

# Oracle® Hospitality Symphony

## Configuration Guide



Release 2.10

E89804-20

October 2019

The Oracle logo, consisting of a solid red square with the word "ORACLE" in white, uppercase, sans-serif font centered within it.

ORACLE®

Copyright © 2010, 2019, Oracle and/or its affiliates. All rights reserved.

This software and related documentation are provided under a license agreement containing restrictions on use and disclosure and are protected by intellectual property laws. Except as expressly permitted in your license agreement or allowed by law, you may not use, copy, reproduce, translate, broadcast, modify, license, transmit, distribute, exhibit, perform, publish, or display any part, in any form, or by any means. Reverse engineering, disassembly, or decompilation of this software, unless required by law for interoperability, is prohibited.

The information contained herein is subject to change without notice and is not warranted to be error-free. If you find any errors, please report them to us in writing.

If this is software or related documentation that is delivered to the U.S. Government or anyone licensing it on behalf of the U.S. Government, then the following notice is applicable:

U.S. GOVERNMENT END USERS: Oracle programs, including any operating system, integrated software, any programs installed on the hardware, and/or documentation, delivered to U.S. Government end users are "commercial computer software" pursuant to the applicable Federal Acquisition Regulation and agency-specific supplemental regulations. As such, use, duplication, disclosure, modification, and adaptation of the programs, including any operating system, integrated software, any programs installed on the hardware, and/or documentation, shall be subject to license terms and license restrictions applicable to the programs. No other rights are granted to the U.S. Government.

This software or hardware is developed for general use in a variety of information management applications. It is not developed or intended for use in any inherently dangerous applications, including applications that may create a risk of personal injury. If you use this software or hardware in dangerous applications, then you shall be responsible to take all appropriate fail-safe, backup, redundancy, and other measures to ensure its safe use. Oracle Corporation and its affiliates disclaim any liability for any damages caused by use of this software or hardware in dangerous applications.

Oracle and Java are registered trademarks of Oracle and/or its affiliates. Other names may be trademarks of their respective owners.

Intel and Intel Xeon are trademarks or registered trademarks of Intel Corporation. All SPARC trademarks are used under license and are trademarks or registered trademarks of SPARC International, Inc. AMD, Opteron, the AMD logo, and the AMD Opteron logo are trademarks or registered trademarks of Advanced Micro Devices. UNIX is a registered trademark of The Open Group.

This software or hardware and documentation may provide access to or information about content, products, and services from third parties. Oracle Corporation and its affiliates are not responsible for and expressly disclaim all warranties of any kind with respect to third-party content, products, and services unless otherwise set forth in an applicable agreement between you and Oracle. Oracle Corporation and its affiliates will not be responsible for any loss, costs, or damages incurred due to your access to or use of third-party content, products, or services, except as set forth in an applicable agreement between you and Oracle.

# Contents

## Preface

---

## 1 Introduction to Symphony

---

EMC Basics	1-1
Multi-Factor Authentication for EMC Access	1-6
Forgotten EMC Password Recovery	1-6
Configuring Access Privileges for Resetting a Password	1-7
Resetting Passwords from the Symphony Web Portal	1-9

## 2 Getting Started

---

## 3 Enterprise

---

Enterprise Organization	3-1
Inheritance and Overrides	3-2
Configuring Permissions for the Enterprise	3-3
Adding Languages	3-3

## 4 Log File Management

---

Modifying the Default Log Archive Purge Settings for Application Services	4-2
Enabling Log Archiving for Workstations	4-2

## 5 Client Application Loader (CAL)

---

Overview of CAL Package Deployment	5-3
Configuring CAL Package Permissions	5-4
Allowing Employees to Install and Authenticate POS Clients and Service Hosts	5-4
Configuring CAL Packages	5-5
Resizing the Initial Workstation Database	5-6
Changing a Custom CAL Package	5-7

CAL Deployment Order	5-8
Adding a Deployment Schedule for the Current CAL Package	5-10
Adding a Deployment Schedule for a Group of CAL Packages	5-11
Configuring the Deployment Schedule to Install CAL on Workstations	5-12
Viewing CAL Package Deployment Schedules	5-13
Changing a CAL Package Version	5-13
Viewing, Reloading, and Saving CAL Package Contents	5-14
Manually Deploying CAL Packages	5-15
Updating CAL Client Workstations	5-16
Distributing CAL from a Property Application Server	5-16
Configuring the Distributed CAL (DCAL) Server	5-17
Changing the CAL Server Location	5-18
Moving the DCAL Server to Another Service Host	5-18
Configuring a DCAL Download Schedule	5-19
Reviewing the DCAL File Download Status	5-19
Assigning a New Workstation to a DCAL Server	5-20

## 6 Distribution

---

Configuring Distribution Privileges	6-2
Distributing Properties and Revenue Centers	6-3
Distributing Records	6-4
Distribution Based on Source, Destination, and Selected Options	6-5

## 7 Properties

---

Adding a Property	7-1
Adding a Revenue Center	7-2
Configuring a Revenue Center Group	7-3

## 8 Zones

---

Creating Zones	8-7
----------------	-----

## 9 POS Workstations

---

Overview of Adding a Workstation	9-1
Adding a Workstation	9-2
Configuring Workstation Transaction Settings	9-4
Setting Offline Transaction Posting Time	9-5
Configuring Workstation Security	9-6
Configuring the Barcode Scanner on the Oracle MICROS Tablet 720	9-7

Configuring the Magnetic Stripe Reader on the Oracle MICROS Tablet 720	9-8
Allowing Employees to Install and Authenticate POS Clients and Service Hosts	9-8
Installing the CAL Client on the Windows Device	9-8
Initiating CAL Authentication on the Windows Device	9-9
POS Clients Running Android Mobile Operating System	9-13
Android Devices and Versions	9-13
Android Functionality Support	9-14
Android Network Requirements	9-15
Android Payments	9-16
Workaround for Android Lollipop 5.0.2 and 5.1	9-16
Configuring the Android Device	9-17
Configuring the Android Device as a Workstation	9-18
Setting the CAL Package for the Android Device	9-18
Installing the Client Application Loader (CAL) on the Android Device	9-19
Installing the Symphony Service Host on an Android Device	9-21
Viewing and Editing Symphony Android Files	9-21
Wireless Signal Strength Threshold	9-22
Configuring Wireless Signal Strength Control Permissions	9-23
Configuring the Wireless Signal Strength Threshold for Tablet Devices	9-23

## 10 Translation for Internationalization

---

Obtaining the Translation Files	10-2
Overview of Configuring Language Translation	10-2
Configuring Translation Privileges	10-3
Adding Languages	10-3
Deploying Standard Translations to Workstations	10-4
Loading Workstation Translations	10-5
Loading EMC Translations	10-5
Loading POS Core and Payment Translations	10-6
Translating Menu Item Records	10-6
Translating EMC Records	10-7
Translating Touchscreen Buttons	10-7
Setting Languages for the Property	10-7
Associating Languages to Employees	10-7
Setting the Default Language for a Workstation	10-8
Printing a Secondary Language on Guest Checks and Customer Receipts	10-8
Configuring Screen Language Buttons	10-8
Copying Translations from One Language to Another	10-9
Exporting a Translation File	10-9

## 11 Employees and Privileges

---

Creating Employee Roles	11-1
Creating Employee Classes	11-3
Adding an Employee	11-4
Deleting an Employee	11-5
Changing Employee Information	11-6
Configuring Employee Shifts	11-8
Configuring Employee Breaks	11-11
Clock-In and Clock-Out Cycles	11-11
Setting Clock-In and Clock-Out Cycles	11-12
Understanding Job Codes	11-13
Configuring Job Codes	11-13
Understanding Tip Tracking	11-14
Configuring Tip Tracking and Reporting	11-15
Configuring Tip Track Front of House Buttons	11-16

## 12 Payments and Currency

---

Types of Payment	12-2
Configuring Base Currency and Alternate Currency	12-3
Configuring Currency Conversions	12-4
Configuring the Cash Tender	12-5
Adding Payment Keys to the Transaction Page	12-7
Understanding Credit Card Tokenization	12-8
Loadable Payment Card Configuration Tasks	12-9
Loadable Payment Configuration Prerequisites	12-10
Universal Transaction Gateway for Shift4	12-11
Communication Methods for Fusebox Payment Card Driver	12-11
stunnel Installation Methods	12-12
Installing stunnel at a Single Host Location	12-13
Installing stunnel Through Symphony as a CAL Package	12-13
Configuring the CAPMS Payment Card Driver	12-14
Configuring the CAPMS Payment Module	12-15
Configuring the Dollars on the Net Payment Card Driver	12-17
Configuring the Dollars on the Net Payment Module	12-18
Configuring the Fusebox Payment Card Driver	12-20
Configuring the Fusebox Payment Module	12-22
Configuring the VisaD Payment Card Driver	12-24
Configuring the VisaD Payment Module	12-26
Configuring the Loadable Payment Card Device	12-27
Creating Front of House Loadable Payment Card Buttons	12-28

The Oracle Payment Interface (OPI)	12-29
Configuring the OPI Driver	12-29
Configuring the OPI Payment Module	12-30
Configuring the Default Payment Tender for OPI	12-31
Updating Credit Card Preambles for OPI	12-31
Configuring the OPI to Settle Transactions at the Start of Day (SOD)	12-32
Configuring an EOD Settlement Button	12-32
Credit Card Preambles for OPI	12-33
Distributing a Third-Party Credit Card Driver Package	12-34
Copying Third-Party Payment Driver Files	12-34
Creating a CAL Package for the Third-Party Payment Card Driver Distribution	12-35
Manually Installing Credit Card Certificates on Workstations	12-35
Understanding Credit Card Batching	12-39
Creating a Credit Card Batch	12-39
Editing a Credit Card Batch	12-40
Settling a Credit Card Batch	12-40
Understanding Pay at the Table	12-41
Configuring a Credit Card Tender	12-42
Credit Card Preamble	12-42
Credit Card Preamble Rules	12-43
Configuring Standard Credit Card Preambles	12-43
List of Standard Credit Card Preambles for the U.S.	12-44
Configuring Credit Card Authorization to Print Merchant Vouchers and Customer Receipts	12-44
Configuring Credit Card Voucher Headers and Trailers	12-45
Configuring the Room Tender	12-46
Configuring the OPERA PMS Payment Driver	12-46
Configuring the MICROS Standard Credit Card Payment Module	12-48
Configuring the Loadable PMS Payment Module	12-51
Configuring the Demo Payment	12-52
Setting the Front of House to Allow Pay at the Table	12-53
Configuring Email Receipts	12-54
Understanding Autosequence Events	12-56
Configuring Autosequence Events	12-56
Configuring the Autosequence Event Schedule	12-57

## 13 Taxes

---

Understanding Tax Rates and Tax Classes	13-2
Configuring Tax Rates and Classes	13-3
Tax Parameters	13-4
Configuring Tax Parameters	13-6

Understanding Serving Periods	13-7
Configuring a Serving Period	13-7
Understanding Order Types	13-7
Configuring Order Types	13-9
Configuring Order Types as Subtotal Keys	13-10
Understanding Tax Labels	13-11
Configuring Tax Labels	13-11
Printing Tax Rate Per Item	13-11
Configuring Tax Rates Per Item to Print on Guest Check, Customer Receipt and Journal	13-12
Configuring Workstation Number and Transaction Number to Print on Guest Check, Customer Receipt, and Journal	13-13
Surcharges	13-13
Configuring Surcharges	13-13

## 14 Discounts

---

Manual Discounts	14-2
Automatic Discounts	14-3
Understanding Automatic Discount Rules	14-4
Understanding Awarding Algorithms	14-5
Discount Award Types	14-7
Discount Exclusivity	14-8
Simple Exclusivity	14-10
Group Exclusivity	14-10
Menu Item Groups	14-12
Configuring Menu Item Groups	14-12
Configuring Discount Privileges	14-13
Configuring Discounts	14-14
Configuring Effectivity Groups	14-18
Understanding Automatic Discounts with Decimal Quantity Menu Items	14-19
Amount Off Examples	14-20
Amount Substitution Examples	14-21
Configuring Decimal Quantity Menu Items	14-22
Configuring an Item Price Substitution Discount	14-22
Configuring a Quantity Threshold Discount	14-24
Configuring a Total Price Threshold Discount	14-25
Configuring a Combination Pricing Discount	14-27
Configuring a Sales Price Discount	14-28
Discounts With Condiments	14-28
Configuring Condiments as Discount Triggers	14-29
Configuring Discounts for Parent Menu Items in a Menu Item Class	14-30



	Configuring a Condiment as the Discount Award	14-30
	Creating the Discount Button	14-32
	Adding Discount and Service Charge Keys to the Transaction Page	14-32
<b>15</b>	<b>Service Charges</b>	
	Configuring Service Charges	15-1
	Adding Discount and Service Charge Keys to the Transaction Page	15-6
	Understanding Menu Item Fees	15-7
	Configuring Menu Item Fees	15-7
<b>16</b>	<b>Menu Items</b>	
	Configuring Menu Item Functionality on the Workstation	16-1
	Configuring Menu Item Availability for Multiple Definitions at the Workstation	16-3
	Adding and Disabling Menu Items	16-3
	Adding Menu Item Keys to the Transaction Page	16-4
	Searching and Filtering Menu Items	16-5
<b>17</b>	<b>Categorizing Menu Items into Groups</b>	
	Configuring Major Groups	17-1
	Configuring Family Groups	17-2
<b>18</b>	<b>Menu Item Master Records</b>	
	Configuring Master Records for Menu Items	18-1
<b>19</b>	<b>Menu Item Classes</b>	
	Configuring Menu Item Classes	19-1
<b>20</b>	<b>Menu Item Definitions</b>	
	Configuring Menu Item Definitions	20-1
	Allowing Users to Override Restricted Menu Item Ranges	20-3
<b>21</b>	<b>Menu Item Pricing</b>	
	Configuring Menu Item Prices	21-2

<b>22</b>	<b>Menu Levels</b>	
	Setting Main, Sub, and Custom Menu Levels	22-3
	Setting the Default Main and Sub Levels for Serving Periods	22-4
	Configuring Auto Menu Levels	22-5
	Setting the Default Menu Levels for a Revenue Center	22-5
	Configuring Active Menu Levels for Menu Item Definitions	22-6
<b>23</b>	<b>Sales Itemizers</b>	
	Configuring Sales Itemizers	23-1
<b>24</b>	<b>Screen Look Up (SLU)</b>	
	Configuring Screen Look Ups for Menu Items	24-1
	Configuring Screen Look Ups for Discounts	24-2
	Configuring Screen Look Ups for Service Charges	24-3
	Configuring Screen Look Ups for Family Groups	24-4
	Configuring Screen Look Ups for Major Groups	24-4
	Configuring Screen Look Ups for Custom Reports	24-5
	Configuring Screen Look Ups for Open Checks	24-5
<b>25</b>	<b>Number Look Up (NLU)</b>	
	Configuring Number Look Ups for Discounts	25-1
	Configuring Number Look Ups for Service Charges	25-2
	Configuring Number Look Ups for Tender/Media Records	25-2
	Configuring Number Look Ups for Main and Sub Levels	25-3
<b>26</b>	<b>Weighed Menu Items</b>	
	Configuring a Weighed Menu Item	26-1
	Understanding Tare Weight	26-1
	Setting the Tare Weight for a Menu Item	26-2
<b>27</b>	<b>Menu Item Waste</b>	
	Allowing Employees to Begin Waste Checks and Run Waste Check Reports	27-2
	Configuring Waste Reasons	27-3
	Configuring Waste Receipt Headers and Trailers	27-3
	Hiding Price Details on Waste Checks	27-4
	Creating the Declare Waste Button	27-4

Menu Item Waste Reports	27-5
-------------------------	------

## 28 Condiments

---

Condiment Groups and Condiment Sets	28-2
Configuring Condiment Groups	28-2
Creating Menu Item Classes for Condiment Groups	28-3
Creating Menu Item Master Records for Condiments	28-3
Configuring Condiment Sets	28-4
Assigning Condiments to Parent Menu Item Classes	28-5
Assigning Default Condiments to Parent Menu Items	28-7
Condiment Prefixes	28-7
Creating Condiment Prefix Menu Items	28-8
Creating Menu Items Classes for Prefixes	28-8
Activating Condiment Prefixes	28-9
Deactivating Condiment Prefixes	28-10
Configuring Touchscreen Buttons for Condiment Prefixes	28-10
Setting Condiment Appearance	28-11
Understanding the Popup Condiment Orderer	28-12
Configuring a Popup Condiment Orderer Page	28-12
Configuring a Revenue Center to Use the Popup Condiment Orderer	28-13
Configuring a Menu Item Class to Use the Popup Condiment Orderer	28-14

## 29 Menu Item Components

---

Components with Condiments	29-2
Creating Menu Item Components	29-2
Assigning Components to a Menu Item	29-3

## 30 Combo and Fixed Price Meals

---

Combo Meal Group Pricing	30-1
Placeholder Menu Items in Combo Meals	30-3
Creating Combo Meal Groups	30-5
Creating Combo Meals	30-8
Configuring Additional Combo Meal Settings	30-10
Creating Combo Meal Pages	30-12
Combo Meal Function Keys	30-13

## 31 Guest Checks

---

Configuring Guest Check Numbers	31-2
Configuring Guest Check Headers and Trailers	31-3
Creating a Tender to End the Current Service Round of Checks	31-4
Adding a Service Total Key to the Transaction Page	31-5
Understanding Fast Transactions	31-6
Configuring Fast Transactions	31-6
Understanding Full Seat Checks	31-7
Configuring the Workstation to Print Full Seat Checks	31-7
Creating a Full Seat Check Button	31-8
Splitting Off an Item	31-8
Configuring a Split Off Item Button	31-9
Conversational Ordering	31-10
Creating Menu Item Master Groups for Conversational Ordering	31-11
Configuring Menu Level Sets for Conversational Ordering	31-11
Configuring Menu Item Classes for Conversational Ordering	31-12
Configuring Menu Items for Conversational Ordering	31-13
Creating Front of House Buttons for Conversational Ordering	31-15
Configuring Employee Privileges for Automatic Check Firing	31-15
Configuring Automatic Check Firing	31-16
Configuring Employee Privileges for Check Re-firing	31-17
Configuring the Check Re-fire Button	31-18
Understanding Suspend and Resume	31-18
Configuring Suspend and Resume	31-18
Creating a Suspend and Resume Button	31-19
Setting the Employee Auto Sign Out Period	31-19
Understanding Follow Me	31-20
Configuring Follow Me Checks	31-20
Order Handling on Open Checks	31-21
Holding and Sending Items to Order Devices	31-22
Setting the Service Total to Send Items to be Prepared While the Check Remains Open	31-22
Setting the Hold and Fire Option	31-23
Setting the Hold and Fire Tender Notification	31-23
Setting a Reminder for Items on Hold	31-24
Setting Checks with Items on Hold to End Current Service Round	31-25
Setting Check Handling with Held Items When Closing Checks	31-26
Configuring Item Hold Buttons	31-27
Team Service	31-27
Reports and Totals Posting for Team Checks	31-28
Enabling Team Service	31-29

Configuring Team Service Privileges	31-29
Configuring Revenue Centers to Delete Service Teams at the Start of Day	31-30
Adding Team Service Buttons	31-31
Printing Multiple Languages on Guest Checks and Customer Receipts	31-32
Configuring Right to Left Reading Languages	31-32
Creating a Print Language List Button	31-33
Creating Print Language Buttons	31-33
Allowing Employees to Manually Replay Checks through the Workstation	31-34
Check Add/Transfer	31-34
Allowing Employees to Add or Transfer Checks	31-34
Configuring the Add/Transfer Revenue Centers	31-35
Configuring Add/Transfer Buttons	31-35

## 32 Workstation Touchscreen Pages

---

Understanding Page Design	32-1
Configuring Function Keys	32-2
Assigning Default Touchscreen Pages	32-2
Changing the Appearance of Workstations and KDS Displays	32-3
Configuring Macros	32-3

## 33 Resetting Daily Totals

---

Start of Day	33-1
Start of Day Business Rules	33-2
Start of Day with Offline Workstations or Server	33-2
Configuring Start of Day	33-3

## 34 Updating POS Client Configuration

---

Setting the Database Update Frequency	34-1
---------------------------------------	------

## 35 Clearing Totals

---

Running the Clear Totals Operation	35-1
------------------------------------	------

## 36 Check and Posting Service (CAPS)

---

Overview of CAPS Configuration Methods	36-2
CAPS Supported Software and Hardware	36-3
CAPS Configuration Tool	36-3
Prerequisite Products for CAPS	36-4

Overview of Setting Up CAPS as a Web Service on Microsoft Internet Information Services (IIS)	36-4
Configuring CAPS on Microsoft IIS with Oracle Database on Enterprise Server	36-5
Configuring CAPS Access	36-5
Configuring the Service Host for CAPS in EMC	36-5
Configuring CAPS with an Oracle Database	36-6
Configuring CAPS on Microsoft IIS	36-7
Configuring CAPS on Microsoft IIS with Oracle Database on Remote Service Host	36-7
Configuring CAPS Access	36-7
Configuring the Service Host for CAPS in EMC	36-8
Preparing the Server to Configure CAPS	36-9
Configuring CAPS with an Oracle Database	36-9
Configuring CAPS on Microsoft IIS	36-10
Configuring CAPS on Microsoft IIS with SQL Server Database on Enterprise Server	36-10
Configuring CAPS Access	36-11
Configuring the Service Host for CAPS in EMC	36-11
Configuring CAPS with a Microsoft SQL Server Database	36-12
Configuring CAPS on Microsoft IIS	36-12
Configuring CAPS on Microsoft IIS with SQL Server Database on Remote Service Host	36-13
Configuring CAPS Access	36-13
Configuring the Service Host for CAPS in EMC	36-13
Preparing the Server to Configure CAPS	36-14
Configuring CAPS with a Microsoft SQL Server Database	36-15
Configuring CAPS on Microsoft IIS	36-16
Upgrading Microsoft IIS CAPS	36-16
Upgrading Microsoft IIS CAPS on Enterprise Server	36-16
Upgrading Microsoft IIS CAPS on Remote Service Host	36-16
Configuring CAPS as a Windows Service with an Oracle Database	36-17
Configuring CAPS Access	36-17
Configuring the Service Host for CAPS in EMC	36-18
Preparing the Server to Configure CAPS	36-18
Configuring CAPS with an Oracle Database	36-19
Copying the Database Settings	36-20
Starting the CAPS Service	36-20
Configuring CAPS as a Windows Service with a Microsoft SQL Database	36-20
Configuring the Service Host for CAPS in EMC	36-20
Preparing the Server to Configure CAPS	36-21
Starting the CAPS Service	36-22
Optional CAPS Configuration Tasks	36-22
Configuring the Show Database Provider Button	36-22
Encrypting Database Credentials	36-22

Verifying CAPS Installation	36-23
Configuring IIS Application Pool Settings	36-23
Configuring Recycle Settings for the IIS Application Pool	36-23
Restarting Microsoft IIS CAPS	36-23
CAL Installation Prerequisites for a Workstation without the POS Interface (CAPS Only Workstation)	36-24
Configuring the Deployment Schedule to Install CAL on a Workstation without the POS Interface	36-24
Installing CAL on a Workstation without the POS Interface	36-25

## 37 Printers

---

Print Controller	37-1
Roll Printer	37-2
Slip Printer	37-3
Internet Protocol (IP) Printer	37-3
Bluetooth Printer	37-4
Printer Groups	37-4
Configuring a Printer	37-5
Creating, Editing, and Removing Printer Groups	37-8
Configuring the Change Default Printer Destination Button	37-9
Printer DIP and Memory Switch Settings	37-10
Epson Printer Setup for IDN Module	37-10
Printer DIP Switch/Memory Switch Setting when using UB-IDN (IDN02) Interface	37-12
Printer DIP Switch/Memory Switch Setting when using UB-IDNML (IDNML02) Interface	37-13
Printer DIP Switch/Memory Switch Setting when using UB-E02 (E03) Interface	37-14
Printer DIP Switch/Memory Switch Setting when using UB-EML Interface	37-16
Printer DIP Switch/Memory Switch Setting when using UB-EML02 Interface	37-17
DIP Switch Definitions	37-19

## 38 Logo Printing

---

Uploading a Logo to Symphony	38-1
Assigning a Logo to Guest Checks and Customer Receipts	38-2

## 39 Kitchen Display System

---

KDS Controller	39-2
Configuring a KDS Controller	39-2
Configuring a KDS Display	39-7
Configuring the KDS Bump Bar	39-11

Configuring the KDS Toolbar	39-12
KDS Bump Bar and Toolbar Functions	39-13
Configuring KDS Course Overrides	39-15
Configuring a Backup KDS Controller	39-17
Creating a KDS Order Device	39-18
Prep Station Linking	39-23
Linking Prep Stations	39-23
Understanding Order Receipt Layouts	39-24
Configuring an Order Receipt Layout	39-24
KDS Chit Layout Styles	39-25
SEI KDS Chit Layout Styles	39-34
KDS Load Balancing	39-37
Creating KDS Distribution Groups	39-38
Assigning a KDS Prep Display to a Distribution Group	39-38
Kitchen Themes	39-38
Workstation Alerts for Unsuccessful Sending to Order Devices	39-39
Enabling Workstation Alerts	39-40
Configuring Employee Privileges for Kitchen Themes	39-40
Creating Kitchen Themes	39-41
Importing Current Settings to a Kitchen Theme	39-42
Creating a Kitchen Theme Period	39-42
Changing the Appearance of Workstations and KDS Displays	39-43
Upgrading the RDC Order Device	39-44
Upgrading the RDC Operating System	39-44
Resetting the RDC Factory Settings	39-45
Installing the KDS Client	39-45
CAL Installation Prerequisites for KDS	39-46
Allowing Employees to Install and Authenticate POS Clients and Service Hosts	39-46
Configuring the Deployment Schedule to Install CAL on KDS	39-46
Installing CAL on the KDS	39-47

## 40 Peripheral Devices

---

Assigning and Unassigning a Cash Drawer	40-1
Configuring a Cash Drawer	40-3
Coin Dispenser	40-5
Configuring a Coin Dispenser	40-6
Magnetic Stripe Reader	40-6
Installing the MSR Sleeve for Oracle MICROS Tablet E-Series 8-Inch and 11-Inch Devices	40-7
Configuring a Magnetic Stripe Reader	40-7



Testing the MSR Sleeve for Oracle MICROS Tablet E-Series 8-Inch and 11-Inch Devices	40-8
Barcode Reader Setup Methods	40-9
Configuring a Barcode Reader Using the Barcodes Module Method	40-10
Configuring a Barcode Reader Using the Number Lookup (NLU) Method	40-11
Fingerprint Scanning	40-12
Configuring the Biometrics CAL Package Deployment	40-13
Configuring Employee Privileges for the Fingerprint Reader	40-13
Setting the Front of House to Assign Employee Personal Identification Number (PIN)	40-14
Configuring the Workstation Employee Fingerprint Sign In Options	40-14
Scanning a Fingerprint	40-15
Configuring a Scale	40-16
Sales Recording Module (SRM)	40-17
Enabling SRM for a Property	40-17
Configuring SRM Payment Types for Tenders	40-18
Enabling SRM for Printers	40-19
Configuring the Quebec SRM Control Button	40-19
Allowing Employees to Enable and Disable SRM from the Workstation	40-20

## 41 Reporting

---

Allowing Employees to Run Reports	41-1
List of Workstation PMC Reports	41-1
Configuring Employee Privileges for Oracle Hospitality Reporting and Analytics	41-4
Configuring the Log Files for Oracle Hospitality Reporting and Analytics	41-4
Viewing Move History Logs	41-5
Configuring Data Retention Limits	41-6

## 42 Auditing

---

Understanding the Audit Trail	42-1
Using the Audit Trail	42-1
Understanding Audit This Record	42-3
Using Audit This Record	42-4

## 43 Importing and Exporting Data

---

Configuring the Import/Export Service Privileges	43-1
Configuring the Import/Export Service	43-2
Increasing the Import File Size	43-2

Import/Export Service Components	43-3
----------------------------------	------

## 44 Loyalty and Gift Card Interfaces and Drivers

---

Loyalty and Stored Value Configuration Prerequisites	44-2
Loyalty Configuration Tasks	44-3
Configuring Loyalty and Stored Value Privileges	44-3
Setting Loyalty Options	44-7
Configuring the Loyalty Driver	44-8
Configuring the Loyalty Module	44-10
Stored Value Configuration Tasks	44-11
Setting Stored Value Options	44-11
Configuring the Stored Value Driver	44-12
Configuring the Stored Value Module	44-14
Creating Front of House Loyalty and Stored Value Buttons	44-15
Voiding Points on a Re-opened Check	44-18
XProcessor Extension Application Migration	44-19

## 45 Events

---

Configuring Event Privileges and Permissions	45-1
Specifying Ad Hoc Reports	45-3
Enabling Events	45-4
Configuring Event Types and Sub Types	45-5
Creating an Event	45-6
Configuring an Event Area	45-7
Linking Events	45-8
Breaking Linked Events	45-9
Cancelling an Event	45-10
Configuring Event Information to Print on Checks and Receipts	45-11
Creating Task Schedules	45-12
Configuring the Front of House Event Status Bar	45-14
Configuring the Front of House Event Buttons	45-15
Event Information in Reporting and Analytics Reports	45-16

## 46 Dining Room Tables and Seating

---

Standard and Enhanced Table Management	46-2
Configuring the Standard Table Management Interface	46-3
Creating Standard Dining Tables	46-5
Configuring the Standard Dining Table Status Set	46-5
Table Management	46-6

Reservation List	46-7
Wait List	46-7
Table Management, Reservation, and Wait List Configuration Prerequisites	46-7
Configuring Table Management Privileges	46-8
Configuring Reservation Privileges	46-10
Configuring Wait List Privileges	46-11
Configuring Servers for Table Management	46-12
Configuring Properties for Table Management	46-13
Configuring Custom Images for Table Management	46-13
Configuring KDS or Dining Course Colors and Images for Table Management	46-13
Configuring Dining Course Pacing	46-14
Configuring the Service Total Tender for Table Management	46-14
Enhanced Dining Tables	46-14
Setting Dining Table Classes	46-15
Setting Enhanced Dining Table Attributes	46-16
Configuring Enhanced Dining Tables	46-16
Setting Table Decorator Images	46-17
Configuring Server and Table Availability	46-19
Setting Table Management Options	46-20
Configuring Table Suggestion Factors	46-22
Table Management Alerts	46-23
Configuring Alerts	46-24
Table Management Sections	46-24
Configuring Sections	46-24
Creating the Front of House Reservation List	46-25
Creating the Front of House Wait List	46-27
Front of House Table Management Tasks	46-30
Host Command Area	46-30
Configuring the Host Command Area	46-31
Dining Table Status	46-31
Configuring the Dining Table Status	46-32
Employee Lines	46-33
Configuring Employee Lines	46-33
Section Layout	46-34
Creating a Section Layout	46-35
Creating Enhanced Dining Tables	46-35
Setting Table Management Functions in Check Detail	46-36
Creating the Employee Section Assignment Report Button	46-36
Configuring Table Cancellation Reasons	46-37
Setting Reservation Timing Parameters	46-37
Setting Wait List Timing Parameters	46-38

Reservation Periods	46-39
Configuring Effectivity	46-40
Configuring Acceptance Limits	46-41
Configuring Occupancy Limits	46-41
Configuring Seating Limits	46-42
Configuring Target Turn Times	46-43
Table Management Configuration Levels	46-44
Reservation Configuration Levels	46-45
Wait List Configuration Levels	46-46

## 47 Enterprise Cash Management

---

Specifying Ad Hoc Reports	47-2
Configuring ECM Privileges	47-3
Allowing Users to View Blind Totals	47-9
Allowing Assigned Receptacle Access	47-10
Configuring Accounting Methods for Users	47-10
Allowing Users to Override Employee Class Options	47-11
Tracking Tender Transaction Items	47-12
Tracking Service Charge Transactions	47-13
Tracking Discount Transactions	47-13
Creating, Editing, and Deleting Cash Management Reasons	47-13
Cash Management Classes	47-14
Adding Transaction Items	47-14
Adding Counting Units	47-15
Cash Pull Threshold Set	47-16
Creating, Editing, and Deleting a Cash Pull Threshold Set	47-16
Cash Count Threshold Set	47-17
Creating, Editing, and Deleting a Cash Count Threshold Set	47-17
PAR Level Set	47-18
Creating, Editing, and Deleting a PAR Level Set	47-18
Count Sheet	47-18
Creating, Editing, and Deleting a Count Sheet	47-19
Adding and Deleting a Page	47-19
Adding and Deleting a Group	47-20
Adding and Deleting a Unit	47-21
Sorting and Modifying the Order of Pages, Groups, and Units	47-21
Viewing the Totals Page	47-22
Creating, Editing, and Deleting an Account	47-22
Creating, Editing, and Deleting a Vendor	47-23
Creating and Editing a Template	47-23

Creating, Editing, and Deactivating Receptacles	47-25
Setting Cash Management Parameters	47-26
Creating Front of House Screens	47-29
Configuring a Smart Key on a Workstation	47-33
Configuring a Till Through Extensibility	47-34
Configuring a Bank Deposit Reference Through Extensibility	47-34
ECM Reporting	47-35
ECM Enterprise Reports	47-35
Enabling Reports in Enterprise Back Office	47-36
ECM Property Reports	47-37
ECM Workstation Hardware	47-38
Enterprise Cash Management Configuration Levels	47-38

## 48 Engagement Cloud Service

---

System Requirements and Supported Devices	48-2
Firewall and Communication	48-3
Security Precautions	48-5
Setting File Management Permissions	48-5
Registering and Logging In	48-6
Retrieving Your Engagement Organization ID	48-7
Language Translation Tasks	48-7
Adding a New Language to Hub and Welcome Pages	48-8
Adding a Language to the EMCWeb File	48-8
Adding a Language File to the Engagement Configuration Application Server	48-9
Setting Multiple Languages	48-9
Understanding Engagement Manager Procedures	48-10
Adding Engagement Manager Procedure Tiles to the Hub Page	48-11
Editing the Check Header and Trailer	48-11
Editing Bulk Menu Item Prices	48-12
Adding an Employee From a Template	48-13
Deactivating an Employee	48-14
Adding a New Menu Item Using an Existing Menu Item as a Template	48-15
Adding Images to Menu Items	48-15
Adding or Changing an Employee's Profile Image	48-16
Creating Pages for Engagement Users	48-17
Modifying Pages for Engagement Users	48-17
Publishing, Unpublishing, and Republishing Pages	48-17
Assigning Logos and Colors to Pages	48-18
Understanding Tagging	48-18
Adding Tags and Creating Relationships between Pages, Employees, and Tablets	48-21

Deleting Tags	48-21
Understanding Widgets	48-21
The IP Camera Widget	48-21
Adding and Moving Widgets	48-22
Creating Tiles (Adding Widgets to a Page)	48-23
Adding Command Buttons	48-25
Understanding Widget Timing Values	48-25
Configuring Widget Timing Values	48-26
List of Widgets	48-26
Viewing the Maximum Data Limit for Hosted Engagement Server	48-29

## 49 Transaction Services

---

Configuring the Transaction Services Workstation Client	49-1
Configuring the Transaction Services Default Employee	49-2
Understanding the Order Information Service	49-3
Activating the Extension Application for Order Information Service	49-3
Configuring Front of House Order Information Service Buttons	49-3
Order Information Service Functions and Extensibility Arguments	49-5

## 50 Cruise Ship Time Zone Settings

---

Changing the Time Zone	50-1
Understanding Start of Business Day	50-1
Configuring Start of Day	50-2
Understanding Workstation Control Privileges	50-3
Configuring Workstation Control Privileges	50-4

## 51 Interfaces with Symphony

---

Configuring the OPERA PMS Enhanced Interface	51-1
Inserting the Extension Application Files for OPERA	51-15
Configuring OPERA Content Information	51-18
Content Text Settings for the OPERA PMS	51-19
Configuring the OPERA PMS Interface	51-21
Enabling the OPERA PMS Interface for a Revenue Center	51-23
Adding the Tender/Media Data Extension for OPERA	51-24
Configuring the Room Charge Buttons for the OPERA PMS	51-25
Updating the SIM OPERA Interface to a Newer Version	51-27

# Preface

Oracle Hospitality Symphony is a cloud-based Point-of-Sale (POS) solution that provides business management capabilities using a single tool with vast integration capabilities to property management systems, paperless kitchen display systems, credit card interfaces, and reporting applications.

## Purpose

This Configuration Guide provides instructions to set up Symphony version 2.10.

## Audience

This document is intended for system administrators of Oracle Hospitality Symphony version 2.10.

## Customer Support

To contact Oracle Customer Support, access My Oracle Support at the following URL:

<https://support.oracle.com>

When contacting Customer Support, please provide the following:

- Product version and program/module name
- Functional and technical description of the problem (include business impact)
- Detailed step-by-step instructions to re-create
- Exact error message received and any associated log files
- Screen shots of each step you take

## Documentation

Oracle Hospitality product documentation is available on the Oracle Help Center at <http://docs.oracle.com/en/industries/food-beverage/>.

## Simphony eLearning

The Simphony Learning Subscription provides additional product knowledge through interactive training, guided video tours, and helpful knowledge checks. After exploring the documentation library, use your Oracle Single Sign On to check out the Simphony learning opportunities at [Hospitality Learning Subscriptions](#).

## Revision History

---

Date	Description of Change
February 2018	Initial publication.

---

Date	Description of Change
March 2018	Updated Adding a Workstation with Oracle MICROS Compact Workstation 310.
April 2018	Updated Configuring the Cash Tender by adding Amount Options table.
May 2018	Removed Configuring Menu Item Availability from the EMC.
July 2018	<ul style="list-style-type: none"> <li>• Updated Chapter 36: Check and Posting Service (CAPS) content, specifically the CAPS Configuration Tool section.</li> <li>• Updated Chapter 13: Taxes section by adding Tax Parameters content.</li> <li>• Updated Chapter 9: POS Workstations content, specifically the Android Payment section.</li> </ul>
August 2018	<ul style="list-style-type: none"> <li>• Removed CAL Installation Prerequisites for Windows Devices from Chapter 9: POS Workstations.</li> <li>• Updated Creating a KDS Order Device, specifically backup printing for order devices (step 4).</li> <li>• Updated Configuring Automatic Check Firing, specifically the description for option 3 - Enable Autorfire in this Revenue Center.</li> <li>• Updated Setting the Hold and Fire Option by adding warning about use with DOM.</li> <li>• Updated Setting Check Handling For Closing Checks With Held Items.</li> </ul>
November 2018	Updated Configuring a Quantity Threshold Discount by adding Allow award of higher priced item option.
December 2018	<p>Updated the following sections in Chapter 10: Translation for Internationalization:</p> <ul style="list-style-type: none"> <li>• Added Deploying Standard Translations to Workstations.</li> <li>• Updated Loading Workstation Translations.</li> </ul> <p>Updated the following sections in Chapter 37: Printers:</p> <ul style="list-style-type: none"> <li>• Removed Oracle MICROS Mini Printer as it is not supported with Symphony.</li> <li>• Updated Configuring a Printer by removing references to the Oracle MICROS Mini Printer.</li> </ul> <p>Added information to Chapter 38: Logo Printing.</p> <p>Updated Configuring SRM Payment Types for Tenders (step 6) in Chapter 40: Peripheral Devices.</p>
January 2019	Added sections regarding DIP and memory switch settings for printers to Chapter 37: Printers.



---

<b>Date</b>	<b>Description of Change</b>
February 2019	Updated Chapter 36 about configuring CAPS running as a Windows Service. Specifically, added content about the CAPS service host Oracle client installation requirements.
March 2019	Updated Oracle Payment Interface (OPI).
April 2019	Removed step from Configuring Decimal Quantity Menu Items.
September 2019	Added missing devices to System Requirements and Supported Devices in Chapter 48: Engagement Cloud Service.
October 2019	Added Chapter 51: Interfaces with Symphony. Updated Fingerprint Scanning in Chapter 40: Peripheral Devices.

---

# 1

## Introduction to Symphony

Oracle Hospitality Symphony is an Enterprise-class Point-of-Sale (POS) software product. Symphony can be centrally hosted at Oracle's data centers, or customers can self-host Symphony at a single property. Symphony can handle a multi-property POS configuration consisting of thousands of workstations generating terabytes of sales data, as well as scale down to smaller single-property configurations.

Administrators can configure Symphony using the Back of House (BOH) Enterprise Management Console (EMC) application. This application allows you to set up the Enterprise, properties, revenue centers, and zones from a PC that has access to the central server.

Symphony interfaces with the following devices and solutions:

- Peripheral Devices
- Printers and Order Devices, such as a Kitchen Display System (KDS)
- Credit Card Drivers
- Loyalty and Gift Card Interfaces and Drivers
- Enterprise Cash Management (ECM)
- Table Management System (TMS)
- Oracle Hospitality Reporting and Analytics
- Oracle Hospitality OPERA 5 Hotel Property Systems
- [EMC Basics](#)
- [Multi-Factor Authentication for EMC Access](#)
- [Forgotten EMC Password Recovery](#)
- [Configuring Access Privileges for Resetting a Password](#)
- [Resetting Passwords from the Symphony Web Portal](#)

## EMC Basics

This section describes the basic functions in EMC.

### EMC Configuration Hierarchy

The Symphony EMC has three areas that allow you to choose where in the EMC's hierarchal tree that you want to define certain definitions and records. In EMC, modules are configured (in order from highest to lowest) on the enterprise, property, or revenue center levels. See [Enterprise](#) for more information on EMC levels.

An employee's assigned role determines whether users have full or partial access to specific modules on certain levels. See [Employees and Privileges](#) for more information on employee roles

## EMC Home Page

When you log in, EMC defaults to the Home Page. The Home Page shows a navigation tree in the Locations pane based on the EMC levels. Modules appear to the right of the Locations pane and filters based on the location you select from the navigation tree.

You can use the filters below the Locations pane to easily search for properties, revenue centers, and zones within a large enterprise.

**Figure 1-1 EMC Home Page Filters**



- **Filter:** Enter the name of a property, revenue center or zone to filter the navigation tree.
- **Coll:** Click to collapse the navigation tree. If the navigation tree is collapsed when filtering, the search returns the top most level. For example, when you search for a revenue center, the navigation tree shows the property to which it belongs.
- **Exp:** Click to expand the navigation tree.
- **Show all zones:** Select to shows zones in the navigation tree and to include zones in your search.
- **#:** Select to show the object number in front of properties, revenue centers, and zones in the navigation tree.

EMC remembers each users state at the time of exit. Therefore, the next time you log in, the EMC Home Page defaults to the location that was last viewed by you when EMC was closed.

## Table View and Form View

Table view and form view are two views used to show information within modules.

Most modules open to table view, which is a grid view showing all records sorted by object number. Typically, the first two columns are the object number and name of the record. Table view is generally used when making bulk changes. When a record is changed, table view highlights the record in yellow.

Form view shows the same content that is available in table view, but for a single record. Sometimes, depending on the data, form view shows more information than table view. For example, the Employee Roles module, which contains only object number and name in table view, contains several configurable tabs in form view. Form view includes a navigation bar that shows the object number and name of each record available, making record-to-record navigation easier. To navigate to a specific record, simply select the record within the navigation bar and the corresponding form view tabs populate with the selected record's information.

Three methods are available for switching between table view and form view:

- Click the **Toggle Table/Form View** icon on the EMC toolbar.
- While in table view, double-click the Object Number column to open form view.
- While in form view, double-click the object number/name in the navigation bar to open table view.

### Module Record Filters

By default, most modules in EMC show all of the available records when opened. You can remove unwanted records from view using the filters available in table view. The filters appear above the table and is set to Show All Records.

**Figure 1-2 EMC Filter Section in Table View**



When records are filtered,

- Form view shows only the records that appear in table view. While in form view, the navigation buttons (next, previous, first, and last) change to only the records that appear in table view.
- The Option Bit Comparison Dialog shows only the records that appear in table view.

The Menu Item Maintenance module provides additional filters for streamlining the records. See [Searching and Filtering Menu Items](#) for more information.

### Sorting Records

In EMC, you can sort records presented in tables by one of the columns. By default, records are sorted by object number. To sort by another column, click the column header.

### EMC Toolbar

EMC uses common controls that are familiar to most users. For example, the top of the screen includes a menu bar with the standard File, Edit, and View options. Additionally, a number of navigational icons are available on the toolbar.

The following table describes the icons on the EMC toolbar. You can also access the functions performed by these icons within the menu bar.

**Table 1-1 EMC Toolbar Icons**



Toolbar Icon	Name	Function	Available in Table View?	Available in Form View?
	Refresh	Performs a refresh of the data in the current module.	Yes	Yes
	Close	Closes the currently active module.	Yes	Yes

Table 1-1 (Cont.) EMC Toolbar Icons






















Toolbar Icon	Name	Function	Available in Table View?	Available in Form View?
	Close All	Closes all open modules.	Yes	Yes
	Location Selector	Opens the current module in another property or revenue center. This icon is enabled only if you open a module from the property or revenue center level.	Yes	Yes
	Language Translation	Opens the EMC Record Translation dialog. This icon is enabled only when the current GUI control is a translatable text field.	Yes	Yes
	Print	Opens a dialog that allows you to print records from table view.	Yes	No
	Save	Saves changes to records in the currently active module. This icon is enabled only when changes have are made to the current module. When you insert a new record to a module, Symphony automatically saves that record. To invoke this icon, you must make initial entries or modify an existing record entry.	Yes	Yes
	Save All	Saves changes to records in all open modules. This icon is enabled only when any open module has its records change.	Yes	Yes
	Insert	Adds a new record to the module. This icon is enabled only when the current module supports the Insert functionality and only when the logged-in user has Employee Role permissions to add new records to the module.	Yes	Yes
	Delete	Deletes records. This icon is enabled only when the current module supports the Delete functionality, and only when the logged-in user has Employee Role permissions to delete records from the module.	Yes	Yes
	Distribute	Distributes records. This icon is enabled only when the EMC user is associated with an Enterprise Role with the option <b>Distribute</b> enabled, and only when the current module supports distribution.	Yes	Yes
	Copy Record(s)	Copies records while in table view.	Yes	No

Table 1-1 (Cont.) EMC Toolbar Icons

Toolbar Icon	Name	Function	Available in Table View?	Available in Form View?
	Undo/Redo	Performs the undo/reload function. You cannot undo the addition or deletion of a record. EMC uses a record-level undo, where all changes to a single record are undone. You cannot undo a previous change because the flow and layout of EMC make this an impractical option. The standard Ctrl+Z functionality does exist to undo changes to a text field. In Employee Maintenance and Menu Item Maintenance, undo is available through the right-click menu only.	Yes	Yes
	Paste Record(s)	Pastes records while in table view.	Yes	No
	Toggle Table/Form View	Switches the current module between table view and form view.	Yes	Yes
	First Record	Navigates to the first record in the module.	No	Yes
	Previous Record	Navigates to the previous visible record in the module.	No	Yes
	Next Record	Navigate to the next record.	No	Yes
	Last Record	Navigates to the last record in the module.	No	Yes
	Go To	Opens a dialog that allows you to type an object number and navigate to the specified record.	Yes	Yes
	Find	Opens a dialog that allow you to find a record based on text comparison in any column.	Yes	No
	Go To Previous	In some modules, go to links are provided to quickly open other modules. For example, the Job Codes module includes a go to link to open the Employee Classes module. After clicking a go to link, this icon is enabled. When clicked, it closes the module that you were navigated to (for example, Employee Classes) and returns you to the module from which the link was pressed (for example, Job Code).	N/A	N/A
	Navigation Bar	Switches the visibility of the navigation bar in form view.	No	Yes

## Multi-Factor Authentication for EMC Access

To adhere to Payment Card Industry (PCI) version 3.2 standards, Multi-Factor Authentication (MFA) has been added to enhance EMC access security. When MFA is enabled, upon logging into the EMC, you are required to enter a temporary One-Time Password (OTP) that is emailed to you. OTPs are valid for one single entry for the individual attempting to log onto the EMC at that time. One-Time Passwords are only valid for five minutes after they are generated by the system. MFA can be enabled during a Symphony installation or upgrade, or after an installation is completed, using the EMC.

### Prerequisites

To utilize this functionality, the following requirements must be met:

- For MFA implementation, you must install and make network accessible, two separate Simple Mail Transfer Protocol (SMTP) email servers (each to be designated as either a Primary or Backup server). This allows users to receive their OTP via email, each time they attempt to log onto the EMC. An SMTP Backup server is required to provide EMC access redundancy in the event that the Primary SMTP server fails for any reason.
- Each employee using the EMC or Symphony Web Portal (SWP) must have a valid email address configured in their employee record

The *Oracle Hospitality Symphony Installation Guide* and the *Oracle Hospitality Symphony PA-DSS Implementation Guide* contain more information about Multi-Factor Authentication.

- [Forgotten EMC Password Recovery](#)

### Related Topics

- [Configuring Access Privileges for Resetting a Password](#)
- [Resetting Passwords from the Symphony Web Portal](#)

## Forgotten EMC Password Recovery

Staff members occasionally forget their password to access the EMC or Symphony Web Portal (SWP). You can reset your password or, in some cases, assist others in resetting their password (if you are privileged to do so). This is accomplished by receiving a temporary, One-Time Password (OTP) via email, which then allows you to log on and reset your password. To further enhance security, you are prompted by the system to choose three security questions from a drop-down list. You must then enter the answers (known only to you) to each of the security questions.

OTPs are valid for one single entry for the individual attempting to log on to the EMC at that time. One-Time Passwords are only valid for five minutes after they are generated by the system.

If you are locked out of the EMC, you cannot reset your own password (regardless if you have the necessary access privileges assigned to your account). You must notify another privileged user to assist you in resetting your EMC password.

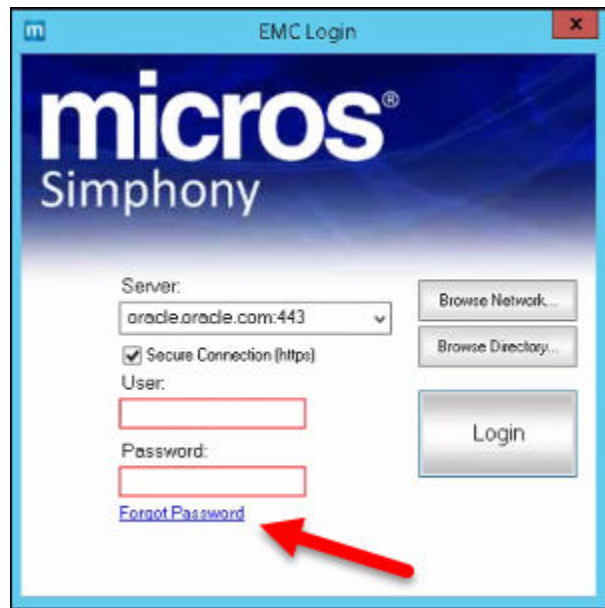
### Prerequisites

To use this functionality, the following requirements must be met:

- You must install and make network accessible, two separate Simple Mail Transfer Protocol (SMTP) email servers (each to be designated as either a Primary or Backup server). This is required so that One-Time Passwords can be emailed to employees as needed.
- To use the **Forgot Password** link, each employee using the EMC must have a valid email address configured in their employee record

You can reset the password using the **Forgot Password** link on the EMC Login screen.

Figure 1-3 EMC Login Forgot Password Link



- [Multi-Factor Authentication for EMC Access](#)

#### Related Topics

- [Configuring Access Privileges for Resetting a Password](#)
- [Resetting Passwords from the Symphony Web Portal](#)

## Configuring Access Privileges for Resetting a Password

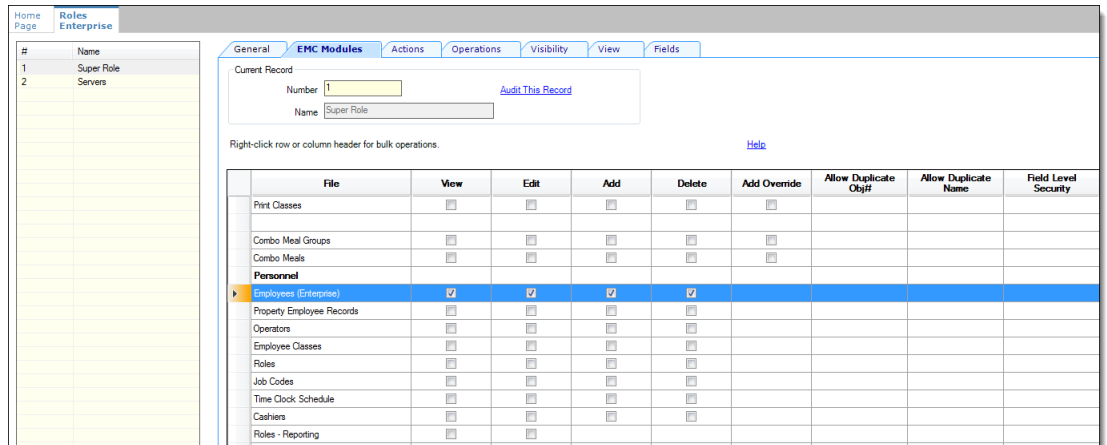
To access and reset passwords for other users, you need to be assigned the appropriate privileges in the EMC.

1. Select the **Enterprise level**, click **Configuration**, and then click **Roles**.
2. Click the **EMC Modules** tab and scroll to the **Personnel** section.
3. Select the options for the **Employees (Enterprise)** access privileges for each of the following columns:



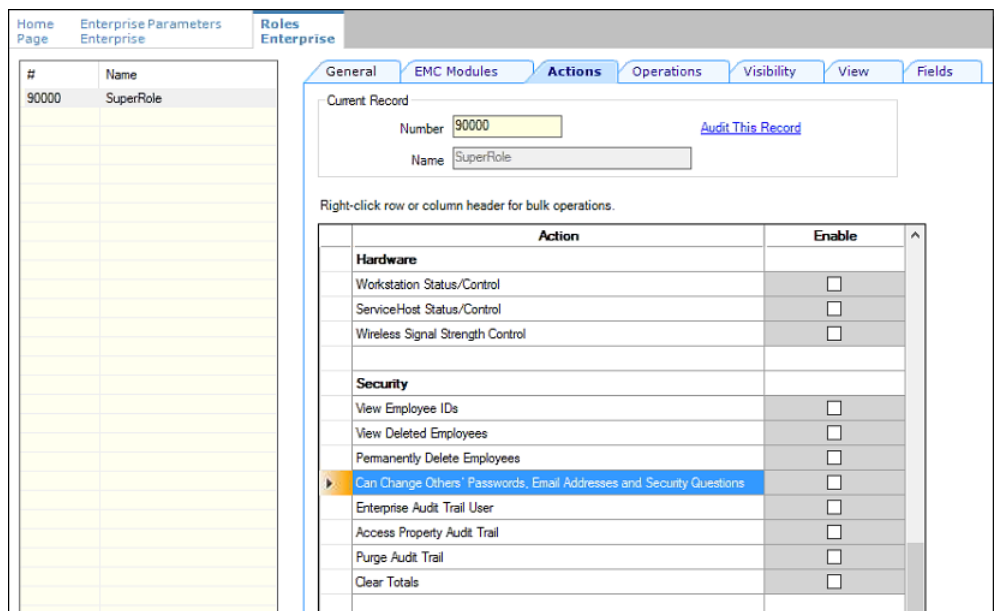
- View
- Edit
- Add
- Delete

Figure 1-4 Roles for EMC Modules



4. Click **Save**.
5. Click the **Actions** tab, and then scroll through the Action column until you reach the Security section.
6. Select the **Can Change Others' Passwords and Email Addresses and Security Questions** check box to enable the option, and then click **Save**.

Figure 1-5 Roles Actions Security Settings



7. Ensure that all users requiring MFA configuration permissions are assigned a role that have these access privileges enabled.

- [Resetting Passwords from the Symphony Web Portal](#)

#### Related Topics

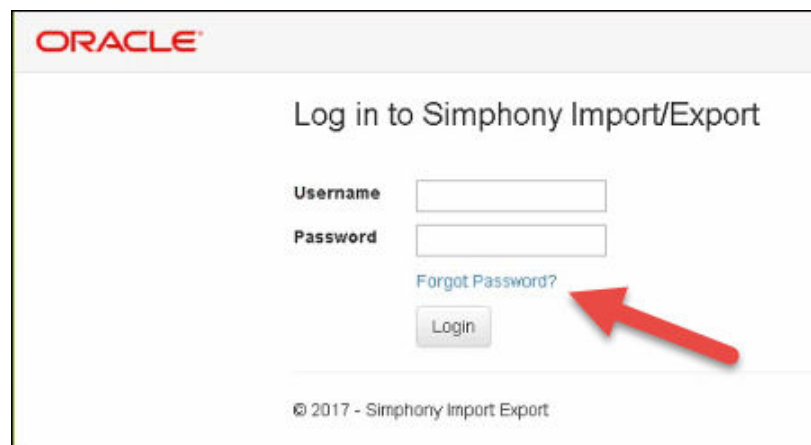
- [Multi-Factor Authentication for EMC Access](#)
- [Forgotten EMC Password Recovery](#)

## Resetting Passwords from the Symphony Web Portal

You can reset passwords and configure your Security Questions from the Symphony Web Portal (SWP) page. To change your password:

1. Open the Symphony Web Portal URL. When prompted, enter your **Username**, and then click the **Forgot Password** link. You are provided with a One-Time Password (OTP) via email.

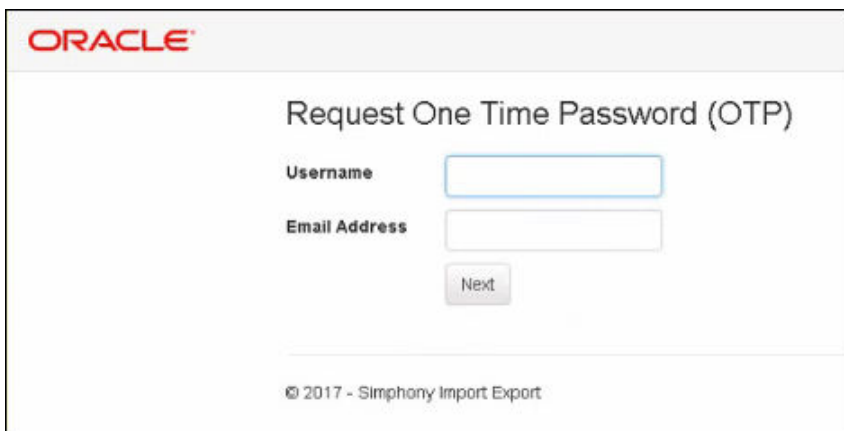
**Figure 1-6 Import/Export Log in Forgot Password Link**



The following prerequisites are validated.

2. When prompted, enter your **Username** and registered **Email Address**.

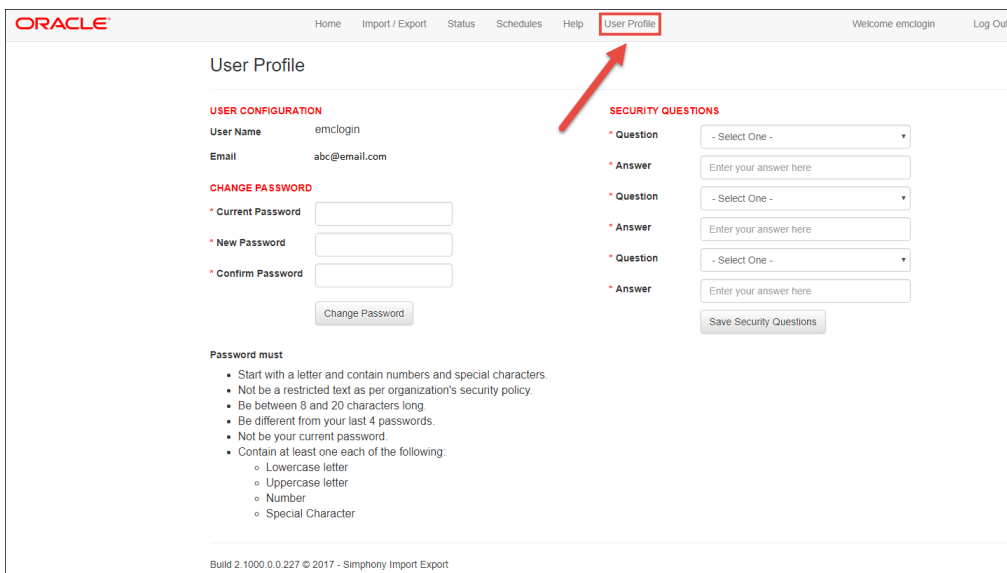
Figure 1-7 Request One Time Password Screen



3. The system validates the information you entered, and shows a details page where you must correctly answer your security questions as configured in the system. Upon entering your validated logon and security question responses, a OTP token is sent to your email account, and you are redirected to the Forgot Password page. You are prompted to enter your OTP and your new password and to confirm it by entering it again.
4. When you click the **Forgot Password** link from the EMC Log-in screen, the system redirects you to the **Request One Time Password (OTP)** page of the SWP in a browser. To log in, enter the following information, and then click **Next**:
  - **Username**
  - **Email Address**

From the SWP, you can change your password as well as update your security questions. The following screen shows the default User Profile screen. You can access the User Profile screen from the SWP page by clicking the **User Profile** link on the toolbar.

Figure 1-8 Simphony Web Portal (SWP) User Profile Screen



- [Configuring Access Privileges for Resetting a Password](#)

**Related Topics**

- [Multi-Factor Authentication for EMC Access](#)
- [Forgotten EMC Password Recovery](#)

# 2

## Getting Started

This chapter provides a high-level overview of setting up the Symphony application for the first time.

**Table 2-1 Getting Started**

<b>I Want To</b>	<b>Go To</b>
Configure the business start of day	<a href="#">Resetting Daily Totals</a>
Add properties	<a href="#">Adding a Property</a>
Configure languages	<a href="#">Adding a Language</a>
Set up currencies	<a href="#">Payment and Currency</a>
Add revenue centers	<a href="#">Adding a Revenue Center</a>
Add employees	<a href="#">Employees and Privileges</a>
Add menu items	<a href="#">Menu Items</a>
Add condiments to menu items	<a href="#">Condiments</a>
Create combo meals	<a href="#">Combo and Fixed Price Meals</a>
Configure the active serving period for menu items	<a href="#">Menu Levels</a>
Set up service charges	<a href="#">Service Charges</a>
Set up taxes	<a href="#">Taxes</a>
Set up discounts	<a href="#">Discounts</a>
Customize guest checks and receipts	<a href="#">Guest Checks</a>
Add workstations	<a href="#">POS Workstations</a>
Create workstation touchscreens	<a href="#">Workstation Touchscreen Pages</a>
Set up Kitchen Display Systems	<a href="#">Kitchen Display System (KDS)</a>
Set up printers	<a href="#">Printers</a>
Set up cash drawers, coin dispenses, barcode scanners, and other peripheral devices	<a href="#">Peripheral Devices</a>

# 3

## Enterprise

The term Enterprise refers to the entirety of a Symphony application. Symphony supports multiple properties, and administrators can configure each property somewhat independently. Each property can also coexist with other properties. The Symphony Enterprise offers a single application for configuration of multiple stores, and allows these stores to report centrally to a single Enterprise database.

A true Enterprise Symphony configuration includes more than one property, such as a franchise environment. In addition, its flexibility is ideal for multiple-property environments even if operations differ from one property to the next. In a true Enterprise, the importance of the EMC configuration hierarchy is apparent to the administrator. Some module components are configured at the Enterprise and then used in various properties and revenue centers.

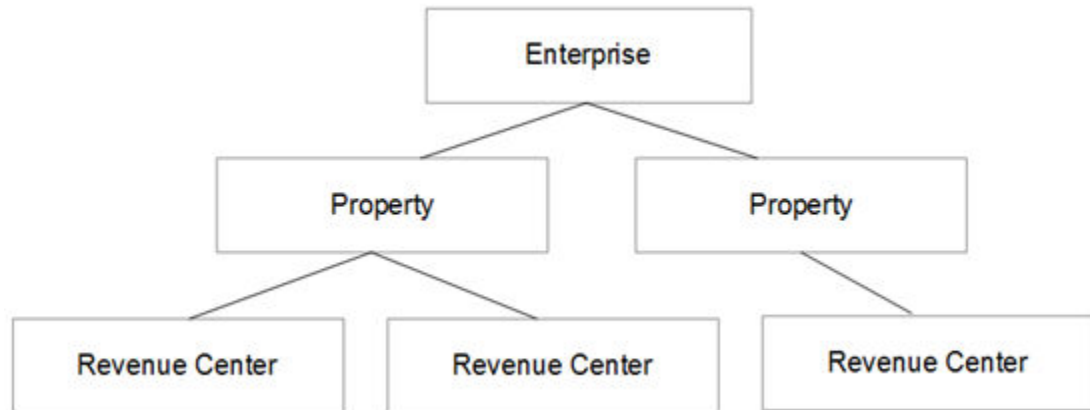
Although Symphony can be installed for large multi-property environments, it can also be installed at a single property. This type of installation, sometimes called a single-property Enterprise, is functionally the same as a true Enterprise. However, modules that are configured at the Enterprise can technically be considered property level modules in this environment because the Enterprise consists of one property.

- [Enterprise Organization](#)
- [Inheritance and Overrides](#)
- [Configuring Permissions for the Enterprise](#)
- [Adding Languages](#)

## Enterprise Organization

The EMC level refers to the location where an EMC module is configured. From the EMC, you can configure modules for the Enterprise, property, revenue center, and zone based on the information you are configuring. For example, employee roles are set at the Enterprise level, because typically a company keeps privileges the same throughout the Enterprise (for example, all bartenders have the same privileges). Tax rates are set at the property level because a property in Chicago uses different tax rates than a property in Dallas. Order devices are set at the revenue center level for a particular restaurant.

The following figure depicts the Enterprise with two properties. One property has two revenue centers (they might be a restaurant and bar), while the other property has one revenue center.

**Figure 3-1 Enterprise Hierarchy Organization Levels**

- [Inheritance and Overrides](#)

**Related Topics**

- [Configuring Permissions for the Enterprise](#)

## Inheritance and Overrides

When you configure a module at the Enterprise level, the property and revenue center levels inherit the module settings. That is, the property and revenue center have the same setting as the Enterprise level. For example, a discount set at the Enterprise level is used by all properties within the Enterprise. If you want the property or revenue center to have a different configuration than the Enterprise level, you can override the inheritance by configuring the module at the property and revenue center levels. For example, you can configure menu items at the Enterprise level, and override the menu items for a property by changing the settings at the property level.

The list of records for each EMC module shows the Zone/Location and Inheritance Type columns. The Zone/Location column shows the zone or the location (Enterprise, property, or revenue center) of each record. The Inheritance Type column indicates the type of inheritance for each record:

- **Defined Here, No Override:** This status indicates the record is defined in the location of the module that is open. The record does not override another record. It is possible that another record overrides this record. (EMC is not aware of records below the current location.)
- **Inherited:** This status indicates the record is defined in another location, and it is inherited in the current module and location.
- **Defined Here, Overriding:** This status indicates the record is defined in the location of the module that is open. The record overrides another record from a higher location.

You cannot edit an inherited record from a child hierarchy. When overrides exist for a record, the lowest record location applies.

- [Enterprise Organization](#)

### Related Topics

- [Configuring Permissions for the Enterprise](#)

## Configuring Permissions for the Enterprise

You can set user permissions for the EMC modules. The privilege options define the actions the user can perform at the Enterprise level.

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Double-click the role type record (for example, administrator, manager or server).
3. Click the **EMC Modules** tab.
4. Select the appropriate module permission options for the user role. You can grant user permissions for the following module actions:
  - **View**: Open and view a module. If you allow a user to Edit, Add, or Delete, you must also grant View access (otherwise the user cannot open the module).
  - **Edit**: Update fields or records within a module.
  - **Add**: Add records to a module.
  - **Delete**: Delete records from a module.

To grant access for all module actions, select **All Modules** from the Global Access section for each action. The **All Modules** option allows you to easily configure the user to View, Edit, Add, or Delete every module without individually selecting each option. Selecting **All Modules** also allows the user to access new modules that become available in future Symphony versions. Oracle Hospitality recommends granting **All Modules** permission for an administrator type of role.

5. Click the **Actions** tab.
6. Select the appropriate action permissions for the role.

To grant access to perform all actions, select **All Actions** from the Global Access section. Selecting **All Actions** also allows the user to perform new actions that become available in future Symphony versions. Oracle Hospitality recommends granting **All Actions** permission for an administrator type of role.

7. Click **Save**.

### Related Topics

- [Enterprise Organization](#)
- [Inheritance and Overrides](#)

## Adding Languages

Configuring languages as described in this procedure translates user interface messages on workstations, text labels, options, help text, and error messages in the EMC. You must manually translate menu items, touchscreen buttons, and EMC records.

1. Select the Enterprise, click **Setup**, and then click **Languages**.
2. Insert a record and enter a name (for example, Spanish).
3. Double-click the record to open it.



4. On the **General** tab, select the language from the **Keyboard Type** drop-down list.
5. On the **Printing** tab, set the following options (if needed):
  - **Print Custom Numerals**: Select this option to print numerals defined in the **Custom Numerals** field on the **General** tab.
  - **Asian Characters**: Select this option for languages such as Chinese, Japanese, Thai, and Korean where characters are picture-based. When you select this option, characters print double-wide to make them more readable. The order device printer also prints the characters double-wide to maximize readability.
  - **Mapping Font**: By default, this option is set to **Amap**. Select **Vmap** for Thai.
6. Click the **Miscellaneous** tab.
7. Select the language from the **Locale String** drop-down list.

See [Table 1 – Language Setup Settings](#) for potential setting options for supported languages.

See [http://msdn.microsoft.com/en-us/library/ee825488\(v=cs.20\)](http://msdn.microsoft.com/en-us/library/ee825488(v=cs.20)) for a more detailed listing of language codes.
8. Select the **Local ID** from the drop-down list, and then enter the **Language Culture** corresponding to the language.
9. Click **Save**.
10. To load translated text files for the workstation, see [Loading Workstation Translations](#).
11. To load translated text files for the EMC, see [Loading EMC Translations](#)

# 4

## Log File Management

Built-in log archiving capabilities are included with Symphony version 2.8 and later. Rather than deleting the oldest log file when a log reaches its maximum size, Symphony compresses the oldest log file up to two percent of its original size and then stores it in an AutoArchive folder, which is located in the same directory as the original logs. This reduces the disk space consumed by the log files and allows you to keep the files for a longer period of time. For example, if the maximum file size for a single log file is 1 MB and the total amount of disk space (log size) that can be used by all log files is 10 MB or 10 logs, when the application generates the eleventh log, it compresses the oldest log file and moves it to the AutoArchive folder.

Simphony names the archived files after the log files and includes the date and time of compression. You can easily search the log files for a particular date. For example, if the log file is `Log_PEPPER_172.txt`, the archived file is `Log_Pepper_172.DateOfCreation_TimeOfCreation.zip`.

Simphony purges archived log files only when one of the following configured thresholds is met:

**Table 4-1 Log Archive Purge Thresholds**

Purge Threshold	Description
<code>LogArchiver.MinDiskUsedPercent</code>	This threshold defines the free disk space threshold. When the free disk space falls below the configured percentage, the application purges the archived files. The minimum disk space is set to 10% by default.
<code>LogArchiver.MaxDiskUsedMB</code>	This threshold defines the maximum size for the archived files. When the total size of all the archives exceeds the configured amount, the application purges the archived files. The size is set to 100 MB by default.
<code>LogArchiver.DaysToKeep</code>	This threshold defines the number of days to keep the archived logs before purging. The number of days to keep is set to 21 days by default.

The `ArchiveHistory.txt` file, which resides in the original log directory, tracks log archiving operations. When this file reaches 20 KB, Symphony renames it to `ArchiveHistory.previous.txt`. Symphony retains only one `ArchiveHistory.previous.txt` file at a time.

Log archiving is active by default for application servers and services, while it is deactivated by default for workstation services due to the constrained disk space of workstations.

- [Modifying the Default Log Archive Purge Settings for Application Services](#)
- [Enabling Log Archiving for Workstations](#)

## Modifying the Default Log Archive Purge Settings for Application Services

To modify the default archive purge settings, you need to add entries to four application service configuration files. The following table lists the configuration files for the application services and their locations:

**Table 4-2 Application Services Configuration Files**

Application Service	Configuration File Name	Location
EGateway Service	Web.config	[Drive Letter]:\MICROS\ \Symphony2\EGatewayService
Data Transfer Service (DTS)	DataTransfeService.exe.config	[Drive Letter]:\MICROS\ \Symphony2\DataTransfeService
Direct Posting Service (DPS)	DirectPostingService.exe.config	[Drive Letter]:\MICROS\ \Symphony2\DirectPostingService
Sequencer Service	SequencerService.exe.config	[Drive Letter]:\MICROS\ \Symphony2\SequencerService

- Browse to the file location and open the configuration file.
  - Add the following entries:
    - To turn off log archiving, add `<add key="LogArchiver.Enabled" value="false" />`.
    - To change the free disk space threshold, add `<add key="LogArchiver.MinDiskUsed-Percent" value="MinDiskUsedPercent" />`.
    - To change the maximum size for the archived files, add `<add key="LogArchiver.MaxDiskUsedMB" value="MaxDiskUsedMB" />`.
    - To change the number of days to keep the archived logs, add `<add key="LogArchiver.DaysToKeep" value="DaystoKeep" />`.
  - Repeat Steps 1 and 2 for each configuration file listed in the table.
- [Enabling Log Archiving for Workstations](#)

## Enabling Log Archiving for Workstations

- Browse to the [Drive Letter]:\MICROS\webserver\wwwroot\EGateway folder and open the Web.config file.
- Add the following entries to the Web.config file:
  - `<add key="LogArchiver.Enabled" value="true" />`
  - `<add key="LogArchiver.MinDiskUsedPercent" value="MinDiskUsedPercent" />`
  - `<add key="LogArchiver.MaxDiskUsedMB" value="MaxDiskUsedMB" />`
  - `<add key="LogArchiver.DaysToKeep" value="DaystoKeep" />`
- Save the changes.

- [Modifying the Default Log Archive Purge Settings for Application Services](#)

# 5

## Client Application Loader (CAL)

The Client Application Loader (CAL) is a process that allows seamless distribution, installation, and maintenance of Symphony software from a CAL server to all Symphony client workstations and service hosts. CAL is the only method for installing Symphony workstation software and service software (such as Kitchen Display System (KDS) Controller software and System Interface Module (SIM) file access software). The CAL stores software packages in the transaction database, providing a central storage location. The CAL allows the clients to:

- Obtain a list of configured workstations from the CAL servers
- Establish unique workstation IDs and network configuration (either Dynamic Host Configuration Protocol (DHCP) or static Internet Protocol (IP)) based on the information received from the CAL server

### Packages

Packages are a sophisticated method of distributing software to the clients. Files that need to be copied or run on the client are bundled together, given a name, and placed in a separate directory on the server. A CAL Package is a group of files and folders that are copied to workstations and other CAL-enabled devices. You can configure the packages to be distributed to:

- All devices in the Enterprise
- Devices in selected properties
- Specific devices

### CAL Directory and Package Contents

The CAL Package files and folders are located on the Symphony application server in the EGatewayService directory. This is the most important directory. Handlers in this directory process messages that are sent to the Symphony application server. The EGatewayService directory includes the encrypted database information, as well as the web.config file that includes important Symphony settings. The following table lists the subdirectories that reside in the EGatewayService\CAL folder and the CAL package contents for various types of client devices.

**Table 5-1 CAL Package Contents**

Platform Type	Type of Device	CAL Packages
ANDROID	Devices Running the Android Mobile Operating System	ServiceHost2.0
DC	Kitchen Display System (KDS) Controllers	<ul style="list-style-type: none"><li>• DCKDS</li><li>• DCKDS2.0</li><li>• DCKDSPrintServer2.0</li><li>• McrsCAL</li><li>• McrsCAL2.0</li></ul>

**Table 5-1 (Cont.) CAL Package Contents**

Platform Type	Type of Device	CAL Packages
MC40	Motorola MC40	<ul style="list-style-type: none"> <li>• FuseboxSTunnel2.0</li> <li>• McrsCAL</li> <li>• McrsCAL2.0</li> <li>• ServiceHost2.0</li> </ul>
ServiceHosts	Not Applicable	Subdirectory named for the Service Host ID that contains automatically generated setup information for each Service Host
Windows	Any Windows machine, such as the Oracle MICROS Tablet 720, Oracle MICROS Workstation 6 Series, Oracle MICROS Tablet E-Series, and Oracle MICROS PC Workstation 2015	<ul style="list-style-type: none"> <li>• CALVersionFixer2.0</li> <li>• CashManagement2.0</li> <li>• DigitalPersona2.0</li> <li>• McrsCAL</li> <li>• McrsCAL2.0</li> <li>• MediaViewer2.0</li> <li>• PosToKdsHandler</li> <li>• PosToKdsHandler2.0</li> <li>• ServiceHost2.0</li> <li>• ServiceHostPrereq2.0</li> <li>• WSKDS2.0</li> </ul>
WS5A	Oracle MICROS Workstation 5A	<ul style="list-style-type: none"> <li>• McrsCAL</li> <li>• McrsCAL2.0</li> <li>• WSKDS</li> <li>• WSKDS2.0</li> </ul>

### Installation and Upgrade

The configuration in the CAL Packages module of the EMC determines when a client receives a new CAL package. The Setup.dat file is a text file that contains installation instructions. New packages include the following information in the Setup.dat file:

- Name: Identifies the CAL Package
- Version: Identifies the release version number using a four-number dotted notation format (for example, 2.800.4.25)
- Commands: Indicates what, how, and where files are placed

The Symphony installer derives an internal name and version for Symphony packages from the Setup.dat file. The internal name and version typically differs from the package name and version. For example, ServiceHost 2.7 and ServiceHost 2.8 are two separate packages, but they share the same internal name, ServiceHost. The installer identifies the matching internal names and prevents installing and running two versions of ServiceHost.exe on the same client.

The CAL client uses the internal name and version from the Setup.dat file to determine whether to download the CAL package. EMC does not allow you to configure duplicate schedules for packages with the same internal name. For example, if you have a deployment schedule for ServiceHost.2.8 to deploy to the Enterprise, adding an Enterprise deployment for ServiceHost.2.8 and ServiceHost.2.7 results in the following error message: Cannot save duplicate deployments.

Beginning with Symphony version 2.10, prerequisite software is pre-loaded in a local directory on new Oracle MICROS workstations, rather than downloading the prerequisite software from the Enterprise through CAL. This reduces the time between opening a new Oracle MICROS workstation and signing into the Symphony POS client for the first time.

When you upgrade Symphony to a new version, the installer does not add new deployments (with one exception) and does not change existing packages or schedules. As a result, you do not need to change deployment schedules from Install to Skip. The installer preserves CAL packages and adds new versions.

- [Overview of CAL Package Deployment](#)
- [Configuring CAL Package Permissions](#)
- [Allowing Employees to Install and Authenticate POS Clients and Service Hosts](#)
- [Configuring CAL Packages](#)
- [Resizing the Initial Workstation Database](#)
- [Changing a Custom CAL Package](#)
- [CAL Deployment Order](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Configuring the Deployment Schedule to Install CAL on Workstations](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Changing a CAL Package Version](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Manually Deploying CAL Packages](#)
- [Updating CAL Client Workstations](#)
- [Distributing CAL from a Property Application Server](#)
- [Configuring the Distributed CAL \(DCAL\) Server](#)
- [Changing the CAL Server Location](#)
- [Moving the DCAL Server to Another Service Host](#)
- [Configuring a DCAL Download Schedule](#)
- [Reviewing the DCAL File Download Status](#)
- [Assigning a New Workstation to a DCAL Server](#)

## Overview of CAL Package Deployment

Deploying a CAL package consists of completing the following tasks:

- [Setting CAL Package Permissions](#)
- [Allowing Employees to Install and Authenticate POS Clients and Service Hosts](#)
- [Configuring CAL Packages](#)
- [Changing a Custom Package](#)
- [Understanding the Deployment Order of CAL Packages](#)

- Adding a Deployment Schedule for the Current CAL Package
- Adding a Deployment Schedule for a Group of CAL Packages
- Viewing CAL Package Deployments
- Switching a CAL Package Version
- Viewing CAL Package Contents
- Deploying CAL Packages
- Updating CAL Clients

## Configuring CAL Package Permissions

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Double-click the role type record (for example, administrator, manager or server).
3. Click the **EMC Modules** tab.
4. Scroll to the CAL Packages file, and then select the **View**, **Edit**, **Add**, and **Delete** permissions for the employee role.
5. Click **Save**.

- [Configuring CAL Packages](#)
- [Resizing the Initial Workstation Database](#)
- [Changing a Custom CAL Package](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Changing a CAL Package Version](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Manually Deploying CAL Packages](#)
- [Updating CAL Client Workstations](#)

### Related Topics

- [CAL Deployment Order](#)

## Allowing Employees to Install and Authenticate POS Clients and Service Hosts

Beginning with Symphony version 2.9.1 and later, you must allow employees to download software, install, and authenticate clients and service hosts using CAL version 139. When this privilege is granted, the User Security Credentials configured in the Property Parameters module become inactive, allowing employees to use their EMC login credentials when setting up POS clients.

1. Select the Enterprise, click **Configuration**, and then click **Roles**.
2. Double-click an employee role.



3. Click the **Operations** tab, click the **Miscellaneous** subtab, and then select **10065 - Download Software, Install and Authenticate Clients and Service Hosts Using CAL**.
  4. Click **Save**.
- [Installing the CAL Client on the Windows Device](#)
  - [Initiating CAL Authentication on the Windows Device](#)

## Configuring CAL Packages

CAL packages belong to the following two subgroups:

- The Symphony subgroup contains the standard packages installed by Symphony.
  - The Custom subgroup contains the packages added by an administrator.
1. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
  2. Highlight a CAL package.
  3. Click the appropriate command from the CAL packages tree:

**Table 5-2 CAL Packages Tree Commands**

Command	Description
Switch View	Change the grouping of CAL packages from name to version and vice versa. For example, you can view packages belonging only to Symphony version 2.9.
Add Custom CAL Package	Upload a CAL package from a local file system to the EMC and database. Uploaded packages appear in the Custom subgroup.
Refresh	Refresh the entire page.
Delete	Delete the highlighted CAL package.

- [Configuring CAL Package Permissions](#)
- [Resizing the Initial Workstation Database](#)
- [Changing a Custom CAL Package](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Changing a CAL Package Version](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Manually Deploying CAL Packages](#)
- [Updating CAL Client Workstations](#)

### Related Topics

- [CAL Deployment Order](#)

## Resizing the Initial Workstation Database

You can change the initial database size of a workstation using a CAL package Generate XML tool from the EMC. You configure the starting database size and growth pattern (Pre-sized or AutoGrow) for the Symphony client databases and the tool creates the CAL package to be added to the application. The tool only sets the initial size of the database. You cannot use it to shrink a database that has already grown too large.

1. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
2. Click the **Generate XML** tab.
3. From the **Sizing Mode** drop-down list, select the method for sizing the database:
  - Select **AutoGrow** for high volume locations where the size of the database on disc grows through a nightly job. AutoGrow mode allows the application to size the database during a nightly job at a specified time. This avoids the lengthy delays of sizing until the application is not in use. Do not select this option for workstations equipped with the 8GB Universal Disk On Chip (UDOC).
  - Select **PreSized** for workstations with limited disc space where the Symphony default database sizes are not proportionate to the available space. You can set a maximum size for each database and log file, and reserve a percentage of the available disc space for non-database files. In Pre-sized mode, the database is potentially sized every time the workstation Service Host starts, and the database does not grow.
4. In the **Non DB Percentage** field, enter a percentage (between 0 and 100) of the free space of the disc to reserve for non-database content.
5. In the **Resize Time** field, enter the amount of time in hours and minutes for the nightly resize job.

The value in this field determines the time on a 24-hour clock to run the database resize job, which attempts to resize the database outside of business hours. Although this field is required, PreSized mode ignores the value entered as there is no nightly resize job.

6. Select the database to configure from the **Alias** drop-down list. You can resize the following database configurations:
  - LocalDB (local datastore database)
  - CPServiceDb (CAPS database)
  - KDSServiceDb (KDS database)
  - CMLocal (cash management database)
7. In the Data File and the Log File sections, enter the appropriate values as described in the following table. To set the default database configuration, select **Use Default Values**.

**Table 5-3 Data File and Log File Database Configuration**

Field	Description
Initial Size	Enter the initial size of the database file. Define the size with a number followed by M, G, or T suffixes to indicate megabytes, gigabytes, or terabytes.
Maximum Size (AutoGrow mode only)	Enter the maximum size to which the database can grow. If there is not enough unreserved space to fit the maximum size, the configuration does not validate.  The <b>NonDB Percentage</b> value you entered determines how much of the free space is not available for the databases.
Auto Grow Floor (AutoGrow mode only)	Enter the size of the free space within the database that triggers a nightly grow event. If you set this value to 10M and the free space inside the data file goes below 10M, the nightly resize job attempts to resize the database.
Auto Grow Increment (AutoGrow mode only)	Enter the auto growth increment for the database. This value is used by the nightly resize job when the database must grow.

8. Click the **Add** button.
9. Click the ellipsis point (...) button, select the destination folder, and then click **OK**.
10. Click the **Generate** button.

- [Configuring CAL Package Permissions](#)
- [Configuring CAL Packages](#)
- [Changing a Custom CAL Package](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Changing a CAL Package Version](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Manually Deploying CAL Packages](#)
- [Updating CAL Client Workstations](#)

**Related Topics**

- [CAL Deployment Order](#)

## Changing a Custom CAL Package

You can change the name of a custom package, its deployment order, and its platform type.

1. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.

2. Expand the Custom subgroup, and highlight the appropriate custom CAL package.
3. Change the following information:
  - **Name**
  - **Deployment Order:** Enter the order in which to deploy the CAL package. CAL packages with a value of 0 (zero) are loaded before packages with a value of 1. See [CAL Deployment Order](#) for more information.
  - **Platform Type:** Select the type of platform to receive the CAL Package.
4. In the Limit To Services section, select specific Service Host types to deploy to workstations.
  - If you do not select a service, the package deploys to every Service Host based on the deployment schedule.
  - If you select one or more services, the package deploys only to Service Hosts that run selected services. That is, when you configure a new service for the existing Service Host, there is no additional deployment for the Service Host. If a CAL package exists that is specific to the service, the Service Host downloads it immediately.

For example, if you select Cash Management, you must also select the Check And Posting service (CAPS) because the Enterprise Cash Management (ECM) module only runs on CAPS Service Hosts. This causes all Service Hosts that run CAPS to automatically download the ECM CAL package if a deployment schedule exists for the Enterprise or property.

- [Configuring CAL Package Permissions](#)
- [Configuring CAL Packages](#)
- [Resizing the Initial Workstation Database](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Changing a CAL Package Version](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Manually Deploying CAL Packages](#)
- [Updating CAL Client Workstations](#)

#### Related Topics

- [CAL Deployment Order](#)

## CAL Deployment Order

By default, all CAL packages have a deployment order of 0 (zero). This can result in packages going to POS client workstations in an undesirable order. Assigning an order allows Symphony to create and place certain files or folders for one package, which are used later by another package in order to succeed.

Oracle Hospitality recommends deploying CAL packages in the order listed in the following table:

**Table 5-4 CAL Deployment Order**

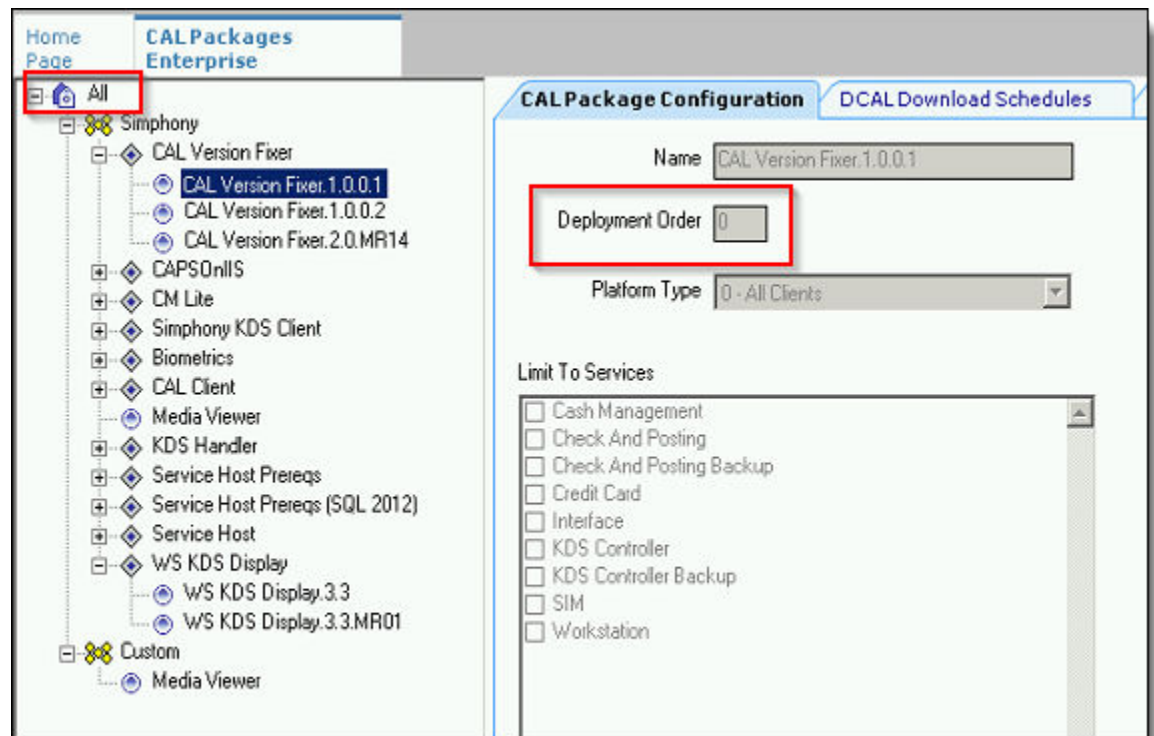
Deployment Order	CAL Package Name
0	CAL Client Platform Updates ServiceHost Prerequisites
1	ServiceHost
2	PosToKdsHandler
3	Interface files (for example, OPERA)
4+	Custom files (for example, WSKDS and SIM scripts)

**Simphony Standard Cloud Service (Hosted) and Premium Cloud Service (Hosted) Environments**

In both Simphony Standard and Premium Cloud Service environments, the **CAL Package Deployment Order** field is grayed out and is not configurable at the organization level.

To change the CAL Package Deployment Order, log in to the EMC as a SuperOrg user. Changing the CAL Package Deployment Order as a SuperOrg user performs this change on all organizations associated with the SuperOrg.

**Figure 5-1 CAL Package Configuration**



### Simphony (Self-Hosted) Environments

Privileged Simphony (self-hosted) users always have the CAL Package Configuration Deployment Order field available for configuration or editing.

#### Related Topics

- [Configuring CAL Package Permissions](#)
- [Configuring CAL Packages](#)
- [Resizing the Initial Workstation Database](#)
- [Changing a Custom CAL Package](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Changing a CAL Package Version](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Manually Deploying CAL Packages](#)
- [Updating CAL Client Workstations](#)

## Adding a Deployment Schedule for the Current CAL Package

You can schedule CAL packages to automatically deploy at preset times.

1. From the CAL Packages module, expand the **Simphony** or **Custom** subgroups, and then highlight the CAL package to deploy.
2. Click the **Deployment Schedules** tab.
3. Click **Add Deployment** to create a new row in the deployments grid.
4. In the **CAL Package** field, select the version number.
5. From the **Deployment Type** drop-down list, select the type of deployment:
  - **1 - Property/Enterprise:** Click the ellipsis point (...) button and select one or more properties where the package downloads.
  - **2 - Specific Service Host:** Click the ellipsis point (...) button and select one or more service hosts or workstations where the package downloads.
6. In the **Action To Take** field, select one of the following options:
  - To allow the deployment to proceed, select **Install**.
  - To prevent a package from being downloaded, select **Skip**.

You can configure multiple deployment schedules for the same CAL package. Simphony uses the most granular deployment when given multiple deployment schedules. For example, if you configure a deployment schedule for a workstation and for the property, Simphony uses the workstation deployment. If you configure a CAL package deployment for a property with **Install** and a deployment for a workstation with **Skip**, the CAL package is not installed on the workstation.

7. (Optional) In the **Effective From** field, select the start date when the package becomes active. You can use this field to schedule Symphony upgrades.
8. (Optional) In the **Effective To** field, select the end date when the package becomes inactive.

- [Configuring CAL Package Permissions](#)
- [Configuring CAL Packages](#)
- [Resizing the Initial Workstation Database](#)
- [Changing a Custom CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Changing a CAL Package Version](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Manually Deploying CAL Packages](#)
- [Updating CAL Client Workstations](#)

#### Related Topics

- [CAL Deployment Order](#)

## Adding a Deployment Schedule for a Group of CAL Packages

Certain nodes in the tree do not have corresponding CAL packages. You can use these nodes to group CAL packages. For example, you can configure packages that affect All Symphony or the Service Host.

1. From the CAL Packages module, expand the **Simphony** or **Custom** subgroups, and then highlight a node without a corresponding CAL package.
2. Click the **Deployment Schedules** tab.
3. Click **Add Deployment**.
4. From the **Choose CAL Package For Deployment** drop-down list, select the package to deploy.

The list of available CAL packages in the dialog changes depending on the node highlighted within the tree. For example, if you highlight the Simphony node, the list of packages contains all Simphony CAL packages. If you select the Service Host node, the list contains only the Service Host packages.

5. From the **Deployment Type** drop-down list, select the type of deployment:
  - **1 - Property/Enterprise**
  - **2 - Specific Service Host**
6. Click the ellipsis point (...) button.
7. From the Select Properties or Select Service Host dialog (depending on your selection in Step 5), select one or more properties or Service Hosts where the package downloads, and then click **OK**.

- Filter lengthy lists by property number or name, or by workstation number or name.
  - Select **Show already configured properties** to prevent yourself from configuring duplicate deployment schedule records.
  - Press and hold the **Ctrl** key while performing a left mouse click to select multiple properties. You can click the **Select All** or **Clear All** links to affect all properties in the list.
  - You can select multiple service hosts or specific workstations.
8. In the **Action To Take** field, select one of the following options:
- To allow the deployment to proceed, select **Install**.
  - To prevent a package from being downloaded select **Skip**.

You can configure multiple deployment schedules for the same CAL package. Symphony uses the most granular deployment when given multiple deployment schedules. For example, when you configure a deployment schedule for a workstation and for the property, Symphony uses the workstation deployment. When you configure a CAL package deployment for a property with **Install** and a deployment for a workstation with **Skip**, the CAL package is not installed on the workstation.

9. (Optional) In the **Effective From** field, select the start date when the package becomes active. You can use this field to schedule Symphony upgrades.
10. (Optional) In the **Effective To** field, select the end date when the package becomes inactive.

- [Configuring CAL Package Permissions](#)
- [Configuring CAL Packages](#)
- [Resizing the Initial Workstation Database](#)
- [Changing a Custom CAL Package](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Changing a CAL Package Version](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Manually Deploying CAL Packages](#)
- [Updating CAL Client Workstations](#)

#### Related Topics

- [CAL Deployment Order](#)

## Configuring the Deployment Schedule to Install CAL on Workstations

1. Select the Enterprise, click **Setup**, and then click **CAL Packages**.
2. If the workstation is running Microsoft Windows Embedded POSReady 2009, select **Service Host Prereqs** from the left pane.



3. If the workstation is running Microsoft Windows 7 or later, select **Service Host Prereqs (SQL 2012)** from the left pane.
4. Click the **Deployment Schedule** tab, and then click **Add Deployment**.
5. In the Choose CAL package to upload dialog, select **2 - Specific Service Host** as the **Deployment Type**, click the ellipsis (...) point button adjacent to the drop-down list, select the appropriate workstation, and then click **OK**.
6. Click **OK** to close the Choose CAL package to upload dialog.
7. In the Action To Take column, select **0 - Install**, and then click **Save**.
8. Select **Service Host** from the left pane, and then repeat Steps 4 through 7.
9. Select **CAL Client** from the left pane, and then repeat Steps 4 through 7.

## Viewing CAL Package Deployment Schedules

A deployment schedule indicates the time at which a specific POS client or clients downloads a CAL package for deployment. You must configure deployment schedules in order to deploy CAL packages.

1. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
2. Expand the **Simphony** or **Custom** subgroups within the navigation tree, and then highlight the appropriate CAL package.

To view all deployment schedules for all CAL packages, highlight the **All** node.

3. Click the **Deployment Schedules** tab. Previously scheduled CAL packages appear in the list.

- [Configuring CAL Package Permissions](#)
- [Configuring CAL Packages](#)
- [Resizing the Initial Workstation Database](#)
- [Changing a Custom CAL Package](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Changing a CAL Package Version](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Manually Deploying CAL Packages](#)
- [Updating CAL Client Workstations](#)

### Related Topics

- [CAL Deployment Order](#)

## Changing a CAL Package Version

You can switch a CAL package that has one version or multiple versions.

1. To change a CAL package with one version:
  - a. From the CAL Packages module, delete the existing deployment.

- b. Add a new deployment for the new version.
2. To change a CAL package with multiple versions:
  - a. From the CAL Packages module, highlight the package deployment.
  - b. Click **Change Package Version**.
  - c. From the **Choose CAL Package For Deployment** drop-down list, select the appropriate package version for deployment, and then click **OK**.

- [Configuring CAL Package Permissions](#)
- [Configuring CAL Packages](#)
- [Resizing the Initial Workstation Database](#)
- [Changing a Custom CAL Package](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Manually Deploying CAL Packages](#)
- [Updating CAL Client Workstations](#)

#### Related Topics

- [CAL Deployment Order](#)

## Viewing, Reloading, and Saving CAL Package Contents

1. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
2. Highlight the CAL package, and then click the **Package Contents** tab. The Platforms section lists all available platform types, the Setup.dat version, and CAL package name.
3. From the **Files** list, select a platform to see all files included in the package.

- To open the file in Notepad, click **View Selected File**.
- To reload the entire CAL package for all platforms and files from the specified file location, click **Reload Package From Disk**. You must be signed on with the same hierarchy level as the CAL package to see this command.

After you modify an existing default or custom package, reload the package. Ensure that the Setup.dat version matches the file before it loads to avoid reloading the package on all POS clients.

After installation, replace the local machine with the load balanced address in SimphonyInstall.xml, and then reload the entire package.

- To save the entire CAL package for all platforms and files to the specified file location, click **Save Package To Disk**, select an empty output folder, and then click **OK**.
- [Configuring CAL Package Permissions](#)
- [Configuring CAL Packages](#)

- [Resizing the Initial Workstation Database](#)
- [Changing a Custom CAL Package](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Changing a CAL Package Version](#)
- [Manually Deploying CAL Packages](#)
- [Updating CAL Client Workstations](#)

#### Related Topics

- [CAL Deployment Order](#)

## Manually Deploying CAL Packages

You can manually deploy CAL packages immediately rather than scheduling the deployment to run automatically.

1. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
2. Click the **Deployment Schedules** tab.
3. Click **Add Deployment**, select the following options, and then click **OK**:
  - **CAL Package For Deployment**
  - **Deployment Type**
4. Select the **Property** or **Service Host** (depending on the Deployment Type).
5. In the **Action to Take** field, select **0 - Install**.
6. (Optional) In the **Effective From** and **Effective To** fields, select the dates when the package becomes active and inactive.
7. Click **Save**. The CAL package downloads to the appropriate POS client workstations within a few minutes.

- [Configuring CAL Package Permissions](#)
- [Configuring CAL Packages](#)
- [Resizing the Initial Workstation Database](#)
- [Changing a Custom CAL Package](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Changing a CAL Package Version](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Updating CAL Client Workstations](#)

#### Related Topics

- [CAL Deployment Order](#)

## Updating CAL Client Workstations

1. Power on the workstation. The workstation connects to the Enterprise server and checks for application updates.

Beginning with Symphony version 2.10, prerequisite software is pre-loaded in a local directory on new Oracle MICROS workstations, rather than downloading the prerequisite software from the Enterprise through CAL. This reduces the time between opening a new Oracle MICROS workstation and signing into the Symphony POS client for the first time.

2. The CAL installs the packages according to the deployment order specified in the EMC. The workstation might restart several times.

- [Configuring CAL Package Permissions](#)
- [Configuring CAL Packages](#)
- [Resizing the Initial Workstation Database](#)
- [Changing a Custom CAL Package](#)
- [Adding a Deployment Schedule for the Current CAL Package](#)
- [Adding a Deployment Schedule for a Group of CAL Packages](#)
- [Viewing CAL Package Deployment Schedules](#)
- [Changing a CAL Package Version](#)
- [Viewing, Reloading, and Saving CAL Package Contents](#)
- [Manually Deploying CAL Packages](#)

### Related Topics

- [CAL Deployment Order](#)

## Distributing CAL from a Property Application Server

When new client applications or support files are available, the CAL sends the new set of files from the Enterprise application server to the clients. A standard Symphony version 2.x Service Host CAL package is usually about 50 megabytes (MB) in size. Based on that, a property with 100 workstation clients needs to download 5000 MB of data through the Wide Area Network (WAN). When the network bandwidth of a property cannot support simultaneous requests made by numerous clients, properties might experience bandwidth bottlenecks.

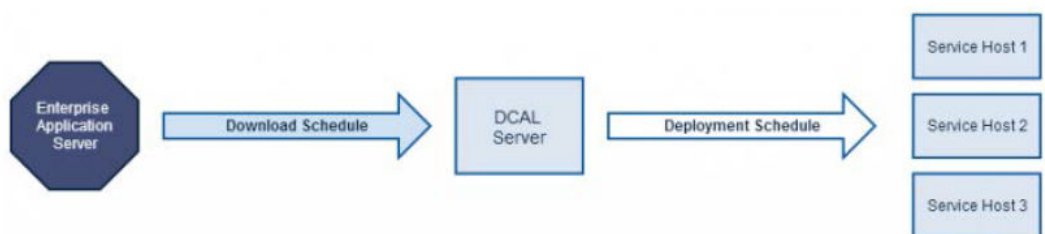
To alleviate bandwidth problems, the Distributed CAL (DCAL) feature lets you configure one or more Service Hosts above or within a property as a DCAL server. To distribute CAL packages, the DCAL server uses the Local Area Network (LAN), which has a higher bandwidth and a higher data transfer rate than a WAN. Updated files and new packages are downloaded to the DCAL server, and then workstations retrieve the updated files from the DCAL server over the LAN.

You can also use DCAL to distribute packages to workstations when a property loses connectivity to the Enterprise application server. After deploying CAL packages to the DCAL server, clients can use the DCAL server to get the new CAL packages without relying on connectivity to the Enterprise application server.

**Figure 5-2 Without DCAL**



**Figure 5-3 With DCAL**



- [Changing the CAL Server Location](#)
- [Assigning a New Workstation to a DCAL Server](#)

#### **Related Topics**

- [Configuring the Distributed CAL \(DCAL\) Server](#)
- [Moving the DCAL Server to Another Service Host](#)
- [Configuring a DCAL Download Schedule](#)
- [Reviewing the DCAL File Download Status](#)

## Configuring the Distributed CAL (DCAL) Server

You need to configure both the Workstations module and the DCAL Download Schedules module to set up the DCAL server.

### **Configuring the Workstations Module**

Designate a Service Host to act as a DCAL server within or above a property, depending on the number of workstations and the geographical distribution of properties.

1. Select the property, click **Setup**, and then click **Property Parameters**.
2. Click the **Workstations** tab.
3. Click the ellipsis point (...) button for the Distributed CAL Service Host.
4. From the Select Service Host dialog, select the Service Host to act as the DCAL server, and then click **OK**.

Due to limited storage, when configuring on a Microsoft Windows CE device, the DCAL server only stores CAL Packages for Microsoft Windows CE clients. If a property has a combination of Microsoft Windows 32 and Microsoft Windows CE Service Hosts, you should set up a Microsoft Windows 32 Service Host as a DCAL server.

5. Click **Save**.

- [Moving the DCAL Server to Another Service Host](#)
- [Configuring a DCAL Download Schedule](#)
- [Reviewing the DCAL File Download Status](#)

#### Related Topics

- [Distributing CAL from a Property Application Server](#)
- [Changing the CAL Server Location](#)
- [Assigning a New Workstation to a DCAL Server](#)
- [Configuring a DCAL Download Schedule](#)

## Changing the CAL Server Location

After you configure a property to retrieve CAL packages from the DCAL server, workstations in the property that were pointed to the Enterprise application server automatically change the CAL URL to point to the DCAL server. You must restart the Service Host for the changes in the CAL server to take effect.

- [Distributing CAL from a Property Application Server](#)
- [Assigning a New Workstation to a DCAL Server](#)

#### Related Topics

- [Configuring the Distributed CAL \(DCAL\) Server](#)
- [Moving the DCAL Server to Another Service Host](#)
- [Configuring a DCAL Download Schedule](#)
- [Reviewing the DCAL File Download Status](#)

## Moving the DCAL Server to Another Service Host

If a DCAL server was moved from one Service Host to another, all Service Hosts in the property update the CAL URL to point to the newly defined DCAL server. You must restart the Service Host for the changes in the DCAL server to take effect.

You can see the changes made to the CAL server URL from the workstation.

1. Sign on to a workstation.
2. Click the **PMC** button, click **PMC Home Page**, and then click the **General** tab.
3. Review the **CAL Url** field and verify the changes.

- [Configuring the Distributed CAL \(DCAL\) Server](#)
- [Configuring a DCAL Download Schedule](#)

- [Reviewing the DCAL File Download Status](#)

#### Related Topics

- [Distributing CAL from a Property Application Server](#)
- [Changing the CAL Server Location](#)
- [Assigning a New Workstation to a DCAL Server](#)

## Configuring a DCAL Download Schedule

DCAL Download Schedules prevent unexpected network utilization by controlling when the software packages are delivered to the DCAL server from the Enterprise application server.

1. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
2. Click the **DCAL Download Schedules** tab.
3. Click the **Add Download** link.
4. From the Add Download Schedules for Distributed CAL Services dialog, select the CAL Package from the **Select CAL Package** drop-down list.
5. Select the properties to receive the scheduled CAL Packages, and then click **OK**.
6. Click the ellipsis (...) button in the **Download From** field, and then set a time to download the CAL Package. Leave the **Download From** field empty to download CAL Packages immediately.

You need to configure Deployment Schedules to deploy CAL Packages to the Service Hosts. Without Deployment Schedules, CAL Packages are stored on the DCAL server and are not deployed to the Service Hosts. [Adding a Deployment Schedule for the Current CAL Package](#) contains more information about scheduling CAL Packages to deploy at preset times.

- [Configuring the Distributed CAL \(DCAL\) Server](#)
- [Moving the DCAL Server to Another Service Host](#)
- [Reviewing the DCAL File Download Status](#)

#### Related Topics

- [Distributing CAL from a Property Application Server](#)
- [Changing the CAL Server Location](#)
- [Assigning a New Workstation to a DCAL Server](#)

## Reviewing the DCAL File Download Status

After you configure and implement CAL Package download schedules, you can review the availability and file download status of CAL Packages for a selected workstation.

1. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
2. Click the **ServiceHost Status/Control** tab, and then click the **Add Download** link.
3. Click the **Install Status** tab, select the search variables, and then click the **Search** button.

- [Configuring the Distributed CAL \(DCAL\) Server](#)
- [Moving the DCAL Server to Another Service Host](#)
- [Configuring a DCAL Download Schedule](#)

**Related Topics**

- [Distributing CAL from a Property Application Server](#)
- [Changing the CAL Server Location](#)
- [Assigning a New Workstation to a DCAL Server](#)

## Assigning a New Workstation to a DCAL Server

When setting up new workstations, select the application server from the workstation's CAL client list. If you configured a DCAL server, select the DCAL server from the list. Because the DCAL server is configured for a property, the CAL client does not provide a list of properties after you have selected the DCAL server as the CAL server.

- [Distributing CAL from a Property Application Server](#)
- [Changing the CAL Server Location](#)

**Related Topics**

- [Configuring the Distributed CAL \(DCAL\) Server](#)
- [Moving the DCAL Server to Another Service Host](#)
- [Configuring a DCAL Download Schedule](#)
- [Reviewing the DCAL File Download Status](#)



# 6

## Distribution

Distribution is an EMC function that enables you to copy records between properties and revenue centers. It eliminates the need to create and configure a record multiple times. You can configure records once within the EMC and distribute the records throughout the enterprise to multiple properties and revenue centers. Distribution is ideal for enterprises that maintain uniform records across multiple properties. See [Distribution Based on Source, Destination, and Selected Options](#) for more information on how Symphony distributes records based on the source record, destination record, and the configured distribution options.

### Remote Distribution

Remote distribution enables you to distribute data between two different Symphony systems. Remote distribution is database independent; therefore, you can distribute from a Microsoft SQL database into an Oracle Database. Remote distribution is specifically designed for the following two scenarios:

- Moving data from the development system into the production system. This allows testing in development before moving to production.
- Distributing a new revenue center into the production system. This reduces the total time required to set up the live system as the installer can perform much of the configuration on a different system in advance.

### Remote Distribution Best Practices

When using remote distribution, the signed in employee can see all properties, revenue centers, and modules in the remote system. Therefore, Oracle Hospitality recommends that you:

- Create an employee named `Remote Distribution In`.
- Give this employee a single enterprise role and only the privilege to Remote Distribute In from another Symphony system. See [Configuring Distribution Privileges](#) for more information on Remote Distribute In.

With this configuration, the employee can only perform distribution.

### The Importance of Object Numbers

When records are distributed from one location to another, the object number stays the same. Therefore, it is important to configure properties and revenue centers consistently. For example, if record #11 is Room Charge in one property, it must be Room Charge in all properties. Consider the following sample serving period configuration in revenue center 4:

- Object Number: 1
- Default Transaction Page: 41

When distributing this record to revenue center 8, it is created with the object number 1. There are two possibilities for its default transaction page:

- If transaction page #41 exists in RVC 8, the serving period's default screen is set to 41.
- If transaction page #41 does not exist in RVC 8, the default screen is set to 0. This is the standard functionality for all types of distributed records. If the referencing object number does not exist, the value is set to 0.
- [Configuring Distribution Privileges](#)
- [Distributing Properties and Revenue Centers](#)
- [Distributing Records](#)
- [Distribution Based on Source, Destination, and Selected Options](#)

**Related Topics**

- [Configuring Distribution Privileges](#)
- [Distributing Properties and Revenue Centers](#)
- [Distributing Records](#)
- [Distribution Based on Source, Destination, and Selected Options](#)

## Configuring Distribution Privileges

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Double-click the role type, click the **Actions** tab, and then select the appropriate privileges:

**Table 6-1 Distribution Privileges**

Privilege Name	Allows the Employee to ...
Distribute	Use the EMC Distribute function.
Remote Distribute Out	Move data from one revenue center to another revenue center or from one property to another property between two different Symphony systems.  Employees need login credentials with permissions on the receiving Symphony system to Remote Distribute In.
Remote Distribute In	Move data from one revenue center to another revenue center or from one property to another property between two different Symphony systems. Select this option to allow employees associated with this role to remote distribute from another Symphony system into this Symphony system.  Employees need <b>Remote Distribute Out</b> permissions on the other system to distribute in.

3. Click **Save**.
- [Distributing Properties and Revenue Centers](#)
  - [Distributing Records](#)

**Related Topics**

- [Distribution](#)
- [Distribution Based on Source, Destination, and Selected Options](#)

## Distributing Properties and Revenue Centers

1. To distribute a property:
  - a. Select the Enterprise, click **Setup**, and then click **Properties**.
  - b. Select the source property record.
2. To distribute a revenue center:
  - a. Select the property, click **Setup**, and then click **RVC Configuration**.
  - b. Select the source revenue center record.
3. To distribute within the same Symphony system, in the EMC toolbar, click **Edit**, and then click **Distribute**.
4. To remotely distribute between Symphony systems:
  - a. In the EMC toolbar, click **Edit**, and then click **Remote Distribute**.
  - b. Enter or select the **Server** or the IP address of the destination Symphony system.
  - c. Enter the user credentials for the destination system in the **User** and **Password** fields respectively, and then click **OK** to log on to the system.
5. From the Destination pane, select the destination properties or revenue centers.
6. From the Modules To Copy pane, select the modules to distribute.
7. Select the appropriate options:

The following table lists the distribution options and indicates whether the options are applicable for property distribution or revenue center distribution.

**Table 6-2 Property and Revenue Center Distribution Options**

Option	Description	Property	RVC
Create Clone	Select this option to copy IP addresses of workstations and KDS displays and to distribute all revenue centers (RVCs) and create new RVCs.	Yes	No
Distribute RVCs	Select this option to distribute revenue centers, including all modules, in addition to distributing the selected modules for the property, if revenue centers exist in both properties. Existing records are overwritten and new records are created.	Yes	No
Create RVCs	Select this option to create revenue centers in the destination properties, if they do not exist. This option is used for remote distribution.	Yes	No

**Table 6-2 (Cont.) Property and Revenue Center Distribution Options**

Option	Description	Property	RVC
Copy IP Addresses	Select this option to copy IP addresses of the source record to the destination record. This option applies only to modules where the records include an IP address (for example, workstations and KDS displays).	Yes	No
Distribute inherited records	Select to distribute all records (defined and inherited) to the destination property. Deselect to distribute only records defined at the source property.	Yes	Yes
If destination record is inherited, create override	Select to override inherited definition records in the destination property. Deselect to keep inherited records unchanged.	Yes	Yes
Distribute Data Extension if they Exist	Select to distribute any existing data extension values. The source and destination data extension property record must match	Yes	Yes

8. Click **OK**.

- [Configuring Distribution Privileges](#)
- [Distributing Records](#)

#### Related Topics

- [Distribution](#)
- [Distribution Based on Source, Destination, and Selected Options](#)

## Distributing Records

This procedure is applicable for most modules in the EMC. Some modules, such as Menu Item Maintenance, contain module-specific distribution dialog boxes.

1. Navigate to the module that you want to distribute.
2. To distribute records within the same Symphony system, in the EMC toolbar, click **Edit**, and then click **Distribute**.
3. To remotely distribute records between Symphony systems:
  - a. In the EMC toolbar, click **Edit**, and then click **Remote Distribute**.
  - b. Enter or select the **Server** or the IP address of the destination Symphony system.
  - c. Enter the user credentials for the destination system in the **User** and **Password** fields respectively, and then click **OK** to log on to the system.
4. From the Record Selection pane, select the records to distribute:
  - **All Records:** Select to copy all records from the source to the destination.
  - **Selected Records:** Select to distribute only the selected records.
  - **Specify Records:** Select to enter a list or range of records to distribute, and then enter the record numbers in the text box below.

5. From the Options pane, select the appropriate options:
  - **Overwrite records if they exist:** Select to overwrite existing records in the destination location. If the destination record is inherited, it is not overwritten.
  - **Create records if they do not exist:** Select to create new records in the destination location.
  - **Distribute inherited records:** Select to distribute all records (defined and inherited) to the destination property. Deselect to distribute only records defined at the source property. This option only appears if the module supports inheritance and override.
  - **If destination record is inherited, create override:** Select to override inherited definition records in the destination property. Deselect to keep inherited records unchanged. This option only appears if the module supports inheritance and override.
  - **Distribute Data Extension if they Exist:** Select to distribute any existing data extension values. The source and destination data extension property record must match.
6. From the Destination pane, select one or more destinations for the records.
7. Click **OK**.

Once distribution completes, a Distribution Report appears showing all records that were created, overwritten, and any errors encountered. You can save this report by clicking **Save to Disk**.

- [Configuring Distribution Privileges](#)
- [Distributing Properties and Revenue Centers](#)

#### Related Topics

- [Distribution](#)
- [Distribution Based on Source, Destination, and Selected Options](#)

## Distribution Based on Source, Destination, and Selected Options

The following table describes how records are distributed based on the source record, destination record, and the selected distribution options.

**Table 6-3 Distribution Based on Source, Destination, And Selected Options**

Record Source Type	Record Destination Type	Option Distribute Inherited Records	Option If Destination Record is Inherited, Create Override	Destination Record Created?
Inherited	Inherited	Selected	Selected	Yes
Inherited	Inherited	Selected	Deselected	No
Inherited	Inherited	Deselected	Selected	No
Inherited	Inherited	Deselected	Deselected	No

**Table 6-3 (Cont.) Distribution Based on Source, Destination, And Selected Options**

<b>Record Source Type</b>	<b>Record Destination Type</b>	<b>Option Distribute Inherited Records</b>	<b>Option If Destination Record is Inherited, Create Override</b>	<b>Destination Record Created?</b>
Inherited	Defined	Selected	N/A	Yes
Inherited	Defined	Deselected	N/A	No
Defined	Inherited	Selected	Selected	Yes
Defined	Inherited	Selected	Deselected	No
Defined	Inherited	Deselected	Selected	Yes
Defined	Inherited	Deselected	Deselected	No
Defined	Defined	Selected	N/A	Yes
Defined	Defined	Deselected	N/A	Yes

**Related Topics**

- [Distribution](#)
- [Configuring Distribution Privileges](#)
- [Distributing Properties and Revenue Centers](#)
- [Distributing Records](#)

# 7

## Properties

A property is a place of business. A property can have one or more revenue centers within a confined geographic location. For example, a hotel property can have three revenue centers (restaurant, bar, and gift shop), and a shopping mall can have several restaurant revenue centers. Both properties can belong to the same Symphony Enterprise, but each property has separate sales figures, tax information, and other configuration specific to the location.

- [Adding a Property](#)
- [Adding a Revenue Center](#)
- [Configuring a Revenue Center Group](#)

### Adding a Property

1. Select the Enterprise level, click **Setup**, and then click **Properties**.
2. Insert a record.
3. From the Add Property dialog, enter the **Property Number** and **Property Name**.
4. Select the **Simphony Platform** from the drop-down list.
5. Select the **Time Zone** of the property.
6. Select the reporting location from the **Report Location** drop-down list. The Oracle Hospitality Reporting and Analytics database determines the locations that appear in the list.
  - a. To add a new location, click the **New** button, and then enter the appropriate information. An administrator must then add the information to the Oracle Hospitality Reporting and Analytics property list in order to run reports.
  - b. To change an existing location, click the **Edit** button, and then enter the appropriate information.
7. (Optional) To copy information from a property template, in the Source Property section, select **Copy from source property**. The hierarchy panel and **Modules To Copy** fields become active.
  - a. From the hierarchy panel, select the property to use as the source property.
  - b. From the Modules to Copy section, select the modules you want to copy from the source property. To automatically select all modules, click the **Select All Modules** link.
  - c. (Optional) Select **Create Clone** to copy the Internet Protocol (IP) addresses of workstations and kitchen display system (KDS) displays, and to distribute all revenue centers and create new revenue centers. Selecting this option essentially selects the next two options (described in Steps 7-d and 7-e).
  - d. (Optional) Select **Create RVCs** to create new revenue centers for the property based on the existing revenue centers in the template property.

- e. (Optional) Select **Copy IP Addresses** to copy the IP addresses of workstations and KDS displays from the source property to the destination property. Use this option when properties are segmented on their own networks and IP address conflicts do not occur.
  - f. (Optional) Select **Distribute inherited records** to distribute all records (defined and inherited) from the source property to the destination property. Deselect this option to distribute only records defined at the source property to the destination property.
  - g. (Optional) Select **If destination record is inherited, create override** to create an override record in the destination property when an inherited definition exists.
  - h. (Optional) Select **Distribute Data Extensions if they exist** to distribute data extension values if they exist.
8. Click **OK** to copy the records from the source template property to the new property.

## Adding a Revenue Center

1. Select the property, click **Setup**, and then click **RVC Configuration**.
2. Insert a record.
3. From the Add Revenue Center dialog, enter the **RVC Number** and the **RVC Name**.
4. (Optional) To copy information from a revenue center template, select **Copy from source Revenue Center** from the Source Revenue Center section. The hierarchy panel and **Modules To Copy** fields become active.
  - a. From the hierarchy panel, select the revenue center to use as the source revenue center.
  - b. From the Modules to Copy section, select the modules you want to copy from the source revenue center. To automatically select all modules, click the **Select All Modules** link.
  - c. (Optional) Select **Distribute inherited records** to distribute all records (defined and inherited) from the source revenue center to the new revenue center. Deselect this option to distribute only records defined at the source revenue center to the new revenue center.
  - d. (Optional) Select **If destination record is inherited, create override** to create an override record in the new revenue center when an inherited definition exists.
  - e. (Optional) Select **Distribute Data Extensions if they exist** to distribute data extension values if they exist.
5. Click **OK** to copy the records from the source template revenue center to the new revenue center.
6. From the RVC Configuration module table view, select the following options as applicable for the new revenue center:
  - **LDS Active**: Select this option if the revenue center uses a Liquor Dispensing System (LDS), which is a third-party system used for pouring and tracking liquor and beverages, as well as mixed drinks.



- **KDS Controller:** Select the KDS Controller to control the kitchen display system (KDS) order devices in the revenue center.
7. Click **Save**.

## Configuring a Revenue Center Group

You can create a revenue center group for use when a property hosts an event that occurs in multiple revenue centers. For example, a baseball game takes place in every revenue center at a stadium. When you create the event, you can associate it with the revenue center group rather than selecting each revenue center individually.

Revenue center groups are also useful when multiple revenue centers use the same kitchen or bar to prepare menu items. You can set a Menu Item Availability record for a revenue center group.

1. Select the property, click **Setup**, and then click **Revenue Center Groups**.
2. Insert a new record or select an existing record, and then double-click the record to open it in form view.
3. Select the revenue centers to include in the revenue center group.
4. Click **Save**.

# 8

## Zones

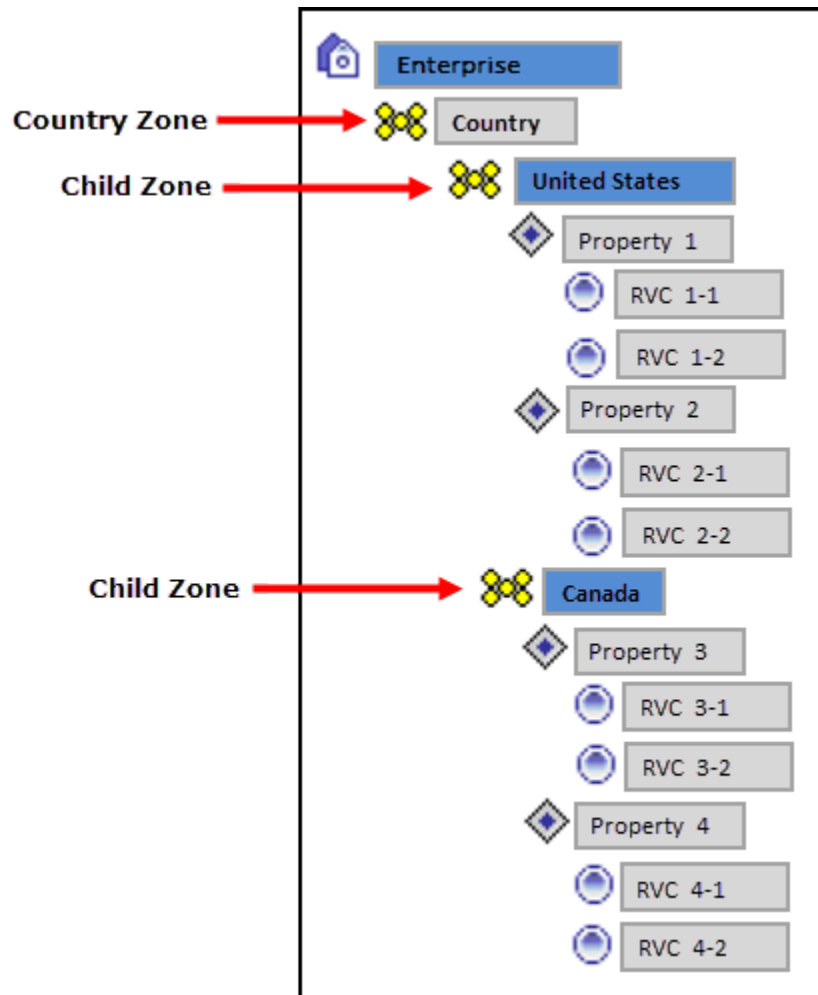
Zones are custom hierarchies within the Enterprise. You can use zones to group similar aspects of an Enterprise together to manage configuration tasks with minimum effort and to eliminate duplicate configuration. For example, you can categorize:

- Taxes by country, state, county, and city
- Prices by region, tier, and property
- Menu item maintenance by item groups (food, beverage, retail), price tiers, and stores

Zones assist in managing definitions and records in a more streamlined manner. Symphony's Inheritance and Override feature enables you to configure definition records on the Enterprise level, and they are inherited throughout the system. If there are unique circumstances where a particular definition must be different from an inherited record, you can override that record at the zone, property, or revenue center level. [Inheritance and Override](#) contains more information.

For example, you can create a country zone for the Enterprise, create sub-zones (child zones) for each country, and then create or override the records from the relevant level as illustrated in the following figure. This figure shows a sample zone hierarchy for a single record group, where the existence of records is denoted in blue and inheritance is denoted in gray.

Figure 8-1 Sample Zone Configuration



A single revenue center or property can belong to multiple zones, and a single zone can contain an unlimited number of sub-zones. Zones with meaningful names provide a clear overview of the structure. Configuring zones effectively:

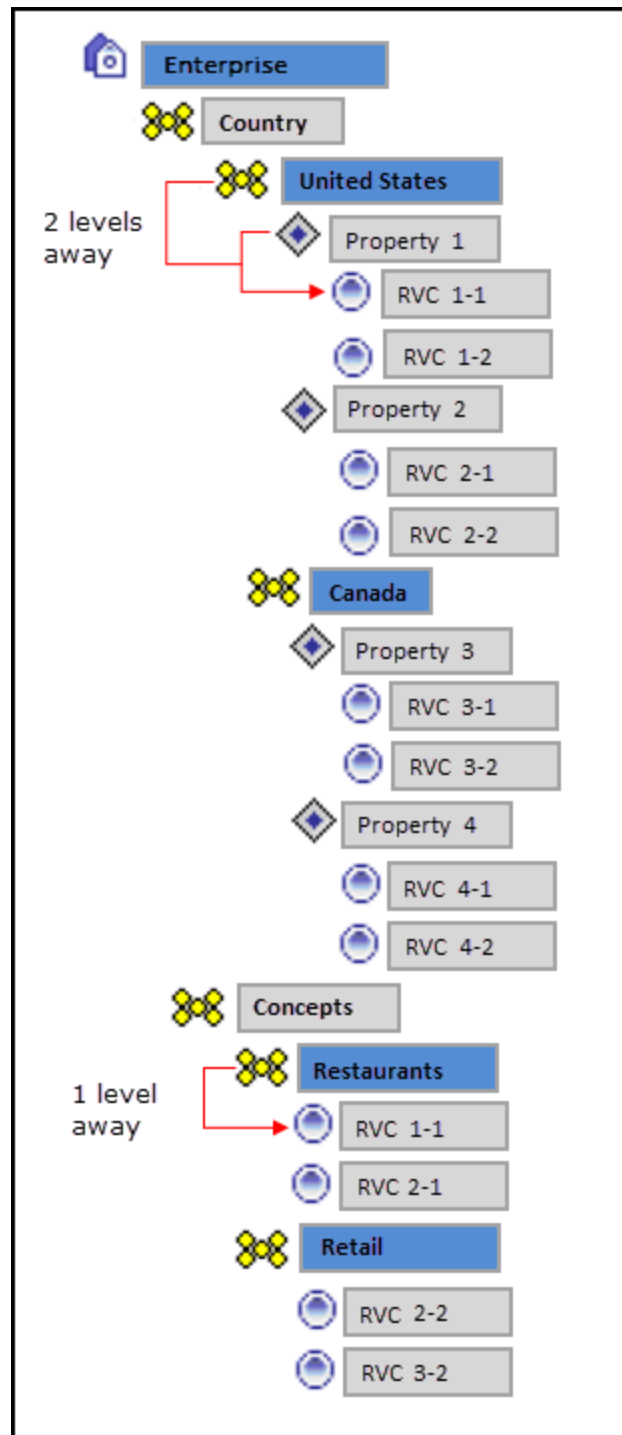
- Allows privileged users to view and navigate the entire Enterprise from within the EMC in a more logical manner
- Creates a big picture that shows which locations might be affected by potential changes or updates
- Saves time with definition handling and updates throughout the system
- Controls definition distribution to POS clients

#### Record Priority within Multiple Zone Configurations

If a property or revenue center exists in multiple zones, Symphony uses the definition record which is closest to the hierarchy when determining which record to use for a specific object number. For example, in the following figure, the Enterprise depicted has two separate zone hierarchies. The Country zone has two sub-zones: United States and Canada. The second zone, Concepts, also has two sub-zones: Restaurants and Retail. Both zone hierarchies have revenue centers in common.

Imagine that a discount record is defined in the Enterprise, and the four sub-zones (United States, Canada, Restaurants, and Retail) override this discount record, which is then inherited by their properties and revenue centers respectively. The existence of the record is denoted in blue and inheritance is denoted in gray.

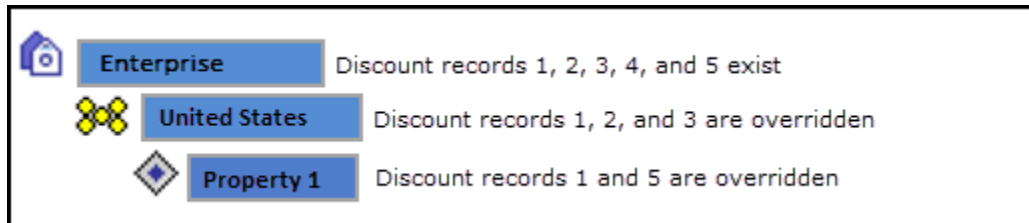
**Figure 8-2 Sample Configuration of a Single Record Definition**



Because the revenue centers are closer to the definition record in the Concepts zone (RVC 1-1 is only one level away from Restaurants while it is two levels away from United States), the Concepts zone record wins.

Consider the following sample configuration for multiple discount records:

**Figure 8-3 Sample Configuration of Multiple Record Definitions**



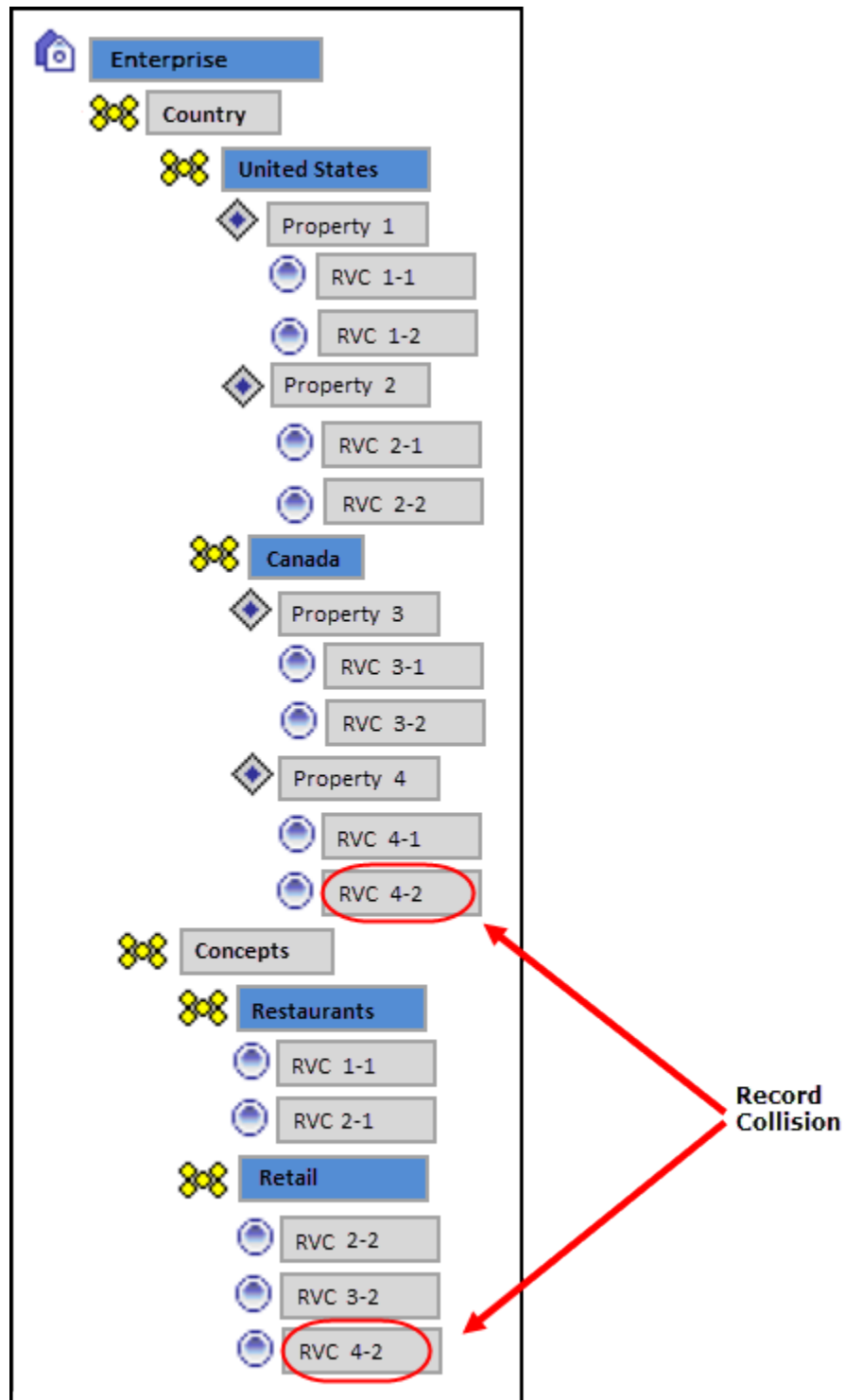
Given the configuration in the above image, Symphony uses the following discount records for Property 1:

- Record 1 defined in Property 1
- Record 2 defined in the United States zone
- Record 3 defined in the United States zone
- Record 4 defined in the Enterprise
- Record 5 defined in Property 1

### Record Collisions

Record collisions occur when a property or revenue center has two competing winning records that are the same number of levels away from the hierarchy. For example, in the following figure, RVC 4-2 is one level away from Property 4 and Retail, both of which have overriding record definitions.

Figure 8-4 Sample Zone Configuration with Record Collision



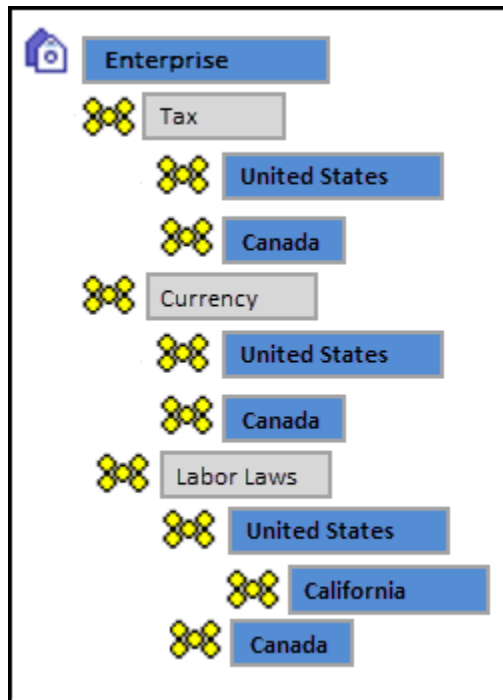
While EMC prevents you from manually creating a competing record, such situations can arise when moving revenue centers and zones, or when using the Import/Export Service. In such instances, EMC detects the error and prevents you from opening the module corresponding to the definition record until the conflict is resolved.

## Example Configuration Scenarios

You can use zones to organize the Enterprise in multiple ways. Here are a few examples:

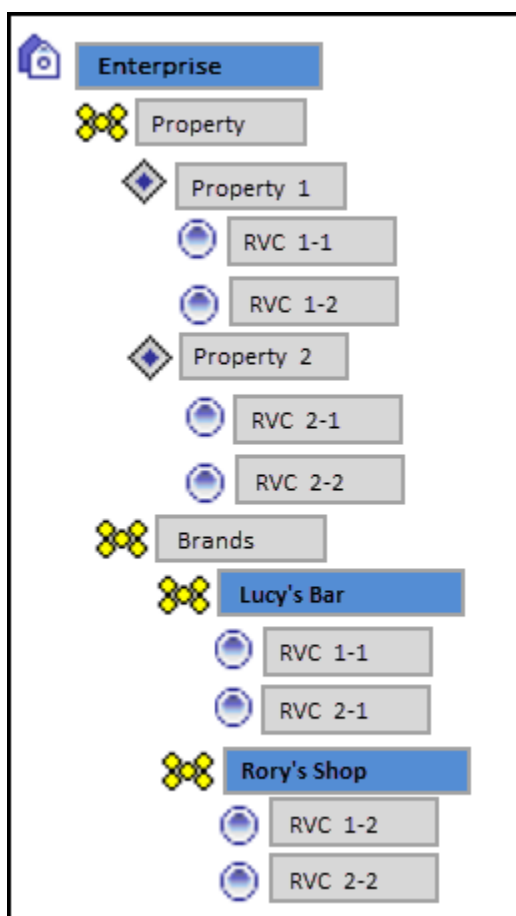
- Example 1: Region zones are useful for many applications, from global considerations such as alphanumeric keyboards and currencies to tax or labor laws. These zones are usable repeatedly in multiple trees.

**Figure 8-5 Sample Zone Configuration for Regions**



- Example 2: Enterprises that have different concepts (Dine-In, Take-Out) between properties or revenue centers can manage their differences through zones. Similarly, zones are useful for configuring brands. Hotel chains that have certain concessions in various or all properties can configure them as zones and place the appropriate revenue centers into the Brand Zones to inherit the relevant records.

Figure 8-6 Sample Zone Configuration for Brands



### Reporting and Analytics Posting

Reporting and Analytics is zone independent. Transactions post to the actual location where the transaction originated. For example, if a menu item definition record originated in the Retail zone, it posts under the revenue center that inherited the record from the zone at the time of the transaction. If you create an overriding record later in the same revenue center and another transaction is posted for the same menu item, Reporting and Analytics shows as if the price change was made for the same menu item.

- [Creating Zones](#)

### Related Topics

- [Creating Zones](#)

## Creating Zones

1. Select the Enterprise, click **Setup**, and then click **Zone Configuration**.
2. In the Zone Configuration pane on the left, right-click Enterprise, and then select the appropriate option:
  - **Add Zone:** Select to create only a single zone.
  - **Add Multiple Zones:** Select to create more than one zone simultaneously.



3. In the Add Zones to Enterprise dialog, enter the **Name** and **Object Number** for each zone, and then click **OK**.  
Enter a meaningful name, such as a description of what modules are defined in the zone, to provide a clear overview of the structure.
4. To apply enforcement rules to the zone to prevent record collisions and unwanted updates:
  - a. From the Zone Configuration pane, select a zone, and then click **Edit Selected Note**.
  - b. Select the appropriate **Zone Type**:
    - **0 - None**: Select if the zone has no restrictions.
    - **1 - Properties and RVCs**: Select if the zone can only contain properties and their revenue centers.
    - **2 - RVCs Only**: Select if the zone can only contain revenue centers.
  - c. Select the appropriate enforcement rules. The following table describes the enforcement rule options and indicates the zone types for which each option is available.

**Table 8-1 Zone Enforcement Rule Options**

Option	Description	Non e	Properti es and RVCs	RVCs Only
1 - Enforce Unique Properties within this Zone	Select to prevent properties from existing more than once in the zone and all child zones.	No	Yes	No
2 - Enforce Unique RVCs within this Zone	Select to prevent revenue centers from existing more than once in the zone and all child zones.	No	Yes	Yes
3 - Modules Available in this Zone are not available in Child Zones.	Select to prevent child zones from inheriting the modules from the zone.	Yes	Yes	Yes
4 - All RVCs must be from the same Property	Select to enforce all revenue centers within the zone to belong to the same property.	No	No	Yes
5 - Sort the selected zone alphabetically	Select to sort a zone in alphabetical order.	Yes	Yes	Yes

- d. To make all EMC modules configurable in the zone, select **All Modules**.
  - e. To select the EMC modules that are configurable in the zone, deselect **All Modules**, and then select the modules that are accessible from the EMC module list.  
Modules that are available in one location are also available in the children of that location, unless you configure otherwise.
  - f. Click **OK**.
5. To add properties to a zone:
    - a. From the Zone Configuration pane, right-click the zone, and then click **Add Properties**.

- b. From the Add Property dialog, select the properties to add, and then click **OK**.
6. To add revenue centers to a zone:
  - a. From the Zone Configuration pane, right-click the zone, and then click **Add Revenue Centers**.
  - b. From the Add RVC dialog, select the property to which the revenue centers belongs, and then select the revenue centers from the list.
  - c. Click **OK**.
7. To apply enforcement rules to the properties or revenue centers in the zone:
  - a. From the Zone Configuration pane, select a property or revenue center, and then click **Edit Selected Node**.
  - b. Select the appropriate enforcement rules and configurable EMC modules. Refer to the Zone Enforcement Rule Options table in Step 4 for more information on the enforcement rules.
8. Click **OK**.

**Related Topics**

- [Zones](#)

# 9

## POS Workstations

A workstation is a device used by managers, servers, bartenders, hosts, and cashiers at a property to perform various functions, such as creating guest checks, adding menu items, applying discounts and service charges, and paying a check. Examples of POS workstations include the Oracle MICROS Workstation 6 Series and the Workstation 5a.

- [Overview of Adding a Workstation](#)
- [Adding a Workstation](#)
- [Configuring Workstation Transaction Settings](#)
- [Setting Offline Transaction Posting Time](#)
- [Configuring Workstation Security](#)
- [Configuring the Barcode Scanner on the Oracle MICROS Tablet 720](#)
- [Configuring the Magnetic Stripe Reader on the Oracle MICROS Tablet 720](#)
- [Allowing Employees to Install and Authenticate POS Clients and Service Hosts](#)
- [Installing the CAL Client on the Windows Device](#)
- [Initiating CAL Authentication on the Windows Device](#)
- [POS Clients Running Android Mobile Operating System](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)
- [Android Payments](#)
- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
- [Configuring the Android Device](#)
- [Configuring the Android Device as a Workstation](#)
- [Setting the CAL Package for the Android Device](#)
- [Installing the Client Application Loader \(CAL\) on the Android Device](#)
- [Installing the Symphony Service Host on an Android Device](#)
- [Viewing and Editing Symphony Android Files](#)
- [Wireless Signal Strength Threshold](#)
- [Configuring Wireless Signal Strength Control Permissions](#)
- [Configuring the Wireless Signal Strength Threshold for Tablet Devices](#)

### Overview of Adding a Workstation

Adding a workstation consists of completing the following tasks:

- Adding a workstation
- Configuring workstation transaction settings
- Setting offline transaction posting time
- Configuring workstation security
- Configuring order device upgrades
- (Optional) Configuring integration with the Android mobile operating system

#### Related Topics

- [Adding a Workstation](#)
- [Configuring Workstation Transaction Settings](#)
- [Setting Offline Transaction Posting Time](#)
- [Configuring Workstation Security](#)
- [POS Clients Running Android Mobile Operating System](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)
- [Android Payments](#)

#### Related Topics

- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
- [Configuring the Android Device](#)
- [Configuring the Android Device as a Workstation](#)
- [Setting the CAL Package for the Android Device](#)
- [Installing the Client Application Loader \(CAL\) on the Android Device](#)
- [Installing the Symphony Service Host on an Android Device](#)
- [Viewing and Editing Symphony Android Files](#)

## Adding a Workstation

1. Select the property, click **Setup**, and then click **Workstations**.
2. Insert a record for the workstation, enter the name, and then click **OK**.
3. Double-click the new workstation record.
4. On the **General** tab, enter information in the following fields:

**Table 9-1 General Workstation Settings**

Field	Description
Type	<p>Select the type of workstation from the drop-down list:</p> <ul style="list-style-type: none"> <li>• <b>1 - Mobile MICROS:</b> Mobile devices</li> <li>• <b>2 - Workstation Client:</b> Workstations, virtual machines, and Android tablets</li> </ul> <p>Select this option for the Oracle MICROS Workstation 6 Series, Oracle MICROS Tablet 700 Series, and the Oracle MICROS Compact Workstation 310.</p> <ul style="list-style-type: none"> <li>• <b>3 - POSAPI Client:</b> Symphony Transaction Services</li> <li>• <b>6 - MICROS Tablet Client:</b> Oracle MICROS Tablet E-Series</li> </ul> <p>Select this option for the Oracle MICROS Tablet E-Series 11-inch.</p>
Language	<p>Select the default language of the workstation. This is the language that appears on the workstation's Sign On screen. If an employee has a different language set, the employee sees another language after signing in to the workstation.</p>
Resolution Cols	<p>Enter the number of Resolution Columns for the workstation's display. This number should correspond to one of the resolutions set in the workstation's .ini file, or leave it set at 0 (zero) as a default.</p>
Resolution Rows	<p>Enter the number of Resolution Rows for the workstation's display. This number should correspond to one of the resolutions set in the workstation's .ini file, or leave it set at 0 (zero) as a default.</p>
Log Verbosity	<p>Select the logging verbosity for the workstation. For example, select 0 (zero) for minimal logging. Higher numbers cause the workstation's disk or flash drive to fill more quickly.</p>
(Optional) Workstation Class	<p>Select a Workstation Class to allow similar workstations to be grouped together and share certain page configuration settings.</p>
Database Update Frequency	<p>Enter the number of seconds the workstation waits to retrieve the latest updates from the database. The default value is 60 seconds.</p> <p>The value in this field overrides the Property Parameter's Database Update Frequency setting.</p>
Check Inactivity Timeout	<p>Enter the number of seconds that the workstation waits before showing a message (Do you need more time?), prompting the workstation operator to cancel the transaction. When you enter 0 (zero), the message does not appear.</p> <p>When you select <b>Enable Follow Me</b> from the RVC Parameters module, the check is automatically suspended rather than cancelled.</p>
Check Inactivity Dialog Timeout	<p>Enter the number of seconds that the workstation shows the Inactivity dialog before automatically cancelling the transaction. This field is dimmed when you set the <b>Check Inactivity Timeout</b> value to 0 (zero).</p>
Report Timeout	<p>Enter the number of seconds the workstation waits to retrieve reporting information before failing.</p>

**Table 9-1 (Cont.) General Workstation Settings**

Field	Description
Address / Host Name	Enter the IP address or host name of the Service Host where the workstation application runs.
Subnet Mask	Enter the subnet mask of the Service Host where the workstation application runs.
Default Gateway	Enter the default gateway of the Service Host where the workstation application runs.
Is Connectionless	Select this option to have the Service Host open and close a new connection for each web service call. Setting this option prevents the workstation from reaching the maximum number of web connections allowed, although the connection is slightly slower.
Is Windows Service	Select this option to allow the Service Host to start as a Windows service. The MICROS Service Host service starts on Microsoft Windows startup with other Microsoft Windows services. The POS client starts only when the workstation operator signs on to the operating system.  If you select this option, you need to change the ports of the services being run (for example, Check and Posting Service (CAPS), KDS Controller, and Interface) in addition to the POS client. Use the EMC modules to change the ports.  If a non-POS client is required to run on the Service Host, it must run on a different port than the workstation port.  You can also set the Service Host to run as a Microsoft Windows service from the Service Host module (rather than from the Workstations module). If you set this option in the Service Host module, you do not need to change the ports of the services being run as the device is not intended to run the POS client.

5. Click the **Revenue Centers** tab.
6. Select the revenue centers for the workstation. You must select at least one revenue center.
7. Click **Save**.

- [Configuring Workstation Transaction Settings](#)
- [Setting Offline Transaction Posting Time](#)
- [Configuring Workstation Security](#)

**Related Topics**

- [Overview of Adding a Workstation](#)

## Configuring Workstation Transaction Settings

1. Select the property, click **Setup**, and then click **Workstations**.
2. Double-click the workstation record to open it.
3. Click the **Transactions** tab, and then enter information in the following fields:

**Table 9-2 Workstation Transaction Settings**

Field	Description
Minimum Check Number	Enter the minimum guest check number to use: <ul style="list-style-type: none"> <li>When the workstation is in offline mode</li> <li>When the workstation is used in revenue centers without the RVC Parameters option <b>Use Revenue Center Check Numbers</b>. In these revenue centers, each workstation determines its own check number range.</li> </ul>
Maximum Check Number	Enter the maximum guest check number to use: <ul style="list-style-type: none"> <li>When the workstation is in offline mode</li> <li>When the workstation is used in revenue centers without the RVC Parameters option <b>Use Revenue Center Check Numbers</b>. In these revenue centers, each workstation determines its own check number range.</li> </ul>
(Optional) Default Order Type	Select the default active order type for the workstation (for example, Dine In, Take Out, or Drive Thru).
Barcode Format Set	Select the barcode format for the workstation to read barcodes of various lengths.
Cashier Link	Select the cashier record to link to the workstation. Linking cashier records provides sales information, such as menu item sales and tenders.  This field is available only when you select <b>8 - On = Link Cashier Totals to WS</b> ; <b>OFF = Link to Operator</b> from the Workstations module ( <b>Optionstab</b> , and then the <b>Offline/Misc</b> subtab).
Merchant Group	Select the merchant group, or select <b>0 - Use RVC Setting</b> to use the settings from the revenue center in which the transaction occurs.
Thai Tax Rd Number	If applicable, enter the number to print on Thai Tax trailers.

4. Click **Save**.

- [Adding a Workstation](#)
- [Setting Offline Transaction Posting Time](#)
- [Configuring Workstation Security](#)

**Related Topics**

- [Overview of Adding a Workstation](#)

## Setting Offline Transaction Posting Time

You can configure the posting of transactions that occur when a property or its workstations are unable to communicate with the database for an extended period of time.

1. Select the property, click **Setup**, and then click **Property Parameters**.
2. Click the **Options** tab.

- To allow offline checks to post to the database (when communications with the Check and Posting server are re-established) with the actual time of the transaction, select **6 - Post Offline Transactions with Actual Transaction Time**. Deselect this option to allow offline checks to post with the time that the check is uploaded into the database.

Reports run offline might not match reports run online (after all the transactions have been played back).

- Click **Save**.

- [Adding a Workstation](#)
- [Configuring Workstation Transaction Settings](#)
- [Configuring Workstation Security](#)

#### Related Topics

- [Overview of Adding a Workstation](#)

## Configuring Workstation Security

- Select the property, click **Setup**, and then click **Workstations**.
- Double-click the workstation record to open it.
- Click the **Options** tab, and then click the **Display/Security** subtab.
- Enter information in the following fields:

**Table 9-3 Workstation Security Options**

Security Option	Description
Mag Card Entry Required for Employee ID	Select this option to require all employee identification (ID) entries at the workstation to use a magnetic employee identification card (for example, to sign on and authorize privileged operations). When you select this option, the workstation does not accept an employee ID number entered through the keyboard or touchscreen. Deselect this option to allow employee ID entry by either a magnetic card or by the keyboard or touchscreen.
Disable Employee Auto Sign Out	Select this option if you do not want to use the Automatic Operator Popup Interval set in the RVC Parameters module. Deselect this option to sign out workstation operators after the Automatic Operator Popup Interval expires.
Use Alternate ID for Sign-in	Select this option to allow workstation operators to sign on using a four-digit alternate ID number rather than a ten-digit employee ID number.
Fingerprint Scan Required for Employee ID	Select this option to require all employee ID entries at the workstation to scan a fingerprint. When you select this option, the workstation does not accept an employee ID number entered through the keyboard or touchscreen.



**Table 9-3 (Cont.) Workstation Security Options**

Security Option	Description
Employee ID or Fingerprint Scan Required for Employee ID	Select this option to require all employee ID entries at the workstation to scan a fingerprint or enter an employee ID through the keyboard or touchscreen. When you select this option, the workstation only accepts an employee ID number entered through the keyboard or touchscreen, or fingerprint scan.
Employee ID and Fingerprint Scan Required for Employee ID	Select this option to require all employee ID entries at the workstation to scan a fingerprint and enter an employee ID through the keyboard or touchscreen. When you select this option, the workstation only accepts an employee ID number entered through the keyboard or touchscreen and fingerprint scan.
Mag Card or Fingerprint Scan Required for Employee ID	Select this option to require all employee ID entries at the workstation to scan a fingerprint or swipe a magnetic card. When you select this option, the workstation only accepts either a magnetic card swipe or fingerprint scan.
Mag Card and Fingerprint Scan Required for Employee ID	Select this option to require all employee ID entries at the workstation to scan a fingerprint and swipe a magnetic card. When you select this option, the workstation accepts only a magnetic card swipe and fingerprint scan.

5. Click **Save**.

- [Adding a Workstation](#)
- [Configuring Workstation Transaction Settings](#)
- [Setting Offline Transaction Posting Time](#)

**Related Topics**

- [Overview of Adding a Workstation](#)

## Configuring the Barcode Scanner on the Oracle MICROS Tablet 720

The Oracle MICROS Tablet 720 comes with a built-in OPOS Barcode Scanner.

1. In EMC, select **Property, Setup, Hardware/Interfaces, Workstations**, and then **Devices**.
2. In the **Peripheral Device Configuration** section, click **Add**.
3. For **Select Peripheral Device Type**, select **OPOS Barcode Reader**.
4. For **Configuration**, enter **Honeywell**.
5. Click **OK**, and then **Save**.

The *Oracle MICROS Tablet 720 Setup Guide* contains more information on setting up and using the Tablet 720.

### Related Topics

- [Configuring the Magnetic Stripe Reader on the Oracle MICROS Tablet 720](#)

## Configuring the Magnetic Stripe Reader on the Oracle MICROS Tablet 720

The Oracle MICROS Tablet 720 comes with a built-in OPOS Mag Stripe Reader (MSR).

1. In EMC, select **Property, Setup, Hardware/Interfaces, Workstations**, and then **Devices**.
2. In the **Peripheral Device Configuration** section, click **Add**.
3. For **Select Peripheral Device Type**, select **OPOS Mag Stripe Reader**.
4. For **Configuration**, enter `IDTECH_SECUREMAG_USBHID`.
5. Click **OK**, and then **Save**.

The *Oracle MICROS Tablet 720 Setup Guide* contains more information on setting up and using the Tablet 720.

### Related Topics

- [Configuring the Barcode Scanner on the Oracle MICROS Tablet 720](#)

## Allowing Employees to Install and Authenticate POS Clients and Service Hosts

Beginning with Symphony version 2.9.1 and later, you must allow employees to download software, install, and authenticate clients and service hosts using CAL version 139. When this privilege is granted, the User Security Credentials configured in the Property Parameters module become inactive, allowing employees to use their EMC login credentials when setting up POS clients.

1. Select the Enterprise, click **Configuration**, and then click **Roles**.
  2. Double-click an employee role.
  3. Click the **Operations** tab, click the **Miscellaneous** subtab, and then select **10065 - Download Software, Install and Authenticate Clients and Service Hosts Using CAL**.
  4. Click **Save**.
- [Installing the CAL Client on the Windows Device](#)
  - [Initiating CAL Authentication on the Windows Device](#)

## Installing the CAL Client on the Windows Device

1. Open an Internet browser on the Windows device.
2. Browse to the application server and download the Windows CAL installation package: `http://[servername or IP]:8080/EGateway/Download/CAL/Win32/setup.exe`.

3. Double-click the **setup.exe** file to start the CAL installation. If prompted with the User Account Control dialog, verify the publisher is Oracle America, Inc. and then press the **Yes** button.
- [Allowing Employees to Install and Authenticate POS Clients and Service Hosts](#)
  - [Initiating CAL Authentication on the Windows Device](#)

## Initiating CAL Authentication on the Windows Device

To initiate CAL authentication on a Windows device:

1. On the device, press **Start**, select **All Programs**, select **Micros Client Application Loader**, and then select **McrsCAL Config**.
2. Decipher and enter the correct access code, and then press the **Configure CAL** button.

Figure 9-1 MICROS CAL Screen



3. In the Enter CAL Server dialog, set the following values, and then press **Next**:
  - **Server Name**: Leave this field blank.
  - **Server IP/URL**: Leave this field blank.
  - **POS Type**: Oracle recommends that you select **MICROS Symphony** (not **Simphony Multi-Tenant**), regardless whether you are running on a Symphony Standard or Premium Cloud Service environment.
  - **CAL Enabled**: Select this option if it is not automatically set by default.
  - **Secure Connection**: Select this option if Symphony uses the Translation Layer Security (TLS) 1.2 Encryption protocol. (If you are installing CAL version 139 or later, this option is set by default.)
  - **Server**: Enter your Symphony application server name.
  - **OrgPa**: If you are installing CAL version 139 in a Symphony Standard or Premium Cloud Service environment, do not enter anything, regardless of which **POS Type** is set.

- **Port:** Enter your port number. Enter 443 if Symphony uses the TLS 1.2 Encryption protocol. (This is the default port number.)
- **Update:** Click the **Update** button to automatically fill the **Server Name** and **Server IP/URL** fields after the application server name is resolved and recognized. You are now required to use an HTTPS secure connection in your Server URL.

**Figure 9-2 Enter CAL Server Dialog**

ORACLE | MICROS CAL - Enter CAL Server

Server Name: microscafe.simphony.net

Server IP/URL : https://microscafe.simphon

POS Type: MICROS Symphony

CAL Enabled  Secure Connection

Server: microscafe.simp Update

Port: 443

Cancel Next >>

Show Keyboard

4. Beginning with Symphony version 2.9.1, if you are installed on a Symphony Standard or Premium Cloud Service environment, CAL prompts you to enter your Symphony EMC logon credentials. Enter your **User** name, **Password**, and **Organization** name in the CAL Authentication dialog, and then press the **Login** button. If you are using Symphony (licensed) (on premises, self-hosted), you do not need to enter the **Organization**.

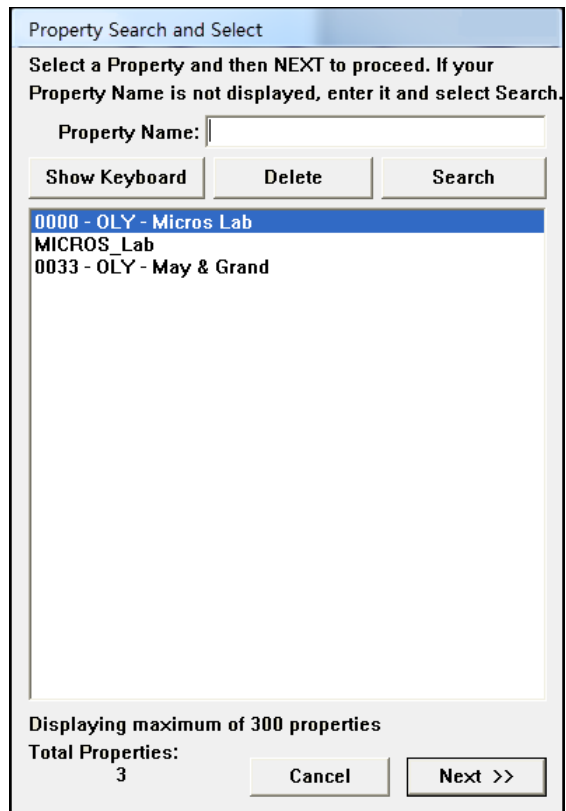
If you are using Symphony version 2.9 or earlier, you must enter the **Install User Security Username** and **Password** configured in the Security tab of the Property Parameters module in the EMC. Contact your system administrator for assistance.

5. If the Enterprise has multiple properties, select the property from the Property Search and Select dialog, and then press **Next**.

If the property does not appear in the list, enter the property name in the **Property Name** field, and then press **Search**.

You do not see a property list if only one property is configured or if there are multiple properties, but only one property is using Windows devices.

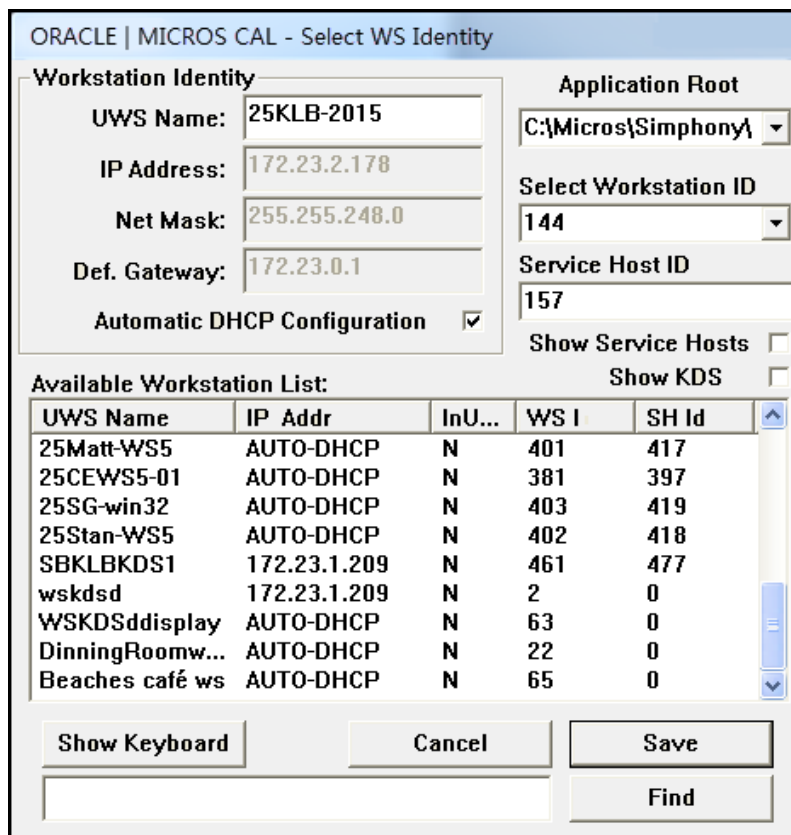
Figure 9-3 Property Search and Select Dialog



6. Select the Windows device you are configuring from the list in the Select WS Identity dialog, and then press the **Save** button. CAL automatically performs the initial authentication using the cached EMC credentials. The Windows device automatically restarts several times when installing the CAL package.

When CAL restarts it performs a re-authentication, and may prompt for credentials again. After validation, the POS client application starts; users can then clock in and log on to the device and resume normal functions.

Figure 9-4 Select Workstation Dialog



- CAL version 139 can reuse an existing pre-Symphony 2.9.1 authentication when the upgrade is deployed from the Enterprise. If you run setup.exe on an existing pre-Symphony 2.9.1 installation, you need to perform initial authentication again.
- If you change the identity of a Windows device you must perform initial authentication again.
- Each Windows device must use a unique Service Host ID. If two devices use the same Service Host ID, the first one authenticated will lose authentication when the second is authenticated.
- If a Windows device is only running the POS client application when you perform the initial authentication and you subsequently add CAPS to the device, you will not need to perform initial authentication again for CAPS.
- Do not use the AuthenticationServer.exe and AuthenticateService.exe utilities for any purpose with Symphony version 2.9.1 and CAL version 139.
- [Allowing Employees to Install and Authenticate POS Clients and Service Hosts](#)
- [Installing the CAL Client on the Windows Device](#)

# POS Clients Running Android Mobile Operating System

You can run Symphony version 2.7 and later on devices running the Android mobile operating system. The Symphony POS client operates in a similar way on an Android mobile device and a Microsoft Windows device. You can configure the POS client using the EMC.

The UI is the same on all devices and workstations. Android devices have special requirements to consider, including deployment method, configuration requirements, and the procurement process.

- [Overview of Adding a Workstation](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)
- [Android Payments](#)

### Related Topics

- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
- [Configuring the Android Device](#)
- [Configuring the Android Device as a Workstation](#)
- [Setting the CAL Package for the Android Device](#)
- [Installing the Client Application Loader \(CAL\) on the Android Device](#)
- [Installing the Symphony Service Host on an Android Device](#)
- [Viewing and Editing Symphony Android Files](#)

## Android Devices and Versions

Symphony is certified and supported with the following Android devices:

- Google Nexus 7 inch Tablet (one revenue center per device)
- Zebra MC40 (formerly the Motorola MC40)
- Samsung Galaxy Note 10 inch (one revenue center per device)
- Samsung S 10-inch
- Samsung S 8-inch

Oracle recommends using one revenue center per Android device, and a maximum of 10,000 menu item definitions.

The following table shows the Android versions available and supported with Symphony.

**Table 9-4 Android Versions Supported with Symphony**

Version Number	Version Name	Supported
4.1.x	Jellybean	No

**Table 9-4 (Cont.) Android Versions Supported with Symphony**

Version Number	Version Name	Supported
4.2.x	Jellybean	No
4.3.x	Jellybean	No
4.4.x	KitKat	Yes
5.0	Lollipop	Yes

See [Android Lollipop 5.0.2 and 5.1 Workaround](#) for instructions to resolve a known issue.

- [Overview of Adding a Workstation](#)
- [POS Clients Running Android Mobile Operating System](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)
- [Android Payments](#)

**Related Topics**

- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
- [Configuring the Android Device](#)
- [Configuring the Android Device as a Workstation](#)
- [Setting the CAL Package for the Android Device](#)
- [Installing the Client Application Loader \(CAL\) on the Android Device](#)
- [Installing the Symphony Service Host on an Android Device](#)
- [Viewing and Editing Symphony Android Files](#)

## Android Functionality Support

Note the following functionality limitations when using Symphony on an Android device:

- Symphony does not support remote access to the Android desktop for certified support applications (for example, Bomgar, Remote Desktop Protocol (RDP), and so on).
  - Android devices only operate the Symphony POS client application and cannot host shared services that other devices might access.
  - Android devices do not support the Check and Posting Service (CAPS). Therefore, the property must use at least one device with a Microsoft operating system in addition to the Android device. Oracle Hospitality recommends that this device be an Oracle MICROS Workstation 5a (POSReady) or Oracle MICROS PC Workstation 2015.
- [Overview of Adding a Workstation](#)
  - [POS Clients Running Android Mobile Operating System](#)
  - [Android Devices and Versions](#)



- [Android Network Requirements](#)
- [Android Payments](#)

**Related Topics**

- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
- [Configuring the Android Device](#)
- [Configuring the Android Device as a Workstation](#)
- [Setting the CAL Package for the Android Device](#)
- [Installing the Client Application Loader \(CAL\) on the Android Device](#)
- [Installing the Symphony Service Host on an Android Device](#)
- [Viewing and Editing Symphony Android Files](#)

## Android Network Requirements

Android devices are connected wirelessly to Symphony using an 802.11x network. Therefore, it is vital that the property have a high quality wireless network. Spotty Wi-Fi coverage causes application performance issues with check sharing and posting, as well as bouncing between online and offline states with the services on property (for example, check and posting, printing and kitchen display) and the Enterprise, which impacts the ability to receive database updates.

You must configure the Android device to use a wireless local area network (WLAN) with connectivity to the (local area network) LAN used by the Check and Posting Service and other Symphony POS clients with which they might share checks. Symphony does not support the use of a 3G or 4G connection through a telecommunications provider back to these local devices.

Oracle Hospitality recommends that you configure Android devices to use a static Internet Protocol (IP) address. Symphony does not support the use of Dynamic Host Configuration Protocol (DHCP) assigned addresses unless you define a DHCP reservation.

- [Overview of Adding a Workstation](#)
- [POS Clients Running Android Mobile Operating System](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Payments](#)

**Related Topics**

- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
- [Configuring the Android Device](#)
- [Configuring the Android Device as a Workstation](#)
- [Setting the CAL Package for the Android Device](#)
- [Installing the Client Application Loader \(CAL\) on the Android Device](#)
- [Installing the Symphony Service Host on an Android Device](#)
- [Viewing and Editing Symphony Android Files](#)

# Android Payments

The Android clients support processing credit cards and other forms of electronic payments.

Simphony installs several credit card payment drivers with the application. The following drivers are supported with the Android mobile operating system:

- CAPMS
- Elavon Fusebox
- mCreditDebit
- Shift4 Dollars On The Net
- VisaD

The loadable Stored Value and Loyalty modules support Android clients, and are used with Oracle Hospitality Gift and Loyalty and FreedomPay. The Xprocessor Extension Application, which is used for third party gift cards such as Givex, does not support Android devices.

- [Overview of Adding a Workstation](#)
- [POS Clients Running Android Mobile Operating System](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)

## Related Topics

- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
- [Configuring the Android Device](#)
- [Configuring the Android Device as a Workstation](#)
- [Setting the CAL Package for the Android Device](#)
- [Installing the Client Application Loader \(CAL\) on the Android Device](#)
- [Installing the Simphony Service Host on an Android Device](#)
- [Viewing and Editing Simphony Android Files](#)

## Workaround for Android Lollipop 5.0.2 and 5.1

Devices running the Android version Lollipop (5.0.2 and 5.1) mobile operating system do not render the WebView drop-down lists properly. To resolve this issue, update the Android WebView Component.

1. Open the Play Store app on the Android device.
  2. Search for, and then select the **Android System WebView** app by Google.
  3. Tap **Update**.
- [Configuring the Android Device](#)

- [Configuring the Android Device as a Workstation](#)
- [Setting the CAL Package for the Android Device](#)
- [Installing the Client Application Loader \(CAL\) on the Android Device](#)
- [Installing the Symphony Service Host on an Android Device](#)
- [Viewing and Editing Symphony Android Files](#)

**Related Topics**

- [Overview of Adding a Workstation](#)
- [POS Clients Running Android Mobile Operating System](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)
- [Android Payments](#)

## Configuring the Android Device

Perform the following steps before installing Symphony software.

1. Configure the Android device to be a member of the POS network using a static Internet Protocol (IP) address.
2. Install antivirus software.
3. Turn off Trusted Sources on the device. See the manufacturer instructions for details.
4. If you are using a Bluetooth printer, pair it with the device. See the manufacturer instructions for details.

- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
- [Configuring the Android Device as a Workstation](#)
- [Setting the CAL Package for the Android Device](#)
- [Installing the Client Application Loader \(CAL\) on the Android Device](#)
- [Installing the Symphony Service Host on an Android Device](#)
- [Viewing and Editing Symphony Android Files](#)

**Related Topics**

- [Overview of Adding a Workstation](#)
- [POS Clients Running Android Mobile Operating System](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)
- [Android Payments](#)

## Configuring the Android Device as a Workstation

1. (Optional) If you are using a Bluetooth printer with the Android device, set the printer from the Printers module. [Configuring a Printer](#) contains more information about setting up the printer.
  2. Select the property, click **Setup**, and then click **Workstations**.
  3. Insert a new workstation record.
  4. Double-click the record to open it in form view.
  5. Enter information in the workstation configuration fields, and set the **Type** as **Workstation Client**.
  6. Enter the Internet Protocol (IP) address or host name of the Service Host where the workstation application runs in the **Address/Host Name** field.
  7. Click the **Options** tab, and then click the **Display/Security** subtab.
  8. Select **39 - Floating Tablet**.
  9. (Optional) If you are using a Bluetooth printer, click the **Printers** tab, and then select the printer.
  10. Click **Save**.
- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
  - [Configuring the Android Device](#)
  - [Setting the CAL Package for the Android Device](#)
  - [Installing the Client Application Loader \(CAL\) on the Android Device](#)
  - [Installing the Symphony Service Host on an Android Device](#)
  - [Viewing and Editing Symphony Android Files](#)

### Related Topics

- [Overview of Adding a Workstation](#)
- [POS Clients Running Android Mobile Operating System](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)
- [Android Payments](#)

## Setting the CAL Package for the Android Device

1. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
2. Highlight the Service Host version.
3. Click the **CAL Package Configuration** tab.
4. Set the **Platform Type for Service Host.[version]** to **0 - All Clients**.
5. Click the **Deployment Schedules** tab.

6. Set the deployment for the Service Host package for your Enterprise, property, or individual Service Host. [Adding a Deployment Schedule for the Current CAL Package](#) contains more information about setting the deployment.
7. Click **Save**.
  - [Workaround for Android Lollipop 5.0.2 and 5.1](#)
  - [Configuring the Android Device](#)
  - [Configuring the Android Device as a Workstation](#)
  - [Installing the Client Application Loader \(CAL\) on the Android Device](#)
  - [Installing the Symphony Service Host on an Android Device](#)
  - [Viewing and Editing Symphony Android Files](#)

#### Related Topics

- [Overview of Adding a Workstation](#)
- [POS Clients Running Android Mobile Operating System](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)
- [Android Payments](#)

## Installing the Client Application Loader (CAL) on the Android Device

1. To initiate CAL authentication on an Android device with Symphony version 2.9 and earlier:
  - a. Open an Internet browser window on the Android device.
  - b. Browse to the application server: `http://[servername or IP]:8080/EGateway/Download/CAL/Android/McrsCALClient_[CALversion].apk`. `McrsCALClient_[CALversion].apk` downloads to the device. (The CAL version is likely 129 or later.)
  - c. Open the **Downloads** menu on the Android device.
  - d. Tap the **McrsCALClient\_[CALversion].apk** file to start the installation.
  - e. If prompted, select the device **Package Installer** or local application for Android file installation, and then tap **Always**.
  - f. If you receive a prompt for clearing instructions, tap **OK**.
  - g. Tap **Install**. CAL installs and notifies you upon completion.
  - h. Tap **Done**.
  - i. Press the **Home** button on the Android device to prompt for CAL Launcher.
  - j. Tap the **Micros CAL** option, and then tap **Always**.
  - k. If you receive a prompt with instructions about defaults, tap **OK**. The CAL Launcher home page appears. Installation of CAL is complete.

- l. Tap the **CAL** shortcut to launch CAL Admin.
  - m. Enter the correct code based on the six-digit number shown at the top, and then tap **Next**.  
 CAL restricts access to CAL Admin and other areas on the Android device. You must enter a security code to access the CAL Admin configuration and settings on the device.
  - n. CAL searches for available servers. If found, the available servers appear. Tap the desired server to populate the server information. If no servers are available, manually configure the server information.
  - o. Tap **Next** to continue.
  - p. Select the correct property for the device, and then tap **Next** to continue. CAL returns a list of defined workstations for the selected property.
  - q. Tap the correct workstation for the device to populate the workstation information. If no workstations are available, manually configure the information for the workstation.
  - r. Tap **Save**.
2. To initiate CAL authentication on an Android device with Symphony version 2.9.1 and later:
    - a. Ensure that you have the employee privilege to run CAL authentication using your EMC logon credentials.  
 See [Allowing Employees to Install and Authenticate POS Clients and Service Hosts](#) for instructions.
    - b. Deploy the CAL package version 139 to the Android devices.  
 See [Configuring the Deployment Schedule to Install CAL on Workstations](#) for instructions about deploying CAL packages.
    - c. Start the Android device, enter your Symphony EMC **User Name** and **Password**, and then press **Login**.
    - d. Select a workstation from the list, and then press **Save**. CAL performs the initial authentication.
    - e. Enter your Symphony EMC **User Name**, and then press **OK**.
    - f. Enter your Symphony EMC **Password**, and then press **OK**.
    - g. If you are running a Symphony Standard or Premium Cloud Service environment, enter the **Organization** name, and then press **OK**.
- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
  - [Configuring the Android Device](#)
  - [Configuring the Android Device as a Workstation](#)
  - [Setting the CAL Package for the Android Device](#)
  - [Installing the Symphony Service Host on an Android Device](#)
  - [Viewing and Editing Symphony Android Files](#)

#### Related Topics

- [Overview of Adding a Workstation](#)

- [POS Clients Running Android Mobile Operating System](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)
- [Android Payments](#)

## Installing the Symphony Service Host on an Android Device

The download and installation of Symphony ServiceHost automatically occurs on an Android device. The CAL shows the download file progress. The estimated file size is 558,000 kilobytes (KB).

1. Tap **Install**.
2. Tap **Open**. ServiceHost starts and requests that you save the property and workstation settings.
3. Tap **OK**. ServiceHost loads and downloads data from the Enterprise level.
4. Enter the **Installer User Name** for the property, and then tap **OK**.
5. Enter the **Installer Password** for the property, and then tap **OK**. The installation is complete when the login page appears.

- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
- [Configuring the Android Device](#)
- [Configuring the Android Device as a Workstation](#)
- [Setting the CAL Package for the Android Device](#)
- [Installing the Client Application Loader \(CAL\) on the Android Device](#)
- [Viewing and Editing Symphony Android Files](#)

### Related Topics

- [Overview of Adding a Workstation](#)
- [POS Clients Running Android Mobile Operating System](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)
- [Android Payments](#)

## Viewing and Editing Symphony Android Files

After you install Symphony on an Android device, use the Configuration Management Tool to view and edit certain files.

1. Launch the Symphony application on the Android device.
2. After the application loads, perform the following task on the Android device: On event (left swipe + right swipe + left swipe + tap + tap).

3. Enter the correct code based on the six-digit number shown at the top, and then tap **Sign In**. The Management Tool Home screen appears.
4. The following table lists the options and actions you can perform.

**Table 9-5** Symphony Android Files

Option	Action
View web.config.txt	Tap to view and edit the web.config.txt file
View config32.web	Tap to view and edit the config32.web file
View Log	Tap to view the EGateway Log
View LogZone	Tap to view the LogZone_LoadHandlers.txt file, which is not editable
Ping Server	Tap to view the Server Name or IP Address
Delete DataStore	Tap to delete the DataStore database file and restart the application on the device
Copy DataStore	Tap to copy the DataStore database file within the device

- [Workaround for Android Lollipop 5.0.2 and 5.1](#)
- [Configuring the Android Device](#)
- [Configuring the Android Device as a Workstation](#)
- [Setting the CAL Package for the Android Device](#)
- [Installing the Client Application Loader \(CAL\) on the Android Device](#)
- [Installing the Symphony Service Host on an Android Device](#)

**Related Topics**

- [Overview of Adding a Workstation](#)
- [POS Clients Running Android Mobile Operating System](#)
- [Android Devices and Versions](#)
- [Android Functionality Support](#)
- [Android Network Requirements](#)
- [Android Payments](#)

## Wireless Signal Strength Threshold

Wireless devices occasionally behave unpredictably or inconsistently due to weak wireless signal strength or a flickering network, leaving the device in a state that is not consistently online or offline. To handle unstable network environments, you can configure the wireless network signal strength at which devices automatically go offline. Configure the wireless signal strength threshold for workstations that use a wireless network (tablet devices running the Microsoft Windows and Android mobile operating systems). Some devices may have both cable and wireless network connections; when docked, the device can use both network types. Disable this wireless signal strength feature when docking a device with a cable (wired) network.

You can define the wireless threshold settings from the following EMC modules:



- **Property Parameters:** The values are set at the property.
- **Workstations:** The workstation inherits the values from the property, unless overridden here.

#### Related Topics

- [Configuring Wireless Signal Strength Control Permissions](#)
- [Configuring the Wireless Signal Strength Threshold for Tablet Devices](#)

## Configuring Wireless Signal Strength Control Permissions

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Double-click the role type record (for example, administrator, manager or server).
3. Click the **Actions** tab, and then click the **Hardware** subtab.
4. Select the **Wireless Monitor** option.
5. Click **Save**.

#### Related Topics

- [Wireless Signal Strength Threshold](#)

## Configuring the Wireless Signal Strength Threshold for Tablet Devices

1. Perform one of the following, depending on which level you want to configure or override:
  - To configure at the property level, select the property, click **Setup**, and then click **Property Parameters**.
  - To override at the workstation, select the property, click **Setup**, and then click **Workstations**.
2. On the **General** tab, in the Wireless Signal Strength Control section, enter information in the following fields:
  - **Offline Threshold:** Enter a number between 0 and 99 to represent the signal strength percentage at which devices go offline. Devices will go offline when the signal strength is at or below this percentage value. For example, if the **Offline Threshold** is set to 90 (90%), and the device's current signal is 89%, the device will go offline. When the signal is detected above 90%, the device reconnects online.
  - **Reconnect Threshold:** Enter a number between 0 and 99 to represent the signal strength percentage at which devices recover online after being in an offline state. Devices will go online when the signal strength is at or above this percentage value. For example, if the **Reconnect Threshold** is set to 80, and the device's signal strength is 85%, the device will go online.

These values appear in a status bar on the POS client workstation.

3. Click **Save**.

**Related Topics**

- [Wireless Signal Strength Threshold](#)

# 10

## Translation for Internationalization

Simphony allows you to translate the user interface to the local language and maintain translation files for the EMC. You can configure up to four languages to appear on workstations, guest checks, and customer receipts. Simphony upgrades earlier versions of translation files into later versions, and translates all languages defined in the system. You cannot translate core translation files as they are managed internally. The Simphony installer updates existing translations and automatically inserts added language files.

Configuring languages also translates user interface messages on workstations, text labels, options, help text, and error messages in the EMC.

You must manually translate menu items, touchscreen buttons, and EMC records.

### Supported Languages

The following table lists all supported languages in Simphony.

**Table 10-1 Language Setup Settings**

Language	Locale String	Local ID	Language Culture
Arabic	Arabic-SaudiArabia	Arabic (Saudi Arabia)	ar-SA
Chinese (Simplified)	chinese-simplified	Chinese (People's Republic of China)	zh-CHS
Chinese (Traditional)	chinese-traditional	Chinese (Taiwan)	zh-CHT
Danish	danish	Danish (Denmark)	da-DK
Dutch	dutch	Dutch (Netherlands)	nl-NL
English	english-us	English (United States)	en-US
Finnish	finnish	Finnish (Finland)	fi-FI
French	french	France (France)	fr-FR
German	german	German (Germany)	de-DE
Italian	italian	Italian (Italy)	it-IT
Japanese	japanese	Japanese (Japan)	ja-JP
Korean	korean	Korean (Korea)	ko-KR
Norwegian	norwegian	Norwegian (Norway)	nb-NO
Portuguese (Brazil)	portuguese	Portuguese (Brazil)	pt-BR
Portuguese (Portugal)	portuguese	Portuguese (Portugal)	pt-PT
Russian	russian	Russian (Russia)	ru-RU
Spanish	spanish	Spanish (Spain)	es-ES
Swedish	swedish	Swedish (Sweden)	sv-SE
Thai	chinese	Thai (Thailand)	th-TH

**Table 10-1 (Cont.) Language Setup Settings**

Language	Locale String	Local ID	Language Culture
Turkish	turkish	Turkish (Turkey)	tr-TR

- [Obtaining the Translation Files](#)
- [Overview of Configuring Language Translation](#)
- [Configuring Translation Privileges](#)
- [Adding Languages](#)
- [Deploying Standard Translations to Workstations](#)
- [Loading Workstation Translations](#)
- [Loading EMC Translations](#)
- [Loading POS Core and Payment Translations](#)
- [Translating Menu Item Records](#)
- [Translating EMC Records](#)
- [Translating Touchscreen Buttons](#)
- [Setting Languages for the Property](#)
- [Associating Languages to Employees](#)
- [Setting the Default Language for a Workstation](#)
- [Printing a Secondary Language on Guest Checks and Customer Receipts](#)
- [Configuring Screen Language Buttons](#)
- [Copying Translations from One Language to Another](#)
- [Exporting a Translation File](#)

## Obtaining the Translation Files

You can access the translated files in the following locations:

- Browse the Symphony installation media to the [Drive Letter]:\Install\Symphony2\Tools\Translation folder.
- From the application server, use Windows Explorer to navigate to the Symphony installation [Drive Letter]:\MICROS\Symphony2\Tools\Translation folder.

## Overview of Configuring Language Translation

Configuring language translation in Symphony consists of completing the following tasks:

**Table 10-2 Overview of Configuring Languages**

Task	Go To
Set the Translation Privileges	<a href="#">Configuring Translation Privileges</a>
Create an Enterprise language entry	<a href="#">Adding a Language</a>
Load translation file	<ul style="list-style-type: none"> <li>• <a href="#">Loading Workstation Translations</a></li> <li>• <a href="#">Setting Languages in the EMC</a></li> <li>• <a href="#">Loading POS Core and Payment Translations</a></li> </ul>
Translate definition data	<ul style="list-style-type: none"> <li>• <a href="#">Translating Menu Item Records</a></li> <li>• <a href="#">Translating EMC Records</a></li> <li>• <a href="#">Translating Touchscreen Buttons</a></li> </ul>
Set languages for the property	<a href="#">Setting Languages for the Property</a>
Assign languages to employees	<a href="#">Associating Languages to Employees</a>
Set the default language for a workstation	<a href="#">Setting the Default Language for a Workstation</a>
(Optional) Configure Symphony to print menu items in an alternate language	<a href="#">Printing a Secondary Language on Guest Checks and Customer Receipts</a>
(Optional) Create touchscreen button to switch between languages on workstations	<a href="#">Configuring Screen Language Buttons</a>

## Configuring Translation Privileges

To enable privileges so that users can modify, import, or configure translations, perform the following steps:

1. Select the Enterprise, click **Configuration**, and then click **Roles**.
2. Double-click the role type, click the **Actions** tab, and then select the appropriate privileges:

**Table 10-3 Translation Privilege Settings**

Privilege Name	Allows the Employee to...	Recommended Roles
EMC Text Translations	Import and modify the EMC related text files	Property expert
Workstation Text Translations	Import and modify workstation related text files	Property expert

3. Click **Save**.

## Adding Languages

Configuring languages as described in this procedure translates user interface messages on workstations, text labels, options, help text, and error messages in the EMC. You must manually translate menu items, touchscreen buttons, and EMC records.

1. Select the Enterprise, click **Setup**, and then click **Languages**.

2. Insert a record and enter a name (for example, Spanish).
3. Double-click the record to open it.
4. On the **General** tab, select the language from the **Keyboard Type** drop-down list.
5. On the **Printing** tab, set the following options (if needed):
  - **Print Custom Numerals:** Select this option to print numerals defined in the **Custom Numerals** field on the **General** tab.
  - **Asian Characters:** Select this option for languages such as Chinese, Japanese, Thai, and Korean where characters are picture-based. When you select this option, characters print double-wide to make them more readable. The order device printer also prints the characters double-wide to maximize readability.
  - **Mapping Font:** By default, this option is set to **Amap**. Select **Vmap** for Thai.
6. Click the **Miscellaneous** tab.
7. Select the language from the **Locale String** drop-down list.

See [Table 1 – Language Setup Settings](#) for potential setting options for supported languages.

See [http://msdn.microsoft.com/en-us/library/ee825488\(v=cs.20\)](http://msdn.microsoft.com/en-us/library/ee825488(v=cs.20)) for a more detailed listing of language codes.
8. Select the **Local ID** from the drop-down list, and then enter the **Language Culture** corresponding to the language.
9. Click **Save**.
10. To load translated text files for the workstation, see [Loading Workstation Translations](#).
11. To load translated text files for the EMC, see [Loading EMC Translations](#)

## Deploying Standard Translations to Workstations

The language translation CAL package contains the following translation files for all 19 standard languages supported by Symphony:

- OpsText\_XX.xml
  - PosCoreText\_XX.xml
  - LoyaltyCommandModule.dll\_xx.xml
  - Micros.Payment.Cash\_XX.xml
  - Micros.Payment.CreditDebit\_XX.xml
  - Micros.Payment.LoadableCreditCardModule\_XX.xml
  - Micros.Payment.LoadablePmsModule\_XX.xml
  - Micros.Payment.MCreditDebit\_XX.xml
1. To deploy the standard translations to the workstations for a new installation:
    - a. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
    - b. Highlight the **Language Translation** CAL package, and then click the **Deployment Schedules** tab.

- c. Click **Add Deployment**, and then select the version that corresponds to the Service Host version you have installed on the workstations.
        - d. Select the **Deployment Type**, click the ellipsis button to complete your selection, and then click **OK**.
  - You can optionally select effective dates if you do not want to deploy the standard translations immediately.
  - e. Click **Save**.
2. To deploy the standard translations to the workstations after upgrading the Enterprise:
  - a. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
  - b. Highlight the **Language Translation CAL** package, and then click the **Deployment Schedules** tab.
  - c. Click the schedule from the list, click **Change Package version**, and then select the version that corresponds to the Service Host version you have or to which you upgraded.
  - d. Click **Save**.
3. The workstation restarts after successful deployment.

## Loading Workstation Translations

When printing multiple languages on order devices, menu item names print in object number order of the languages configured in print settings.

Importing workstation translation files using EMC is not required for deploying the standard workstation translations. This is only required if you want to modify a standard translation or create a bespoke translation in EMC after importing the file. After completing the configuration of the bespoke translation, the files can be exported for deployment; Oracle recommends using a new custom CAL package or manually copying the files to each workstation.

## Loading EMC Translations

To load translated text files for the EMC:

1. Select the Enterprise, click **Setup**, and then click **Languages**.
2. Double-click the appropriate language record to open it.
3. Click the **Translation** tab, select **EMC Text** as the **Type**, and then click **Import from a File**.
4. Browse to the `[Drive Letter]:\MICROS\Symphony2\EmcClient` folder, and then select the EMC Text file corresponding to your language.

For example, select `EMCText_es.xml` to translate to Spanish.
5. Click **Open**, and then click **Yes** each time you are prompted.
6. Browse to the `[Drive Letter]:\MICROS\Symphony2\EmcClient` folder, and then rename the EMC text file you selected in Step 4 to include the object ID of that language record.

For example, in the Languages module, if the object ID for Spanish is 4, rename the EMCText\_es.xml to EMCText4.xml.

7. Click **Save**.

## Loading POS Core and Payment Translations

In addition to applying translated files for POS client workstations and the Symphony EMC, you also need to load the translated text for the following files:

- POS Core Text
- MICROS Payment Cash
- MICROS Payment Credit/Debit
- MICROS Payment Demo Credit/Debit (MICROS.Payment.MCreditDebit)
- Any Custom file that you want to apply

To apply translated files for these files:

1. Select the Enterprise, click **Setup**, and then click **Languages**.
2. Double-click the appropriate language record to open it.
3. Click the **Translation** tab, select the appropriate text **Type** to be translated (for example, POS Core Text), and then click **Import from a File**.
4. Browse to the [Drive Letter]:\MICROS\Symphony2\Tools\Translation folder, and then select the desired text file corresponding to your language.

For example, select PosCoreText\_es.xml to translate to Spanish.

5. Click **Open**, and then click **OK**.
6. Repeat Steps 3 through 5 for each Payment module.
7. Click **Save**.

## Translating Menu Item Records

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
2. Use the filters to search for the items to translate, and then click **Search**.
3. To translate menu item master records, enter the translated text in the relevant language column on the **Master Records** tab.

For example, to translate master records to Spanish, enter the translated text in the **Name - Spanish** column. Master records show a separate column for each language configured in the Enterprise.


4. To translate menu item definitions, click the **Definition Records** tab, and then enter the translated text in the relevant language column.

Definition records show two extra columns per language, **First - [Language Name]** and **Second - [Language Name]**, to allow translations for the first name and second name of each definition.

5. Click **Save**.




## Translating EMC Records

In the EMC, you can translate the name of any record into multiple languages using the Text Translation dialog. This dialog is invoked by the Language Translation icon () on the toolbar (or using the shortcut key F8 ). The Language Translation icon only becomes active when a translatable text field or a translatable table view cell is active in the module. This icon is dimmed if:

- Only one language exists in the Enterprise
- You do not have Edit access for the selected module

Translated text saves when the record itself is saved. Therefore, if you perform an undo operation on a record, record translations are also reverted.

## Translating Touchscreen Buttons

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page to translate, and then on the **Edit** tab, click the **Translate current item legend** () icon.
3. In the Edit Content Area Translated Text dialog, enter the translation for each button in the relevant language column.

The dialog shows a separate column for each language assigned to the current property in Property Parameters. Each row in the grid represents a single touchscreen button.

4. Click **Save**.

## Setting Languages for the Property

1. Select the property, click **Setup**, and then click **Property Parameters**.
2. On the **General** tab, select the default language from the **Language 1** drop-down list.
3. (Optional) From the **Language 2** through **Language 4** drop-down lists, select the secondary languages.
4. Click **Save**.

## Associating Languages to Employees

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Employee Maintenance**.
2. Double-click an employee record to open it, change the default **Language** of the employee, and then click **Save**.
3. Repeat Step 2 for all employees.

## Setting the Default Language for a Workstation

Follow this procedure to configure the language that appears on the workstation's Sign-In screen. Employees with a different language configured see their default language after signing in to the workstation.

1. Select the property, click **Setup**, and then click **Workstations**.
2. Double-click a workstation record to open it.
3. On the **General** tab, select the **Language** to appear on the workstation device, and then click **Save**.
4. Repeat Steps 2 through 3 for all workstations.

## Printing a Secondary Language on Guest Checks and Customer Receipts

You can configure Symphony to print menu items in an alternate language beneath the default language on guest checks and customer receipts.

1. Select the property, click **Setup**, and then click **Property Parameters**.
2. On the **General** tab, select a language from the **Select Secondary Print Language** drop-down list. Select **0 - None** to print only the default language.
3. Click **Save**.
4. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Format Parameters**.
5. Click the **Options** tab.
6. Select **52 - Print Secondary Language on Guest Checks/Customer Receipt**.
7. Click **Save**.

## Configuring Screen Language Buttons

If more than one language is configured, you can create touchscreen buttons to allow workstation operators to switch between the languages.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place the language buttons, and then on the Edit tab, select the page area in which to define the buttons.
3. Click **Button**, and then on the General subtab, select **Function** from the **Type** drop-down list.
4. Click the black arrow directly beneath the **Type** drop-down list, and then select **Multi Language** from the **Type** pane.
5. To allow workstation operators to select the preferred language from a list, select **Screen Language List**, and then click **OK**.
6. To configure separate touchscreen buttons for each language configured for the property, select **Screen Language 1**, and then click **OK**.

Screen Language 1 shows the descriptors for the default language.

7. Enter a **Legend** for the button, and then position and size the button on the page.
8. If you are creating separate buttons for each language, repeat Steps 3 through 7 and configure buttons for the following:
  - **Screen Language 2:** Shows the descriptors for the second language defined in the system.
  - **Screen Language 3:** Shows the descriptors for the third language defined in the system.
  - **Screen Language 4:** Shows the descriptors for the fourth language defined in the system.
9. Click **Save**.

## Copying Translations from One Language to Another

1. Select the Enterprise, click **Setup**, and then click **Languages**.
2. Double-click the appropriate language record to open it, and then click the **Translations** tab.
3. To copy all translations from another language, click **Copy All Translations**, select the language from which to copy, and then click **OK**.
4. To copy the translations for selected elements:
  - a. From the Text Element section, select the relevant records, and then click **Copy Selected Translations**.
  - b. Select the language from which to copy, and then click **OK**.
5. Click **Save**.

## Exporting a Translation File

After you modify a language file, you can export it and then import it into another system.

1. Select the Enterprise, click **Setup**, and then click **Languages**.
2. Double-click the appropriate language record to open it, and then click the **Translations** tab.
3. Click **Export to a File**, and then browse to the desired local directory and save the file.

The default file name appends the language to the end. For example, if the language is French, the exported default file name is `OPSText_French`.

# 11

## Employees and Privileges

If you are using Oracle Hospitality Labor Management, you need to add employees using Labor Management. The *Oracle Hospitality Labor Management Cloud Service Feature Reference Manual*, located on the [Oracle Help Center](#), contains information about adding employees in Labor Management. The initial employee information is sent from Labor Management to Symphony. To change the role for an existing employee, use the Symphony EMC.

In Symphony, privileges determine the activities an employee can perform, the EMC modules available to the employee, and the types of transactions the employee can process. You can configure privileges by the job role (for example, host, server, bartender, cashier, or manager).

- [Creating Employee Roles](#)
- [Creating Employee Classes](#)
- [Adding an Employee](#)
- [Deleting an Employee](#)
- [Changing Employee Information](#)
- [Configuring Employee Shifts](#)
- [Configuring Employee Breaks](#)
- [Clock-In and Clock-Out Cycles](#)
- [Setting Clock-In and Clock-Out Cycles](#)
- [Understanding Job Codes](#)
- [Configuring Job Codes](#)
- [Understanding Tip Tracking](#)
- [Configuring Tip Tracking and Reporting](#)
- [Configuring Tip Track Front of House Buttons](#)

### Creating Employee Roles

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Insert a record for the type of role (for example, host, bartender, server, manager, or administrator), and then click **OK**.
3. Double-click the role type.
4. On the **General** tab, select the role security from the **Level** drop-down list.

Level 0 (zero) has greater privileges than level 9. The value in this field prevents EMC users from creating employee records with greater privileges than the administrator is granted. The following table describes typical levels for various types of roles. Gaps appear to allow flexibility for other types of roles that are not listed.

**Table 11-1 Role Security Levels**

Level	Type of Role
0	System Administrator
1	Enterprise Level Administrator
2	
3	
4	Property Level Administrator
5	
6	Property Floor Manager
7	
8	Bartender, Cashier, Server
9	

5. Click the **EMC Modules** tab.
6. For each EMC module listed in the File column, select one or more of the following privileges:
  - **View:** Selecting this option grants access to view a module. You must select **View** so that employees in the role can open the module.
  - **Edit:** Selecting this option allows employees in the role to update fields or records within a module.
  - **Add:** Selecting this option allows employees in the role to add records to a module.
  - **Delete:** Selecting this option allows employees in the role to delete records from a module.
  - **Add Override:** Selecting this option allows employees in the role to override records in a module.
  - **Allow Duplicate Obj#:** Selecting this option allows employees in the role to add menu item records where existing records with the same number exist elsewhere in the Enterprise.
  - **Allow Duplicate Name:** Selecting this option allows employees in the role to add records where existing records with the same name exist elsewhere in the Enterprise.
  - To easily configure a role to View, Edit, Add, Delete, or Add Override for every module without individually selecting each option, right-click a column heading and select **Set All**.
7. Click the **Actions** tab.
8. Select **Enable** for the appropriate EMC tasks listed in the Action column.  
To activate a role for every module without individually selecting each option, right-click the **Enable** heading, and then select **Set All**.
9. Click **Save**.
  - [Creating Employee Classes](#)
  - [Adding an Employee](#)

- [Deleting an Employee](#)
- [Changing Employee Information](#)
- [Configuring Employee Shifts](#)
- [Configuring Employee Breaks](#)

## Creating Employee Classes

You can set collective options for a group of similar employee roles using an Employee Class. Each employee must belong to an Employee Class to perform workstation operations.

1. Select the property, click **Configuration**, and then click **Employee Classes**.
2. Insert a record for a group of employees (for example, server, bartender, or host), and then double-click the record to open it.
3. On the **General** tab, set information for the fields as described in the following table:

**Table 11-2 Employee Class Settings**

Field	Description
#Hours/Day Before OT	Enter the number of regular hours that employees in the Employee Class can work in a single day before being paid at the overtime rate.
#Hours/Period Before OT	Enter the number of regular hours that employees in the Employee Class can work in a single pay period before being paid at the overtime rate.
ISL Options	Select the <b>ISL Employee Options</b> to allow employees in the Employee Class to execute Interface Script Language (ISL) scripts.  ISL is the Oracle Hospitality proprietary interpreted language used to create small programs called scripts. The ISL options act like a transaction privilege level in an ISL script. ISL scripts can be written to include variables that check for the presence of these privileges for the employee who is running the script. If the employee is not a member of an Employee Class that has the necessary ISL employee option set, the script does not execute, and a privilege prompt appears.
Default Trans TS	Select the default touchscreen that appears when members of the Employee Class sign on to a workstation.
MMH Default Trans TS	Select the default touchscreen that appears when members of the Employee Class sign on to a Mobile MICROS device.

**Table 11-2 (Cont.) Employee Class Settings**

Field	Description
Pickup/Add/Xfer SLU Style	Select a touchscreen style that workstation operators can use when adding and transferring checks with the <b>Add/Transfer Check Screen Lookup (SLU)</b> function key.
View Screen/Style Names for RVC	View the touchscreen names and styles set in the revenue centers.

4. Click the **Operator Options** tab.
5. For each revenue center listed, from the **Operator Type** drop-down list, select the guest check printing method for workstation operators assigned to the Employee Class.
  - **By Round:** Select this option to print a guest check at the end of each service round, showing only the changes posted to the service round.
  - **On Demand:** Select this option to print a buffered guest check after performing a Service Total or tender set to print an on demand check.
  - **Temp On Demand:** Select this option to print a guest check on demand (in a by round manner).
  - **Special By Round:** Select this option to print a guest check on demand for all rounds except the first round of a check. The first round always prints. Subsequent service rounds print if the Service Total is set to print an on demand check.

6. For each revenue center listed, select the appropriate **Options** for workstation operators assigned to the Employee Class, and then click **OK**.

Using a Server Employee Class as an example, you can require all servers in a revenue center to enter the number of guests when beginning new checks and to enter table numbers.

7. Click **Save**.
  - [Creating Employee Roles](#)
  - [Adding an Employee](#)
  - [Deleting an Employee](#)
  - [Changing Employee Information](#)
  - [Configuring Employee Shifts](#)
  - [Configuring Employee Breaks](#)

## Adding an Employee

You must have the Enterprise level permission Add Employees to add an employee record from a template.

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Employee Maintenance**.
2. Click the Insert Record icon from the toolbar. The Add Employees dialog appears.

3. From the **Select a task to perform** drop-down list, select **Add Employee Record from Template**.

Using a template simplifies the process of adding employees.

4. Click the **Select** link next to the **Employee To Copy** field.
5. From the Select Employee dialog, select a template employee record, and then click **OK**.
6. Enter employee information in the following fields, and then click **OK**.
  - **First and Last Name**
  - (Optional) **Check Name**: The employee name appearance on guest checks (for example, Sally S)
  - (Optional) **ID**: The employee identification number
  - **Record Number**: The next available record number appears by default
  - **Property # and Name**: The property where the employee works
  - **RVC # and Name**: The revenue center (RVC) where the employee works
7. Click **Yes** on the Add Employee? confirmation prompt.
8. To add another employee, click **Yes** on the prompt, and then repeat Steps 6 and 7. When you are finished adding employees, click **No**.

- [Creating Employee Roles](#)
- [Creating Employee Classes](#)
- [Deleting an Employee](#)
- [Changing Employee Information](#)
- [Configuring Employee Shifts](#)
- [Configuring Employee Breaks](#)

## Deleting an Employee

You must have the Enterprise level permission called Delete Employees to remove an employee record.

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Employee Maintenance**.
2. Search for the employee record.
3. Right-click the employee record, and then select **Delete**.
4. From the Delete Employee Records dialog, click **Yes** to confirm.
5. To view a list of all deleted employees in the search area, select **View Deleted Employees**, and then click **Search**.
6. To reactivate a deleted employee, right-click the employee record, select **Reactivate**, and then click **Yes** to confirm.
7. If you are an administrator and want to permanently delete an employee, right-click the employee record, select **Permanently Delete**, and then click **Yes** on the prompts to confirm.



You cannot permanently delete an employee who is not marked Is Deleted and who has associated sales or timecard records in the Oracle Hospitality Reporting and Analytics database. Employees are mapped between the Symphony and Reporting and Analytics databases using the object number from the EMC. Consider the following example:

- Employee 12345, Ted Davis, has \$500 in sales.
- Employee 12345 is deleted from the database.
- If the EMC allowed this employee to be permanently deleted, a new employee, Mary Smith, could be added at employee record 12345 and the new employee would essentially start with \$500 in sales.

Thus, the two-step employee deletion process preserves the object number between the two databases. Because of this potential scenario, object numbers are not reusable. If employee 12345 is marked as Is Deleted in the database, you cannot create a new employee record using number 12345.

8. Click **Save**.

- [Creating Employee Roles](#)
- [Creating Employee Classes](#)
- [Adding an Employee](#)
- [Changing Employee Information](#)
- [Configuring Employee Shifts](#)
- [Configuring Employee Breaks](#)

## Changing Employee Information

You must have the Enterprise level permission Edit Employees to change an employee record.

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Employee Maintenance**.
2. Search for the employee record using the **Search Criteria** fields to limit the results, and then click **Search**. Depending on the hierarchy level at which you opened the Employee Maintenance module (Enterprise, property, or revenue center), the resulting list of employee records appears in one of the following tabs located near the lower area of the screen:
  - Employee Records – Enterprise level
  - Property Employee Records – Property level
  - Operator Records – Revenue Center level
3. Make changes in either table view or form view. To make changes in form view, double-click the object number of the employee record.
4. Change any of the information in the active fields. The following tables list the types of information you can change for each hierarchy level.

**Table 11-3 Employee Records Information**

Subtab	Type of Information
General	Allows you to change basic information about the employee, including name, language, identification numbers, level, group, email address, and EMC login credentials.
Roles	Allows you to change the employee's role.
Reporting	Allows you to change the employee's log in credentials for Oracle Hospitality Reporting and Analytics.
References	Shows the locations where the employee is being referenced (excluding workstations).

**Table 11-4 Property Employee Records Information**

Subtab	Type of Information
General	The <b>General</b> subtab allows you to change basic information about the employee, including name, employee class, revenue center, check name, email address, and clock-in options.
Job Codes	The <b>Job Codes</b> subtab shows the job code assigned to the employee in the property. You can change the <b>Regular and Overtime Pay Rates</b> for each job code.
Operators	The <b>Operators</b> sub tab shows each revenue center in the property where the employee has an operator record. You can change the <b>Cash Drawer</b> , <b>Table Count</b> , <b>TMS Color</b> , and <b>Server Efficiency</b> . You can also select whether to use the Employee Class options or set options at the operator level.

**Table 11-5 Operator Records Information**

Subtab	Type of Information
General	The <b>General</b> subtab allows you to change basic information about the employee, including name, employee class, revenue center, and clock-in options.
Job Codes	The <b>Job Codes</b> subtab shows the job code assigned to the employee in the property. You can change the <b>Regular and Overtime Pay Rates</b> for each job code.

**Table 11-5 (Cont.) Operator Records Information**

Subtab	Type of Information
Operators	The <b>Operations</b> subtab shows each revenue center in the property where the employee has an operator record. You can change the <b>Cash Drawer</b> , <b>Table Count</b> , <b>TMS Color</b> , and <b>Server Efficiency</b> . You can also select whether to use the Employee Class options or set options at the operator level.

5. Click **Save**.
  - [Creating Employee Roles](#)
  - [Creating Employee Classes](#)
  - [Adding an Employee](#)
  - [Deleting an Employee](#)
  - [Configuring Employee Shifts](#)
  - [Configuring Employee Breaks](#)

## Configuring Employee Shifts

A shift is the period of time that an employee is scheduled to work. Employees can volunteer or are scheduled to work more than one shift. Symphony provides the ability to post employee or cashier totals to shifts to account for the multiple shifts worked during a single business day.

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Control Parameters**.
2. Click the **Options** tab, and then select the appropriate shift options.

**Table 11-6 Shift Options**

Option	Description
49 - Enable Shift Tracking	Select this option to activate shift reporting, segregating employee, employee tip, and cashier financial totals by shift. Deselect this option to accumulate employee, employee tip, and cashier totals in a single total set. When you deselect this option, the subsequent shift-related options are dimmed.
50 - Increment Cashier Shift when Clocking Out	Select this option to increment the shift for the cashier associated with the employee clocking out (except when clocking out on break). Deselect this option to have the shift for the cashier associated with the employee remain the same.

**Table 11-6 (Cont.) Shift Options**

<b>Option</b>	<b>Description</b>
51 - Increment Cashier Shift when Clocking In	Select this option to increment the shift for the cashier associated with the employee clocking in (except when returning from break). Deselect this option to have the shift for the cashier associated with the employee remain the same.
52 - Increment Cashier Shift when Changing Job	Select this option to increment the shift for the cashier associated with the employee when they clock in with a different job. This clock in occurs automatically when the employee signs on to a workstation with a different revenue center than the job in which they are currently clocked in. Deselect this option to have the shift for the cashier associated with the employee remain the same during this clock in cycle.
53 - Increment Cashier Shift when Changing Revenue Center	Select this option to increment the shift for the cashier associated with the employee when signing on to a different revenue center. Deselect this option to have the shift for the cashier associated with the employee remain the same when signing on to a different revenue center.
54 - Prompt before incrementing Cashier Shift	Select this option to prompt the employee to increment the shift for the cashier associated with the employee when the shift is set to increment upon clocking in or out, changing jobs, or changing revenue centers. Deselect this option so that no prompting occurs when the cashier shift is set to increment through one of those methods.
55 - Prompt to Increment Cashier Shift after Shift Report	Select this option to prompt the workstation operator to increment the cashier shift when a Cashier Shift Report is generated with a shift scope. Deselect this option so that no prompting occurs and the cashier shift does not increment.
56 - Increment Employee Shift when Clocking Out	Select this option to increment the shift for the employee upon clocking out (except on break). Deselect this option to have the shift for the employee remain the same.
57 - Increment Employee Shift when Clocking In	Select this option to increment the shift for the employee upon clocking in (except when returning from break). Deselect this option to have the shift for the employee remain the same.

Table 11-6 (Cont.) Shift Options

Option	Description
58 - Increment Employee Shift when Changing Job	Select this option to increment the shift for the employee when clocking in with a different job. This clock in occurs automatically when the employee signs on to a workstation with a different revenue center than the job in which they are currently clocked in. Deselect this option to have the shift for the employee remain the same during this clock in cycle.
59 - Increment Employee Shift when Changing Revenue Center	Select this option to increment the employee shift when signing in to a different revenue center. Deselect this option to have the employee shift remain the same when signing in to a different revenue center.
60 - Prompt to Increment Employee Shift after Shift Report	Select this option to prompt the workstation operator to increment the employee shift when an Employee Shift Report is generated with a shift scope. Deselect this option to set no prompting and leave the employee shift the same.
61 - Prompt before incrementing Employee Shift	Select this option to prompt the workstation operator to increment the employee shift when the shift is set to increment upon clocking in or out, changing jobs, or changing revenue centers. Deselect this option to set no prompting when the employee shift is set to increment through one of those methods.

3. Click **Save**.
4. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
5. Click the **Calendar** tab.
6. From the Shift Incrementing Options section, select the following options if you do not want Employee or Cashier Financial Shifts to reset with the start of business day:
  - **Do not reset Employee Financial Shifts with the start of each business day**
  - **Do not reset Cashier Financial Shifts with the start of each business day**
7. Click **Save**.
  - [Creating Employee Roles](#)
  - [Creating Employee Classes](#)
  - [Adding an Employee](#)
  - [Deleting an Employee](#)
  - [Changing Employee Information](#)
  - [Configuring Employee Breaks](#)

## Configuring Employee Breaks

A break is a rest period for hourly workers, such as a lunch break. Breaks can be either paid or unpaid and you can set time limits for breaks. Some jurisdictions legislate break length requirements for minor employees.

1. Select the property, click **Setup**, and then click **Property Parameters**.
2. Click the **Timekeeping** tab, and then enter values in the following fields:
  - **Minor Unpaid Break Minimum Length:** If applicable, enter the minimum number of minutes allowed for unpaid breaks taken by a minor employee.
  - **Minor Unpaid Break Maximum Length:** If applicable, enter the maximum number of minutes allowed for unpaid breaks taken by a minor employee.
  - **Minor Paid Break Minimum Length:** If applicable, enter the minimum number of minutes allowed for paid breaks taken by a minor employee.
  - **Minor Paid Break Maximum Length:** If applicable, enter the maximum number of minutes allowed for paid breaks taken by a minor employee.
  - **Regular Unpaid Break Minimum Length:** Enter the minimum number of minutes allowed for an unpaid break taken by a regular employee.
  - **Regular Unpaid Break Maximum Length:** Enter the maximum number of minutes allowed for an unpaid break taken by a regular employee.
  - **Regular Paid Break Minimum Length:** Enter the minimum number of minutes allowed for a paid break taken by a regular employee.
  - **Regular Paid Break Maximum Length:** Enter the maximum number of minutes allowed for a paid break taken by a regular employee.
3. Click **Save**.
  - [Creating Employee Roles](#)
  - [Creating Employee Classes](#)
  - [Adding an Employee](#)
  - [Deleting an Employee](#)
  - [Changing Employee Information](#)
  - [Configuring Employee Shifts](#)

## Clock-In and Clock-Out Cycles

A clock-in cycle for a workstation operator includes one clock in and the subsequent clock out. Clock-in cycles are sequentially numbered from the start of the current payroll period to the current date on employee time cards and labor detail reports. If breaks are not in use, a cycle is the equivalent of a work shift.

A clock-in cycle includes the day, date, and time of the entry and the Job Code under which the employee clocks in.

### Related Topics

- [Setting Clock-In and Clock-Out Cycles](#)

## Setting Clock-In and Clock-Out Cycles

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Employee Maintenance**.
2. Search for the property employee record.
3. Select the **Employee Records** tab near the lower part of the screen, and then double-click the object number of the appropriate record.
4. If the **ID** field is blank, enter the employee identification number.
5. Click the **Search/Table View** tab.
6. Click the **Property Employee Records** tab near the lower part of the screen, and then double-click the object number of the appropriate record.
7. Click the **Job Codes** tab and add a job code for the role if it does not exist.  
Employees who clock in require a job code. Employees without a job code assigned typically do not need to clock in (such as tax exempt employees). If an employee has more than one job code assigned (for example, bartender and server), the workstation prompts the employee to select a job code when clocking in.
8. Click **Save**.
9. Select the Enterprise level, click **Configuration**, and then click **Roles**.
10. Select the role type, click the **Operations** tab, and then click the **Timekeeping** subtab.
11. From the Job Rate Options section, select the appropriate **Clock in at Rate** options for employees associated with the role. Each rate number refers to a pay rate that is assigned for the employee record.
12. Select the appropriate general timekeeping options as described in the following table:

**Table 11-7 Employee Timekeeping Options**

Option	Allow the Employee to Perform or Authorize...
13 - Authorize/Perform Reprint of Time Card	Reprinting a time card using the Reprint Time Card key, and to authorize non-privileged employees to do so
20009 - Authorize Clock In / Authorize Clock In/Out for the Wrong Location	Other employees to clock in Setting this option also allows users to clock in or out for the wrong location
20010 - Authorize/Perform Clock In/Out Outside Schedule or Scheduled Breaks	Clocking in or out at times that conflict with the assignment in the Time Clock Schedule module
20011 - ON = Minor Employees; OFF = Regular Employees	Designating employees associated with the role as minors
20012 - Authorize/Perform Clock Out with Open Checks	Clocking out at the end of a shift with open guest checks, and to authorize other employees to do so

**Table 11-7 (Cont.) Employee Timekeeping Options**

Option	Allow the Employee to Perform or Authorize...
20013 - Authorize Changing Revenue Center at Clock In	Changing the revenue center assignment of other employees who are clocking in
20014 - Change Revenue Center at Clock In	Changing the revenue center assignment when clocking in
20015 - Authorize/Perform Clock Out in the Future	Clocking out at a time ahead of the application time

13. Click **Save**.

#### Related Topics

- [Clock-In and Clock-Out Cycles](#)

## Understanding Job Codes

A Job Code identifies a category of labor group (for example, Server, Bartender, Cashier, Manager) for timekeeping. Job codes:

- Link hourly employees to specific pay rates upon clock in
- Group labor hours and costs into job categories on reports

#### Related Topics

- [Configuring Job Codes](#)

## Configuring Job Codes

1. Select the property, click **Configuration**, and then click **Job Codes**.
2. Insert a new job code record with the appropriate name (for example, Server, Bartender, or Manager), and then double-click it to open.
3. Select the **Employee Role** from the drop-down list to associate with the job code.  
If you select **0 - None**, the employee receives privileges based on the roles set in the Employee Maintenance module.  
This setting is ideal for an employee who has two job codes (for example, Server and Bartender). The privileges associated with this employee role are active for the duration of the clock-in cycle.
4. Select the **Employee Class** from the drop-down list.  
If you select **0 - None**, the employee uses the Employee Class set in the Employee Maintenance module.  
The employee is assigned to this employee class for the duration of the clock-in cycle.
5. Select the **Revenue Center** in which the job code is available.  
To make the job code available in all revenue centers, select **0 - None**.
6. Enter the **Report Group** for the job code.



The labor reports sort and calculate subtotals by the Report Group. If you set the Report Group to 0 (zero), the job code does not appear on job code reports.

7. Select the appropriate options as described in the following table:

**Table 11-8 Job Code Options**

Option	Description
1 - Prompt for Direct Tips before Clocking Out	Select this option to prompt employees who are clocked in under the job code to declare the amount of direct tips received (tips given directly from the customer to the employee) when clocking out.
2 - Prompt for Indirect Tips before Clocking Out	Select this option to prompt employees who are clocked in under the job code to declare the amount of indirect tips received (tips given from one employee to another) when clocking out.
3 - Cannot Clock Out with Open Checks	Select this option to prevent employees clocked in under the job code from clocking out while they have open guest checks.  You can override this setting for employees that have the <b>Clock Out with Open Checks</b> privilege.
4 - Use Scheduled Time if Employee Clocks in Early	Select this option to use the employee's scheduled clock-in time for labor calculations if the employee clocks in earlier than scheduled.
5 - Prompt for Clock In Revenue Center	Select this option to allow employees to select the revenue center when clocking in.

8. Click **Save**.

#### Related Topics

- [Understanding Job Codes](#)

## Understanding Tip Tracking

Tip declaration is a generic term that applies to direct tips and indirect tips.

Tip Track is a Symphony feature that involves declaration of indirect tips. Servers can use Tip Track to:

- Share tips with other employees
- Edit tip-outs
- Claim tips from other employees

Managers can use Tip Track to:

- Grant tip-out privileges
- Generate tip-out transaction reports

#### Related Topics

- [Configuring Tip Tracking and Reporting](#)
- [Configuring Tip Track Front of House Buttons](#)

## Configuring Tip Tracking and Reporting

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the type of role (for example, server or bartender).
3. Click the **Operations** tab, and then select the appropriate options as described in the following table:

**Table 11-9 Tip Tracking and Reporting Privileges**

Option Number	Privilege Name	Allow the Employee to...	Recommended Role
65	Authorize/Use the [Direct Tips] and [Indirect Tips] Keys	Use the Direct Tips and Indirect Tips function keys to declare cash tips received, and to authorize others to do so	Server
66	Authorize/Use the [Direct Tips] and [Indirect Tips] Keys for Another Employee	Use the Direct Tips and Indirect Tips keys to declare cash tips received by another employee, and to authorize others to do so	Manager
187	Authorize/Perform the Pay Tip Out To Others Keys	Give cash tips to others, and to authorize non-privilege employees to do so	Server
188	Claim Tips From Other Employee	Receive a tip from another employee	Server
189	Authorize/Perform Edit Of Any Tip Outs	Edit cash tips given to other employees, and to authorize non-privilege employees to do so	Manager
195	Allow Edit of My Tip Out	Edit tip outs	Server
31010	Run Employee Tip Report	Run the Employee Tip Report	Manager
31045	Run Employee Tip Track Report	Run the Employee Tip Track Report	Manager

4. Click **Save**.
5. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
6. Click the **Options** tab.
7. To print a validation receipt when a tip-out or tip edit operation occurs, select **7 - Validate Employee Direct/Indirect Tips Declared Transactions**.
8. Assign a validation printer at the property level:

- a. Select the property, click **Setup**, and then click **Workstations**.
- b. Click the **Printers** tab.
- c. Select a **Validation Printer**, and then click **OK**.
- d. Click **Save**.

- [Configuring Tip Track Front of House Buttons](#)

#### Related Topics

- [Understanding Tip Tracking](#)

## Configuring Tip Track Front of House Buttons

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place tip track buttons.
3. On the **Edit** tab, select the page area in which to define the tip track functions.
4. Click **Button**.
5. On the **General** subtab, enter the button name **Tip Track Tip Out** in the **Legend** field.
6. Select **Function** from the **Type** drop-down list.
7. Click the black arrow directly beneath the **Type** drop-down list, select **Tips** from the Type section, select **Tip Track Tip Out** from the Results section, and then click **OK**.
8. Repeat Steps 3 through 7 to create the following buttons:
  - **Tip Track Edit My Tips**
  - **Tip Track Edit**
9. Click **Save**.

- [Configuring Tip Tracking and Reporting](#)

#### Related Topics

- [Understanding Tip Tracking](#)

# 12

## Payments and Currency

Customers pay guest checks with various types of payments or tenders, ranging from paper to plastic to digital.

- [Types of Payment](#)
- [Configuring Base Currency and Alternate Currency](#)
- [Configuring Currency Conversions](#)
- [Configuring the Cash Tender](#)
- [Adding Payment Keys to the Transaction Page](#)
- [Understanding Credit Card Tokenization](#)
- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)
- [Universal Transaction Gateway for Shift4](#)
- [Communication Methods for Fusebox Payment Card Driver](#)
- [stunnel Installation Methods](#)
- [Installing stunnel at a Single Host Location](#)
- [Installing stunnel Through Symphony as a CAL Package](#)
- [Configuring the CAPMS Payment Card Driver](#)
- [Configuring the CAPMS Payment Module](#)
- [Configuring the Dollars on the Net Payment Card Driver](#)
- [Configuring the Dollars on the Net Payment Module](#)
- [Configuring the Fusebox Payment Card Driver](#)
- [Configuring the Fusebox Payment Module](#)
- [Configuring the VisaD Payment Card Driver](#)
- [Configuring the VisaD Payment Module](#)
- [Configuring the Loadable Payment Card Device](#)
- [Creating Front of House Loadable Payment Card Buttons](#)
- [The Oracle Payment Interface \(OPI\)](#)
- [Configuring the OPI Driver](#)
- [Configuring the OPI Payment Module](#)
- [Configuring the Default Payment Tender for OPI](#)
- [Updating Credit Card Preambles for OPI](#)
- [Configuring the OPI to Settle Transactions at the Start of Day \(SOD\)](#)
- [Configuring an EOD Settlement Button](#)

- [Credit Card Preambles for OPI](#)
- [Distributing a Third-Party Credit Card Driver Package](#)
- [Copying Third-Party Payment Driver Files](#)
- [Creating a CAL Package for the Third-Party Payment Card Driver Distribution](#)
- [Manually Installing Credit Card Certificates on Workstations](#)
- [Understanding Credit Card Batching](#)
- [Creating a Credit Card Batch](#)
- [Editing a Credit Card Batch](#)
- [Settling a Credit Card Batch](#)
- [Understanding Pay at the Table](#)
- [Configuring a Credit Card Tender](#)
- [Credit Card Preamble](#)
- [Credit Card Preamble Rules](#)
- [Configuring Standard Credit Card Preambles](#)
- [List of Standard Credit Card Preambles for the U.S.](#)
- [Configuring Credit Card Authorization to Print Merchant Vouchers and Customer Receipts](#)
- [Configuring Credit Card Voucher Headers and Trailers](#)
- [Configuring the Room Tender](#)
- [Configuring the OPERA PMS Payment Driver](#)
- [Configuring the MICROS Standard Credit Card Payment Module](#)
- [Configuring the Loadable PMS Payment Module](#)
- [Configuring the Demo Payment](#)
- [Setting the Front of House to Allow Pay at the Table](#)
- [Configuring Email Receipts](#)
- [Understanding Autosequence Events](#)
- [Configuring Autosequence Events](#)
- [Configuring the Autosequence Event Schedule](#)

## Types of Payment

Payments reduce the balance of the guest check, and can include the types listed in the following table:

**Table 12-1 Payment Types**

Payment Type	More Information
Cash	<a href="#">Configuring the Cash Tender</a>
Credit Cards	<a href="#">Loadable Payment Card Configuration Tasks</a>

**Table 12-1 (Cont.) Payment Types**

Payment Type	More Information
Gift Cards	<a href="#">Stored Value Configuration Tasks</a>
Pay at the Table	<a href="#">Pay at the Table</a>
Hotel Room Charge	<a href="#">Configuring the Room Tender</a>

- [Understanding Credit Card Tokenization](#)

**Related Topics**

- [Configuring Base Currency and Alternate Currency](#)
- [Configuring Currency Conversions](#)
- [Configuring the Cash Tender](#)
- [Adding Payment Keys to the Transaction Page](#)

## Configuring Base Currency and Alternate Currency

1. Select the Enterprise, property or zone, click **Setup**, and then click **Currency Parameters**.
2. Select the **Base Currency** from the drop-down list. This is the primary currency for the location.  
  
Oracle recommends setting the base currency once during initial configuration of a property, prior to opening guest checks. When you change the base currency after opening checks, the EMC prompts you for verification twice.
3. (Optional) Select the **Alternate Currency** from the drop-down list. This is the other currency used at the location. For example, a property located near Niagara Falls might set US Dollars as the base currency and accept Canadian Dollars as the alternate currency.
4. To use rounding, select **4 - Round Currency**. When you select this option the subsequent options are available. Select the appropriate options to round the amount due:
  - **5 - ON = Round to Nearest 0; OFF = Round to Nearest 5:** Select this option to round currency amounts to the nearest 0 (for example, 163.336 rounds to 163.340). Deselect this option to round currency amounts to the nearest 5 (for example, 163.336 rounds to 163.335).
  - **6 - ON = Round to Second-Least Significant Digit; OFF = Round to Least Significant Digit:** Select this option to round currency amounts based on the second least significant digit (for example, in 100.45, the second least significant digit is 4). Deselect this option to round currency amounts based on the least significant digit (for example, in 100.45, the least significant digit is 5).
5. Click **Save**.
6. Select the Enterprise, property or zone, click **Setup**, and then click **Currency Availability**.
7. If you selected the Enterprise level, for each record, select the non-base currency (foreign or alternate currency) in the **Currency** field.

8. Select the appropriate alternate currency options:
  - **2 - Issue Change In Other Currency:** Select this option to issue change from a currency conversion in the currency. Deselect this option to issue change in the base currency.
  - **3 - Prompt For Issuing Change:** Select this option to prompt the workstation operator to issue change in the other currency. Deselect this option to issue change in the base currency.
  - Select options **4**, **5**, and **6** as appropriate for the alternate currency. These options are described in Step 4.
9. Click **Save**.

- [Configuring Currency Conversions](#)
- [Configuring the Cash Tender](#)
- [Adding Payment Keys to the Transaction Page](#)

#### Related Topics

- [Types of Payment](#)
- [Understanding Credit Card Tokenization](#)

## Configuring Currency Conversions

You can configure the manner in which one currency rate converts to another currency rate. Typically, currency conversion rates are set at the Enterprise level, and each property receives the same conversion. If one location has a slightly different conversion rate for the same two currencies, you can set the currency conversion at the zone (for example, a Euro-to-US Dollar conversion might be standard for the Enterprise level, while an airport property has a different rate).

1. Select the Enterprise, property or zone, click **Setup**, and then click **Currency Conversions**.
2. Insert a record. Each record contains two currencies: a Currency and a Conversion Currency.
3. Click the ellipsis point (...) button from the **Currency** column, select the currency, and then click **OK**.

This field, divided by the Rate, determines the number of Conversion Currency records.

4. Click the ellipsis point (...) button from the **Conversion Currency** column, select the conversion currency, and then click **OK**. You must select a different currency than the selection in the **Currency** field. That is, the **Currency** and **Conversion Currency** fields cannot contain the same values.

This field, multiplied by the Rate, determines the number of Currency records.

5. Enter the conversion **Rate**.

The Rate determines how the application calculates the Currency and Conversion Currency. The Conversion and Conversion Reverse fields calculate automatically to show additional information about the record.

6. Click **Save**.

- [Configuring Base Currency and Alternate Currency](#)
- [Configuring the Cash Tender](#)
- [Adding Payment Keys to the Transaction Page](#)

**Related Topics**

- [Types of Payment](#)
- [Understanding Credit Card Tokenization](#)

## Configuring the Cash Tender

You must configure a cash tender to allow guests to pay the check with cash.

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Payments**.
2. Insert a record, enter **Cash** as the name, and then click **OK**.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **Micros.Payment.Cash.dll**, and then click **Open**.
6. Click the **Configuration** tab, and then click the **Module Configuration** subtab.
7. Enter information in the following fields:

**Table 12-2 Module Configuration Fields**

Field	Description
Module ID	Enter <b>MicrosCashPaymentModule</b> .
Description	Enter a description for the payment driver (for example, MICROS Cash Payment Module).
Do Not Batch	Select <b>False</b> .
Run As Service	Select either <b>True</b> or <b>False</b> to indicate whether to run the MICROS Cash Payment Module as a Service Host service. Select <b>False</b> to run the cash module directly on the POS client.
Show Change Due Dialog	Select <b>True</b> to show the Change Due dialog on the POS client.

8. Click **Save**.
9. Select the Enterprise or property, click **Configuration**, and then click **Tender/Media**.
10. Insert a record, name it **Cash**, and then click **OK**.
11. Double-click the **Cash** record to open it.
12. On the **General** tab, select **1 - Payment** from the **Key Type** drop-down list.
13. Click the **Options** tab, and then click the **Printing Options** subtab.
14. Select **8 - Print Customer Receipt** and **21 - Print Summary Totals**.



15. Select the **Ops Behavior** subtab, and then select the appropriate options as described in the following table:

**Table 12-3 Amount Options**

Option	Description
2 - Amount Required	<p>Select this option to require an amount when using the cash tender. If the workstation operator presses the cash tender button at the POS client without entering an amount, the POS client prompts to enter the tender amount.</p> <p>If you deselect option <b>2</b> and select option <b>3</b>, the tender is used for 0.00, unless the workstation operator enters an amount before pressing the tender key.</p>
3 - Assume Paid in Full	<p>Select this option to record the exact amount due as the entry. You must also deselect option <b>2</b>. If you deselect both options <b>2</b> and <b>3</b>, the system records 0.00 as the entry.</p>
4 - Use with Currency Conversion	<p>Select this option to post payment amounts entered through a currency key to the cash payment key.</p>
37 - Partial Tender Not Allowed	<p>Select this option to prevent the cash tender from being used to partially tender a transaction.</p>
53 - Round Tender to Next Highest Dollar	<p>Select this option to round the cash tender up to the next highest whole number dollar amount.</p> <p>Options <b>3</b> and <b>53</b> work together; to enable option <b>53</b>, you must also select option <b>3</b>. In addition, option <b>2</b> must be deselected. In this scenario, the system calculates change due as the tender is the next highest dollar.</p> <p>In Page Design, you must configure the <b>Payment Type</b> as <b>Cash:Cash</b> and the <b>Function</b> as <b>Default</b> in the Payment Configuration dialog when configuring the Cash payment tender button.</p> <p>Partial tenders are ignored when Amount Options <b>3</b> and <b>53</b> are enabled, the <b>Payment Type</b> is <b>Cash:Cash</b> and the <b>Function</b> is <b># (DollarUp)</b> in the Payment Configuration dialog when configuring the payment tender button in Page Design.</p> <p><a href="#">Adding Payment Keys to the Transaction Page</a> contains more information.</p>
56 - Round Change Due	<p>Select this option to accept payments for the exact amount and to round change due.</p> <p>Selecting option <b>56</b> overrides option <b>87</b>.</p>
87 - Rounded Payments and Change	<p>Select this option to round change due resulting from an overtender.</p>

**Table 12-3 (Cont.) Amount Options**

Option	Description
88 - Round Payments and Change To the Nearest 0	<p>Select this option to round the payment total or change due to the nearest 0 or 10. You must also select one of the following options:</p> <ul style="list-style-type: none"> <li>• <b>56</b></li> <li>• <b>87</b></li> </ul> <p>If you select option <b>88</b>, the least significant decimal digit is rounded to 0 or 10. Deselect option <b>88</b> to round the least significant decimal digit to 0 or 5.</p> <p>Tender/Media Amount Options <b>53</b> and <b>88</b> are mutually exclusive; you cannot select both.</p>

16. Click **Save**.

- [Configuring Base Currency and Alternate Currency](#)
- [Configuring Currency Conversions](#)
- [Adding Payment Keys to the Transaction Page](#)

#### Related Topics

- [Types of Payment](#)
- [Understanding Credit Card Tokenization](#)

## Adding Payment Keys to the Transaction Page

You can create payment keys for each type of payment tender (for example, Cash, Auth, Auth and Pay, Final Authorization, and Split Tender).

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page (typically the Transaction page) on which to place the payment buttons.
3. On the **Edit** tab, select the page area in which to define the payment buttons.
4. Click **Button** to add a button.
5. On the **General** subtab, enter the button name in the **Legend** field.
6. From the **Type** drop-down list, select **Payment Tenders**.
7. Click the black arrow beneath the **Type** drop-down list.
8. Select the tender payment type, and then click **OK**.
9. From the Payment Configuration dialog, select the **Payment Type**, and then click **OK**.
10. Position and size the button on the page. Use the Style arrow to change the color.
11. Click **Save**.

- [Configuring Base Currency and Alternate Currency](#)
- [Configuring Currency Conversions](#)
- [Configuring the Cash Tender](#)

**Related Topics**

- [Types of Payment](#)
- [Understanding Credit Card Tokenization](#)

## Understanding Credit Card Tokenization

Credit card tokenization helps to protect merchants from credit card theft. Tokenization technology replaces the customer's credit card number with a different identifier to uniquely distinguish the customer's credit card during settlement of a transaction. This technology eliminates the need to store credit card numbers on persistent media on the merchant's site. All sensitive information that is stored for credit card processing is kept off site.

Encryption technology is used to store customer credit card data. While the encryption technology is secure, it requires ongoing maintenance tasks to maintain the security. Managing this technology can be cumbersome for merchants. Many smaller merchants do not typically employ Management Information System (MIS) staff to monitor networks and security infrastructure. Larger Enterprise clients can incur large auditing charges to verify that each property is compliant with Payment Card Industry Data Security Standards (PCI DSS).

In a typical restaurant payment scenario, a server picks up a guest check with the credit card to be used for payment. The server swipes the credit card on the Point of Sale (POS) application and the credit authorization with the credit card number is sent to the credit card payment processor. The payment processor returns a valid authorization code and, along with the payment, a token is also returned to identify the credit card during the transaction's settlement. Any record of the original card number, expiration date, and track data is erased from memory. When the voucher prints, all that remains is the last four digits of the original credit card number and a token that identifies the card to the payment processor for future operations.

Consider the same transaction, but with the network connection to the credit card processor offline. In this case, the server must manually authorize the credit card and the credit card payment processor cannot provide a token. The credit card data must be stored until a token can be acquired by the POS system (usually at transaction settlement time). At that point the sensitive credit card information is purged from the application.

**Table 12-4 Loadable Credit Card Tokenization**

Loadable Credit Card Driver	Requires Tokenization?
CAPMS	Optional
Dollars on the Net by Shift4	Yes
Fusebox by Elavon	Optional (Elavon sets tokenization)
VisaD	No

- [Types of Payment](#)

**Related Topics**

- [Configuring Base Currency and Alternate Currency](#)
- [Configuring Currency Conversions](#)

- [Configuring the Cash Tender](#)
- [Adding Payment Keys to the Transaction Page](#)

## Loadable Payment Card Configuration Tasks

Loadable payment drivers (including TVS and TV2G) do not support the use of Transaction Services POS API clients.

Setting up a loadable payment driver consists of completing the tasks listed in the following table:

**Table 12-5 Loadable Payment Card Configuration Tasks**

Task	More Information
Reading configuration prerequisites	<a href="#">Configuration Prerequisites</a>
(If applicable) Vendor installing third-party gateway application or communication method	<ul style="list-style-type: none"> <li>• <a href="#">Universal Transaction Gateway</a> (required for Dollars on the Net by Shift4)</li> <li>• <a href="#">Communication Methods for Fusebox Payment Card Driver</a></li> </ul>
Configuring the loadable payment driver	Configuring the Payment Card Driver: <ul style="list-style-type: none"> <li>• <a href="#">CAPMS</a></li> <li>• <a href="#">Dollars on the Net</a></li> <li>• <a href="#">Fusebox</a></li> <li>• <a href="#">VisaD</a></li> </ul>
Configuring the payment device	<a href="#">Configuring the Loadable Payment Device</a>
Configuring the loadable payment card module	Configuring the Payment Card Module: <ul style="list-style-type: none"> <li>• <a href="#">CAPMS</a></li> <li>• <a href="#">Dollars on the Net</a></li> <li>• <a href="#">Fusebox</a></li> <li>• <a href="#">VisaD</a></li> </ul>
Creating Front of House loadable payment card buttons	<a href="#">Creating Front of House Loadable Payment Card Buttons</a>
(Optional) Setting Automatic Event Tasks	<a href="#">Autosequence Events</a>
(If applicable) Distributing a third-party payment card driver package	<a href="#">Distributing a Third-Party Credit Card Driver Package</a>

- [Universal Transaction Gateway for Shift4](#)
- [Loadable Payment Configuration Prerequisites](#)

### Related Topics

- [Configuring the Dollars on the Net Payment Card Driver](#)
- [Configuring the Dollars on the Net Payment Module](#)
- [Communication Methods for Fusebox Payment Card Driver](#)
- [stunnel Installation Methods](#)
- [Loadable Payment Configuration Prerequisites](#)

### Related Topics

- [Installing stunnel at a Single Host Location](#)

- [Installing stunnel Through Symphony as a CAL Package](#)
- [Configuring the Fusebox Payment Card Driver](#)
- [Configuring the Fusebox Payment Module](#)

**Related Topics**

- [Configuring the CAPMS Payment Card Driver](#)
- [Configuring the CAPMS Payment Module](#)

**Related Topics**

- [Configuring the VisaD Payment Card Driver](#)
- [Configuring the VisaD Payment Module](#)

## Loadable Payment Configuration Prerequisites

Before configuring the loadable payment card driver and module, perform the following actions:

- Install Symphony version 2.6 or later at the property.
- Obtain access to the EMC within Symphony.
- Ensure that you have the Value Added Reseller (VAR) sheet from a CAPMS payment processing vendor representative. The VAR sheet contains the property information, such as the Bank Identification Number, Merchant Number, Store Number, and Terminal Number.
- (If Applicable) Implement custom payment or device drivers. [Distributing a Third-Party Credit Card Driver Package](#) contains more information.
- [Universal Transaction Gateway for Shift4](#)
- [Loadable Payment Card Configuration Tasks](#)

**Related Topics**

- [Configuring the Dollars on the Net Payment Card Driver](#)
- [Configuring the Dollars on the Net Payment Module](#)
- [Communication Methods for Fusebox Payment Card Driver](#)
- [stunnel Installation Methods](#)
- [Loadable Payment Card Configuration Tasks](#)

**Related Topics**

- [Installing stunnel at a Single Host Location](#)
- [Installing stunnel Through Symphony as a CAL Package](#)
- [Configuring the Fusebox Payment Card Driver](#)
- [Configuring the Fusebox Payment Module](#)

**Related Topics**

- [Configuring the CAPMS Payment Card Driver](#)
- [Configuring the CAPMS Payment Module](#)

### Related Topics

- [Configuring the VisaD Payment Card Driver](#)
- [Configuring the VisaD Payment Module](#)

## Universal Transaction Gateway for Shift4

The Universal Transaction Gateway (UTG) is necessary for communication between Symphony and Dollars on the Net by Shift4. Obtain the Internet Protocol (IP) address of each computer that processes credit card transactions, and provide this list to the Shift4 representative. A Shift4 representative must install the UTG:

- On only one machine at a property. (Do not install UTG on each workstation.)
- Before you can configure the Shift4 loadable payment card driver in Symphony.

A Shift4 representative must also install and configure one instance of the UTG at the Oracle Hospitality Hosting Center to support all batching activity. Depending on the transaction volume, you can implement additional UTGs in the Hosting Center to handle the required daily transactions.

UTG does not run on the Microsoft Windows CE operating system.

- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

### Related Topics

- [Configuring the Dollars on the Net Payment Card Driver](#)
- [Configuring the Dollars on the Net Payment Module](#)

## Communication Methods for Fusebox Payment Card Driver

You can implement one of the following communication methods to process credit cards with the Fusebox payment card driver:

- Fusebox solution through stunnel
- ProtoBase Hosted Solution through Virtual Private Network (VPN)

For premise-based implementations, a single VPN can accommodate both authorization and settlement traffic.

### Fusebox stunnel

The Fusebox application (Next Generation Hosted Solutions from Elavon) uses the stunnel application as a secure TCP connection between the property and the Elavon Hosting Center. This secure connection allows credit card authorizations and communication between the Oracle Hospitality Hosting Center and the Elavon Hosting Center for settlements. Stunnel is a small application that uses a certificate to establish an SSL connection. You can implement stunnel through a Symphony CAL package. [stunnel Installation Methods](#) contains instructions about implementing stunnel.

### ProtoBase Hosted Solution

If you use the legacy ProtoBase application, you need to use the ProtoBase Hosted Solution VPN communication method. When you use the ProtoBase Hosted Solution to communicate, establish at least two VPNs.

- Set the first VPN between the property and the ProtoBase Hosting Center. Install and configure a VPN appliance to establish the connection. This connection is used to process credit card authorizations. Contact an Elavon representative for details about this implementation.
- The second VPN appliance resides at the Oracle Hospitality Hosting Center and is used to process all settlements (batching) for the property. If multiple properties exist within an Enterprise organization, you can use a single VPN connection. Contact an Elavon representative for details about this implementation.
- [stunnel Installation Methods](#)
- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

### Related Topics

- [Installing stunnel at a Single Host Location](#)
- [Installing stunnel Through Symphony as a CAL Package](#)
- [Configuring the Fusebox Payment Card Driver](#)
- [Configuring the Fusebox Payment Module](#)

## stunnel Installation Methods

Symphony uses the stunnel application to communicate with the Elavon Hosting Center. You can install stunnel on one computer (single host location) at the Enterprise level, or on individual workstations at the property to allow individual connectivity to Fusebox by Elavon. You must install stunnel at the Oracle Hospitality Hosting Center to perform all batching activities.

### Single Host Location

Use this method for Oracle Hospitality Hosting Center installations or for properties that want to perform all payment card activity from a single computer. [Installing stunnel at a Single Host Location](#) contains instructions for this method.

### CAL Package to Each Workstation

Use this method for properties that want to have stunnel installed on each workstation and perform payment card activity from multiple workstations. [Installing stunnel Through Symphony as a CAL Package](#) contains instructions for this method.

- [Communication Methods for Fusebox Payment Card Driver](#)
- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

### Related Topics

- [Installing stunnel at a Single Host Location](#)

- [Installing stunnel Through Symphony as a CAL Package](#)
- [Configuring the Fusebox Payment Card Driver](#)
- [Configuring the Fusebox Payment Module](#)

## Installing stunnel at a Single Host Location

Obtain the Symphony version 2.6 or later installation media to perform the instructions in this section.

1. From the root of the Symphony version 2.6 installation media, browse to \Install\Symphony2\Tools\FuseboxSTunnel.
2. Double-click **stunnel.exe**. stunnel automatically installs the files under Program Files, Fusebox, stunnel. stunnel installs as a service and is set to automatically start.

- [Installing stunnel Through Symphony as a CAL Package](#)
- [Configuring the Fusebox Payment Card Driver](#)
- [Configuring the Fusebox Payment Module](#)

### Related Topics

- [Communication Methods for Fusebox Payment Card Driver](#)
- [stunnel Installation Methods](#)
- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

## Installing stunnel Through Symphony as a CAL Package

1. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
2. Select **Fusebox STunnel** from the navigation tree.
3. Click the **Deployment Schedules** tab.
4. Click **Add Deployment**.
5. Select **1 - Property/Enterprise** from the **Deployment Type** drop-down list.
6. Select the property in the **Property** field.
7. Select **0 - Install** from the **Action to Take** drop-down list.
8. Click **Save**.

- [Installing stunnel at a Single Host Location](#)
- [Configuring the Fusebox Payment Card Driver](#)
- [Configuring the Fusebox Payment Module](#)

### Related Topics

- [Communication Methods for Fusebox Payment Card Driver](#)
- [stunnel Installation Methods](#)
- [Loadable Payment Card Configuration Tasks](#)



- [Loadable Payment Configuration Prerequisites](#)

## Configuring the CAPMS Payment Card Driver

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Payment Drivers**.
2. Insert a record and enter **CAPMS** as the name.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **CAPMSPayment.dll**, and then click **Open**.
6. Click the **Configuration** tab.
7. From the Assembly/Class section, enter information in the following fields:

**Table 12-6 Assembly/Class Fields**

Field	Description
Description	Enter a description for the payment driver (for example, CAPMS Payment Driver).
Display Name	Enter the name of the third-party driver development company. This value appears in the <b>Driver</b> drop-down list.
Driver ID	Enter <b>CAPMS</b> .

8. From the Common Driver Properties section, enter **1** in the following fields:
  - **Bank Identification Number**
  - **Batch Number**
  - **Merchant Number**
  - **Store Number**
  - **Terminal Number**

The values in these fields cannot be 0 (zero) or blank.

9. From the Transport Service Properties section, enter information in the following fields:

**Table 12-7 Transport Service Properties Fields**

Field	Description
Batching Host	Enter the IP address of the machine where the vendor gateway application is installed at the Hosting or Enterprise level. Refer to the third-party driver development company for the appropriate value.
Batching Host Port	Refer to the third-party driver development company for the appropriate value.

**Table 12-7 (Cont.) Transport Service Properties Fields**

Field	Description
Host Timeout	Enter the timeout value in seconds. Setting the value to 0 (zero) equals no timeout. Do not leave this field blank.

10. From the CAPMS Driver Properties section, enter information in the following fields:

**Table 12-8 CAPMS Driver Properties Fields**

Field	Description
Enable RFID	Select <b>False</b> .
Enable Shift4 Messaging	Select <b>True</b> .
Enable Tokenization	Select <b>True</b> to use tokenized messaging. Select <b>False</b> to use standard non-tokenized messages. This setting is based on the vendor configuration.
Interface Name	Refer to the third-party driver development company for the appropriate value.
Message Version	Refer to the third-party driver development company for the appropriate value.
Non-Tokenized Authorization Reversal Method	If you set <b>Enable Tokenization</b> to <b>False</b> , select one of the following standard messaging options: <ul style="list-style-type: none"> <li>• <b>Expire</b>: Do nothing with the authorization reversal request.</li> <li>• <b>Send</b>: Send the authorization reversal request.</li> <li>• <b>ZeroSale</b>: Send \$0.00 sale as the authorization reversal request.</li> </ul>
Send Issue Number	Select <b>False</b> .
Send Start Date	Select <b>False</b> .

11. Click **Save**.

- [Configuring the CAPMS Payment Module](#)

**Related Topics**

- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

## Configuring the CAPMS Payment Module

1. Select the Enterprise level, click **Setup**, and then click **Payments**.
2. Insert a record, and then enter **Credit Card** as the name. If a Credit Card payment record exists, skip this step.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **Micros.Payment.LoadableCreditCardModule.dll**, and then click **Open**.

6. Select **CAPMS** from the **Driver** drop-down list.
7. Select the appropriate device from the **Device** drop-down list.
  - Select **Internal** for Oracle Hospitality devices.
  - Select the third-party device if the property is using a custom device driver.
8. Click the **Configuration** tab.
9. From the Common Properties section, enter information in the following fields:

**Table 12-9 Common Properties Fields**

Field	Description
Allow Manual Authorization Credit Card	Select <b>True</b> for processors using the CAPMS driver. This field indicates whether manual authorization of credit cards is allowed.
Allow Partial Settlement On Batch	Select <b>False</b> for processors using the CAPMS driver.
Do Not Batch	Select <b>False</b> for processors using the CAPMS driver. This field indicates whether batch creation and settlement occurs within Symphony.
Encrypt Data	Select <b>True</b> for processors using the CAPMS driver.
Manual Card Data Entry Retries	Enter the number of times a workstation operator can attempt to manually enter a card number. Oracle recommends entering <b>5</b> . The minimum value is <b>1</b> .
Offline Authorizations	Enter the number of offline card authorizations allowed before the application attempts to re-establish online communication.
Prompt for Manual Card Data Entry	Select <b>True</b> for processors using the CAPMS driver. This field indicates whether workstation operators can manually enter a card number.
Retry Authorization Reversals On Batch	Select <b>False</b> for processors using the CAPMS driver.
Run As Service	Select <b>False</b> for processors using the CAPMS driver.

10. Click **Save**.
11. (Optional) To configure CAPMS payment driver settings that are unique to the property or revenue center:
  - a. Select the property or revenue center, click **Setup**, and then click **Payment Drivers**.
  - b. Double-click the **CAPMS** record to open it.
  - c. On the **General** tab, click the **Override this record** link, and then click **Yes**.
  - d. Click the **Configuration** tab.

- e. If the property or revenue center values differ from those set at the Enterprise level in the Common Driver Properties section, enter property information in the fields.

Ensure that you have the VAR sheet from a CAPMS payment processing vendor representative. The VAR sheet contains the property information, such as the Bank Identification Number, Merchant Number, Store Number, and Terminal Number.

- f. If the property or revenue center values differ from those set at the Enterprise level in the Transport Service Properties section, enter property information in the fields.

12. Click **Save**.

- [Configuring the CAPMS Payment Card Driver](#)

#### Related Topics

- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

## Configuring the Dollars on the Net Payment Card Driver

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Payment Drivers**.
2. Insert a record, enter **DOTN** as the name, and then click **OK**.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **DOTNPayment.dll**, and then click **Open**.
6. Click the **Configuration** tab.
7. From the Assembly/Class section, enter information in the following fields:

**Table 12-10 Assembly/Class Fields**

Field	Description
Description	Enter a description for the payment driver (for example, Dollars on the Net Payment Driver).
Display Name	Enter the name of the third-party driver development company (for example, Shift4). This value appears in the <b>Driver</b> drop-down list.
Driver ID	Enter <b>DOTN</b> .

8. From the Common Driver Properties section, enter **1** in the following fields:
  - **Bank Identification Number**
  - **Batch Number**
  - **Merchant Number**
  - **Store Number**

- **Terminal Number**

The values in these fields cannot be 0 (zero) or blank.

9. From the Transport Service Properties section, enter information in the following fields:

**Table 12-11 Transport Service Properties Fields**

Field	Description
Batching Host	Enter the IP address of the machine where the Universal Transaction Gateway (UTG) application is installed at the Hosting or Enterprise level. Refer to the third party driver development company for the appropriate value.
Batching Host Port	Enter <b>17476</b> . Contact Shift4 to use a different port.
Host Timeout	Enter the timeout value in seconds. Setting the value to 0 (zero) equals no timeout. Do not leave this field blank.
Primary Host	Enter the IP address of the machine at the property that runs the UTG application. If you enter <b>0.0.0.0</b> , the actual IP address of the workstation at the property is required when you set the override.
Primary Host Port	Enter <b>17476</b> . Contact Shift4 to use a different port.

10. From the Shift4 Driver Properties section, enter **MICROS\_SIMP2** in the **VendorID** field.

This is the Interface Identifier that Shift4 uses to recognize the interface sending the message.

11. Click **Save**.

- [Configuring the Dollars on the Net Payment Module](#)

#### Related Topics

- [Universal Transaction Gateway for Shift4](#)
- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

## Configuring the Dollars on the Net Payment Module

1. Select the Enterprise level, click **Setup**, and then click **Payments**.
2. Insert a record, enter **Credit Card** as the name, and then click **OK**. If a Credit Card payment record exists, skip this step.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **Micros.Payment.LoadableCreditCardModule.dll**, and then click **Open**.
6. Select **DOTN** from the **Driver** drop-down list.
7. Select the appropriate device from the **Device** drop-down list.

- Select **Internal** for Oracle Hospitality devices.
  - Select the third-party device if the property is using a custom device driver.
8. Click the **Configuration** tab.
  9. From the Common Properties section, enter information in the following fields:

**Table 12-12 Common Properties Fields**

Field	Description
Allow Manual Authorization Credit Card	Select <b>True</b> for processors using the Shift4 driver. This field indicates whether manual authorization of credit cards is allowed.
Allow Partial Settlement On Batch	Select <b>True</b> for processors using Dollars on the Net by Shift4.
Do Not Batch	Select <b>False</b> for processors using the Shift4 driver. This field indicates whether batch creation and settlement occurs within Symphony.
Encrypt Data	Select <b>True</b> for processors using the Shift4 driver.
Manual Card Data Entry Retries	Enter the number of times a workstation operator can attempt to manually enter a card number. Oracle recommends entering <b>5</b> . The minimum value is <b>1</b> .
Offline Authorizations	Enter the number of offline card authorizations allowed before the application attempts to re-establish online communication.
Prompt for Manual Card Data Entry	Select <b>True</b> for processors using the Shift4 driver. This field indicates whether workstation operators can manually enter a card number.
Retry Authorization Reversals On Batch	Select <b>False</b> for processors using the Shift4 driver.
Run As Service	Select <b>False</b> for processors using the Shift4 driver.

10. Click **Save**.
11. Select the property, click **Setup**, and then click **Payment Drivers**.
12. Double-click the **DOTN** record to open it.
13. On the **General** tab, click the **Override this record** link, and then click **Yes**.
14. Click the **Configuration** tab.
15. If the property or revenue center values differ from those set at the Enterprise level in the Common Driver Properties section, enter property information in the fields. For example, Shift4 assigns a Merchant ID Number for the property, and you can enter it here.
16. From the Transport Service Properties section **Batching Host** field, enter the IP address of the computer where the UTG application is installed at the Hosting Center.

17. In the **Primary Host** field, enter the IP address of the computer with the UTG application installed at the property.
18. From the Shift4 Driver Properties section, enter information in the following fields:

**Table 12-13 Shift4 Driver Properties Fields**

Field	Description
APIPassword	Enter the password that Shift4 assigns, which is unique to the property and pairs with the <b>APISerialNumber</b> .
APISerialNumber	Enter the password that Shift4 assigns, which is unique to the property and pairs with the <b>APIPassword</b> .
ZipCode	Enter the postal code of the property assigned by Shift4.

19. Click **Save**.
  - [Configuring the Dollars on the Net Payment Card Driver](#)

**Related Topics**

- [Universal Transaction Gateway for Shift4](#)
- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

## Configuring the Fusebox Payment Card Driver

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Payment Drivers**.
2. Insert a record, enter **Fusebox** as the name, and then click **OK**.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **FuseboxPayment.dll**, and then click **Open**.
6. Click the **Configuration** tab.
7. From the Assembly/Class section, enter information in the following fields:

**Table 12-14 Assembly/Class Fields**

Field	Description
Description	Enter a description for the payment driver (for example, Fusebox Payment Driver).
Display Name	Enter the name of the third-party driver development company (for example, Elavon). This value appears in the <b>Driver</b> drop-down list.
Driver ID	Enter <b>FB</b> .

8. From the Common Driver Properties section, enter **1** in the following fields:

- **Bank Identification Number**
- **Batch Number**
- **Merchant Number**
- **Store Number**
- **Terminal Number**

The values in these fields cannot be 0 (zero) or blank.

9. From the Transport Service Properties section, enter information in the following fields:

**Table 12-15 Transport Service Properties Fields**

Field	Description
Batching Host	If you are using the Fusebox solution, enter the IP address of the machine where the stunnel application is installed.  If you are using ProtoBase, enter the IP address of the ProtoBase Hosted Solution provided by the Elavon representative for settlement transactions.
Batching Host Port	Enter <b>10001</b> for Fusebox.  Contact the Elavon representative for the ProtoBase Hosted Solution port number for settlement transactions.
Host Timeout	Enter the timeout value in seconds. Setting the value to 0 (zero) equals no timeout. Do not leave this field blank.
Primary Host	Enter the IP address of the machine that runs the stunnel application. <ul style="list-style-type: none"> <li>• If stunnel is installed per workstation, enter <b>127.0.0.1</b>.</li> <li>• If stunnel is installed on a single workstation at the property, leave this field blank.</li> <li>• If the property is using ProtoBase, enter the IP address of the ProtoBase Hosted Solution provided by the Elavon representative for authorizations.</li> </ul>
Primary Host Port	Enter <b>10001</b> for Fusebox.  Contact the Elavon representative for the ProtoBase Hosted Solution port number for authorizations.

10. From the Elavon Driver Properties section, enter information in the following fields:

**Table 12-16 Elavon Driver Properties Fields**

Field	Description
Chain Code	Elavon assigns the six-character alphanumeric code, which is used for key management in gateway environments. The <b>Chain Code</b> is used with Fusebox, but not with ProtoBase.



**Table 12-16 (Cont.) Elavon Driver Properties Fields**

Field	Description
LocationName	If Elavon supplied a Location Name or Source IP Adress to pass from the POS client, enter it here. This value passes on every transaction and can be the location name or Fusebox workstation. You can leave this field blank.  The <b>LocationName</b> is used with Fusebox, but not with ProtoBase.
TerminationID	Enter the terminal code assigned by Elavon for the property to use with credit cards.
TransactionInquiryRetryDelayTimeoutMS	Enter the amount of time Symphony waits before sending the request when a failure occurs. After a communication failure with Fusebox, Symphony sends an inquiry to Fusebox to discover the cause of failure. Oracle recommends entering <b>5000</b> .

**11. Click Save.**

- [Installing stunnel at a Single Host Location](#)
- [Installing stunnel Through Symphony as a CAL Package](#)
- [Configuring the Fusebox Payment Module](#)

**Related Topics**

- [Communication Methods for Fusebox Payment Card Driver](#)
- [stunnel Installation Methods](#)
- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

## Configuring the Fusebox Payment Module

1. Select the Enterprise level, click **Setup**, and then click **Payments**.
2. Insert a record, enter **Credit Card** as the name, and then click **OK**. If a Credit Card payment record exists, skip this step.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Simphony2\EgatewayService\handlers, select **Micros.Payment.LoadableCreditCardModule.dll**, and then click **Open**.
6. Select **Fusebox** from the **Driver** drop-down list.
7. Select the appropriate device from the **Device** drop-down list.
  - Select **Internal** for Oracle Hospitality devices.
  - Select the third-party device if the property is using a custom device driver.
8. Click the **Configuration** tab.
9. From the Common Properties section, enter information in the following fields:

**Table 12-17 Common Properties Fields**

Field	Description
Allow Manual Authorization Credit Card	Select <b>True</b> for processors using the Fusebox driver. This field indicates whether manual authorization of credit cards is allowed.
Allow Partial Settlement On Batch	Select <b>False</b> for processors using the Fusebox driver.
Do Not Batch	Select <b>False</b> for processors using the Fusebox driver. This field indicates whether batch creation and settlement occurs within Symphony.
Encrypt Data	Select <b>True</b> for processors using the Fusebox driver.
Manual Card Data Entry Retries	Enter the number of times a workstation operator can attempt to manually enter a card number. Oracle recommends entering <b>5</b> . The minimum value is <b>1</b> .
Offline Authorizations	Enter the number of offline card authorizations allowed before the application attempts to re-establish online communication.
Prompt for Manual Card Data Entry	Select <b>True</b> for processors using the Fusebox driver. This field indicates whether workstation operators can manually enter a card number.
Retry Authorization Reversals On Batch	Select <b>False</b> for processors using the Fusebox driver.
Run As Service	Select <b>False</b> for processors using the Fusebox driver.

10. Click **Save**.
11. (Optional) To configure Fusebox payment driver settings that are unique to the property or revenue center:
  - a. Select the property or revenue center, click **Setup** , and then click **Payment Drivers**.
  - b. Double-click the **Fusebox** record to open it.
  - c. On the **General** tab, click the **Override this record** link, and then click **Yes**.
  - d. Click the **Configuration** tab.
  - e. If stunnel is installed on a single workstation at the property, enter the **Primary Host** in the Transport Service Properties section. This is the IP address of the machine that houses stunnel for Fusebox, or the IP address for authorizations to the ProtoBase Hosted Solution.
  - f. From the Elavon Driver Properties section, enter information in the following fields:

**Table 12-18 Elavon Driver Properties Fields**

Field	Description
Chain Code	Enter the six-character alphanumeric code assigned by Elavon, which is used for key management in gateway environments. The <b>Chain Code</b> is used with Fusebox, but not with ProtoBase.
LocationName	If Elavon supplied a Location Name or Source IP Address to pass from the POS client, enter it here. This value passes on every transaction and can be the location name or Fusebox workstation. You can leave this field blank.  The <b>LocationName</b> is used with Fusebox, but not with ProtoBase.
TerminationID	Enter the Terminal Code assigned by Elavon for the property to use with credit cards.
TransactionInquiryRetryDelayTimeoutMS	Enter the amount of time Symphony waits before sending the request when a failure occurs. After a communication failure with Fusebox, Symphony sends an inquiry to Fusebox to discover the cause of failure. Oracle recommends entering <b>5000</b> .

g. Click **Save**.

- [Installing stunnel at a Single Host Location](#)
- [Installing stunnel Through Symphony as a CAL Package](#)
- [Configuring the Fusebox Payment Card Driver](#)

**Related Topics**

- [Communication Methods for Fusebox Payment Card Driver](#)
- [stunnel Installation Methods](#)
- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

## Configuring the VisaD Payment Card Driver

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Payment Drivers**.
2. Insert a record, enter **VisaD** as the name, and then click **OK**.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **VisaDPayment.dll**, and then click **Open**.
6. Click the **Configuration** tab.
7. From the Assembly/Class section, enter information in the following fields:

**Table 12-19 Assembly/Class Fields**

Field	Description
Description	Enter a description for the payment driver (for example, VisaD Payment Driver).
Display Name	Enter the name of the third-party driver development company (for example, MerchantLink). This value appears in the Driver drop-down list.
Driver ID	Enter <b>VISAD</b> .

8. From the Common Driver Properties section, enter **1** in the following fields:

- **Bank Identification Number**
- **Batch Number**
- **Merchant Number**
- **Store Number**
- **Terminal Number**

The values in these fields cannot be 0 (zero) or blank.

9. From the Transport Service Properties section, enter information in the following fields:

**Table 12-20 Transport Service Properties Fields**

Field	Description
Host Timeout	Enter the timeout value in seconds. Setting the value to 0 (zero) equals a 30-second timeout. Do not leave this field blank. Oracle recommends entering <b>60</b> .  This field applies only to Win32 devices. You cannot change the timeout from the default setting of 100 seconds on WinCE devices.
Primary Host	Enter the URL of the payment provider application. For MerchantLink, enter <b>g1.merchantlink.com</b> .
Primary Host Port	Enter the port number used for the Primary Host. For MerchantLink, enter <b>443</b> .
Request URI	If applicable, enter the Uniform Resource Identifier (URI) for the payment provider. For MerchantLink, enter <b>/Micros/process_transaction.cgi</b> .
Secondary Host	Enter the URL of the payment provider application. For MerchantLink, enter <b>g2.merchantlink.com</b> .
Secondary Host Port	Enter the port number used for the Secondary Host. For MerchantLink, enter <b>443</b> .

10. From the VisaD Driver Properties section, enter **9999** in the **Max Batch Records** field.

11. Click **Save**.

- [Configuring the VisaD Payment Module](#)

### Related Topics

- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

## Configuring the VisaD Payment Module

1. Select the Enterprise level, click **Setup**, and then click **Payments**.
2. Insert a record, enter **Credit Card** as the name, and then click **OK**. If a Credit Card payment record exists, skip this step.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Simphony2\EgatewayService\handlers, select **Micros.Payment.LoadableCreditCardModule.dll**, and then click **Open**.
6. Select **VisaD** from the **Driver** drop-down list.
7. Select the appropriate device from the **Device** drop-down list.
  - Select **Internal** for Oracle Hospitality devices.
  - Select the third-party device if the property is using a custom device driver.
8. Click the **Configuration** tab.
9. From the Common Properties section, enter information in the following fields:

**Table 12-21 Common Properties Fields**

Field	Description
Allow Manual Authorization Credit Card	Select <b>True</b> for processors using the VisaD driver. This field indicates whether manual authorization of credit cards is allowed.
Allow Partial Settlement On Batch	Select <b>False</b> for processors using the VisaD driver.
Do Not Batch	Select <b>False</b> for processors using the VisaD driver. This field indicates whether batch creation and settlement occurs within Symphony.
Encrypt Data	Select <b>True</b> for processors using the VisaD driver.
Manual Card Data Entry Retries	Enter the number of times a workstation operator can attempt to manually enter a card number. Oracle recommends entering <b>5</b> . The minimum value is <b>1</b> .
Offline Authorizations	Enter the number of offline card authorizations allowed before the application attempts to re-establish online communication.
Prompt for Manual Card Data Entry	Select <b>True</b> for processors using the VisaD driver. This field indicates whether workstation operators can manually enter a card number.

**Table 12-21 (Cont.) Common Properties Fields**

Field	Description
Retry Authorization Reversals On Batch	Select <b>False</b> for processors using the VisaD driver.
Run As Service	Select <b>False</b> for processors using the VisaD driver.

10. Click **Save**.
  11. (Optional) If you need to configure VisaD payment driver settings that are unique to the property or revenue center:
    - a. Select the property or revenue center, click **Setup**, and then click **Payment Drivers**.
    - b. Double-click the **VisaD** record to open it.
    - c. On the **General** tab, click the **Override this record** link, and then click **Yes**.
    - d. Click the **Configuration** tab.
    - e. If the property or revenue center values differ from those set at the Enterprise level in the Transport Service Properties section, enter property information in the fields  
  
Ensure that you have the VAR sheet from a VisaD payment processing vendor representative. The VAR sheet contains the property information, such as the Agent Bank Number, Industry Type, Merchant Category, and Time Zone.
    - f. From the VisaD Driver Properties section, enter values in all fields based on the VAR sheet information.
    - g. Click **Save**.
- [Configuring the VisaD Payment Card Driver](#)

**Related Topics**

- [Loadable Payment Card Configuration Tasks](#)
- [Loadable Payment Configuration Prerequisites](#)

## Configuring the Loadable Payment Card Device

The payment module generally uses payment devices containing internal drivers (for example, magnetic stripe reader (MSR) or radio-frequency identification (RFID)) that are compatible with Symphony and accept payment card information. If this is the case, skip the instructions in this section.

If the payment module uses a physical input device containing a custom driver that is not supported with Symphony, you must configure the third-party device driver to allow communications between the device and Symphony.

1. Select the Enterprise level, click **Setup**, and then click **Payment Device**.
2. Insert a record, enter the device name, and then click **OK**.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.

5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **[ThirdPartyProvider].dll**, and then click **Open**.
6. Click the **Configuration** tab.
7. From the Assembly/Class section, enter information in the following fields:

**Table 12-22 Assembly/Class Fields**

Field	Description
Description	Enter a description of the device driver (for example, Magtek).
Driver ID	Enter a value that matches the device (for example, Magtek350M).
Display Name	Enter the name of the third-party device (for example, Magtek). This value appears in the <b>Device</b> drop-down list.

8. Click **Save**.

## Creating Front of House Loadable Payment Card Buttons

Oracle recommends that you create payment card buttons on a page for the loadable payment card functions.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place loadable payment card buttons.
3. On the **Edit** tab, select the page area in which to define the loadable payment card functions (typically the payment area).
4. Click **Payments**.
5. On the **General** subtab, select **Payment Tenders** from the **Type** drop-down list.
6. Click the black arrow beneath the **Type** drop-down list.
7. From the Select Tender/Media Payment dialog, select the payment tender, and then click **OK**.

Select **None** to use all types of credit cards.

8. From the Payment Configuration dialog, select **CreditDebit:Loadable** from the **Payment Type** drop-down list.
9. Select the appropriate function key from the **Functions** drop-down list, and then click **OK**:
  - **CreditAuthOnly**: This function sends a request to the cardholder's bank to authorize available funds and place a hold on those funds for sale. The account is not charged. This function is used in Table Service to obtain authorization of payment.
  - **CreditAuthAndPay**: This function authorizes funds available and completes the sale. This function is used in Quick Service to apply payment and close a check.
  - **InitialAuthorization**: This function sends a request to the cardholder's bank to authorize available funds and place a hold on those funds for sale. The

account is not charged. This function is used in Table Service to obtain authorization of payment for a large party or with bar tabs where additional charges may be incurred.

- **ManualAuthorization:** When connection to the credit card processor is unavailable, this function allows the workstation operator to manually enter the authorization code (obtained by phoning the credit card processor).
10. Position and size the button on the page. Use the Style arrow to change the color.
  11. In the **Legend** field, enter the button name.
  12. Repeat Steps 7 through 11 for each type of payment tender.
  13. Click **Save**.

## The Oracle Payment Interface (OPI)

The Oracle Payment Interface (OPI) simplifies credit card payment configuration by enabling Symphony to communicate with payment service providers (PSPs) that provide credit card processing using a single payment driver.

In addition, the OPI also:

- Enhances security by not handling or storing card holder or sensitive authentication data in Symphony or OPI. PSPs process card data and provide a token to Symphony.
- Eliminates credit card batch processing in Symphony by automating end-of-day settlement for credit card transactions through the OPI.

### Related Topics

- [Configuring the OPI Driver](#)
- [Configuring the OPI Payment Module](#)
- [Configuring the Default Payment Tender for OPI](#)
- [Updating Credit Card Preambles for OPI](#)
- [Configuring the OPI to Settle Transactions at the Start of Day \(SOD\)](#)
- [Configuring an EOD Settlement Button](#)
- [Credit Card Preambles for OPI](#)

## Configuring the OPI Driver

If sending transactions to multiple merchant IDs, create the OPI driver record in the property with the merchant ID which is used by majority of the revenue centers, and then override the driver records of the revenue centers that route transactions to other merchant IDs.

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Payment Drivers**.
2. Insert a new Payment Driver record named `OPI`, and then double-click the record to open it.
3. On the General tab, select **3 - DLL** or **26 - Secure DLL Configuration** as the **Content Type**, click **Import from a file**, browse to `[Drive letter]\MICROS`



`\Symphony2\EgatewayService\handlers\OPIPayment.dll`, and then click **Open**.

4. On the Configurations secondary tab, enter information in the following fields:
  - **Display Name:** Enter a display name for the driver (for example, OPI).
  - **Merchant Number:** Enter the merchant ID.
  - **Primary Host:** Enter the URL for the OPI gateway.
  - **Host Timeout:** Enter the timeout value in seconds. The default timeout value is 30 seconds.
  - **Pass Phrase:** Enter a passphrase for authentication.
5. Click **Save**.

- [Configuring the OPI Payment Module](#)
- [Configuring the Default Payment Tender for OPI](#)
- [Updating Credit Card Preambles for OPI](#)
- [Configuring the OPI to Settle Transactions at the Start of Day \(SOD\)](#)
- [Configuring an EOD Settlement Button](#)

#### Related Topics

- [The Oracle Payment Interface \(OPI\)](#)
- [Credit Card Preambles for OPI](#)

## Configuring the OPI Payment Module

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Payments**.
2. Insert a new record for the OPI, and then double-click to open it.
3. Select the OPI **Driver**, select **3 - DLL** as the **Content Type**, click **Import From File**, browse to `[Drive letter]\MICROS\Symphony2\EgatewayService\handlers\Micros.Payment.LoadableCreditCardModule.dll`, and then click **Open**.
4. From the Configuration subtab, modify the settings as required, and then click **Save**.

The configuration information is obtained from the credit card processor.

- [Configuring the OPI Driver](#)
- [Configuring the Default Payment Tender for OPI](#)
- [Updating Credit Card Preambles for OPI](#)
- [Configuring the OPI to Settle Transactions at the Start of Day \(SOD\)](#)
- [Configuring an EOD Settlement Button](#)

#### Related Topics

- [The Oracle Payment Interface \(OPI\)](#)
- [Credit Card Preambles for OPI](#)

## Configuring the Default Payment Tender for OPI

1. Create a credit card tender for the OPI. See [Configuring a Credit Card Tender](#) for instructions.  
Give the tender a general name such as `OPIDefault`.
2. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Tender Parameters**.
3. On the Configuration tab, select the credit card tender that you created for the OPI as the **Default Payment Card Tender**.
4. Click **Save**.
5. Create a button for the default OPI tender. See [Creating Front of House Loadable Payment Card Buttons](#) for instructions.

- [Configuring the OPI Driver](#)
- [Configuring the OPI Payment Module](#)
- [Updating Credit Card Preambles for OPI](#)
- [Configuring the OPI to Settle Transactions at the Start of Day \(SOD\)](#)
- [Configuring an EOD Settlement Button](#)

### Related Topics

- [The Oracle Payment Interface \(OPI\)](#)
- [Credit Card Preambles for OPI](#)

## Updating Credit Card Preambles for OPI

1. Click the Enterprise or property, click **Configuration**, and then click **Tender/Media**.
2. Double-click a credit card tender type to open it, click the **Options** tab, and then click the **Credit Card Options** subtab.
3. In the Preambles section, if standard credit card preambles are defined, select the preamble records, and then click **Delete**.  
You must delete all preexisting standard credit card preambles.
4. Click **Add**, and then configure the **Start** preamble and the **Length** based on the card payment type.  
See [Credit Card Preambles for OPI](#) for a list of preambles for commonly used card types.
5. Click **Save**.
6. Repeat Steps 2 through 5 for other credit card payment types.

- [Configuring the OPI Driver](#)
- [Configuring the OPI Payment Module](#)
- [Configuring the Default Payment Tender for OPI](#)

- [Configuring the OPI to Settle Transactions at the Start of Day \(SOD\)](#)
- [Configuring an EOD Settlement Button](#)

**Related Topics**

- [The Oracle Payment Interface \(OPI\)](#)
- [Credit Card Preambles for OPI](#)

## Configuring the OPI to Settle Transactions at the Start of Day (SOD)

1. Select the Enterprise or property, click **Configuration**, and then click **Task Schedules**.
2. Insert a new record, and then double-click the record to open it.
3. On the General tab, select **8- Check and Posting** as the **Service Type**, and then select **5 - EOD Settlement** as the **Task Type**.
4. Select **4 - Recurring - Daily** as the **Schedule Type**, and then select **Enabled**.
5. Select the **Start Date**, and then select **No end date**.
6. Click the Recurrence tab.
7. In the Daily Frequency section, select **Occurs once at**, and then schedule the EOD settlement to execute at the same time Start of Day (SOD) runs on the property.
8. Click **Save**.

- [Configuring the OPI Driver](#)
- [Configuring the OPI Payment Module](#)
- [Configuring the Default Payment Tender for OPI](#)
- [Updating Credit Card Preambles for OPI](#)
- [Configuring an EOD Settlement Button](#)

**Related Topics**

- [The Oracle Payment Interface \(OPI\)](#)
- [Credit Card Preambles for OPI](#)

## Configuring an EOD Settlement Button

If credit card settlement fails, you can allow workstation operators to manually perform the EOD settlement through the workstation.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Double-click the transaction page on which you want the button to appear on the workstation, and insert a new button.
3. On the General tab, select **Payment Tender** as the **Type**, click the right arrow directly beneath the **Type** drop-down menu, select the **None** payment record, and then click **OK**.

4. On the Payment Configuration dialog, select **CreditDebit:Loadable** from the **Payment Type** drop-down list.
5. From the **Functions** drop-down list, select **ManualEODSettlement**, and then click **OK**.
6. Enter a **Legend** for the button (for example, EOD Settlement), and then click **Save**.

- [Configuring the OPI Driver](#)
- [Configuring the OPI Payment Module](#)
- [Configuring the Default Payment Tender for OPI](#)
- [Updating Credit Card Preambles for OPI](#)
- [Configuring the OPI to Settle Transactions at the Start of Day \(SOD\)](#)

#### Related Topics

- [The Oracle Payment Interface \(OPI\)](#)
- [Credit Card Preambles for OPI](#)

## Credit Card Preambles for OPI

The following table lists the credit card preambles for OPI.

**Table 12-23 Credit Card Preambles for OPI**

Card Type	Start	Length
Visa	0*	1
Visa PIN Credit	12*	2
Visa Electron	17*	2
Visa Debit	18*	2
VPAY	20*	2
MasterCard	1*	1
MasterC Debit	24*	2
MasterCard PIN Credit	13*	2
American Express	2*	1
Discover	26*	2
Diners	3*	1
JCB	4*	1
SVC	7*	1
Maestro	19*	2
Gift Card	8*	1
Points	9*	1
CUP	10*	2
CUP Debit	14*	2
Debit	11*	2

**Table 12-23 (Cont.) Credit Card Preambles for OPI**

Card Type	Start	Length
Interac	15*	2
UKDM/Switch	16	1
VPAY	20*	2
Alliance	21*	2
ecChip	22*	2
GiroCard	23*	2
Bank Card	25*	2
PayPal	27*	2

**Related Topics**

- [The Oracle Payment Interface \(OPI\)](#)
- [Configuring the OPI Driver](#)
- [Configuring the OPI Payment Module](#)
- [Configuring the Default Payment Tender for OPI](#)
- [Updating Credit Card Preambles for OPI](#)
- [Configuring the OPI to Settle Transactions at the Start of Day \(SOD\)](#)
- [Configuring an EOD Settlement Button](#)

## Distributing a Third-Party Credit Card Driver Package

Custom third-party credit card payment device drivers do not automatically install along with the Symphony EMC installation. Consequently, the configuration for the third-party drivers is not available from the EMC. Complete the following tasks to configure third-party payment device drivers:

- Manually copy the third-party payment .DLL files to the correct installation directories on the Application Server where Server EMC or Remote EMC is installed. [Copying Third-Party Payment Driver Files](#) contains instructions to copy the files to the appropriate directories.
- [Create a Client Application Loader \(CAL\) Package](#) from the EMC.
- [Creating a CAL Package for the Third-Party Payment Card Driver Distribution](#)

**Related Topics**

- [Copying Third-Party Payment Driver Files](#)
- [Manually Installing Credit Card Certificates on Workstations](#)

## Copying Third-Party Payment Driver Files

1. After you receive the CreditDriverPackage.zip from the third-party vendor, extract it.

2. Copy the CreditCardDrivers2.0 folder from the \CreditDriverPackage\CE directory and place it in the following folders on the Application Server:
  - \MICROS\Symphony2\EgatewayService\CAL\WS5A\Packages
  - \MICROS\Symphony2\EgatewayService\CAL\WS5\Packages
3. Copy the CreditCardDrivers2.0 folder from the \CreditDriverPackage\WIN32 directory and place it in the following folder on the Application Server:
  - \MICROS\Symphony2\EgatewayService\CAL\Win32\Packages
4. Open the CreditCardDrivers2.0 folder in the \MICROS\Symphony2\EgatewayService\CAL\Win32\Packages directory and copy all of the files to the following directories on the Application Server, with the exception of the Setup.dat file. Do not copy the Setup.dat file to these directories.
  - \MICROS\Symphony2\EgatewayService\handlers
  - \MICROS\Symphony\EgatewayService\Download\EMCClient
5. Copy the third-party payment DLL files to the appropriate installation directory on the Application Server where Server EMC or Remote EMC is installed.
  - Server EMC: Copy custom .dll files to \MICROS\Symphony2\EgatewayService\handlers
  - Remote EMC: Copy custom .dll files to \MICROS\EMC\EMCClient

#### Related Topics

- [Distributing a Third-Party Credit Card Driver Package](#)
- [Creating a CAL Package for the Third-Party Payment Card Driver Distribution](#)

## Creating a CAL Package for the Third-Party Payment Card Driver Distribution

See [Client Application Loader](#) for instructions to create and upload the CAL package.

- [Distributing a Third-Party Credit Card Driver Package](#)

#### Related Topics

- [Copying Third-Party Payment Driver Files](#)
- [Manually Installing Credit Card Certificates on Workstations](#)

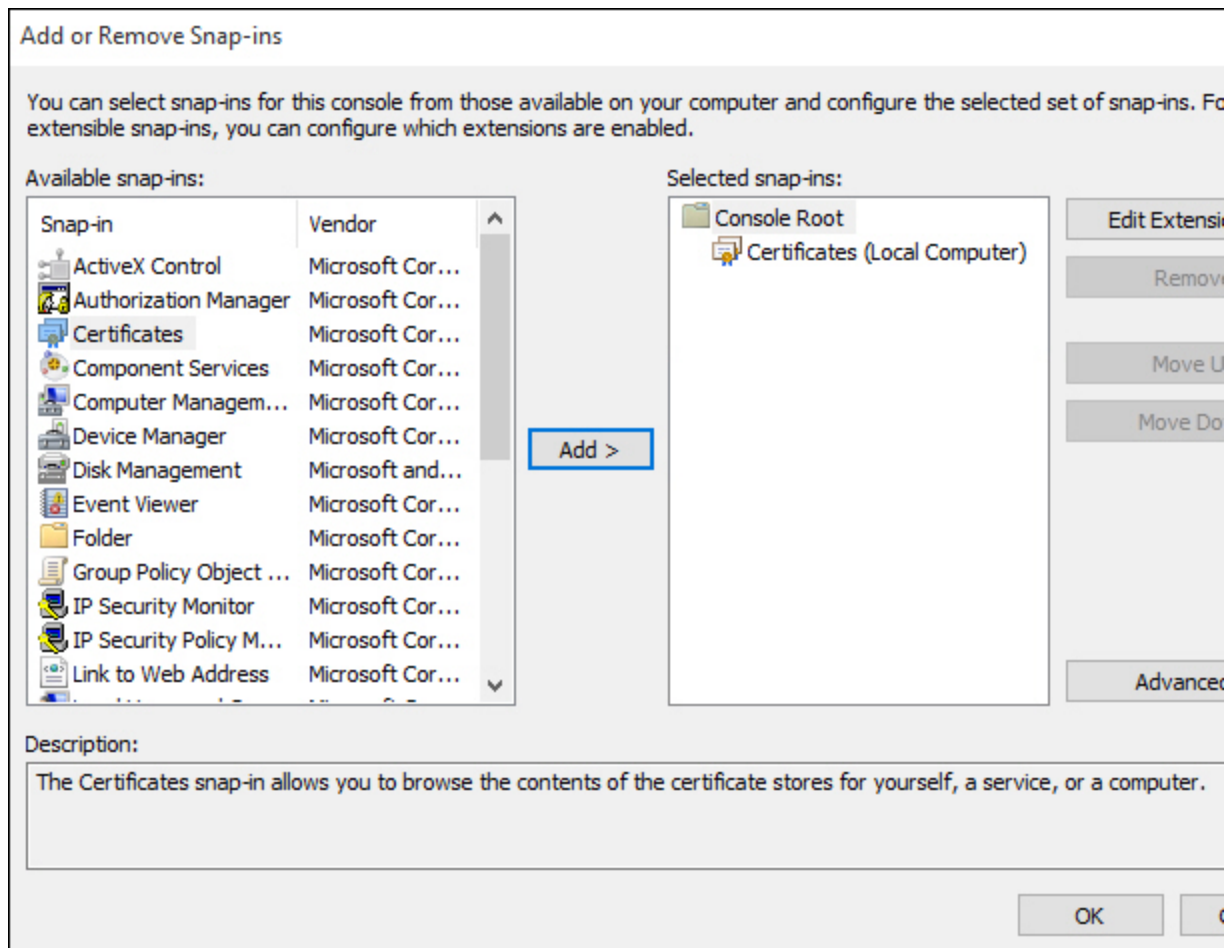
## Manually Installing Credit Card Certificates on Workstations

Perform these steps on the POS client workstation running Microsoft Windows 10. Upon completion, the MerchantLink credit card certificate is ready for use on the POS client workstation.

1. Open the Run window from the desktop.
2. In the **Open** field, enter `mmc`, and then click **OK**.
3. From the Console window, click **File**, and then select **Add/Remove Snap-in**.
4. From the Add or Remove Snap-ins window, select **Certificates**, and then click the **Add** button.

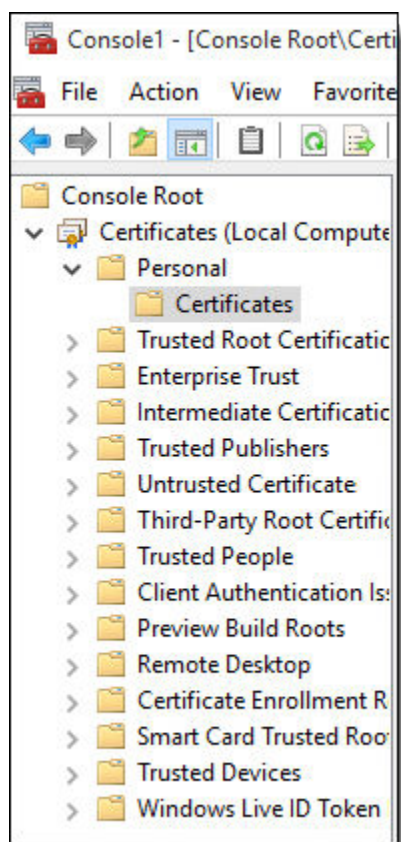
5. From the Certificates Snap-In dialog, select **Computer Account**, and then click **Next**.
6. From the Select Computer dialog, select **Local Computer**, and then click **Finish**.
7. Verify that the Add Snap-ins window shows the Certificates snap-in on the right, and then click **OK**.

**Figure 12-1 Add or Remove Snap-ins Window**



8. From the Console window, expand **Certificates (Local Computer)**, and then expand the **Personal** folder.

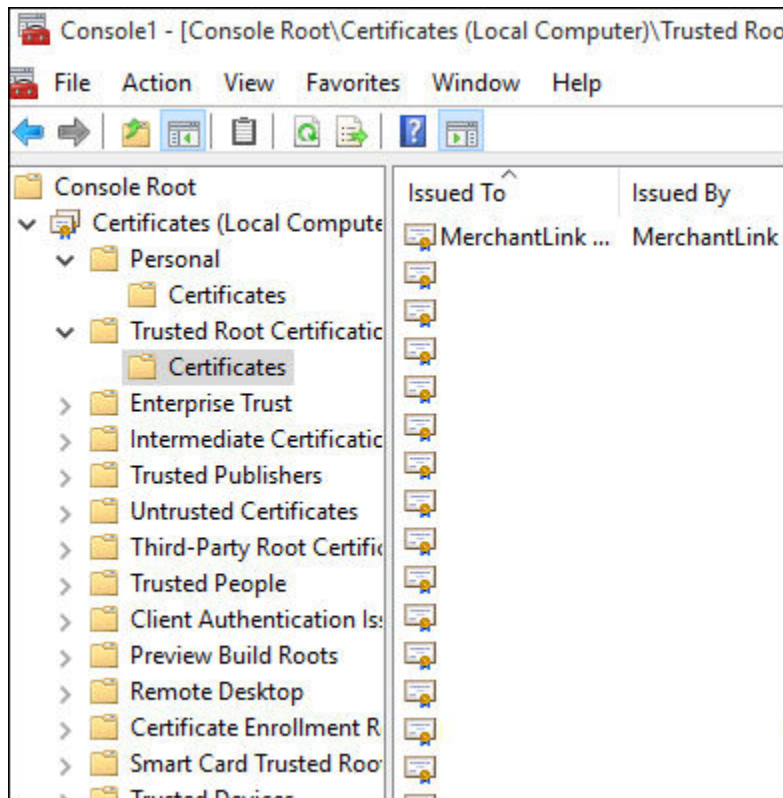
Figure 12-2 Console Root Certificates



9. Right-click the **Certificates** folder directly under the Personal folder, select **All Tasks**, and then click **Import...**
10. From the Certificate Import Wizard dialog, verify that the **Store Location** is set to **Local Machine**, and then click **Next**.
11. From the File To Import page, click **Browse**, navigate to the file location where the certificate resides, and then click **Next**. MerchantLink sends a certificate in the .P12 format.  
If your certificate does not appear in the file location, change the **File Type** drop-down list to **All Files**.
12. From the Private key protection page, enter the **Password** provided by MerchantLink that corresponds to the certificate being installed, and then click **Next**.  
Leave the Import Options at the default settings.
13. From the Certificate Store page, select **Automatically select the certificate store based on the type of certificate**, and then click **Next**.
14. From the Console window verify that the certificate is added to the Personal Store.  
Refresh the page if the certificate does not appear. The Issued To column shows your company name.
15. Expand the Certificates folders to **Trusted Root Certification Authorities** and then **Certificates**. This store includes a MerchantLink Certificate Authority certificate.



Figure 12-3 Console Root Trusted Root Certificates



16. Close the MMC Console window.

When closing the window, you are prompted to save the Console. If you save the Console window, you can make modifications to certificates without using the Add / Remove Snap-In windows.

17. Download the Microsoft WinHttpCertCfg tool from <https://www.microsoft.com/en-us/download/details.aspx?id=19801>.

The tool may be included in the credit card driver files distributed by MerchantLink. Older releases of this tool were in the .exe format. Newer releases of the tool are in .msi format.

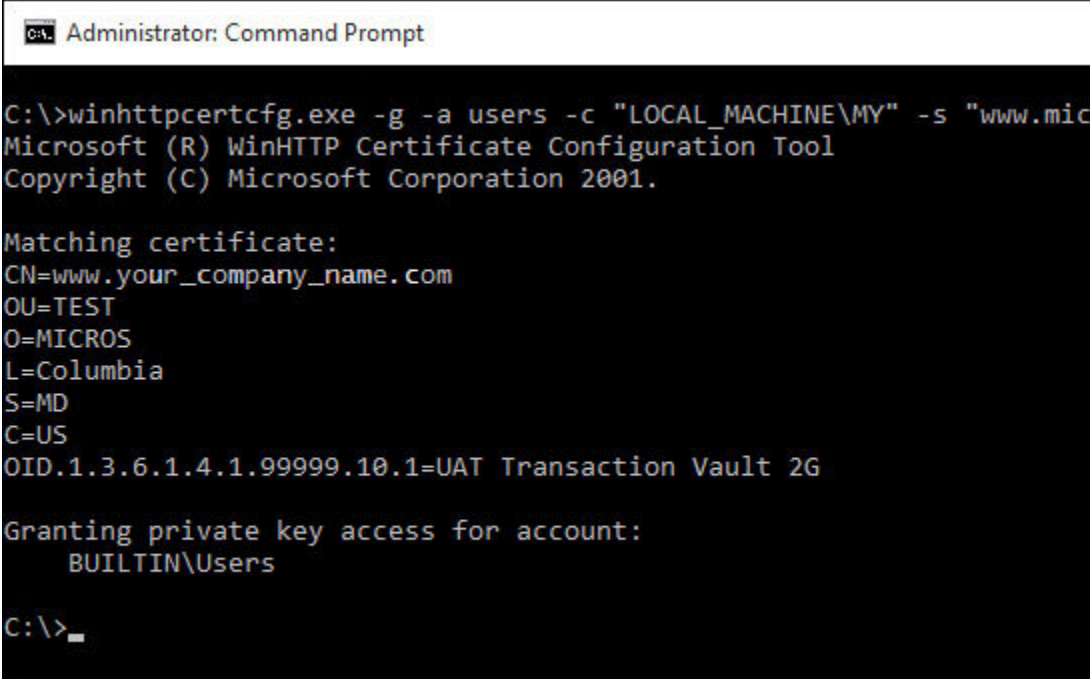
- a. Open a command prompt window as Administrator.
- b. Navigate to the location where you saved the WinHttpCertCfg tool, and execute one of the following commands:

```
winhttpcertcfg.exe -g -a users -c "LOCAL_MACHINE\MY" -s "-insert unique customer cert info here-"
```

```
winhttpcertcfg.msi -g -a users -c "LOCAL_MACHINE\MY" -s "-insert unique customer cert info here-"
```

- c. Replace the `insert unique customer cert info here` with the customer certificate information found in the Personal certificate store (for example, `www.your_company_name.com`).

Figure 12-4 Command Prompt



```
Administrator: Command Prompt

C:\>winhttpcertcfg.exe -g -a users -c "LOCAL_MACHINE\MY" -s "www.mic
Microsoft (R) WinHTTP Certificate Configuration Tool
Copyright (C) Microsoft Corporation 2001.

Matching certificate:
CN=www.your_company_name.com
OU=TEST
O=MICROS
L=Columbia
S=MD
C=US
OID.1.3.6.1.4.1.99999.10.1=UAT Transaction Vault 2G

Granting private key access for account:
    BUILTIN\Users

C:\>_
```

#### Related Topics

- [Distributing a Third-Party Credit Card Driver Package](#)
- [Creating a CAL Package for the Third-Party Payment Card Driver Distribution](#)

## Understanding Credit Card Batching

Credit card batches are typically created and settled automatically using a PC Autosequence during the Start of Day (SOD) process. You can manually create, edit, and settle credit card batches from the EMC in special situations, such as:

- When the property wants to batch multiple times per day, at various times
- During troubleshooting

#### Related Topics

- [Creating a Credit Card Batch](#)
- [Editing a Credit Card Batch](#)
- [Settling a Credit Card Batch](#)

## Creating a Credit Card Batch

1. Select a property, click **Tasks**, and then click **Create Batch**.
2. (Optional) Enter information about the batch you are creating in the **Comment** field.
3. To create a batch for yesterday's totals and all dates prior to yesterday, select **Yesterday**.

4. To create a batch only for today's totals up to the current time, select **Current Totals**.
5. To create a batch for the entire property, select **All** from the Revenue Centers section.
6. To create a batch for the totals of a revenue center, select **Selected**, and then select a revenue center from the list.
7. To revert the changes that you made and use the default selections, click **Default**.
8. Click **Create**.

- [Editing a Credit Card Batch](#)
- [Settling a Credit Card Batch](#)

#### Related Topics

- [Understanding Credit Card Batching](#)

## Editing a Credit Card Batch

1. Select a property, click **Tasks**, and then click **Edit Batch**.
2. Click **Select** adjacent to the **Batch** field, select a batch, and then click **Select**.
3. To refine the search results, use the **Employee**, **Revenue Center**, **Card Holder**, and **Check Number** filters.

The card holder name is often encrypted on the card and is not stored in the Transaction database. Therefore, it is not always possible to use this as a search parameter.

4. Click **Search**.
5. Click **Edit** near the relevant credit card record.
6. Make the changes, and then click **Save**.

- [Creating a Credit Card Batch](#)
- [Settling a Credit Card Batch](#)

#### Related Topics

- [Understanding Credit Card Batching](#)

## Settling a Credit Card Batch

1. Select a property, click **Tasks**, and then click **Transfer Batch**.
2. Click **Select**, select one or more batches to transfer, and then click **Transfer**.

- [Creating a Credit Card Batch](#)
- [Editing a Credit Card Batch](#)

#### Related Topics

- [Understanding Credit Card Batching](#)

## Understanding Pay at the Table

This section describes the brief process in which a guest can pay a check using a tablet device, and an overview for setting up Symphony's Pay at the Table (PATT) features.

Guests can use PATT on the following handheld devices:

- Oracle MICROS Table E-Series
- Zebra MC40 (formerly the Motorola MC40) mobile device running on the Android mobile operating system and configured with either an integrated or external magnetic card reader.

After a dining room guest or hotel guest places an order, a server or room service staff member presents a tablet device containing the check to the guest, who can:

- View the check
- Add a tip or change the tip value
- Select a different language
- Share payment among several guests
- Charge menu items to a credit card or room account
- Swipe a credit card, or enter a room number and guest last name
- Sign the check with electronic signature after card authorization
- Enter a valid email address and receive a receipt electronically through email

When a guest charges payment to a room account, Symphony posts the total payment to the OPERA property management system (PMS). The front desk manager can view the payment and signature from PATT in:

- Oracle Hospitality Reporting and Analytics using the Check Query and Audit and Analysis portlets
- Oracle Hospitality Symphony Reports

Sales executives can demonstrate PATT features to clients without using a magnetic card or card reader.

Check images, including captured electronic signatures, are available through the Oracle Hospitality Reporting and Analytics Check Query and Audit and Analysis portlets.

Complete the following tasks to set up the PATT feature.

- Configure the Tenders
- Configure the Payment Drivers
- Configure the Payment Modules
- Create Pay at the Table Buttons for the POS Client
- Configure Email Receipts
- Configure Languages

### Related Topics

- [Configuring a Credit Card Tender](#)
- [Configuring Credit Card Voucher Headers and Trailers](#)
- [Configuring the Room Tender](#)
- [Configuring the OPERA PMS Payment Driver](#)
- [Configuring the MICROS Standard Credit Card Payment Module](#)
- [Configuring the Loadable PMS Payment Module](#)
- [Configuring the Demo Payment](#)
- [Setting the Front of House to Allow Pay at the Table](#)
- [Configuring Email Receipts](#)

## Configuring a Credit Card Tender

1. Select the Enterprise or property, click **Configuration**, and then click **Tender/Media**.
2. Insert a record and name it based on the credit card company (for example, Visa or MasterCard).
3. Double-click the credit card record to open it.
4. On the **General** tab, select **1 - Payment** from the **Key Type** drop-down list.
5. Click the **Options** tab, and then click the **Printing Options** subtab.
6. Select **8 - Print Customer Receipt** and **21 - Print Summary Totals**.
7. Click the **Ops Behavior** subtab.
8. Select **3 - Assume Paid in Full**.
9. Click **Save**.

- [Configuring Credit Card Voucher Headers and Trailers](#)
- [Configuring the Room Tender](#)
- [Configuring the OPERA PMS Payment Driver](#)
- [Configuring the MICROS Standard Credit Card Payment Module](#)
- [Configuring the Loadable PMS Payment Module](#)
- [Configuring the Demo Payment](#)
- [Setting the Front of House to Allow Pay at the Table](#)
- [Configuring Email Receipts](#)

### Related Topics

- [Understanding Pay at the Table](#)

## Credit Card Preamble

A credit card preamble—sometimes called a credit card prefix, issuer identification number (IIN), or bank identification number (BIN)—is a digit or series of digits at the

beginning of a credit card number that identifies the type of card or company that issued the card.

- [Credit Card Preamble Rules](#)

#### Related Topics

- [Configuring Standard Credit Card Preambles](#)
- [List of Standard Credit Card Preambles for the U.S.](#)

## Credit Card Preamble Rules

Adhere to the following rules for governing a valid credit card preamble:

- The **Start** and **End** preambles must end with an asterisk (\*) (for example, 304\*).
- The number of digits in the **Start** and **End** fields must be the same.
- The number of digits in the **Start** and **End** fields cannot exceed the **Length** defined.
- The value of the **End** field must be greater than the value of the **Start** field.

- [Credit Card Preamble](#)

#### Related Topics

- [Configuring Standard Credit Card Preambles](#)
- [List of Standard Credit Card Preambles for the U.S.](#)

## Configuring Standard Credit Card Preambles

1. Select the Enterprise or property, click **Configuration**, and then click **Tender/Media**.
2. Double-click a credit card tender to open it, click the **Options** tab, and then click the **Credit Card Options** subtab.
3. In the Preambles section, click **Add**, and then enter the **Start**, **End**, and **Length** for the preamble.

If the preamble record defines a range such as 3050 to 3090, the Start field represents the begin range, which is 3050\*, and the End field represents the end range, which is 3090\*.

See [List of Standard Preambles for the U.S](#) for a list of standard credit card preamble ranges for different card types.

4. To add another preamble for the card, Repeat Step 3.
5. Click **Save**.

#### Related Topics

- [Credit Card Preamble](#)
- [Credit Card Preamble Rules](#)
- [List of Standard Credit Card Preambles for the U.S.](#)

## List of Standard Credit Card Preambles for the U.S.

The values listed in the following table apply to all US sites. Additional types are accepted in other countries. Contact the local processor for the specific list. Preambles also change as card providers are bought out (for instance, Discover purchased Diner's Club) and should be updated regularly.

**Table 12-24 List of Standard U.S. Credit Card Preambles**

Card Type	Start	End	Length
Visa	40000000*	49999999*	16
MasterCard	51000000*	55999999*	16
	222100*	272099*	16
American Express	34000000*	34999999*	16
	37000000*	37999999*	15
Diners Club	36000000*	36999999*	14
	38000000*	39999999*	16
	30000000*	30599999*	16
	30950000*	30959999*	16
JCB	35280000*	35899999*	16
Discover	60110000*	60110999*	16
	60112000*	60114999*	16
	60117400*	60117499*	16
	60117700*	60117999*	16
	60118600*	60119999*	16
	64400000*	65999999*	16
Discover (CUP)	62212600*	62292599*	16
	62400000*	62699999*	16
	62820000*	62889999*	16

### Related Topics

- [Credit Card Preamble](#)
- [Credit Card Preamble Rules](#)
- [Configuring Standard Credit Card Preambles](#)

## Configuring Credit Card Authorization to Print Merchant Vouchers and Customer Receipts

You can configure the printing of credit card vouchers when workstation operators press the **Credit Card Authorization** function key on the POS client. Complete the steps below to allow the following items to print:

- Merchant voucher (for cardholder signature)
- Customer receipt

1. Select the Enterprise or property, click **Configuration**, and then click **Tender/Media**.
2. Click the **Printing Options** tab, and then select the following options:
  - **8 - Print Customer Receipt**
  - **54 - Print 2 Guest Checks/Receipts**
3. Click **Save**.
4. Repeat Steps 1 through 3 for each credit card tender record.

If multiple properties exist and each property has different credit card tenders (not inherited from the Enterprise), you will need to configure the printing options separately for each property.
5. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
6. Click the **CA/EDC** tab (Credit Card Authorization/Electronic Draft Capture), and then select **7 - Print Two Credit Card Vouchers**.
7. Click **Save**.

## Configuring Credit Card Voucher Headers and Trailers

Credit card headers and trailers are leading and trailing lines that print on credit card vouchers.

1. Select the Enterprise or revenue center, click **Descriptors**, and then click either **Credit Card Headers** or **Credit Card Trailers**.
2. In the Text column, enter the text to appear on the header or trailer in the rows.
3. To insert a logo for the header or trailer, select a check box from the **Use Logo** column, and then select a logo using the ellipsis point (...) button in the **Logo** column.

[Logo Printing](#) contains more information about setting a header or trailer line to print logos rather than text.
4. Click **Save**.

- [Configuring a Credit Card Tender](#)
- [Configuring the Room Tender](#)
- [Configuring the OPERA PMS Payment Driver](#)
- [Configuring the MICROS Standard Credit Card Payment Module](#)
- [Configuring the Loadable PMS Payment Module](#)
- [Configuring the Demo Payment](#)
- [Setting the Front of House to Allow Pay at the Table](#)
- [Configuring Email Receipts](#)

### Related Topics

- [Understanding Pay at the Table](#)



## Configuring the Room Tender

Configure a room charge tender for guests to charge meals to a hotel room using Oracle Hospitality OPERA.

1. Select the Enterprise or property, click **Configuration**, and then click **Tender/Media**.
2. Insert a record and name it **PATT Room Charge**.
3. Double-click the **PATT Room Charge** record to open it.
4. On the **General** tab, select **1 - Payment** from the **Key Type** drop-down list.
5. Click the **Options** tab, and then click the **Interface Options** subtab.
6. Select **39 - Reverse PMS Itemizers On VOID Postings**.
7. Click **Save**.

- [Configuring a Credit Card Tender](#)
- [Configuring Credit Card Voucher Headers and Trailers](#)
- [Configuring the OPERA PMS Payment Driver](#)
- [Configuring the MICROS Standard Credit Card Payment Module](#)
- [Configuring the Loadable PMS Payment Module](#)
- [Configuring the Demo Payment](#)
- [Setting the Front of House to Allow Pay at the Table](#)
- [Configuring Email Receipts](#)

### Related Topics

- [Understanding Pay at the Table](#)

## Configuring the OPERA PMS Payment Driver

To configure the Oracle Hospitality OPERA 5 Hotel Property Systems payment driver:

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Payment Drivers**.
2. Insert a record, enter **OPERA PMS Driver** as the name, and then click **OK**.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **OperaWSPayment.dll**, and then click **Open**.
6. Click the **Configuration** tab.
7. From the Assembly/Class section, enter information in the following fields:

**Table 12-25 Assembly/Class Fields**

Field	Description
Description	Enter a description for the payment driver (for example, PMS posting driver for OPERA).
Display Name	Enter the name of the PMS driver (for example, OPERAPMS). This value appears in the <b>Driver</b> drop-down list.
Driver ID	Enter <b>OPERAPMS</b> .

8. From the Opera Interface Properties section, enter information in the following fields:

**Table 12-26 Opera Interface Properties Fields**

Field	Description
Connection String	Enter <b>jdbc / operaoperads</b> .
Interface ID	Enter the OPERA interface ID.
Opera Tender Number	Enter the Tender/Media object number mapped for the Room Charge.
Password	Enter the password.
Posting Format	Select one of the following: <ul style="list-style-type: none"> <li>• <b>Encoded</b>: Select to post to OPERA with encoded format in the XML request. The <b>Encoded</b> format is used for backward compatibility. Use this format with OPERA version 5.0.04.</li> <li>• <b>Literal or Empty (by default)</b>: Select to post to OPERA with plain text format. The room charge will post to OPERA with <b>Literal</b> format in the XML request. Use this format with OPERA version 5.0.05.</li> </ul>
Resort	Enter the name of the property using OPERA.
UserName	Enter the user name.
Web Service	Enter the URL of the OPERA Web Service.

9. Click **Save**.
- [Configuring a Credit Card Tender](#)
  - [Configuring Credit Card Voucher Headers and Trailers](#)
  - [Configuring the Room Tender](#)
  - [Configuring the MICROS Standard Credit Card Payment Module](#)
  - [Configuring the Loadable PMS Payment Module](#)
  - [Configuring the Demo Payment](#)
  - [Setting the Front of House to Allow Pay at the Table](#)
  - [Configuring Email Receipts](#)

### Related Topics

- [Understanding Pay at the Table](#)

## Configuring the MICROS Standard Credit Card Payment Module

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Payments**.
2. Insert a record and name it based on the payment driver you are using (for example, MCreditDebit).
3. Double-click the record to open it.
4. Select **3 - DLL** from the **Content Type** drop-down list.
5. Click the **Import from a file** link.
6. Browse to [Drive Letter]:\MICROS\Simphony2\EgatewayService\handlers\Micros.Payment.MCreditDebit.dll, and then click **Open**.
7. Click the **Configuration** subtab.
8. From the Assembly/Class section, enter information in the following fields:

**Table 12-27 Assembly/Class Fields**

Field	Description
Module ID	Enter a description for the payment driver (for example, MicrosCreditDebitPaymentModuleStandard).
Description	Enter a description for the payment driver (for example, Micros Standard Credit/Debit Payment Driver).

9. From the Common Properties section, enter information in the following fields:

**Table 12-28 Common Properties Fields**

Field	Description
Allow Manual Authorization Credit Card	Select <b>True</b> for processors using the MICROS standard credit and debit payment driver. This field indicates whether manual authorization of credit cards is allowed.
Allow Partial Settlement On Batch	Select <b>False</b> for processors using the MICROS standard credit and debit payment driver.
Bank Identification Number	Enter the six-digit bank identification number provided by the bank or processor.
Batch Number	Enter a value between 1 and 9999 to indicate the next sequence number. The number increments by one each time a new batch is created, and resets to 1 after reaching 999.  The bank or processor assigns the value for this field and uses it to detect duplicate batches.

**Table 12-28 (Cont.) Common Properties Fields**

Field	Description
Do Not Batch	Select <b>False</b> for processors using the MICROS standard credit and debit payment driver. This field indicates whether batch creation and settlement occurs within Symphony.
Encrypt Data	Select <b>True</b> for processors using the MICROS standard credit and debit payment module.
Host Timeout	Enter the timeout value in seconds. Setting the value to 0 (zero) equals a 30-second timeout. Do not leave this field blank. Oracle recommends entering <b>60</b> .  This field applies only to Win32 devices. You cannot change the timeout from the default setting of 100 seconds on WinCE devices.
Merchant Number	Enter the merchant number provided by the bank or processor.
Offline Authorizations	Enter the number of offline card authorizations allowed before the application attempts to re-establish online communication.
Primary Host	Enter the URL of the payment provider application. As an example, this field should include something.receiving-url.com. For MerchantLink, enter <b>g1.merchantlink.com</b> .
Primary Host Port	Enter the port number used for the Primary Host. For MerchantLink, enter <b>443</b> .
Prompt for Manual Card Data Entry	Select <b>True</b> for processors using the VisaD driver. This field indicates whether workstation operators can manually enter a card number.
Retry Authorization Reversals On Batch	Select <b>False</b> for processors using the MICROS standard credit and debit payment module.
Run As Service	Select <b>False</b> for processors using the MICROS standard credit and debit payment module.
Store Number	Enter the 4-digit store identification number used to identify the merchant store. The bank or processor assigns the value for this field.
Terminal Number	Enter the workstation number at the merchant store.
Manual Card Data Entry Retries	Enter the number of times a workstation operator can attempt to manually enter a card number. Oracle Hospitality recommends entering <b>5</b> . The minimum value is <b>1</b> .
VisaQ Compatibility	Select <b>False</b> for processors using the MICROS standard credit and debit payment driver.

10. If you are using the VisaD driver, enter information in the VisaD Driver Specific section fields:

**Table 12-29 VisaD Driver Specific Fields**

Field	Description
Agent Bank Number	Enter a six-digit number that identifies the Agent Bank Number. This value identifies the agent of the acquirer which signed the merchant. The acquirer provides this value to the merchant.
Agent Chain Number	Enter a six-digit number that identifies the Agent Chain Number. This value identifies a specific chain of an agent organization. The merchant's bank or processor provides this number.
City Code	Enter the city code that identifies the merchant's location. Within the United States, enter the five- or nine-digit postal code of the merchant's address. In other countries, the bank or processor assigns the code.
Country Code	Select the country that identifies where the merchant is located. The bank or processor assigns the value for this field. The United States country code is 840.
Currency Code	Select the currency that the merchant uses. The bank or processor assigns the value for this field. The United States currency code is 840.
Enable Card Level Results	Select <b>True</b> to have the VisaD driver retrieve card-level results during authorization and return the data at settlement.
Enable POS Data Code	Select <b>True</b> to have the VisaD driver report the POS Data Code at authorization and settlement.
Include Exp Date And Extra Mag Card Data	Select <b>True</b> to include the expiration date and modified magnetic stripe reader data during settlement.
Industry Type	Select a value to identify the industry type to the merchant. The bank or processor assigns the value for this field.
Language Indicator	Enter the language in which Authorization Response messages should be returned to the workstation for display and printing. The bank or processor assigns the value for this field.
Max Batch Records	Enter the maximum number of records that can be transferred in one batch (for example, 9999). Some banks and driver types can support only a specific number of records during credit card settlement. When you enter 0 (zero), all records are processed in the same batch.
Merchant Category	Enter the four-digit number assigned by the bank or processor to identify the merchant type.
Merchant Location	Enter the merchant location or city name provided by the bank or processor. For auditing purposes, the Merchant Location should correspond to the location or city that prints on a credit card voucher.
Merchant Name	Enter the merchant's name. For auditing purposes, the Merchant Name should correspond to the name that prints on a credit card voucher.

**Table 12-29 (Cont.) VisaD Driver Specific Fields**

Field	Description
Merchant State	Enter the merchant's state or province code provided by the bank or processor. For auditing purposes, the Merchant State should correspond to the state or province code that prints on a credit card voucher.
Request URI	If applicable, enter the uniform resource identifier (URI) to use when sending VisaD messages to the processor. For MerchantLink, enter <b>/Micros/process_transaction.cgi</b> .
Secondary Host	Enter the URL of the secondary host. As an example, this field should include something.receiving-url.com. For MerchantLink, enter <b>g2.merchantlink.com</b> .
Secondary Host Port	Enter the port number used for the Secondary Host. For MerchantLink, enter <b>443</b> .
Send RFID Data	Select <b>True</b> to add RFID-related fields to the message. Some processors require this information to authorize and settle RFID transactions.
Time Zone	Select the code used to calculate the local time within the VisaNet Authorization System. The bank or processor assigns the value for this field.

**11. Click Save.**

- [Configuring a Credit Card Tender](#)
- [Configuring Credit Card Voucher Headers and Trailers](#)
- [Configuring the Room Tender](#)
- [Configuring the OPERA PMS Payment Driver](#)
- [Configuring the Loadable PMS Payment Module](#)
- [Configuring the Demo Payment](#)
- [Setting the Front of House to Allow Pay at the Table](#)
- [Configuring Email Receipts](#)

**Related Topics**

- [Understanding Pay at the Table](#)

## Configuring the Loadable PMS Payment Module

Configure a property management system (PMS) payment module for guests to charge meals to a hotel room using Oracle Hospitality OPERA version 5.0.04.01 and later.

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Payments**.
2. Insert a record and name it **LoadablePMS**.
3. Double-click the LoadablePMS record to open it.

4. Click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers\Micros.Payment.LoadablePmsModule.dll, and then click **Open**.
6. Click the **Configuration** subtab.
7. Select the **Module Functions** section.
8. Enter the **Configuration Number** for the Room Charge tender record.
9. Select **Payment** as the **Configuration Type**.
10. Click **Save**.

- [Configuring a Credit Card Tender](#)
- [Configuring Credit Card Voucher Headers and Trailers](#)
- [Configuring the Room Tender](#)
- [Configuring the OPERA PMS Payment Driver](#)
- [Configuring the MICROS Standard Credit Card Payment Module](#)
- [Configuring the Demo Payment](#)
- [Setting the Front of House to Allow Pay at the Table](#)
- [Configuring Email Receipts](#)

#### Related Topics

- [Understanding Pay at the Table](#)

## Configuring the Demo Payment

Sales executives can use demo mode to demonstrate PATT features to customers without needing a magnetic card or reader.

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Payments**.
2. Insert a record for demo payments (for example, Demo).
3. Double-click the record to open it.
4. Select **3 - DLL** from the **Content Type** drop-down list.
5. Click the **Import from a file** link.
6. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers\Micros.Payment.CreditDebit.dll, and then click **Open**.
7. Click **Save**.

- [Configuring a Credit Card Tender](#)
- [Configuring Credit Card Voucher Headers and Trailers](#)
- [Configuring the Room Tender](#)
- [Configuring the OPERA PMS Payment Driver](#)
- [Configuring the MICROS Standard Credit Card Payment Module](#)
- [Configuring the Loadable PMS Payment Module](#)

- [Setting the Front of House to Allow Pay at the Table](#)
- [Configuring Email Receipts](#)

#### Related Topics

- [Understanding Pay at the Table](#)

## Setting the Front of House to Allow Pay at the Table

Depending on the property's Pay at the Table (PATT) payment methods, you need to create the following PATT buttons for the Front of House page:

- **PATT Credit Card:** Create this button if the property allows credit card payments with PATT
  - **PATT Room Charge:** Create this button if the property allows room charges with PATT
1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
  2. Open the Front of House page on which to place PATT buttons.
  3. On the **Edit** tab, select the page area in which to define the PATT functions (typically the payment area).
  4. Click **Button**.
  5. On the **General** subtab, enter the button name in the **Legend** field.
  6. Select **Function** from the **Type** drop-down list.
  7. Click the black arrow directly beneath the **Type** drop-down list, and then select **Pay at the Table**.
  8. Highlight the PATT button.
  9. Click the **Pay at the Table Config** button.
  10. (Optional) Select **Enable Tip Screen**, and then enter the **Default Tip Percent** value. The tip percentage appears to the guest. To hide the tip screen from guests, deselect **Enable Tip Screen**.
  11. (Optional) Select **Enable Share Payment**, and then enter the **Default Share Payment** group sizes (for example, 2, 3, 4). This is the default number of people that can share the payment. (If a different number of people want to share payment, the guest can enter the number.) Deselect **Enable Share Payment** to prevent guests from sharing the check payment.
  12. (Optional) To use PATT in demonstration mode, select **Demo Payment**. This allows sales executives to demonstrate Pay at the Table features to clients without needing a magnetic card or reader. Deselect **Demo Payment** to use Pay at the Table live at a property.
  13. In the Select Payment Type area, select the payment type (for example, Credit Card or OPERA) from the **Payment Type** drop-down list.
  14. Click the **Edit Command** link in the Command column.
  15. From the Payment Configuration dialog, select the appropriate payment method from the **Type** drop-down list.



- Click **Edit...**, and then enter the appropriate **Command**. The following table lists the Types and associated Commands.

**Table 12-30 PATT Payment Methods**

Type	Command
Credit Card	<b>CreditDebit:MCreditDebit:</b> MICROS standard credit and debit drivers for credit card charges
Credit Card Other	<b>CreditDebit:Loadable:</b> Loadable credit and debit drivers for credit card charges
Opera	<b>Other1:LoadablePms:</b> Loadable property management system driver for room charges

- If the payment type is a credit card, select **CreditAuthAndPay** from the **Functions** drop-down list, and then click **OK**.
- Position and size the button on the page. Use the Style arrow to change the color.
- Click **Save**.
- Repeat Steps 1 through 18 for each PATT button.

- [Configuring a Credit Card Tender](#)
- [Configuring Credit Card Voucher Headers and Trailers](#)
- [Configuring the Room Tender](#)
- [Configuring the OPERA PMS Payment Driver](#)
- [Configuring the MICROS Standard Credit Card Payment Module](#)
- [Configuring the Loadable PMS Payment Module](#)
- [Configuring the Demo Payment](#)
- [Configuring Email Receipts](#)

**Related Topics**

- [Understanding Pay at the Table](#)

## Configuring Email Receipts

- Select the property, click **Setup**, and then click **Property Parameters**.
- On the **General** tab, click the **Primary SMTP Server** subtab.
- Enter information in the fields as described in the following table:

**Table 12-31 Email Receipt Fields**

Field	Description
Server	Enter the email server or service to use. Click <b>Select</b> to choose from the SMTP Server list of commonly used mail servers (for example, Outlook, Gmail, or Yahoo).

**Table 12-31 (Cont.) Email Receipt Fields**

Field	Description
Port	Enter the port number for the SMTP email server. A default port of 587 works for most SMTP servers.
SSL	Select this option to require secure Internet communication.
User Name	Enter the user name of the email address that will send receipts.
Password, Confirm Password	Enter the password associated with the email user name.
Source Email	Enter the full email address to appear as the sender in the emailed receipt. Depending on the SMTP server, this may not create a copy of emails sent.
Name	Enter the business name or name to appear along with the email in the sender field. Depending on the SMTP server, this value may or may not appear in the sent email (for example, Username = jsmith Name = John could appear as: John<jsmith@oracle.com>).
BCC List	Enter the email addresses to receive a blind carbon copy of the email receipt that is sent to the guest. Oracle recommends that you list the source email in the BCC field so you can resend copies of email receipts later if necessary.
Send Test Email	After saving the information entered in the fields, send a test email receipt message to the source email address. A confirmation appears after the email is successfully sent.

4. Click the **Backup SMTP Server** subtab.
5. Configure the Backup SMTP Server with the same settings as the Primary SMTP Server or an alternate server from which to send emails in the event the primary server becomes unavailable.
6. Click the **Text Formatting** subtab, and then enter information in the following fields:
  - **Email Subject:** Enter text in rich text format to appear as the subject line of email receipts.
  - **Email Body:** Enter text in rich text format to appear as the body of email receipts. You must include @@Check in the body in order to send a copy of the receipt.
7. Click the **HTML Formatting** subtab, and then enter information in the following fields:
  - **Email Subject:** Enter text in HTML format as the subject line of email receipts.
  - **Email Body:** Enter text in HTML format as the body of email receipts. You must include @@Check in the body in order to send a copy of the receipt.

8. Select the **Send Html Email** check box to dim the Text Formatting tab and send only HTML format. Deselect this option to dim the HTML Formatting tab and send only the text formatted email.

9. Click **Save**.

- [Configuring a Credit Card Tender](#)
- [Configuring Credit Card Voucher Headers and Trailers](#)
- [Configuring the Room Tender](#)
- [Configuring the OPERA PMS Payment Driver](#)
- [Configuring the MICROS Standard Credit Card Payment Module](#)
- [Configuring the Loadable PMS Payment Module](#)
- [Configuring the Demo Payment](#)
- [Setting the Front of House to Allow Pay at the Table](#)

#### Related Topics

- [Understanding Pay at the Table](#)

## Understanding Autosequence Events

You can set up automatic event tasks, such as running Start of Day (SOD) and nightly credit card batching, using the PC Autosequence feature. After you create an automatic event, you can schedule it to run repeatedly at specific frequencies or time intervals.

To set up an automatic event, you must configure the Autosequence Event and the Autosequence Event Schedule.

#### Related Topics

- [Configuring Autosequence Events](#)
- [Configuring the Autosequence Event Schedule](#)

## Configuring Autosequence Events

1. Select the Enterprise level, click **Configuration**, and then click **PC Autosequences**.
2. Insert a record for the autosequence event (for example, Nightly Batch). If the autosequence event record exists, skip this step.
3. Double-click the record to open it.
4. On the **General** tab, select each **Property** to include in the autosequence event run.
5. (Optional) Select the employee group that is allowed to run the autosequence event from the **Privilege Group** drop-down list.
6. (Optional) To restrict execution of the autosequence event, click the **Add** link from the Parameters section, and then add optional parameters.
7. Click the **Steps** tab.

8. Beneath the Steps section, click the **Add** link to add the first step of the autosequence event.
9. From the Step Parameters section, select the **Step Type** from the drop-down list.
10. Repeat Steps 9 and 10 to add each step required to run the autosequence event.
11. Select the outcome for each step:
  - **Step on Success:** Select the step number to occur next if a step succeeds. For example, after Step 1 runs successfully, proceed to Step 2.
  - **Step on Failure:** Select the step number to occur next if a step fails. For example, if Step 1 fails, do not proceed with any steps.
12. Click **Save**.

- [Configuring the Autosequence Event Schedule](#)

#### Related Topics

- [Understanding Autosequence Events](#)

## Configuring the Autosequence Event Schedule

1. Select the Enterprise level, click **Configuration**, and then click **PC Autosequence Schedules**.
2. Insert a record for the autosequence schedule (for example, Nightly Batch). If the autosequence schedule record exists, skip this step.
3. Double-click the record to open it.
4. On the **General** tab, enter information in the following fields:

**Table 12-32 General Settings Fields**

Field	Description
Autosequence	Select the autosequence event from the drop-down list.
Server Name	Enter the name of the server located at the Enterprise level or Hosting Center.
Time Zone	Select the time zone of the Enterprise level or Hosting Center.
Schedule Type	Select the frequency for the autosequence event.
Duration	Select <b>Enabled</b> for the autosequence event to run. Select the <b>Start</b> and <b>End dates</b> for the autosequence event.

5. Click the **Recurrence** tab.
6. From the **Daily** section, enter the number of days for the autosequence event to reoccur. For example, to run the event daily, set this value to Every 1 day(s).
7. From the **Daily Frequency** section, set the time or times for the autosequence event to run.

8. Click **Save**.

- [Configuring Autosequence Events](#)

**Related Topics**

- [Understanding Autosequence Events](#)

# 13

## Taxes

A tax is a sum of money imposed by a government, levied upon prepared food and beverages sold in a restaurant. The following table explains the Symphony methods of taxation:

**Table 13-1 Tax Methods**

Tax Method	Description
Value Added Tax (VAT)	<p>A VAT is a form of sales tax used in some countries. VAT is an inclusive tax, which means the tax is included in the menu item price. The global tax type can be set as European or United States. A VAT is calculated differently, depending on the global setting. In Europe, only inclusive type tax is calculated. In the United States, inclusive type tax and add-on type tax can be used at the same time.</p> <p>VAT inclusive taxes are broken out from sales totals on financial related reports (for example, Revenue Center Financial Report or System Financial Report), with the inclusive tax reflected in the Tax Collected totals field.</p> <p>If your property uses VAT, the following Reporting and Analytics templates can be applied for the Open/Closed Check reports:</p> <ul style="list-style-type: none"> <li>• EAME_MMRevCtrOpenChecks_VAT</li> <li>• EAME_MMRevCtrClosedChecks_VAT</li> </ul>
U.S. Inclusive Tax	<p>U.S. inclusive tax uses the item price and a percent value to calculate the tax amount. The tax is then included in the price of each menu item not added to the bill. For example, if the tax rate is 5% and the item price is \$5.00, the inclusive tax method calculates by the formula: <math>\\$5.00/(1+5\%) = \\$4.76</math>. The total cost for the customer remains \$5.00, but the net sales price is \$4.76 and the tax is \$0.24. If U.S. inclusive tax is used, only one inclusive tax rate can be applied to a menu item.</p> <p>U.S. inclusive taxes do not appear on the Open Check Report in Reporting and Analytics, and do not print on Open/Closed Check reports.</p> <p>Additionally, inclusive taxes are broken out from net sales totals on financial related reports (for example, Revenue Center Financial Report or System Financial Report), with the inclusive tax reflected in the Tax Collected totals field.</p>
Add-on Tax	<p>Add-on tax uses the item price to calculate tax, which is then added to the bill. For example, if the tax rate is 5% and the item is \$5.00, the application calculates 5% of \$5.00, posting \$0.25 tax to the check and making the total due of \$5.25.</p>

**Table 13-1 (Cont.) Tax Methods**

Tax Method	Description
Breakpoint or Threshold Tax	Breakpoints establish the points at which an increase of one cent in sales increases tax by one cent. For example, a breakpoint tax might be one percent for sales from zero to twenty cents and then two percent from twenty-one to forty cents. Twenty cents would be the breakpoint for this tax.

- [Understanding Tax Rates and Tax Classes](#)
- [Configuring Tax Rates and Classes](#)
- [Tax Parameters](#)  
The Tax Parameters module enables you to configure options related to taxes. You can configure the Tax Parameters module at the Property, Zone, or Revenue Center levels.
- [Configuring Tax Parameters](#)
- [Understanding Serving Periods](#)
- [Configuring a Serving Period](#)
- [Understanding Order Types](#)
- [Configuring Order Types](#)
- [Configuring Order Types as Subtotal Keys](#)
- [Understanding Tax Labels](#)
- [Configuring Tax Labels](#)
- [Printing Tax Rate Per Item](#)
- [Configuring Tax Rates Per Item to Print on Guest Check, Customer Receipt and Journal](#)
- [Configuring Workstation Number and Transaction Number to Print on Guest Check, Customer Receipt, and Journal](#)
- [Surcharges](#)
- [Configuring Surcharges](#)

## Understanding Tax Rates and Tax Classes

Simphony uses two tax handling files to assign taxes to menu items, discounts, and service charges:

- Tax Rates
- Tax Classes

A tax class is a collection of tax rates. Tax classes determine the tax rates that apply to menu items and service charges, and which tax rates can be reduced by discounts. A tax class can have up to 64 active tax rates, but typically a single tax class has one to three tax rates. By grouping multiple tax rates into a single tax class, you can easily see a record named Food Tax in other EMC modules without wondering which tax rates are active.

You can associate a tax class with the following types of records:

- **Menu Item Class:** All menu item definitions in the menu item class are taxed using the tax class
- **Discount:** Specific tax rates can receive a discount when a menu item is discounted
- **Service Charge:** Specific types of services charges are taxed, such as banquet and room service transactions

In some jurisdictions, multiple tax rates apply to food items. Usually these tax rates must be calculated separately for accounting purposes (allowing each jurisdictional government to collect the appropriate tax amount). Generally a restaurant must pay taxes to both the state and the city:

- State – 5% tax
- City – 2% tax

In this example, both the state and city tax rates are active for the Food tax class. The total tax for a food item would be 7%.

For customer convenience, bars often use inclusive taxes. In some properties with multiple revenue centers, it is common that a bar revenue center uses inclusive taxes while a restaurant revenue center uses add-on taxes, even though both revenue centers serve the same items. In this scenario, the configuration of a Liquor tax class might be:

- Inclusive tax rate – 5%
- Add-on tax rate – 5%

Using this scenario, you can set either order types or serving periods to have the appropriate tax rates in the revenue centers. The following table shows an example configuration using Order Types:

**Table 13-2 Example of Inclusive Tax with Multiple Revenue Centers**

Revenue Center	Order Type Tax Configuration
Bar	<ul style="list-style-type: none"> <li>• Inclusive tax rate enabled</li> <li>• Add-on tax rate disabled</li> </ul>
Restaurant	<ul style="list-style-type: none"> <li>• Inclusive tax rate disabled</li> <li>• Add-on tax rate enabled</li> </ul>

**Related Topics**

- [Configuring Tax Rates and Classes](#)

## Configuring Tax Rates and Classes

1. Select the Enterprise, property, or zone, click **Setup**, and then click **Tax Rates**.
2. Locate the appropriate tax rate. There are 64 active tax rates.
3. Select the tax rate type from the **Type** drop-down list. The following table describes the tax types:



**Table 13-3 Tax Types**

Type	Description
0 - Disabled Tax Rate	Select this option if the tax rate is not used.
1 - Add On, Breakpoint	Select this option to calculate the add-on tax using the Breakpoint method.
2 - Add On, Percentage	Select this option to calculate the add-on tax using the tax percentage rate.
3 - Included, Percentage	Select this option to calculate the inclusive tax using the tax percentage rate to determine what portion of the sales price is the tax. The inclusive tax applies differently depending on the global VAT (European or United States).  Because the tax is included in the price, the tax is backed out of gross sales on reports.
4 - Surcharge	Select this option to calculate surcharges for items.

4. Click **Save**.
5. Select the Enterprise, property, or zone, click **Setup**, and then click **Tax Classes**.
6. Insert a tax class record with the appropriate name (for example, Soda Tax, Liquor Tax, or Surcharge).
7. From the **Taxes Enabled** field, select the applicable tax rates, and then click **OK**. The tax rates you select are active for the tax class.
8. Click **Save**.

**Related Topics**

- [Understanding Tax Rates and Tax Classes](#)

## Tax Parameters

The Tax Parameters module enables you to configure options related to taxes. You can configure the Tax Parameters module at the Property, Zone, or Revenue Center levels.

**Table 13-4 Tax Parameters International Options**

International Options	Description
1 – ON = Apply Tax as Add-On; OFF = Apply Tax as VAT	Select this option to treat taxes as add-on. Deselect this option to treat taxes as a value added tax (VAT). If you enable VAT, all tax rates in use must be type <b>Included, Percentage</b> .

**Table 13-4 (Cont.) Tax Parameters International Options**

International Options	Description
3 - Print Tax Itemizers	Select this option to print tax itemizers on guest checks and receipts. An itemizer is considered a bucket that holds the sale amount of all items taxed at a specific rate. At the end of a transaction, the tax is applied to the subtotal of all items in the bucket. Menu Item Classes are linked to Tax Classes, which in turn, are linked to Tax Rates 1-64. When you link to a tax rate, you are in effect, creating an itemizer bucket for that item. You must enable this option for Philippine tax.
4 - Enable Canadian GST	Select this option to enable Canadian Goods and Services Tax (GST).
6 - Enable Thailand Tax Printing	Select this option to enable Thai tax options.
13 - Truncate Inclusive Taxes	This option applies to all inclusive tax calculations. It determines whether the inclusive tax amount that is calculated is rounded or truncated. For example, if a currency has two decimal places and the tax calculated is 12.005, the rounded tax is 12.01, but the truncated tax is 12.00.
14 - Print Item Inclusive Tax Total	If the check contains items with inclusive taxes, this option enables the total inclusive tax to print on the guest check. The line prints according to Tax Parameters option [4 - Print Inclusive Tax Totals when 0.00]. The inclusive tax amount is the sum of the inclusive taxes for each item on the check. You must also select Tender/Media options [21 - Print Summary Totals] and [24 - Print Inclusive Tax or VAT Lines on Check or Receipt] for the inclusive tax totals to print.
15 - Print Check Inclusive Tax Total	If the check contains items with inclusive taxes, this option enables the total inclusive tax to print on the guest check. The line prints according to Tax Parameters option [4 - Print Inclusive Tax Totals when 0.00]. The inclusive tax amount is calculated on the total sales for each tax rate. You must also select Tender/Media options [21 - Print Summary Totals] and [24 - Print Inclusive Tax or VAT Lines on Check or Receipt] for the inclusive tax totals to print.
16 - Print Tax Rate per item	Select to print the applied tax rates for each menu item on guest checks, customer receipts, and the journal.
17 - Enable Tax labels	Select to consolidate tax reporting information based on the defined Tax Labels configured under Tax Rates.

**Table 13-5 Tax Parameters Options**

Options	Description
1 - Do Not Include Tax in Totals on Tip Reports	Select this option to prevent a transaction's calculated tax amount from posting to the gross receipts and charged receipts totals on tip reports.
2 - Require a Reference Entry with Tax Exemptions	Select this option to require operators to enter a reference entry when using an exempt tax function key.
3 - Print VAT Lines Before Summary Totals	Select this option to print VAT lines before summary totals on guest checks and customer receipts.
4 - Always Print VAT Lines Even if 0.00	Select this option to print VAT lines on guest checks and customer receipts even if the calculated tax due is 0.00.
5 - Print Consolidated VAT Line on Checks and Customer Receipts	Select this option to print a consolidated VAT line. If you use this option in conjunction with individual VAT line printing, the consolidated line prints last.
6 - Print VAT Net Totals on Guest Checks and Customer Receipts	Select this option to print a VAT Net Totals line on guest checks and customer receipts.
7 - Print Tax Exempt Voucher	Select this option to print a voucher when any tax is exempted. The voucher prints when a tax exempt function key or a tender exempts tax. The voucher prints at the validation printer designated for the workstation. Deselect this option to suppress printing of a tax exempt voucher.
8 - Post Taxable Sales When the Tax Rate is Zero	Select this option to have taxable sales post to the TAX_DAILY_TOTAL table in Reporting and Analytics when the tax rate is set to 0.00%. The taxable amounts can be used for reporting even though there are no applied taxes. Deselect this option so that taxable sales do NOT post to Reporting and Analytics when the tax rate is set to 0.00%.

## Configuring Tax Parameters

1. From EMC, select the Property, Zone, or Revenue Center, click the Setup tab, under Taxes and Order Types, and then click **Tax Parameters**.
2. Click the **International Options** tab and enable the options that you want to apply and **Save**.
3. Click the **Options** tab and enable the options that you want to apply and **Save**.
4. Select the **VAT Options** to set printing lines for the appropriate tax rates and **Save**.

## Understanding Serving Periods

A serving period is a time period during the business day in one revenue center. The following examples illustrate serving periods:

- Breakfast (5:00 a.m. to 11:00 a.m.)
- Lunch (11:00 a.m. to 5:00 p.m.)
- Dinner (5:00 p.m. to 10:00 p.m.)

You can run sales reports for serving periods, include the active serving period in interface posting messages, and use serving periods on the default transaction screen.

### Related Topics

- [Configuring a Serving Period](#)

## Configuring a Serving Period

1. Select the revenue center, click **Configuration**, and then click **Serving Periods**.
2. Insert a record and name it for the serving period.
3. Select the serving period **Start Time** and the **End Time**. If the serving period lasts all day, use the same start and end times.
4. In the **Table Count** field, enter the number of tables available during the serving period.
5. Select the days of the week when the serving period is active.
6. Select the **Default Transaction Touchscreen** to use when the serving period is active.
7. If you are using the Mobile MICROS workstation, select the **MMH Default Transaction Touchscreen** to use when the serving period is active.
8. Select the **Default Main Level** to use when the serving period is active.
9. Select the **Default Sub Level** to use when the serving period is active.
10. Click the **Taxes** tab.
11. Select the tax rates to use when the serving period is active.
12. Click **Save**.

### Related Topics

- [Understanding Serving Periods](#)

## Understanding Order Types

An order type is a menu item sales category, such as Dine In or Take Out. You can set up to eight order types for each location. Order types control active tax rates for a transaction and prevent theft in fast transaction environments. The following table describes the three order type classes in Symphony:

**Table 13-6 Order Types**

<b>Order Type</b>	<b>Description</b>
Transaction Order Type	This is the order type of the current round. If the workstation operator changes the transaction order type, the order type of all menu items in the current round changes to the selected order type while the order type of the check remains unaffected. A reference entry with the name of the changed order type appears at the top of the menu items.
Check Order Type	The check order type appears in the check detail header. If you select <b>16 - Post to Check Order Type</b> from the RVC Parameters module Posting options, menu item sales post to the check order type. Otherwise, menu item sales post to the overridden order type.
Menu Item Order Type	This is the order type of the menu item and also affects the condiments of the menu item. The workstation operator can change the order type of an entire combo meal or selected items in a combo meal. A reference entry appears with the name of the order type beneath the menu item to which the change was made. If the workstation operator consolidates menu items, changing the menu item order type affects all consolidated items. When the workstation operator changes a condiment order type, it applies to the parent menu item.

#### **Order Type Subtotal Security Option**

In a fast transaction environment, you can increase security and prevent theft by restricting the workstation operators' ability to perform voids and cancel transactions, while still allowing operators to perform legitimate error corrections. Symphony allows you to suppress the check total on the workstation until the workstation operator presses a subtotal key. The following table describes the type of theft that can be prevented using the subtotal security.

**Table 13-7 Subtotal Restriction Scenarios**

No Order Type Subtotal Keys	Using Order Type Subtotal Keys
<ul style="list-style-type: none"> <li>• Workstation operator begins transaction.</li> <li>• Customer orders hamburger and soda.</li> <li>• Workstation operator sees the total as \$4.78 and requests the payment amount from the customer.</li> <li>• The customer gives \$4.78 in cash.</li> <li>• Workstation operator pockets the cash and voids the items or cancels the transaction.</li> </ul>	<ul style="list-style-type: none"> <li>• Workstation operator begins transaction.</li> <li>• Customer orders hamburger and soda.</li> <li>• Workstation operator does not see the total amount due, and must press one of the <b>Order Type</b> function keys to view the subtotal.</li> <li>• The customer gives \$4.78 in cash.</li> <li>• Workstation operator cannot void items or cancel the transaction after pressing the <b>Order Type</b> key. After pressing the <b>Order Type</b> key, the items ordered are considered previous-round items for voiding purposes. Typically, only managers can perform previous-round voids.</li> </ul> <p>If the workstation operator adds another menu item after pressing the <b>Order Type</b> key, the check summary is blank. The workstation operator can perform error corrections on items that were ordered since the Order Type key was pressed, but cannot perform error corrections on items before the Order Type declaration.</p>

**Related Topics**

- [Configuring Order Types](#)
- [Configuring Order Types as Subtotal Keys](#)

## Configuring Order Types

1. Select the Enterprise, property, or zone, click **Descriptors**, and then click **Order Types**.
2. In the **Text** field, enter an order type for each record (for example, Dine In, Take Out, Drive Thru).
3. Click **Save**.
4. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Order Type Parameters**.
5. For each order type record, select the appropriate options as described in the following table:

**Table 13-8 Order Type Options**

Option	Description
1 - Print on Customer Receipt and Guest Check	Select this option to print the order type name on customer receipts and guest checks.

**Table 13-8 (Cont.) Order Type Options**

Option	Description
2 - Print on Order Printer	Select this option to print the order type name on order printers.
4 - Do Not Post Transactions to Tip Report Totals	Select this option to hide sales for the order type from Tip Report Totals.
5 - Perform Auto Combo Recognition	Select this option to have workstations automatically perform auto combo recognition when the workstation operator changes the workstation to the order type.
6 - Transaction Cancel Default	Select this option when starting orders without an order type.  When a workstation operator begins a transaction and cancels it before selecting an order type, the POS client requires the workstation operator to associate the check with an order type for posting purposes. The POS client finds the first order type that has this option selected and uses it.  Deselect this option to have the POS client use the first order type record in the list to associate with the check.
8 - Enable Routing Order by Order Type	Select this option to control order routing by the order type. The workstation order devices must be set for all possibilities and use this as an override to disable order devices.

6. Click the ellipsis point (...) button in the **Tax Mask** column, select the appropriate tax rates for the order type record, and then click **OK**.
7. Select **Active** for each order type that you want to activate.
8. Click **Save**.
9. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
10. Select the **Default Order Type** from the drop-down list. This is the order type that is active when a workstation operator begins a check.
11. Click **Save**.
12. To override the default order type setting for a workstation:
  - a. Select the property, click **Setup**, and then click **Workstations**.
  - b. Click the **Transactions** tab.
  - c. Select the **Default Order Type** from the drop-down list.
  - d. Click **Save**.

- [Configuring Order Types as Subtotal Keys](#)

**Related Topics**

- [Understanding Order Types](#)

## Configuring Order Types as Subtotal Keys

You can allow the Order Type keys in the revenue center to act as Subtotal keys.

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Control Parameters**.
2. Click the **Options** tab.
3. If you do not want summary subtotals (subtotal, tax, amount due, and change due) to appear on the workstation until the workstation operator presses an **Order Type** key, select **8 - Display Summary Totals Only After Order Type Declared**.

After pressing the Order Type key, the items ordered are considered previous-round items for voiding purposes. This is a security option to prevent fast transaction operators from voiding items after viewing the check subtotal.

4. Click **Save**.

- [Configuring Order Types](#)

#### Related Topics

- [Understanding Order Types](#)

## Understanding Tax Labels

Setting tax labels allows you to perform the following actions:

- Define up to two tax labels and associate each of them with a specific tax rate
- Associate multiple tax rates with the same tax labels
- Associate a blank tax label with tax exempt items (considered non-value-added tax (VAT))

#### Related Topics

- [Configuring Tax Labels](#)

## Configuring Tax Labels

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Tax Parameters**.
2. Click the **International Options** tab.
3. Select **17 - Enable Tax Labels**.
4. Click the **Options** tab.
5. To print items with a 0% tax rate on guest checks, select **8 - Post Taxable Sales when Tax Rate is Zero**.
6. Click **Save**.

#### Related Topics

- [Understanding Tax Labels](#)

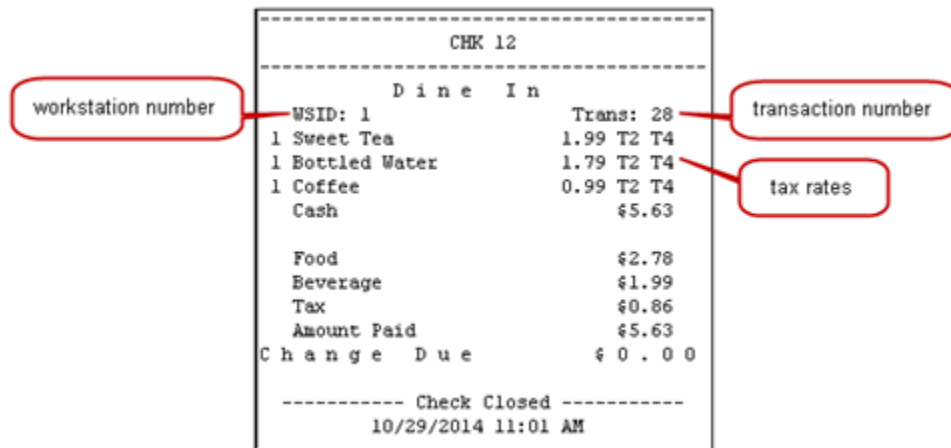
## Printing Tax Rate Per Item

You can set a menu item's tax rate to print on the header of guest checks and customer receipts, and in the journal. The following diagram illustrates a sample



customer receipt printed with the tax rates for each menu item, workstation number and transaction number.

**Figure 13-1 Sample Customer Receipt with Tax Rates**



#### Related Topics

- [Configuring Tax Rates Per Item to Print on Guest Check, Customer Receipt and Journal](#)
- [Configuring Workstation Number and Transaction Number to Print on Guest Check, Customer Receipt, and Journal](#)

## Configuring Tax Rates Per Item to Print on Guest Check, Customer Receipt and Journal

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Tax Parameters**.
2. Click the **International Options** tab.
3. Select **16 - Print Tax Rate per item** to print tax rates associated with the menu item class on the header of guest checks and customer receipts. Deselect this option if you do not want the tax rates to print on the guest check, customer receipt, or journal.

For example, the line item for a BLT on the printed check appears as follows:

1 BLT 5.99 T2 T4

The guest check and customer receipt indicate the tax rate applied to each item. The T2 and T4 shown after the item's price indicate that tax rates 2 and 4 were applied to a BLT.

4. Click **Save**.
- [Configuring Workstation Number and Transaction Number to Print on Guest Check, Customer Receipt, and Journal](#)

**Related Topics**

- [Printing Tax Rate Per Item](#)

## Configuring Workstation Number and Transaction Number to Print on Guest Check, Customer Receipt, and Journal

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Format Parameters**.
  2. Click the **Options** tab.
  3. Select the appropriate workstation and transaction options. These options work independently of each other; you can set one, both, or none.
    - **54 - Print Workstation Number:** Select this option to print the workstation number on the header of guest checks and customer receipts, and in the journal.
    - **55 - Print Transaction Number:** Select this option to print the transaction number on the header of guest checks and customer receipts, and in the journal. The journal header does not contain the legacy transaction number (labeled TRN).
  4. Click **Save**.
- [Configuring Tax Rates Per Item to Print on Guest Check, Customer Receipt and Journal](#)

**Related Topics**

- [Printing Tax Rate Per Item](#)

## Surcharges

A surcharge is an extra fee applied to a guest check total to cover various restaurant costs. For example, a restaurant might charge a fee to cover the cost of credit card payment processing. Many restaurants impose a surcharge for parties of more than six or eight people. Some cities charge a sugar tax for beverages that contain added sugar, such as carbonated soft drinks, sports drinks, and energy drinks.

**Related Topics**

- [Configuring Surcharges](#)

## Configuring Surcharges

1. Create a surcharge tax rate:
  - a. Select the Enterprise, property, or zone, click **Setup**, and then click **Tax Rates**.
  - b. Insert a record and name it for the surcharge.
  - c. Select the **4 - Surcharge** tax rate type from the **Type** drop-down list.
  - d. Click **Save**.
2. Create a surcharge tax class:

- a. Select the Enterprise, property, or zone, click **Setup**, and then click **Tax Classes**.
  - b. Insert a tax class record and name it for the surcharge.
  - c. From the **Taxes Enabled** field, select the surcharge tax rate, and then click **OK**.
  - d. Click **Save**.
3. Configure the Tax Mask:
- a. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Order Type Parameters**.
  - b. Click the ellipsis point (...) button in the **Tax Mask** column, select the surcharge tax rate for the order type, and then click **OK**.
  - c. Ensure that **Active** is enabled for the order type with the surcharge tax rate.
  - d. Click **Save**.
4. Configure the serving period for the tax rate:
- a. Select the revenue center, click **Configuration**, and then click **Serving Periods**.
  - b. Insert a record and enter the serving period name, or select an existing serving period.
  - c. On the **Taxes** tab, select the surcharge tax rate
  - d. Click **Save**.
5. Change the Menu Item Class to the surcharge tax class:
- a. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Classes**.
  - b. Double-click the menu item class.
  - c. On the **General** tab, select the surcharge tax class from the **Tax Class** drop-down list.
  - d. Click **Save**.
6. Configure the surcharge for the Menu Item Definition record:
- a. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
  - b. Double-click the menu item master record corresponding to the definition to open it.
  - c. Click the **General** tab, and then enter the surcharge for the menu item in the **Surcharge** field.
  - d. Click **Save**.

#### Related Topics

- [Surcharges](#)

# 14

## Discounts

You can activate a discount using the methods described in the following table:

**Table 14-1 Discount Methods**

Discount Method	Description
Manual	A workstation operator manually applies a discount to a check by pressing a discount key. This is a traditional discount method.
Automatic	A workstation applies an automatic discount when the transaction meets certain criteria. As a workstation operator adds menu items to the guest check, the discount engine detects items that trigger a discount, and then applies the award amount to the check.
Coupon	<p>An automatic coupon discount is an automatic discount with one difference: the workstation operator must first apply the discount (coupon) to the guest check, alerting the discount engine that the discount is available for the check.</p> <p>Coupon discounts do not require trigger menu items on the transaction when entering the coupon. The coupon discounts the check if trigger menu items are added before or after the coupon is entered. The coupon is applied only when the menu items are ordered and it is not excluded by the presence of a better deal.</p>
Combination Pricing	A combination pricing discount is a type of automatic discount or automatic coupon discount that allows a property to charge a single price for multiple items when they appear on a check at the same time. Restaurants use this type of discount in combo meal scenarios such as Burger, Fries, and Soda are \$3.25. <a href="#">Configuring a Combination Pricing Discount</a> contains instructions to set up combination pricing discounts.

The discount engine within the POS client automatically performs the following actions:

- Detects the presence of discountable menu items on a transaction.
- Applies the discounts to the transaction.
- [Manual Discounts](#)
- [Automatic Discounts](#)
- [Understanding Automatic Discount Rules](#)
- [Understanding Awarding Algorithms](#)
- [Discount Award Types](#)
- [Discount Exclusivity](#)

- [Simple Exclusivity](#)
- [Group Exclusivity](#)
- [Menu Item Groups](#)
- [Configuring Menu Item Groups](#)
- [Configuring Discount Privileges](#)
- [Configuring Discounts](#)
- [Configuring Effectivity Groups](#)
- [Understanding Automatic Discounts with Decimal Quantity Menu Items](#)
- [Amount Off Examples](#)
- [Amount Substitution Examples](#)
- [Configuring Decimal Quantity Menu Items](#)
- [Configuring an Item Price Substitution Discount](#)
- [Configuring a Quantity Threshold Discount](#)
- [Configuring a Total Price Threshold Discount](#)
- [Configuring a Combination Pricing Discount](#)
- [Configuring a Sales Price Discount](#)
- [Discounts With Condiments](#)
- [Configuring Condiments as Discount Triggers](#)
- [Configuring Discounts for Parent Menu Items in a Menu Item Class](#)
- [Configuring a Condiment as the Discount Award](#)
- [Creating the Discount Button](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)

## Manual Discounts

Workstation operators can manually apply a discount to a transaction. You can configure manual discounts as:

- Subtotal discounts
- Item discounts

### **Subtotal Discounts**

All discounts are subtotal discounts by default. That is, the discount applies to all items on a check that belongs to a menu item group or itemizer group affected by the discount. Subtotal discounts are item discounts that apply to multiple items. The amount of a subtotal discount is allotted to all items to which the discount applies. For example, a \$3.00 discount that applies to two items will discount each item by \$1.50. Workstation operators can add a subtotal discount any time during the transaction, and the subtotal discount is applied to all trigger items that are already on the check. New items added after applying the discount are not discounted.

## Item Discounts

An item discount applies to only one item. Item discounts apply to any menu item that belongs to a Menu Item Class with option **7 - Item Discounts May Be Applied to these Menu Items** set. Discount Itemizers and Menu Item Groups are not applicable for item discounts. Workstation operators must add an item discount immediately after adding the menu item to discount.

# Automatic Discounts

The workstation automatically applies discounts to a guest check based on conditions within the transaction and without workstation operator interaction. For example, a property may run a promotional sale: buy one DVD and receive one CD for free. In this situation, whenever both a CD and a DVD appear on a single transaction, a 100% discount applies to the CD. There are several automatic discount types. This scenario is just one example of an automatic discount configuration.

Automatic discounts and automatic coupon discounts use the following Menu Item Groups to determine which items receive a discount:

- **Trigger Menu Item Group:** Trigger menu items are the menu items that trigger a discount. A trigger menu item group contains at least one item that initiates a discount. For example, in a Buy a DVD, get a CD example, the DVD is in the trigger menu item group.
- **Award Menu Item Group:** An award menu item group contains at least one item to receive a discount. For example, in the Buy a DVD, get a CD example, the CD is in the award menu item group.

A menu item can be in both the trigger and award groups.

Symphony uses several other factors to determine the automatic discount amount:

- [Automatic Discount Rules](#)
- [Awarding Algorithms](#)
- [Discount Award Types](#)
- [Discount Exclusivity](#)
  
- [Understanding Automatic Discount Rules](#)
- [Understanding Awarding Algorithms](#)
- [Discount Award Types](#)
- [Discount Exclusivity](#)
- [Simple Exclusivity](#)
- [Group Exclusivity](#)

## Related Topics

- [Configuring Discount Privileges](#)
- [Configuring Discounts](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)
- [Understanding Automatic Discounts with Decimal Quantity Menu Items](#)

- [Amount Off Examples](#)
- [Amount Substitution Examples](#)

**Related Topics**

- [Configuring Decimal Quantity Menu Items](#)
- [Configuring an Item Price Substitution Discount](#)
- [Configuring a Quantity Threshold Discount](#)
- [Configuring a Total Price Threshold Discount](#)
- [Configuring a Combination Pricing Discount](#)
- [Configuring a Sales Price Discount](#)

## Understanding Automatic Discount Rules

Various algorithms (known as Automatic Discount Rules) determine how Symphony calculates a discount. The following table explains the Automatic Discount Rules:

**Table 14-2 Automatic Discount Rules**

Automatic Discount Rule	Description
Item Price Substitution	<p>The discount is applied when the <b>Minimum Quantity</b> has been satisfied. If the <b>Minimum Quantity</b> is not met, the normal item price applies. When the <b>Minimum Quantity</b> is set to 1, the <b>Max Count</b> is equal to the number of the number of items awarded. When the <b>Minimum Quantity</b> is set to a value greater than 1, the <b>Max Count</b> field applies to groups of awarded menu items. When set, the <b>Max Count</b> field affects which items get the reward. A value of 0 indicates that the discount applies to an unlimited number of items.</p> <p>This discount rule is used in scenarios such as:</p> <ul style="list-style-type: none"> <li>• All Beverages are half-price on Tuesday</li> <li>• If you order three or more hamburgers, they are 20% off</li> <li>• Candy bars are 10% off</li> <li>• Candy bars are 50 cents off</li> <li>• Candy bars are \$1 each</li> </ul> <p>The Item Price Substitution discount rule is more complex than the Sales Price rule.</p>
Quantity Threshold	<p>Use a Quantity Threshold discount when the number of items added triggers a discount, and the awarded items are different than the trigger items.</p> <p>This discount rule is used for Buy-One-Get-One scenarios, such as Buy one DVD and get one CD for 50% off, or Buy two entrees and a dessert is free.</p>

**Table 14-2 (Cont.) Automatic Discount Rules**

Automatic Discount Rule	Description
Total Price Threshold	<p>Use a Total Price Threshold discount when the total price of items triggers a discount. This discount is similar in operation to Quantity Threshold, except that Total Price Threshold looks at the total price of the trigger items rather than the quantity of items on the transaction.</p> <p>This discount rule is used for scenarios such as 15% off all purchases of \$200 or more.</p>
Combination Pricing	<p>This discount type needs to have part of each item included in the combination to apply the discount. Workstation operators must add at least two of an item before a discount can be applied.</p> <p>This discount rule is used for combination meals, such as when a hamburger, fries, and soda are applied on one check, charge \$4.00.</p>
Sales Price	<p>This discount rule is similar to Item Price Substitution, but it is easier to configure. Sales Price discounts have no <b>Minimum Quantity</b> or <b>Max Count</b> associated, always apply before any other discount, and cannot be replaced by a better deal.</p> <p>Use this discount rule for All hamburgers are \$2.00 on Wednesdays, without configuring <b>Minimum Quantity</b> of trigger items or <b>Max Count</b> per check.</p>

- [Automatic Discounts](#)
- [Understanding Awarding Algorithms](#)
- [Discount Award Types](#)
- [Discount Exclusivity](#)
- [Simple Exclusivity](#)
- [Group Exclusivity](#)

**Related Topics**

- [Configuring Discount Privileges](#)
- [Configuring Discounts](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)

## Understanding Awarding Algorithms

When dealing with automatic discounts, the better deal always wins. For example, if you set both Buy One DVD Get One CD For Free and Buy One DVD Get One Car For Free, the application discounts the price of the car to \$0.00 because this is a better deal than receiving a CD for \$0.00.

When you use automatic discounts, the discount engine detects the presence of discountable menu items on a transaction, and then performs algorithms to determine



which discounts are applied and which items receive a discount. The following two types of algorithms determine the discount:

**Table 14-3 Awarding Algorithms**

Awarding Algorithm	Description
Best Deal for Customer	<p>If two discounts can be applied to a check and one yields a higher discounted amount, that discount is said to give the best deal. If two discounts can be applied to a check, and the order in which they are applied yields a different amount, the ordering which gives the customer the highest discount is said to give the best deal.</p> <p>Each automatic discount type provides the best deal for the customer, which means that the workstation scans all menu items and determines the largest discount to apply. In this example, a common best deal scenario is described as follows:</p> <ul style="list-style-type: none"> <li>• A combo discount is configured so any Pants-and-Shirt purchase is \$30.</li> <li>• If a customer orders a \$25 pair of pants and a \$20 shirt, the discount is \$15: <ul style="list-style-type: none"> <li>– \$25 for a pair of pants, \$20 for a shirt = \$45</li> <li>– The combination price is \$30, so the discount is \$15.</li> </ul> </li> <li>• If the customer then orders a \$25 shirt, the discount recalculates: <ul style="list-style-type: none"> <li>– \$25 for a pair of pants, \$25 for a shirt = \$50</li> <li>– The combination price is \$30, so the discount is \$20.</li> </ul> </li> </ul> <p>In this example, the higher-priced shirt is discounted, so the customer receives a total discount of \$20 instead of just \$15. This is the calculation for all automatic discounts and you cannot configure it (except for Quantity Threshold Discounts). By default, the POS client considers all menu items on the check and all discounts that can apply, and creates the largest discount possible for the customer.</p>
Best Deal for Merchant	<p>You can configure Quantity Threshold Discounts to provide the best deal for the merchant, which means that the customer receives the lowest possible discount. Some jurisdictions require this configuration.</p>

**Figure 14-1 Examples of Best Deals for Merchant and Customer**

-- Ex 1: Best for Customer --	
Filet	20.00
Chicken Dinner	15.00
Spaghetti	10.00
Discount	-7.50

-- Ex 2: Best for Merchant --	
Filet	20.00
Chicken Dinner	15.00
Spaghetti	10.00
Discount	-5.00

Consider this discount: Buy one entree and get a second (of equal or lesser value) for 50% off. The examples show the different calculations of the discount based on the best deal configuration.

- In Example 1, the Filet is the most expensive item, so it is the trigger. The Chicken Dinner is more expensive than the Spaghetti, so it is discounted by 50%. The total discount is \$7.50.
- In Example 2, the Filet is the most expensive item, so it is the trigger. The Spaghetti is the least expensive entree, so it is discounted by 50%. The total discount is \$5.00.

- [Automatic Discounts](#)
- [Understanding Automatic Discount Rules](#)
- [Discount Award Types](#)
- [Discount Exclusivity](#)
- [Simple Exclusivity](#)
- [Group Exclusivity](#)

**Related Topics**

- [Configuring Discount Privileges](#)
- [Configuring Discounts](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)

## Discount Award Types

The following table describes the discount award types.

**Table 14-4 Award Types**

Award Type	Description
Percent Off	Simphony calculates this type of award as a percent of the sales total. For example, if the item is \$10 and the discount is 20%, the discounted item's price is \$8.
Amount Off	Simphony calculates this type of award as a fraction of the sales total. The discount awarded cannot be greater than the Amount Off value. The Amount Off is subtracted from the item's price when the discount is awarded. For example, if the item is \$10 and the Amount Off is \$3, the discounted item's price is \$7. <a href="#">Amount Off Examples</a> contains more complex examples of the Amount Off award type.
Amount Substitution	The amount is substituted for the original price of the item. For example, if the item is \$10 and the amount substitution is \$5.99, the discounted item's price is \$5.99. Calculations do not change with whole numbers. For decimal values, Simphony calculates what percent of the parent item the original substitution price was, and applies that percent discount to the new decimal quantity. <a href="#">Amount Substitution</a> contains more complex examples of the Amount Substitution award type.

- [Automatic Discounts](#)
- [Understanding Automatic Discount Rules](#)
- [Understanding Awarding Algorithms](#)
- [Discount Exclusivity](#)
- [Simple Exclusivity](#)
- [Group Exclusivity](#)

**Related Topics**

- [Configuring Discount Privileges](#)
- [Configuring Discounts](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)

## Discount Exclusivity

Exclusivity stops all discounts from appearing on a check at once. Discount exclusivity controls how multiple discounts interact with each other. You can configure discounts to be exclusive to the following:

- Per transaction
- Per menu item
- Based on workstation operator-defined groups

In short, discount exclusivity stops discounts from applying multiple times to the same items.

Discount exclusivity applies in these situations:

- A senior citizen discount coupon cannot be used at the same time as a 25% off all items discount.
- A Buy One Get One Free discount cannot be applied to a transaction that also has a Buy \$100, Get 25% Off Discount.
- The customer's 10% coupon cannot be applied to items that receive the Happy Hour discount.

You can configure two types of discount exclusivity: simple exclusivity and group exclusivity. Simple exclusivity is easier to use and configure. Group exclusivity yields greater flexibility, but at the price of complexity. [Simple Exclusivity](#) and [Group Exclusivity](#) contain more information about these types of discount exclusivity.

Automatic discounts always recalculate after the workstation operator adds or removes an item from a guest check. Because of this, automatic discounts are always applied after manual discounts. Consider the following example:

- The revenue center is configured with automatic discounts enabled in the RVC Parameters module.
- One automatic discount is active: all food is 10% off.
- A manual discount is configured, and it allows the 10% off all food discount to be on the check at the same time as the manual discount.
- The operator orders \$20 of food.
- The automatic discount applies on the check for \$2.

If the workstation operator then adds a manual discount for \$5.00 off, the discount changes:

- All automatic discounts are removed (this occurs internally on the workstation but is listed here to explain the logic)
- The check's total is \$15.00 (\$20.00 minus the \$5.00 manual discount)
- The 10% automatic discount is applied for \$1.50, taking the check's total to \$13.50

Because of the scenario described here, it is not possible to get a better deal when combining automatic and manual discounts. Either the discounts can both be on the check (as in this example) or the manual discount is not allowed (if the automatic discount is exclusive to the manual discount). Thus, to use manual discounts and automatic discounts in the same environment, configure the discounts that would normally be manual as automatic coupon discounts, which follow the best deal rules of the Discount Engine. See [Understanding Awarding Algorithms](#) for more information.

[Configuring Discounts](#) contains more information about setting the **Simple Item Exclusivity** and **Simple Transaction Exclusivity** options.

- [Automatic Discounts](#)
- [Understanding Automatic Discount Rules](#)
- [Understanding Awarding Algorithms](#)
- [Discount Award Types](#)
- [Simple Exclusivity](#)
- [Group Exclusivity](#)

**Related Topics**

- [Configuring Discount Privileges](#)
- [Configuring Discounts](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)

## Simple Exclusivity

The following three discount options apply to simple exclusivity in the Discounts module:

**Table 14-5 Simple Exclusivity Options**

Option	Description
9 - Simple Item Exclusivity	When you select this option, only this discount can be applied to a menu item. This prevents individual items from being discounted more than once. Deselecting this option causes the Exclusivity Group settings to determine how this discount interacts with other discounts. If other discounts that are better deals can apply to the item or transaction, the better deal discounts apply.
23 - Simple Transaction Exclusivity	When you select this option, only this discount can be applied to a single check. This prevents the check from being discounted more than once. Deselecting this option causes the Exclusivity Group settings to determine how this discount interacts with other discounts. If other discounts that are better deals can apply to the item or transaction, the better deal discounts apply.
24 - Discount is Final	When you select this option, no additional discounts can be applied to the transaction after this discount posts. (This option works in automatic discount transactions only.)

- [Automatic Discounts](#)
- [Understanding Automatic Discount Rules](#)
- [Understanding Awarding Algorithms](#)
- [Discount Award Types](#)
- [Discount Exclusivity](#)
- [Group Exclusivity](#)

**Related Topics**

- [Configuring Discount Privileges](#)
- [Configuring Discounts](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)

## Group Exclusivity

Group exclusivity is sometimes a difficult concept to grasp, but it is important as it lets you configure the manner in which possibly hundreds of discounts interact. An understanding of group exclusivity is crucial for long-term discount configuration.

When two discounts are exclusive to each other, it means that only one discount applies. This exclusiveness can apply either per transaction or per menu item:

- If two discounts are transaction exclusive to each other, only one can be applied to the same transaction. The discount that provides the best deal is applied to the check.
- If two discounts are item exclusive to each other, only one can be applied to a specific menu item. Two discounts that are item exclusive can both be present on a transaction, but only applied to different menu items. Again, the discount that provides the best deal is applied to the item.

**Table 14-6 Transaction Exclusivity**

Discount	In Exclusivity Group 1	In Exclusivity Group 2
A	Yes	Yes
B	Yes	No
C	No	Yes
D	No	No

Given the configuration shown in the Transaction Exclusivity table, the following occurs:

- Discounts A and B cannot appear on the same transaction because they both belong to the first group.
- Discounts A and C cannot appear on the same transaction because they both belong to the second group.
- Discounts B and C can appear on the same transaction because they do not belong to the same groups.
- Discount D can appear on any transaction with A, B, and C because it does not belong to any group.

The Transaction Exclusivity example shows a configuration with only two groups. The combinations become more complex (yet more flexible) when using all 32 groups in the property.

**Table 14-7 Item Exclusivity**

Discount	In Exclusivity Group 1	Menu Items Affected by Discount
A	Yes	x, y
B	Yes	x
C	No	y

Given the configuration shown in the Item Exclusivity table, the following occurs:

- Menu Item x is discounted by A or B, but not both. Discounts A and B are exclusive to each other.
- Menu Item y is discounted by A and C. These discounts are not exclusive to each other, so they may both discount the same items.

- [Automatic Discounts](#)
- [Understanding Automatic Discount Rules](#)
- [Understanding Awarding Algorithms](#)
- [Discount Award Types](#)
- [Discount Exclusivity](#)
- [Simple Exclusivity](#)

**Related Topics**

- [Configuring Discount Privileges](#)
- [Configuring Discounts](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)

## Menu Item Groups

Each record in a menu item group specifies the menu items it represents. A menu item group is a workstation operator-defined group of menu items that Symphony uses to calculate discounts. Within the Menu Item Group module, you can assign menu items based on major groups, family groups, or by menu item object number or range. Each menu item group can have a combination of major groups, family groups, and so on. You can configure menu item groups to include and exclude major groups, family groups, and so on.

Examples of menu item groups are:

- All menu items in major group Liquor
- All menu items in major group Liquor, but not Bottles of Wine in family group 6
- All menu items in family groups Cold Appetizers, Warm Appetizers, and Soups
- All menu items with object numbers in the range 4000-4999, 14000-14999, and major group Non-liquor
- All menu items with object numbers in the range 5000-10000, except the ones in 6500-6600

**Related Topics**

- [Configuring Menu Item Groups](#)
- [Categorizing Menu Items into Groups](#)

**Related Topics**

- [Configuring Major Groups](#)
- [Categorizing Menu Items into Groups](#)

**Related Topics**

- [Configuring Family Groups](#)

## Configuring Menu Item Groups

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Menu Item Groups**.

2. Insert a menu item group record, and then double-click it to open.
3. Click **Add** near one of the following areas:
  - Include: You can add the menu item groups to include in the discount here
  - Exclude: You can add the menu item groups to exclude from the discount here
4. Select information for the fields described in the following table:

**Table 14-8 Include and Exclude Fields**

Field	Description
Type	Select the grouping to include or exclude: <ul style="list-style-type: none"> <li>• <b>0 - None</b></li> <li>• <b>1 - All</b></li> <li>• <b>2 - By Major Group</b></li> <li>• <b>3 - By Family Group</b></li> <li>• <b>4 - By Menu Item</b></li> </ul>
Start #	Click in this field, but do not enter a value.
End #	Click in this field, but do not enter a value.
See Items and Select	Click the link and then select the menu items to be the trigger. This item appears in the End # field.
Range	The items you selected in the See Items and Select dialog appear in this field.
Override Price Amount/ Percentage (Include only)	If you want a discount to apply to menu items differently, use this field. For example, you can set discounts for Sweet Potato Fries to 15% and Pub Fries to 20%.  To use this field with automatic discounts, you must select the <b>Use Price in MI Group Detail</b> option from the Discounts module <b>Auto</b> subtab. You can set amount off, percent off, or amount substitution, based on the discount configuration. For example, enter 10.00 to indicate 10% off (not 0.10).

5. Click **Save**.

**Related Topics**

- [Menu Item Groups](#)
- [Categorizing Menu Items into Groups](#)

## Configuring Discount Privileges

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **VOIDS/RETURNS** subtab.
3. Select the appropriate options to allow employees to void discounts in a previous round and on closed checks:
  - **27 - Authorize/Perform Void of Discounts from a Previous Round**
  - **70 - Authorize/Perform Void of Discounts on Closed Checks**
4. Click the **Transactions** subtab.



5. Select the appropriate options that apply to discounts:
  - **20 - Post Discounts to Checks Belonging to Another Operator**
  - **98 - Authorize/Perform Employee Meal Discount Override for Non-Scheduled Employees**
6. Click **Save**.

- [Configuring Discounts](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)

#### Related Topics

- [Automatic Discounts](#)
- [Understanding Automatic Discount Rules](#)
- [Understanding Awarding Algorithms](#)
- [Discount Award Types](#)
- [Discount Exclusivity](#)
- [Simple Exclusivity](#)
- [Group Exclusivity](#)

## Configuring Discounts

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Discounts**.
2. Insert a record for a discount or double-click a record to select it.
3. On the **General** tab, select the type of discount from the **Activation Type** drop-down list:
  - **0 - Manual (Manually entered and applied)**
  - **1 - Automatic (Automatically applied, operator cannot enter)**
  - **2 - Coupon (Automatically applied, operator must enter)**
4. To configure a manual discount, enter the following information. Otherwise, skip this step.
  - a. To use a percent discount, enter the percentage in the **Percent** field.
  - b. To use an amount discount, enter the maximum amount allowed for the discount in the **Max Amount** field.
5. To make the discount available to the workstation operator, select **Enabled**. (If you configure a temporary discount, you can quickly turn it off.)
6. Select the **Tax Class** to be applied when the discount is used.
7. Select a **Privilege Group** to restrict the discount to only employees who are linked to the same privilege group. Set the **Privilege Group** to **0** to allow all employees to use the discount.
8. Select the method to determine how condiment menu items are discounted from the **Condiment Discountability** drop-down list.
9. Select the **Report Group** to associate with the discount.

10. Select the appropriate options for the discount. The following table describes the options and indicates the Activation Types (Manual, Automatic, Coupon) that are available for each option.

**Table 14-9 Discount Options**

Option	Description	Manual	Automatic	Coupon
1 - ON = Open; OFF = Preset	Select this option to make the discount open. The workstation prompts the workstation operator to enter the amount or percentage.  Deselect this option to use a preset amount or preset percentage for the discount.	Yes	No	Yes
2 - ON = Amount; OFF = Percentage	Select this option to make the discount an amount. Deselect this option to make the discount a percentage.	Yes	No	No
3 - This is an Item Discount	Select this option to calculate the discount based on the price of the last menu item entered. Deselect this option to calculate the discount based on the discountable transaction subtotal.  For automatic discounts, this option controls the discount sorting and consolidation on a check. When set, each item in the Menu Item Award Group shows the discounted amount on customer receipts and on the POS client. When deselected, all items in the Menu Item Award Group show a combined discounted amount as one entry.	Yes	Yes	Yes
4 - Employee Meal	Select this option to set the discount as an Employee Discount. The POS client prompts the workstation operator to enter the employee number of the employee receiving the discount.	Yes	No	Yes
5 - Reference Entry Required	Select this option to require the workstation operator to enter a name or number when using the discount.	Yes	No	Yes
6 - Validation Required	Select this option to print a validation chit when the discount is applied.	Yes	No	Yes
7 - Limit Discount to Value in Amount Field	Select this option to limit the amount of a discount. Enter an amount in the <b>Amount</b> field, which represents the highest discount possible when setting this option.	Yes	No	Yes

Table 14-9 (Cont.) Discount Options

Option	Description	Manual	Automatic	Coupon
8 - If No Amount is Entered, Use the Full Discountable Amount	<p>Select this option to control the open amount discount calculation if the workstation operator does not enter an amount before pressing the Discount button. In short, this option allows you to set a discount as:</p> <ul style="list-style-type: none"> <li>• A 100% discount (if the workstation operator does not enter an amount before selecting the Discount button)</li> <li>• An open amount discount (if the workstation operator enters an amount before selecting the Discount button)</li> </ul> <p>You must select option <b>2 - ON = Amount; OFF = Percentage</b> to activate this option.</p>	Yes	No	No
9 - Simple Item Exclusivity	<p>Select this option to apply the discount to only one menu item. This setting imposes a limit of one discount per item and prevents individual items from receiving a discount more than once.</p> <p>Deselect this option to have the Exclusivity tab settings determine how the discount interacts with other discounts.</p>	Yes	Yes	Yes
23 - Simple Transaction Exclusivity	<p>Select this option to have the discount apply to a single check. This setting prevents the check from receiving a discount more than once.</p>	Yes	Yes	Yes
24 - Discount is Final	<p>Select this option to prevent workstation operators from applying additional discounts to the transaction after the discount is posted.</p>	Yes	Yes	Yes
25 - Discount Combo Meal Group Items	<p>Select this option to discount combo group menu items when the <b>Allow Discounts</b> option is set for the combo group.</p>	Yes	Yes	No
28 - Apply to Returned or Direct-Voided Menu Items	<p>Select this option to allow the discount to be applied to returned and voided items.</p>	No	Yes	Yes
29 - Menu item to use check open time	<p>Select this option to have a menu item use the check's open time (instead of using the current time) to determine effectivity of the discount.</p>	Yes	Yes	Yes

**Table 14-9 (Cont.) Discount Options**

Option	Description	Manual	Automatic	Coupon
30 - Selected menu item to include parent menu item in discount	Select this option to include a parent menu item in the discount when the workstation operator selects a child menu item for the discount.	Yes	Yes	Yes
31 - Net Automatic Service Charge Itemizer	Select this option to post the net value of the menu item to the Automatic Service Charge Itemizer, reducing the Automatic Service Charge after the discount is applied.  This option is available when you set option <b>3 - This is an Item Discount</b> (above) and option <b>12 - Add to Automatic Service Charge Itemizer</b> from the Menu Item Classes module.	No	Yes	Yes
32 - Limit Discount value to value of Discountable Item	Select this option to limit the discountable amount to the item or award when the Amount Off exceeds the item or award. For example, if the Amount Off is \$5.00 and the item or award is \$4.00, the discount is limited to \$4.00.	Yes	Yes	No
33 - Cash Management Transaction Item	Select this option to include the discount in ECM tracking and reports.	Yes	No	Yes

11. Click the **RVC Type** tab.
12. Select the revenue centers that can have the discount available.
13. Click the **Effectivity** tab.
14. Select the dates, days, and times for the discount to be in effect.
15. Click the **Effectivity Groups** tab.  
  
The effectivity group configuration allows you to configure and package promotions so that the menu items and their discounts are only available for a fixed period of time.
16. Click the **Add Effectivity Record** link.
17. Assign discounts, menu item prices, and other configuration elements to the effectivity group.
18. Click **Save**.
19. To set an automatic discount to apply to a revenue center:
  - a. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
  - b. Click the **Options** tab.
  - c. Select **48 - Enable Automatic Discounts by Default**. If you do not select this option, workstation operators must activate automatic discounts per transaction using one of the following function keys:

- **655 - Auto Discount Toggle:** Toggle the automatic discounts for the transaction
- **656 - Auto Discount Apply:** Apply all discounts possible
- **657 - Auto Discount Remove:** Remove all discounts from the transaction

Examples of the types of discounts that are available with this option include:

- All appetizers are 25% off
- All domestic beers are \$3 during Happy Hour
- Buy an appetizer, get another one for 50% off
- Buy an entrée, get \$2 off a dessert

d. Click **Save**.

- [Configuring Discount Privileges](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)

#### Related Topics

- [Automatic Discounts](#)
- [Understanding Automatic Discount Rules](#)
- [Understanding Awarding Algorithms](#)
- [Discount Award Types](#)
- [Discount Exclusivity](#)
- [Simple Exclusivity](#)
- [Group Exclusivity](#)

## Configuring Effectivity Groups

You can assign discounts, menu item prices, and reservation periods to an effectivity group. Effectivity groups let you configure and package promotions and reservation times. For example, you can make menu items or discounts available for a fixed period of time.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Effectivity Groups**.
2. Insert a record for the effectivity group, enter a descriptive name, and then click **OK**.
3. Double-click the record to open it.
4. Click the **Add** link, and then select the **Start Time** and the **End Time** from the calendar.
5. Click **Save**.
6. After creating the Effectivity Group, you need to associate the Effectivity Group with one of the following types of records to make it active:
  - Tender/Media
  - Menu Item Price
  - Discount

- Combo Group Detail Price
- Service Charge
- Tax
- Page Content Area

You can make the association in the record type. For example, to associate a Tender/Media record with the Effectivity Group, click the **Tender/Media** module, and then click the **Effectivity** tab.

## Understanding Automatic Discounts with Decimal Quantity Menu Items

Symphony ignores partial (or decimal) quantities with automatic discounts and applies the discount for the closest whole number. For example, if you have an order for 2.3 cups yogurt, the automatic discount algorithms consider only 2.0 cups yogurt when determining whether to apply a discount.

- If you add a menu item to the check with an original quantity less than 1, Symphony does not apply the automatic discount.
- If you add a menu item to the check with a discount and then split the check, the discount no longer applies to either check.

The following automatic discount rules ignore partial quantities when ordering:

- Quantity Threshold
- Combination Pricing

The discount engine ignores menu items added with an original quantity of less than 1 (for example .5 cup of yogurt). [Understanding Automatic Discount Rules](#) contains more information about Quantity Threshold and Combination Pricing.

[Amount Off Examples](#) contains examples of the Amount Off award type.

[Amount Substitution](#) contains examples of the Amount Substitution award type.

- [Automatic Discounts](#)
- [Amount Off Examples](#)
- [Amount Substitution Examples](#)

### Related Topics

- [Configuring Decimal Quantity Menu Items](#)
- [Configuring an Item Price Substitution Discount](#)
- [Configuring a Quantity Threshold Discount](#)
- [Configuring a Total Price Threshold Discount](#)
- [Configuring a Combination Pricing Discount](#)
- [Configuring a Sales Price Discount](#)

## Amount Off Examples

This section provides examples of the Amount Off discount award type.

### Example 1: Whole Number Item

- 1 Salad: \$10.00
- Amount Off: \$2.00
- Award Percent = Amount Off (\$2.00) / Item Base Price (\$10.00) = .20
- Discount = Current Sales Total (\$10.00) x Award Percent (.20) = \$2.00

Because the Current Sales Total is greater than or equal to the base price, the customer receives the Amount Off.

### Example 2: Decimal Number Item

- .5 Salad: \$5.00
- Amount Off: \$2.00
- Award Percent = Amount Off (\$2.00) / Item Base Price (\$10.00) = .20
- Discount = Current Sales Total (\$5.00) x Award Percent (.20) = \$1.00

When the Current Sales Total is less than the base price, the customer receives the discount based on the award percent calculation.

### Example 3: Decimal Number Item with Condiment

- .5 Salad: \$5.00
- 1 Chicken: \$5.00
- Current Sales Total = \$10.00
- Discount = Current Sales Total (\$10.00) x Award Percent (.20) = \$2.00

Because the Current Sales Total is greater than or equal to the base price, the customer receives the Amount Off.

- [Automatic Discounts](#)
- [Understanding Automatic Discounts with Decimal Quantity Menu Items](#)
- [Amount Substitution Examples](#)

### Related Topics

- [Configuring Decimal Quantity Menu Items](#)
- [Configuring an Item Price Substitution Discount](#)
- [Configuring a Quantity Threshold Discount](#)
- [Configuring a Total Price Threshold Discount](#)
- [Configuring a Combination Pricing Discount](#)
- [Configuring a Sales Price Discount](#)

## Amount Substitution Examples

This section provides examples of the Amount Substitution discount award type.

### Example 4: Whole Number Item

- 1 Salad: \$10.00
- Amount Substitution: \$9.00 (discounted \$1.00)
- Award Percent = Amount Substitution (\$9.00) / Item Base Price (\$10.00) = .90
- Discount = (\$10.00) - Amount Substitution (\$9.00) = \$1.00

When dealing with whole number menu items, the customer always pays the Amount Substitution. If the customer orders items totaling \$100, they pay only \$9.00.

### Example 5: Decimal Number Item

- .5 Salad: \$5.00
- Amount Substitution: \$9.00 (discounted \$1.00 from parent item base price)
- Award Percent = Amount Substitution (\$9.00) / Item Base Price (\$10.00) = .90
- Discount = (Current Sales Total – (Current Sales x Award Percent)) = \$5.00 – (\$5.00 x .90) = \$5.00 – \$4.50 = \$.50

### Example 6: Decimal Number Item, More Condiments Than Parent Items

- The Award Percent for Amount Substitution is based on the parent item base price, not the total price of each item plus condiments.
- The Discount Calculation only comes into effect when the menu item plus condiments are less than the base price amount of the parent item.

Order Number	Items	Price	Award Percent	Discount Calculation	Discount Amount	Customer Pays
1	1 Salad 1 Chicken 1 Steak 1 Steak (This extra condiment is added to the first menu item.)	\$10.00 \$5.00 \$5.00 \$5.00	(\$9.00) / (\$10.00) = .90	(\$25.00 – \$9.00)	\$16.00	\$9.00
2	1 Salad 1 Chicken 1 Steak	\$10.00 \$5.00 \$5.00				
3	1 Salad 1 Chicken 1 Steak	\$10.00 \$2.50 \$5.00				



Order Number	Items	Price	Award Percent	Discount Calculation	Discount Amount	Customer Pays
4	.5 Salad	\$5.00				
	1 Steak	\$5.00				
				(\$9.00) / (\$10.00) = .90	(\$10.00) - \$9.00	\$1.00
						\$9.00

- [Automatic Discounts](#)
- [Understanding Automatic Discounts with Decimal Quantity Menu Items](#)
- [Amount Off Examples](#)

#### Related Topics

- [Configuring Decimal Quantity Menu Items](#)
- [Configuring an Item Price Substitution Discount](#)
- [Configuring a Quantity Threshold Discount](#)
- [Configuring a Total Price Threshold Discount](#)
- [Configuring a Combination Pricing Discount](#)
- [Configuring a Sales Price Discount](#)

## Configuring Decimal Quantity Menu Items

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Menu Item Classes**.
2. Double-click the menu item class record to open it.
3. On the **General** tab, select **2 - Decimal/fraction allowed, round sales count up** from the **Count Entry** drop-down list.
4. Click **Save**.

- [Configuring an Item Price Substitution Discount](#)
- [Configuring a Quantity Threshold Discount](#)
- [Configuring a Total Price Threshold Discount](#)
- [Configuring a Combination Pricing Discount](#)
- [Configuring a Sales Price Discount](#)

#### Related Topics

- [Automatic Discounts](#)
- [Understanding Automatic Discounts with Decimal Quantity Menu Items](#)
- [Amount Off Examples](#)
- [Amount Substitution Examples](#)

## Configuring an Item Price Substitution Discount

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Discounts**.

2. Double-click an automatic discount record to open it.
3. On the **Auto** tab, select **1 - Item Price Substitution** from the **Automatic (Automatically applied, operator cannot enter)** drop-down list.
4. (Optional) Enter a **Priority** for the discount.

Priority determines the order in which discounts are calculated. By default, this field is blank (0) for all discounts, meaning that discounts are calculated at the same time. If you enter a priority, the workstation calculates all discounts in priority 1, then in priority 2, and so on. Priority zero (0) discounts are calculated last. The priority field allows Symphony to calculate discounts more efficiently.

5. In the Trigger section, configure a trigger to invoke the discount:
  - **Trigger MI Group:** Select the menu item groups that will trigger the discount award.
  - **Trigger Condiment Group:** Select the condiment menu item groups to use as the trigger for the discount, if any. For example, If customers can get a bagel for \$0.50 when they add cream cheese to any bagel, cream cheese is the trigger condiment and bagel is the trigger menu item for the \$0.50 discount.
  - **Minimum Quantity:** Enter the number of items that customers must order from the corresponding trigger menu group before applying the discount award.
6. In the Awards section, configure the discount amount:
  - **Percentage Off:** If this is a percent discount, enter the percentage to discount from each item in the Trigger MI Group.
  - **Amount Off:** If this is an amount discount, enter the amount to discount from each item in the Trigger MI Group.
  - **Amount Substitution:** If this is an amount substitution discount, enter the price to charge for each item in the Trigger MI Group.
  - **Max Count:** Enter the maximum number of discounts that can be applied to a single check when option **23 - Simple Transaction Exclusivity** is enabled for this discount. If set to zero (0), the maximum count is unlimited.

For example, if the discount is \$5.00 off every appetizer with a limit of 3 appetizers per check, set this field to 3. Then, if seven appetizers are ordered, the three most expensive appetizers are discounted while the other four appetizers are charged the regular price.
7. If you configured a Percent Off discount, click the **General** tab, and then enter the maximum amount allowed for the discount in the **Max Amount** field.

8. Click **Save**.

- [Configuring Decimal Quantity Menu Items](#)
- [Configuring a Quantity Threshold Discount](#)
- [Configuring a Total Price Threshold Discount](#)
- [Configuring a Combination Pricing Discount](#)
- [Configuring a Sales Price Discount](#)

#### Related Topics

- [Automatic Discounts](#)

- [Understanding Automatic Discounts with Decimal Quantity Menu Items](#)
- [Amount Off Examples](#)
- [Amount Substitution Examples](#)

## Configuring a Quantity Threshold Discount

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Discounts**.
2. Double-click an automatic discount record to open it.
3. Click the **Auto** tab, and then select **2 - Quantity Threshold** from the **Automatic (Automatically applied, operator cannot enter)** drop-down list.
4. Select the appropriate **Awarding Algorithm**:
  - **1 - Best Deal for Customer**: Select to apply the best possible deal (highest discount amount) to the check. Oracle recommends using this setting unless specific business needs are required at the property.
  - **2 - Best Deal for Merchant**: Select to apply the smallest discount amount to the check. This option is intended for properties with specific needs and configurations.
5. (Optional) Enter a **Priority** for the discount.

Priority determines the order in which discounts are calculated. By default, this field is blank (0) for all discounts, meaning that discounts are calculated at the same time. If you enter a priority, the workstation calculates all discounts in priority 1, then in priority 2, and so on. Priority zero (0) discounts are calculated last. The priority field allows Symphony to calculate discounts more efficiently.
6. Enter the maximum number of times the coupon discount can be entered on a check in the **Max Count Per Check** field.
7. To use promotion prices that appear in the Menu Item Groups module for the discounted menu item, select **Use Price in MI Group Detail**.
8. In the Trigger section, configure up to eight unique triggers to invoke the discount. You must configure the triggers in sequential order.
  - **Trigger MI Group**: Select the menu item groups that will trigger the discount award.
  - **Trigger Condiment Group**: Select the condiment menu item groups to use as the trigger for the discount, if any. For example, If customers can get a bagel for \$0.50 when they add cream cheese to any bagel, cream cheese is the trigger condiment and bagel is the trigger menu item for the \$0.50 discount.
  - **Quantity**: Enter the number of items that customers must order from the corresponding trigger menu group before applying the discount award.
  - **Minimum Quantity**: Enter the number of items that customers must order from the corresponding trigger menu group before applying the discount award.
9. In the Awards section, configure up to eight rewards for the discount:
  - **Award MI Group**: Select the menu item groups to use as the award group when the minimum quantity of items from the Trigger MI Group is ordered.
  - **Award Type**: Select the discount type.

- **Percentage Off:** If this is a percent discount, enter the percentage to discount from each item in the Award MI Group.
  - **Amount Off:** If this is an amount discount, enter the amount to discount from each item in the Award MI Group.
  - **Amount Substitution:** If this is an amount substitution discount, enter the price to charge for each item in the Award MI Group.
  - **Award Count:** Enter the number of award items that are allowed once the Trigger MI Group's Minimum quantity is reached. For example, if this is a Buy Three Coffees and Get Two Donuts at 50% off discount, set this field to 2.
  - **Max Count:** Enter the maximum number of award items that can be discounted on a single check. If set to zero (0), the maximum count is unlimited.
  - **Allow award of higher priced item:** Select to allow a discount to be applied when the trigger item price is lower than the award item price.
10. If you configured a Percent Off discount, click the **General** tab, and then enter the maximum amount allowed for the discount in the **Max Amount** field.
  11. Click **Save**.

- [Configuring Decimal Quantity Menu Items](#)
- [Configuring an Item Price Substitution Discount](#)
- [Configuring a Total Price Threshold Discount](#)
- [Configuring a Combination Pricing Discount](#)
- [Configuring a Sales Price Discount](#)

#### Related Topics

- [Automatic Discounts](#)
- [Understanding Automatic Discounts with Decimal Quantity Menu Items](#)
- [Amount Off Examples](#)
- [Amount Substitution Examples](#)

## Configuring a Total Price Threshold Discount

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Discounts**.
2. Double-click an automatic discount record to open it.
3. Click the **Auto** tab, and then select **3 - Total Price Threshold** from the **Automatic (Automatically applied, operator cannot enter)** drop-down list.
4. (Optional) Enter a **Priority** for the discount.

Priority determines the order in which discounts are calculated. By default, this field is blank (0) for all discounts, meaning that discounts are calculated at the same time. If you enter a priority, the workstation calculates all discounts in priority 1, then in priority 2, and so on. Priority zero (0) discounts are calculated last. The priority field allows Simphony to calculate discounts more efficiently.

5. To use promotion prices that appear in the Menu Item Groups module for the discounted menu item, select **Use Price in MI Group Detail**.

6. In the Trigger section, configure up to eight unique triggers to invoke the discount. You must configure the triggers in sequential order.
  - **Trigger MI Group:** Select the menu item groups that will trigger the discount award. When the total amount of all items on a check exceeds the amount configured for the trigger group, the discount will be applied to all items in the Award Menu Item Group.
  - **Trigger Condiment Group:** Select the condiment menu item groups to use as the trigger for the discount, if any. For example, If customers can get a bagel for \$0.50 when they add cream cheese to any bagel, cream cheese is the trigger condiment and bagel is the trigger menu item for the \$0.50 discount.
  - **Total:** Enter the total amount of corresponding trigger menu item group items customers must order before applying the discount (that is, to activate the Award Menu Item Group). For example, if you are giving 15% off all shirts for a purchase of \$80 or more, enter 80.00 in this field.
7. In the Awards section, configure up to eight rewards for the discount:
  - **Award MI Group:** Select the menu item groups to use as the award group when the total amount of all items on a check exceeds the Total configured for the Trigger MI Group.
  - **Award Type:** Select the discount type.
  - **Percentage Off:** If this is a percent discount, enter the percentage to discount from each item in the Award MI Group.
  - **Amount Off:** If this is an amount discount, enter the amount to discount from each item in the Award MI Group.
  - **Amount Substitution:** If this is an amount substitution discount, enter the price to charge for each item in the Award MI Group.
  - **Max Count:** Enter the maximum number of award items that can be discounted on a single check. If set to zero (0), the maximum count is unlimited.
8. If you configured a Percent Off discount, click the **General** tab, and then enter the maximum amount allowed for the discount in the **Max Amount** field.
9. Click **Save**.

- [Configuring Decimal Quantity Menu Items](#)
- [Configuring an Item Price Substitution Discount](#)
- [Configuring a Quantity Threshold Discount](#)
- [Configuring a Combination Pricing Discount](#)
- [Configuring a Sales Price Discount](#)

#### Related Topics

- [Automatic Discounts](#)
- [Understanding Automatic Discounts with Decimal Quantity Menu Items](#)
- [Amount Off Examples](#)
- [Amount Substitution Examples](#)

## Configuring a Combination Pricing Discount

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Discounts**.
2. Double-click the discount record to open it.
3. On the **Auto** tab, select **4 - Combination Pricing** from the **Automatic (Automatically applied, operator cannot enter)** drop-down list.

**Table 14-10 Discount Rule Configuration Fields**

Field	Description
Priority	Enter the order in which the workstation calculates the discounts. This field is blank (0) for all discounts by default, meaning that the workstation calculates discounts at the same time. When using this field, the workstation calculates all discounts in priority 1, then in priority 2, and so on. the workstation calculates priority 0 discounts last. The Priority field allows the discount engine to determine which discount to apply quicker, thus reducing central processing unit (CPU) time on the workstation.
Trigger MI Groups	Select the menu item groups that belong to this combination discount. This discount is used in scenarios such as a Burger, Fries, and Soda are \$3.25. You can configure a maximum of four trigger Menu Item Groups for combination pricing discounts. You can use a Trigger MI Group more than once (for example, if the combo meal includes two sides). (This is not a typical configuration.)
Amount Substitution	Enter the price to be charged for this combo meal.
Max Count	Enter the maximum number of combo meals that can be ordered per check. In general, this field is set to 0 to allow an unlimited amount of combo meals on a single check.

4. Click **Save**.
  - [Configuring Decimal Quantity Menu Items](#)
  - [Configuring an Item Price Substitution Discount](#)
  - [Configuring a Quantity Threshold Discount](#)
  - [Configuring a Total Price Threshold Discount](#)
  - [Configuring a Sales Price Discount](#)

### Related Topics

- [Automatic Discounts](#)
- [Understanding Automatic Discounts with Decimal Quantity Menu Items](#)
- [Amount Off Examples](#)
- [Amount Substitution Examples](#)

## Configuring a Sales Price Discount

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Discounts**.
2. Double-click an automatic discount record to open it.
3. On the **Auto** tab, select **5 - Sales Price** from the **Automatic (Automatically applied, operator cannot enter)** drop-down list.
4. Select the menu item groups that will trigger the discount from the **Trigger MI Group** drop-down list, and then select the condiment menu item groups to use as the trigger for the discount, if any from the **Trigger Condiment Group** drop-down list.

For example, if customers can get a bagel for \$0.50 when they add cream cheese to any bagel, cream cheese is the trigger condiment and bagel is the trigger menu item for the \$0.50 discount.

5. Select discount type, and then enter the discount amount:
  - **Percentage Off:** If this is a percent discount, enter the percentage to discount from each item in the menu group.
  - **Amount Off:** If this is an amount discount, enter the amount to discount from each item in the menu group.
  - **Amount Substitution:** If this is an amount substitution discount, enter the price to charge for each item in the menu group.
6. If you configured a Percent Off discount, click the **General** tab, and then enter the maximum amount allowed for the discount in the **Max Amount** field.
7. Click **Save**.

- [Configuring Decimal Quantity Menu Items](#)
- [Configuring an Item Price Substitution Discount](#)
- [Configuring a Quantity Threshold Discount](#)
- [Configuring a Total Price Threshold Discount](#)
- [Configuring a Combination Pricing Discount](#)

### Related Topics

- [Automatic Discounts](#)
- [Understanding Automatic Discounts with Decimal Quantity Menu Items](#)
- [Amount Off Examples](#)
- [Amount Substitution Examples](#)

## Discounts With Condiments

You can apply manual, automatic, and coupon discounts to a check when a condiment item is present on the check. A workstation operator can manually apply a discount by selecting the condiment item. For example, configure a bagel to be a parent menu item and configure the condiment, such as cream cheese, to trigger a 5% discount. As a result, when the workstation operator enters the customer order for a bagel with

cream cheese, the system applies the discount after the workstation operator selects cream cheese.

Place condiments in trigger menu item groups to have Symphony apply automatic and coupon discounts.

Complete the following tasks to apply discounts using condiments:

- Specify the condiment to be the trigger
- Set the discount to apply to the parent menu item, condiment, or both
- Set up the discount for a condiment
- Create a discount button to appear on the workstation page

#### Related Topics

- [Configuring Condiments as Discount Triggers](#)
- [Configuring Discounts for Parent Menu Items in a Menu Item Class](#)
- [Configuring a Condiment as the Discount Award](#)
- [Creating the Discount Button](#)

## Configuring Condiments as Discount Triggers

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Menu Item Groups**.
2. Create a menu item group record and then double-click it to open.
3. Click **Add** near the Include area.
4. Select information for the fields described in the following table:

**Table 14-11 Include Fields**

Field	Description
Type	Select <b>4 - By Menu Item</b> .
Start #	Click in this field, but do not enter a value.
End #	Click in this field, but do not enter a value.
See Items and Select	Click the link and then select the condiment to be the trigger. This condiment appears in the End # field.

5. Click **Save**.
- [Configuring Discounts for Parent Menu Items in a Menu Item Class](#)
  - [Configuring a Condiment as the Discount Award](#)
  - [Creating the Discount Button](#)

#### Related Topics

- [Discounts With Condiments](#)



## Configuring Discounts for Parent Menu Items in a Menu Item Class

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Menu Item Classes**.
2. Double-click a menu item class record.
3. Click the **Options** tab.
4. To allow both parent and condiment items to receive the discount, select **55 - Discounts Apply to Priced Condiments (parent items only)**. Deselect option **55** to have only the parent item receive the discount.
5. Click **Save**.

- [Configuring Condiments as Discount Triggers](#)
- [Configuring a Condiment as the Discount Award](#)
- [Creating the Discount Button](#)

### Related Topics

- [Discounts With Condiments](#)

## Configuring a Condiment as the Discount Award

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Discounts**.
2. Create the discount record and then double-click it.
3. On the **General** tab, enter the fields as described in the following table:

**Table 14-12 Discount Fields**

Field	Description
Activation Type	Select the type of discount: <ul style="list-style-type: none"> <li>• <b>0 - Manual (Manually entered and applied)</b></li> <li>• <b>1 - Automatic (Automatically applied, operator cannot enter)</b></li> <li>• <b>2 - Coupon (Automatically applied, operator must enter)</b></li> </ul>
Percent	Enter the discount percentage to use a percent discount.
Max Amount	Enter the maximum amount allowed for the discount to use an amount discount.
Enabled	Select this option to make the discount available to the workstation operator. (If you configure a temporary discount, you can quickly turn it off.)

**Table 14-12 (Cont.) Discount Fields**

Field	Description
Condiment Discountability	<p>Select the discount method for condiment menu items:</p> <ul style="list-style-type: none"> <li>• <b>0 - Use MI Class Option:</b> You must also select Menu Item Class option <b>55 - Discounts Apply to Priced Condiments (parent items only)</b>.</li> <li>• <b>1 - Parent Items Only:</b> Selecting this option applies the discount only to the parent menu item.</li> <li>• <b>2 - Condiment Items Only:</b> Selecting this option applies the discount to the trigger condiment and to all condiments associated with the check.</li> <li>• <b>3 - Parent and Highlighted Condiment Items:</b> This option is available only for manual discounts.</li> <li>• <b>4 - Parent and All Condiment Items:</b> Selecting this option applies the discount to the parent menu item and to all condiments associated with the check.</li> </ul>
Trigger MI Group	<p>Select the menu item group to be the trigger for the discount.</p> <p>When you select <b>0 - Use Discount Itemizers</b>, the only options available for the Trigger Condiment Group are <b>0 - None</b> and all available condiment groups previously created.</p>
Trigger Condiment Group	<p>Select the trigger condiment group.</p> <p>This field is dimmed when the Trigger MI Group is set to <b>0 - Use Discount Itemizers</b>.</p>
Options	<p>Select <b>25 - Discount Combo Meal Group Items</b> to discount combo group menu items. You must also select option <b>1 - Allow Discounts</b> from the Combo Meal Groups module.</p>

4. On the **Effectivity** tab, select the days on which the application applies the discount.
5. On the **RVC Type** tab, select the revenue centers that can use this discount.
6. On the **Menu Levels** tab and the **Menu Level Configuration** group, select all options for **Active On Main Levels** and **Active On Sub Levels**.
7. On the **Output** tab, select the following options:
  - **Print on Customer Receipt**
  - **Print on Journal**
  - **Print on Guest Check**
8. Click **Save**.

- [Configuring Condiments as Discount Triggers](#)
- [Configuring Discounts for Parent Menu Items in a Menu Item Class](#)
- [Creating the Discount Button](#)

**Related Topics**

- [Discounts With Condiments](#)

## Creating the Discount Button

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Page Design**.
  2. Select **Discount** from the **Type** drop-down list.
  3. Click the black arrow beneath the Type field, select the discount, and then click **OK**.
  4. Click **Save**.
- [Configuring Condiments as Discount Triggers](#)
  - [Configuring Discounts for Parent Menu Items in a Menu Item Class](#)
  - [Configuring a Condiment as the Discount Award](#)

### Related Topics

- [Discounts With Condiments](#)

## Adding Discount and Service Charge Keys to the Transaction Page

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
  2. Open the Front of House page (typically the Transaction page) on which to place the **Discount** and **Service Charge** buttons.
  3. On the **Edit** tab, select the page area in which to define the **Discount** and **Service Charge** buttons.
  4. Click **Button** to add a button.
  5. On the **General** subtab, enter the button name in the **Legend** field.
  6. Select the appropriate function from the **Type** drop-down list:
    - **Discount**
    - **Service Charge**
  7. Click the black arrow beneath the **Type** drop-down list.
  8. Select one of the following, and then click **OK**:
    - **Discount amount or percentage**
    - **Service Charge amount or percentage**
  9. Position and size the button on the page. Use the Style arrow to change the color.
  10. Click **Save**.
- [Configuring Discount Privileges](#)
  - [Configuring Discounts](#)

### Related Topics

- [Automatic Discounts](#)

- [Understanding Automatic Discount Rules](#)
- [Understanding Awarding Algorithms](#)
- [Discount Award Types](#)
- [Discount Exclusivity](#)
- [Simple Exclusivity](#)
- [Group Exclusivity](#)
- [Configuring Service Charges](#)

**Related Topics**

- [Service Charges](#)

# 15

## Service Charges

A service charge is the amount added to a sales transaction for a service rendered and is posted to one of the following parties:

- The person or people providing the service (for example, a server or bartender, or a team of servers)
- The House or the establishment providing the service

You can configure the following types of service charges:

- Service charges that report as Tips on employee tip reports
- Service charges that report as Service Charges on employee tip reports
- Service charges that are paid to the House
- Non-revenue service charges
- Gift certificates sold
- [Configuring Service Charges](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)
- [Understanding Menu Item Fees](#)
- [Configuring Menu Item Fees](#)

### Related Topics

- [Configuring Service Charges](#)
- [Adding Discount and Service Charge Keys to the Transaction Page](#)
- [Understanding Menu Item Fees](#)

### Related Topics

- [Configuring Menu Item Fees](#)

## Configuring Service Charges

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Service Charges**.
2. Insert the service charge record, and then double-click it.
3. On the **General Settings** tab, enter information in the fields as described in the following table:

**Table 15-1** General Settings Fields

Field	Description
Percent	Enter the service charge percentage.
Amount	Enter the service charge amount.

**Table 15-1 (Cont.) General Settings Fields**

Field	Description
Tips Paid Tender/Media	To link a tender to the service charge, select the Tender/Media from the drop-down list.
HALO	Enter the High Amount Lock Out (HALO) value for the service charge. This setting prevents workstation operators from entering abnormally high values for the service charge. To exceed this limit, the workstation operator must have the <b>Authorize/Perform Over HALO Amounts on Service Charge Keys</b> option set for the employee role.  When you set the value to <b>0</b> , there is no HALO for the service charge.  This field does not apply to automatic service charges.
Tax Class	To apply a tax class to the service charge, select a <b>Tax Class</b> from the drop-down list.
Privilege Group	Select a <b>Privilege Group</b> to restrict use of this service charge to employees who are linked to the same privilege group. You can set the field to <b>0</b> to allow all employees to use the service charge.
Percent to Tips Paid	Select the trigger condiment group.  This field dims when you set the <b>Trigger MI Group to 0 - Use Discount Itemizers</b> .
Report Group	Select the report group to which this service charge record belongs.  Report groups are subcategories that allow reports to show similar service charges grouped and subtotaled together. You can set report groups from the Report Groups module, in the Reporting section of the Property tab.

- Select the Service Charge options as described in the following table:

**Table 15-2 Service Charge Options**

Option	Description
1 - ON = Open; OFF = Preset	Select this option to make the service charge an open service charge, prompting the workstation operator for the amount or percentage. Deselect this option to use a preset amount or preset percentage for the service charge.
2 - ON = Amount; OFF = Percentage	Select this option to make the service charge an amount service charge. Deselect this option to make the service charge a percentage service charge.

**Table 15-2 (Cont.) Service Charge Options**

Option	Description
3 - Post to Charged Tips Total on Tip Reports	<p>Select this option to post the service charge to the Direct Charged Tips total and to add it to the Total Tips on employee tip reports. This setting records charged tips that employees receive directly from customers. If you select this option, workstation operators who use it must also enter a charged tip payment using a tendering key with Tender/Media option <b>Post to Charged Receipts on Tip Reports</b> set.</p> <p>Select either <b>3 - Post to Charged Tips Total</b> on Tip Reports or <b>11 - Do Not Post to Gross Receipts</b>, but not both.</p> <p>Select either <b>3 - Post to Charged Tips Total</b> on Tip Reports or <b>4 - Post to Service Charges Total on Tip Reports</b>, but not both.</p>
4 - Post to Service Charges Total on Tip Reports	<p>Select this option to post the service charge to the Service Charges total, but not the Total Tips or the Gross F&amp;B Receipts total. Use this option for service charges that are paid to the House. This setting records tips that employees receive as wages through payroll. Deselect this option to post the service charge to the Gross F&amp;B Receipts, but not the Service Charges total. The Service Charges total on tip reports meets the reporting requirements of United States IRS Form 8027, which states that this total should equal all tips that are paid to the employee as wages, and are less than 10% of the transaction total.</p> <p>Select either <b>3 - Post to Charged Tips Total</b> on Tip Reports or <b>4 - Post to Service Charges Total on Tip Reports</b>, but not both.</p>
5 - Reference Entry Required	<p>Selecting this option requires the workstation operator to enter a name or number when using the service charge.</p>
6 - Validation Required	<p>Select this option to print a validation chit when the workstation operator uses the service charge.</p>
7 - Non-Revenue Service Charge (No Post to Sales)	<p>Select this option to create a service charge that can be paid by credit card without posting to the Symphony sales totals. (A tracking group total can track this amount if necessary.) This option is often used to create a service charge for gift certificate sales as the customer can pay for the gift certificate with a credit card. When you select this option, you must configure the service charge as an amount service charge. A non-revenue service charge cannot post to a check that contains menu items. If the tender requires a cashier link, posting a non-revenue service charge also requires a cashier link. When using this option, deselect options <b>3</b> and <b>4</b>.</p>
8 - Taiwanese Paid Out	<p>Select this option to create a service charge records repayment of cash from a Taiwanese paid out.</p>

Table 15-2 (Cont.) Service Charge Options

Option	Description
9 - Reset Itemizer(s)	Select this option to reset service charge itemizers. This option prevents all service charges from being applied twice to menu items that post to the same service charge itemizers. Deselecting this option allows multiple service charges to apply to the same service charge itemizers.
10 - Service Charge Adds to Guest Count	Select this option to increment the transaction's guest count by one every time the service charge applies to the transaction. This option is often used for non-revenue service charges that apply as cover charges. Selecting the RVC Parameter option <b>8 - Use Number of Seats for Guest Count</b> overrides the setting of this option. When the workstation operator presses the <b>Number of Guests</b> key during a transaction, the guest count no longer increments when the service charge applies to the transaction. The workstation operator must maintain the guest count manually from that point.
11 - Do Not Post to Gross Receipts	Select this option to prevent this service charge from posting to gross F&B receipts on tip reports. This is intended for service charges that meet the United States Internal Revenue Service's definition of non-allocable receipts (as defined in the IRS Instructions for Form 8027). Deselecting this option allows the service charge to post to gross F&B receipts on the tip reports. Select either <b>3 - Post to Charged Tips Total</b> on Tip Reports or <b>11 - Do Not Post to Gross Receipts</b> , but not both.
12 - Item is Shareable	Select this option to share the item between two or more seats or two or more checks when using TouchEdit or TouchSplit.
13 - Cash Tips	Select this option to add the Direct Cash Tips total on the tip reports. Selecting option <b>3 - Post to Charged Tips Total on Tip Reports</b> or <b>4 - Post to Service Charges Total on Tip Reports</b> overrides this option. This option is used in a cashier environment where the customer leaves the table and pays their check directly with a cashier. After paying the bill, the cashier can post a value to a Cash Tip Service Charge. This Cash Tip Service Charge posts to the employee's Direct Cash Tips total on the Employee Tip Report.
14 - Service Charge Used For Stored Value Transactions	Select this option if the service charge is used for stored value transactions.
15 - Mask Account Number	Use this option for service charges with reference entries. Select this option to mask the account number (often a gift card number or other reference entry) on guest checks and customer receipts. Deselect this option to keep the text un-masked.



**Table 15-2 (Cont.) Service Charge Options**

Option	Description
16 - Encrypt Service Charge Reference Entry	Use this option for service charges with reference entries. Select this option to encrypt the reference entry (in the Oracle Hospitality relational database) that is associated with the service charge. Deselect this option to post the unencrypted reference entry information to the relational database.
17 - Use Floor Amount (Automatic Service Charges Only)	This option only applies to the service charge in revenue centers where it is used as an automatic service charge. Select this option to require a minimum value for the automatic service charge. Then enter the minimum floor amount in the Amount field, which is only active for percentage service charges when you select option <b>17</b> .
18 - Gift Certificate Sold	Select this option to create a service charge that can be paid without posting to the application's sales totals. (A tracking group total can track the amount if necessary.) This option is similar to <b>7 - Non-Revenue Service Charge</b> , except that menu items can be present on the check in addition to the service charge. When you select this option, you must configure the service charge as an amount. If a tender requires a cashier link, posting a non-revenue service charge also requires a cashier link. Selecting this option dims option <b>7</b> .
21 - Post To Till Totals	Select this option if you are using Enterprise Cash Management (ECM) and the server must be assigned to a till when applying the service charge. Deselect this option if the ECM accounting method is set to <b>Server Banking</b> .
22 - Add to Checks Begun/Paid Count if Non-Revenue	This option applies to the service charge if it is configured as non-revenue (option <b>7</b> is set). Selecting this option increases the checks begun or paid count on reports when the non-revenue service charge applies to a transaction. Deselecting this option results in no change to the checks begun or paid count.
23 - Rental Deposit	Select this option to use the service charge as a rental deposit. Rental deposits work with the deposit handling feature and are necessary to apply a deposit to a check. Service charges with this option set may be non-revenue service charges. However, unlike traditional non-revenue service charges, a check may contain more than one rental deposit service charge.
26 - Configure as Banquet Tip	Select this option to include the amount of the service charge transaction in the Tip line item of the banquet check.
27 - Configure as Banquet Fee	Select this option to include the amount of the service charge transaction in the Fees line item based upon the selected service charge on the banquet check.

5. Click **Save**.

- [Adding Discount and Service Charge Keys to the Transaction Page](#)

### Related Topics

- [Service Charges](#)

## Adding Discount and Service Charge Keys to the Transaction Page

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page (typically the Transaction page) on which to place the **Discount** and **Service Charge** buttons.
3. On the **Edit** tab, select the page area in which to define the **Discount** and **Service Charge** buttons.
4. Click **Button** to add a button.
5. On the **General** subtab, enter the button name in the **Legend** field.
6. Select the appropriate function from the **Type** drop-down list:
  - **Discount**
  - **Service Charge**
7. Click the black arrow beneath the **Type** drop-down list.
8. Select one of the following, and then click **OK**:
  - **Discount amount or percentage**
  - **Service Charge amount or percentage**
9. Position and size the button on the page. Use the Style arrow to change the color.
10. Click **Save**.

- [Configuring Discount Privileges](#)
- [Configuring Discounts](#)

### Related Topics

- [Automatic Discounts](#)
- [Understanding Automatic Discount Rules](#)
- [Understanding Awarding Algorithms](#)
- [Discount Award Types](#)
- [Discount Exclusivity](#)
- [Simple Exclusivity](#)
- [Group Exclusivity](#)
- [Configuring Service Charges](#)

### Related Topics

- [Service Charges](#)

## Understanding Menu Item Fees

You can apply one or more menu item service charge fees (for example, a bottle deposit and a recycling fee) combined as a service charge group to a menu item. When the workstation operator adds a menu item (for example, Diet Coke) associated with a service charge group, the application adds the menu item fees under the service charge group to the check. Auditors can track the revenue from specific menu item fees, such as a recycling fee.

- [Service Charges](#)

### Related Topics

- [Configuring Menu Item Fees](#)

## Configuring Menu Item Fees

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Service Charge Groups**.
2. Insert a new service charge group or double-click the service charge group record.
3. Add or remove service charges to be included with this service charge group using the **Add** and **Delete** links.
4. Click **Save**.
5. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Classes**.
6. Double-click the menu item class record.
7. On the **General** tab, select the **Service Charge Group** from the drop-down list to apply to the menu item class record.
8. Click **Save**.
9. Select the Enterprise level, click **Configuration**, and then click **Roles**.
10. Select the role type, click the **Operations** tab, and then click the **Voids/Returns** subtab.
11. Select **Authorize/Perform Void of Fees**.
12. Click **Save**.
13. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
14. Add the **Display/Hide Menu Item Fees** function key.  

Workstation operators use the **Display/Hide Menu Item Fees** function key to show or hide menu item fees on the workstation.
15. Click **Save**.

### Related Topics

- [Service Charges](#)
- [Understanding Menu Item Fees](#)

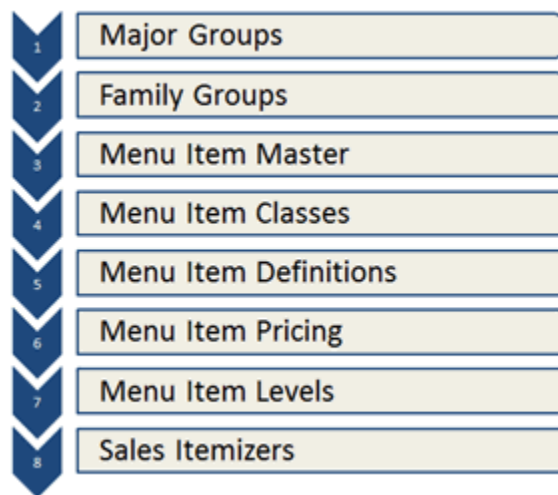
# 16

## Menu Items

A menu item is the foundation of transactions. Anything ordered is a menu item. In restaurants, food and drinks are menu items. In retail stores, shirts and hats are also considered menu items. Therefore, any item being sold is a menu item.

Oracle recommends configuring menu items in the following order:

**Figure 16-1 Sequence for Configuring Menu Items**



- [Configuring Menu Item Functionality on the Workstation](#)
- [Configuring Menu Item Availability for Multiple Definitions at the Workstation](#)
- [Adding and Disabling Menu Items](#)
- [Adding Menu Item Keys to the Transaction Page](#)
- [Searching and Filtering Menu Items](#)

## Configuring Menu Item Functionality on the Workstation

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Classes**.
2. Double-click a menu item class.
3. To allow the main level of the transaction to change to another level when a workstation operator orders a menu item from this class, select a new **Main Level Popup**.
4. To allow the sub level of the transaction to change to another level when a workstation operator orders a menu item from this class, select a new **Sub Level Popup**.

5. To allow the transaction to return to the default main level after a workstation operator orders a menu item from this class, select **Main Level Default**.
6. To allow the transaction to return to the default sub level after a workstation operator orders a menu item from this class, select **Sub Level Default**.
7. Click the **Options** tab, and then select the appropriate options:

**Table 16-1 Menu Item Functionality Options at the Workstation**

Option	Description
10 - ON = Use Sub Level Pricing; OFF = Use Main Level Pricing	Select this option for an item with multiple price definitions, to have the workstation use sub level pricing for the menu item class.
26 - Keep Main Level With Repeat Rounds	Select this option to have the items in the class use the same main menu level that was in effect during the most recent service round when ordered using the <b>Repeat Round</b> touchscreen button.
27 - Keep Sub Level With Repeat Rounds	Select this option to have the items in the class use the same sub menu level that was in effect during the most recent service round when ordered using the <b>Repeat Round</b> touchscreen button.
28 - Print Main Level Prefix and Suffix	Select this option to show the main menu level prefixes or suffixes on the check detail area and print on guest checks and customer receipts.
29 - Print Sub Level Prefix and Suffix	Select this option to show the sub menu level prefixes or suffixes on the check detail area and print on guest checks and customer receipts.
69 - Prompt to lookup menu item definition based on current menu levels (Repeat Rounds)	Select this option to prompt workstation operators to run a fresh menu item definition lookup based on the current active menu levels when a repeatable menu item is unavailable.  You must also select options <b>26 - Keep Main Level With Repeat Rounds</b> and <b>27 - Keep Sub Level With Repeat Rounds</b> .

8. Click **Save**.
  - [Configuring Menu Item Availability for Multiple Definitions at the Workstation](#)
  - [Adding and Disabling Menu Items](#)
  - [Adding Menu Item Keys to the Transaction Page](#)
  - [Setting Main, Sub, and Custom Menu Levels](#)
  - [Setting the Default Main and Sub Levels for Serving Periods](#)
  - [Configuring Auto Menu Levels](#)
  - [Setting the Default Menu Levels for a Revenue Center](#)
  - [Configuring Active Menu Levels for Menu Item Definitions](#)

### Related Topics

- [Menu Levels](#)

## Configuring Menu Item Availability for Multiple Definitions at the Workstation

By default, the **Menu Item Availability** function key only allows workstation operators to adjust the availability of the first menu item definition. To allow workstation operators to edit all definitions of an item from the workstation:

1. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
2. Click the **Options** tab, and then select **66 - Manage Menu Item Availability/Out of Item for each Menu Item Definition**.
3. Click **Save**.

- [Configuring Menu Item Functionality on the Workstation](#)
- [Adding and Disabling Menu Items](#)
- [Adding Menu Item Keys to the Transaction Page](#)

## Adding and Disabling Menu Items

Adding a menu item is a different process than adding records in other EMC modules. You can add master records, definition records, and price records at the same time for the Enterprise from the Menu Item Maintenance module. These instructions explain how to add menu item master records with definition and price records. For information about adding masters, definitions, and prices individually, see the appropriate section:

- [Configuring Master Records for Menu Items](#)
  - [Configuring Menu Item Definitions](#)
  - [Configuring Menu Item Prices](#)
1. To add menu items from the EMC, select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
  2. Insert a record.
  3. If you opened Menu Item Maintenance at the revenue center level, from the **Select a task to perform** drop-down list, select **Add Master Record from Template**.
  4. Click **Select** adjacent to the **Master to Copy** field, and then select a template record.
  5. Enter the **Name** of the new menu item.
  6. Enter the **Record Number** of the item. By default, this field shows the next available record number after the selected record to copy.
  7. If you selected **Add Master Record from Template**, select **Copy Menu Item Names** to copy all existing primary and foreign names, including Long Descriptors, from the original menu item to the new menu item.

8. If the menu item is priced the same for the entire Enterprise or property, select **Use the same price for all records**, and then enter the price in the text box next to the option.
  9. If the menu item has more than one definition and price, select **Configure Prices Individually**, enter the price for the first definition in the **Price** column, and then click **OK** to add the menu item.
  10. To add another menu item, click **Yes** when prompted, and repeat Steps 4 through 9.
  11. When you have finished adding items, click **No**.
  12. Click **Save**.
  13. To disable a menu item, select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
  14. Double-click the menu item to disable.
  15. Click the **General** tab, and then deselect all main and sub levels from the Menu Level Availability section.
  16. Click **Save**.
- [Configuring Menu Item Functionality on the Workstation](#)
  - [Configuring Menu Item Availability for Multiple Definitions at the Workstation](#)
  - [Adding Menu Item Keys to the Transaction Page](#)

## Adding Menu Item Keys to the Transaction Page

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
  2. Open the Front of House page (typically the Transaction page) on which to place the menu item buttons.
  3. On the **Edit** tab, select the page area in which to define the menu item buttons.
  4. Click **Button** to add a button.
  5. On the **General** subtab, enter the button name in the **Legend** field.
  6. From the **Type** drop-down list, select **Menu Item**.
  7. Click the black arrow beneath the **Type** drop-down list.
  8. Select the menu item, and then click **OK**.
  9. From the **Menu Item Display Name** drop-down list, select the appearance for the menu item name.
  10. Position and size the button on the page. Use the Style arrow to change the color.
  11. Click **Save**.
  12. Repeat Steps 4 through 11 to create keys for each menu item.
- [Configuring Menu Item Functionality on the Workstation](#)
  - [Configuring Menu Item Availability for Multiple Definitions at the Workstation](#)
  - [Adding and Disabling Menu Items](#)

## Searching and Filtering Menu Items

The Menu Item Maintenance module allows you to search for menu items. Typically several thousand menu item records are likely to exist. Searching and filtering allows you to work with only the desired menu item records. By default, no items appear in table view.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
2. To view all records, click **Search** without entering search criteria.  
Depending on the number of menu items, this step may take several minutes.
3. To view specific menu item records, enter information in the relevant search fields, and then click **Search**:
  - **Record Type**: Select the type of record to find (**Menu Item Master**, **Menu Item Definition**, or **Menu Item Price**). When both a **Menu Item Master** and a revenue center are selected, Symphony returns only master records with definitions in the selected revenue center.
  - **Name Search**: Enter the menu item name (partial or full) to search. Only records containing the text in the name field for the specified language are returned. Menu Item Definition and Price searches will look for the text in either the Name 1 or Name 2 fields. Entering Shrimp Cocktail returns the specific record; a family group search on Appetizers returns results more quickly.
  - **Major Group**: Enter a major group number or a range of major group numbers to include in the search.
  - **Family Group**: Enter a family group number or a range of family group numbers to include in the search.
  - **Master Group**: Enter a menu item master group number or a range of master group numbers to include in the search.
  - **Object Number or Range**: Enter an object number or range of object numbers to include in the search.
  - **Show Master w/Defs Only**: Select to show only menu item master records that contain one or more definitions for this zone or property. Deselect to show all menu item master records for this level or above.
  - **Map Menu Item Overrides**: Select to show the Menu Item Override indicator, which allows you to see other locations in the Enterprise where the item is configured. Deselect to exclude the Menu Item Override indicator. As the system needs to check the entire enterprise for the menu item, the search results will take longer to generate. Therefore, set this option only when there is a specific need to see this information.
  - **Class**: Enter a menu item class or range of menu item classes to include in the search when querying menu item definitions or menu item prices.
  - **SLU**: Enter a SLU or range of SLUs to include in the search when querying menu item definitions or menu item prices.
  - **Sales Itemizer**: Enter a sales itemizer or range of sales itemizers to include in the search when querying menu item definitions or menu item prices.



# 17

## Categorizing Menu Items into Groups

### Major Groups

A major group is a basic category of a menu item, such as Food or Liquor. Every menu item belongs to a major group. Examples of major groups include:

- Food
- Liquor
- Beer
- Wine

You can configure major groups based on your database and reporting needs. For example, you can configure major groups to represent leased outlets so that an accountant can immediately see sales figures for a tenant.

### Family Groups

A family group is a category of menu items. Every menu item belongs to a family group. A family group is a subcategory of a major group. For example, if the major group is Food, its family groups are

- Appetizer
- Salad
- Dessert
- Entrée
- [Configuring Major Groups](#)
- [Configuring Family Groups](#)

### Related Topics

- [Configuring Menu Item Groups](#)
- [Menu Item Groups](#)

### Related Topics

- [Configuring Major Groups](#)
- [Menu Item Groups](#)

### Related Topics

- [Configuring Family Groups](#)

## Configuring Major Groups

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Major Groups**.

2. Insert a new record, and then enter a name for the major group (for example, Food).
3. Enter a number other than 0 (zero) in the **Report Group** field.  
For example, you can enter 1 for the Food major group and enter 2 for the Liquor major group. When you enter 0 (zero), the menu item does not appear on the Menu Item Report.
4. Click **Save**.

#### Related Topics

- [Categorizing Menu Items into Groups](#)
- [Menu Item Groups](#)

## Configuring Family Groups

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Family Groups**.
2. Insert a new record, and then enter a name for the family group (for example, Appetizers).
3. Enter a number other than 0 (zero) in the **Report Group** field.  
For example, you can enter 1 for all family groups associated with Food and enter 2 for all family groups associated with Liquor. When you enter 0 (zero), the menu item does not appear on the Menu Item Report.
4. Select the **Parent Major Group** to which the new family group belongs.
5. Click **Save**.

#### Related Topics

- [Categorizing Menu Items into Groups](#)
- [Menu Item Groups](#)

# Menu Item Master Records

A menu item master record is a property-level menu item record. This record resides at the top of the menu item hierarchy, and its primary purpose is to appear in reports. A menu item master:

- Does not appear on workstation touchscreens
- Does not have a price

A menu item can have only one menu item master per property (for example, one Shrimp Cocktail master record exists).

- [Configuring Master Records for Menu Items](#)

## Related Topics

- [Configuring Master Records for Menu Items](#)

## Configuring Master Records for Menu Items

You can add master records for menu items, along with menu item definitions and prices, using a template record. If there are no template records to use when creating a property, you can add only a menu item master record, without adding definitions and prices.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
2. Click **Insert** on the toolbar.
3. From the **Select a task to perform** drop-down list, select **Add Master Record Without a Template**, and then enter the **Name** of the new menu item.
4. Select a **Major Group** and a **Family Group** for the menu item.
5. Enter a **Report Group** number between 1 and 99 for the menu item.

Menu Item Reports sort and list subtotals by Report Group. When the Report Group number is 0 (zero), the menu item does not show on Menu Item Reports.

6. Select the appropriate value for the object number:
  - To insert the menu item in the next available position, select **Next Available Position**.
  - To define the record number or range for the new menu item record or records, select **Record Number Or Range**, and then enter the record numbers or ranges.
7. Click **OK**.

## Related Topics

- [Menu Item Master Records](#)

# 19

## Menu Item Classes

A menu item class consists of a set of options that apply to similar menu items in a revenue center. A menu item class specifies important information, including:

- The tax class associated with the menu items
- The two types of menu items: Regular and Condiments
- The functionality of menu levels after ordering an item
- The order devices to which the items print

Configuring similar menu items into a class is easier than individually setting each menu item's order device output or condiment settings. For example, the menu items Coke, Diet Coke, Sprite, and Root Beer all share the following characteristics:

- Receive the same tax rates
- Do not require condiments
- Print to the same order device

Therefore, you can create one menu item class called Soda and make all soda menu items a part of this class.

- [Configuring Menu Item Classes](#)

### Related Topics

- [Configuring Menu Item Classes](#)
- [Condiments](#)

### Related Topics

- [Configuring Menu Item Classes](#)

## Configuring Menu Item Classes

For information about configuring menu item classes for condiments and fixed price meals, see [Creating Menu Item Classes for Condiment Groups](#).

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Classes**.
2. Insert a new record, and then enter a name for the new menu item class.
3. Double-click the new menu item class.
4. On the **General** tab, configure the appropriate settings:

**Table 19-1 General Menu Item Class Fields**

Field	Description
Tax Class	Select the tax class to apply to the menu item class. To leave the tax class blank, select <b>0 - None</b> . <a href="#">Tax Rates and Tax Classes</a> contains more information about tax classes.
Main Level Popup	Select the Main Level of the transaction that becomes active after ordering a menu item from the menu item class.
Sub Level Popup	Select the Sub Level of the transaction that becomes active after ordering a menu item from the menu item class.
Privilege Group	Select a Privilege Group number to restrict the use of menu items in the menu item class to employees who are linked to the same Privilege Group. To enable all employees to order items in the menu item class, select <b>0</b> (zero).
Sales Itemizer	Select the Sales Itemizer that is associated with this Menu Item Class. The Sales Itemizer is often used for interface (Property Management System) purposes, or to replace the Subtotal on printed guest checks and customer receipts. You can either see the Subtotal, or Food, Liquor, Beer, and Wine.
Discount Itemizer	Select the discount itemizer to determine which discounts can apply to specific menu items.
Srv Chrg Itemizer	Select the Service Charge Itemizer that is associated with this Menu item Class. The Service Charge Itemizer is used to determine which Service Charges can be applied to specific menu items. Note that the automatic service charge is unaffected by this setting; only Menu Item Class Option <b>12 – Add to Automatic Service Charge Itemizer</b> affects the Automatic Service Charge posting.

Table 19-1 (Cont.) General Menu Item Class Fields

Field	Description
HALO	<p>Enter the High Amount Lock Out (HALO) value for menu items in this Menu Item Class. This field represents the total dollar amount of the items that are being ordered, and it is often used for Open Priced menu items. For example, if this field is set to 50, the operator is prompted to confirm items in this class if they exceed 50.00. Note that the entered value must contain all zeroes except for the first digit. Valid values are: 2, 20, 200, 2000. Invalid values are 45, 450, 405.</p> <p>HALO is also often used for preset priced menu items to safeguard against erroneous entry. For example, the price of Coffee is \$1.00. A workstation operator could post 1 Coffee, 5 Coffees or 10 Coffees if someone is getting coffee for their entire office. It is unlikely that someone would order 100 Coffees (\$100). It is likely that someone ordering 10 Coffees inadvertently presses an extra 0 when entering the quantity.</p>
Pricing Calculation	<p>Select the calculation method to use for pricing menu items in the class.</p> <ul style="list-style-type: none"> <li>To base the price on the amount entered, select <b>0 - Based on entered count</b></li> <li>To base the price on the rounded up count, select <b>1 -Based on sales count when sales rounded up.</b></li> </ul>
Count Display	<p>Select the manner in which the amount appears for a decimal item on the workstation and printers.</p> <ul style="list-style-type: none"> <li><b>0 - Show entered amount</b></li> <li><b>1 - Show sales count amount with entered count as reference</b></li> </ul> <p>The count for an item can be entered as a decimal. There are two counts kept for an item; the entered amount, and the sales count. The sales count is always the entered amount if the entered amount is a whole number. If the entered amount is not a whole number then the sales count is the entered amount, only rounded up. For example, if a user enters 1.5, then the entered amount is 1.5 and the sales count is 2. This field determines whether the entered amount or the sales count appears on workstations and printers.</p>
Count Entry	<p>Select the manner in which workstation operators can enter the sales count of an item in the class.</p>

**Table 19-1 (Cont.) General Menu Item Class Fields**

Field	Description
Print Group	Enter the Print Group (1-99). The sorting mechanism uses this value for receipt printing, check detail, and order output devices. When the items are set to use groups for sorting, the items appear from lowest group number to highest.
Print Class	Select the print class for the menu item class.  If the Condiment Prefix Type is set to anything except <b>0 - Not a Prefix</b> , prefix condiments follow the same print class setting chosen for the condiment with which they are associated.
KDS Highlight Scheme	Select the KDS Highlight Scheme color to display menu items on the KDS.
Condiment Prefix Type	Select the prefix type associated with the condiment type.
Next Page/Panel	Select a Page or Panel that the order screen switches to after a menu item associated with this class is ordered. <ul style="list-style-type: none"> <li>• <b>Page:</b> From the drop-down list, select the next screen to which the workstation user is directed.</li> <li>• <b>Panel:</b> If you select a tabbed template, this area specifies which tab to navigate to after pressing the button.</li> </ul> <p>To use the Next Page functionality in the Menu Item Classes module, Oracle recommends that you configure a Sales SLU screen in the Page Design module, and then select this newly created SLU page from the Page drop-down list and <b>Save</b>.</p> <p>Ensure that menu items are assigned the proper SLU from the Menu Item Definition record; this allows workstation operators to add the menu item from the SLU page.</p> <p>To enable a hard-coded menu item key to navigate to another page, configure the Next Page/Panel fields for the actual menu item key in the Page Design module.</p>
Maximum Refill Count	Enter the maximum number of refills allowed (up to 99).
Refill Descriptor	Enter the optional label to identify refill items when printed on order chits (up to 12 characters).
Service Charge Group	Select the Service Charge Group to apply to this Menu Item Class. Select <b>0 - None</b> for no service charge.

5. Click the **Options** tab, and then select the appropriate options.

**Table 19-2 Menu Item Class Options**

Option	Description
1 - ON = Open-Priced Menu Items; OFF = Preset Menu Items	Select this option to require workstation operators to enter a price when adding a menu item in the class. Deselect this option if you are using preset prices.
3 - Negative Priced Menu Items	Select this option to have menu items in this class post a negative price. This option causes a minus sign (-) to appear before the price.
4 - Increment Seat Number With Sale of these Menu Items	Select this option to increase the seat number each time a workstation operator adds a menu item in the class. This feature is not available when seat filtering is active.
5 - Reference Entry Required	Select this option to require workstation operators to enter a reference entry when adding menu items in the class. The text that is entered outputs to order devices, checks, receipts, and journals.
6 - Validation Required	Select this option to print a validation chit at the validation printer designated in the Workstation module.
7 - Item Discounts May Be Applied to these Menu Items	Select this option to allow menu items in the class to be discounted with an item discount (manual discount only).
8 - Allow Menu Items in this Class to be Non-Priced	Select this option to allow menu items in the class to be non-priced. When selected, priced menu items in this class post a sales and count total when ordered, and appear on reports; non-priced items do not post a sales count and do not appear on reports. Priced menu items do not require an entry on the Menu Item Price form.
10 - ON = Use Sub Level Pricing; OFF = Use Main Level Pricing	Select this option to apply Sub Level pricing to menu items assigned to the menu item class.
11 - Add to Guest Count	<p>Select this option to increase the guest count each time a workstation operator adds menu items that are assigned to the class. When this option is selected and the Guest Count field is set to 0, Symphony increments the guest count in the transaction by one.</p> <p>If a workstation operator uses the <b>Number of Guests</b> function key during a transaction, the guest count no longer increments when menu items in the class are added to the check.</p> <p>Revenue Center Parameters option <b>8 - Use Number of Seats for Guest Count</b> overrides this option.</p>



**Table 19-2 (Cont.) Menu Item Class Options**

Option	Description
12 - Add to Automatic Service Charge Itemizer	Select this option to add sales of the menu items in this class to the Automatic Service Charge itemizer. Automatic service charges apply to all menu items associated with Menu Item Classes where this option is enabled.
13 - Print Price on Order Chit	Select this option to print the menu item price on order devices. This option is typically used with open-priced menu items. Order Devices option <b>Wrap Condiments</b> overrides this option.
14 - Do Not Put in Transaction Detail	Select this option to prevent zero-priced or non-priced menu items in the class from printing, appearing, or posting.
17 - Print Name 1 and Name 2 on Checks	Select this option to print the First Name and the Second Name (from the Menu Item's Definition record) of all menu items associated with the class on guest checks. For example, with wine menu items, the First Name shows the name of the wine, while the Second Name shows the Bin Number and the type of wine.
18 - Print Name 2 on Order Output instead of Name 1	Select this option to print the Second Name, if defined, of menu items associated with this class on order devices. If a Second Name is not defined, the First Name is used. Order Devices option <b>11 - Print Both Menu Item Names</b> overrides this option.
19 - Use Name 2 on Touchscreens instead of Name 1	Select this option to show the Second Name, if defined, of menu items in this class on touchscreen keys. If a Second Name is not defined, the First Name is used. This applies to names shown on Menu Item and Condiment SLU's, but not to Direct Access keys.
24 - LDS Items (International LDS Only)	Select this option if all menu items in this class can be ordered using an International Liquor Dispensing System (ILDS). Deselect if using a North American Dispensing System (NALDS).
33 - Do Not Download to Mobile MICROS	Select this option to prevent items assigned this menu item class from downloading to Mobile clients. This option decreases the database size loaded onto Mobile clients, which may have tighter restrictions on memory and drive-space than regular workstation clients.
38 - Item is Shareable	Select this option to allow menu items in the class to be shared between two or more seats, or two or more checks.

**Table 19-2 (Cont.) Menu Item Class Options**

Option	Description
39 - Retail Item	Select this option to designate all menu items in this class as retail items. Retail items do not post to Gross Food and Beverage receipts.
41 - Consolidate Menu Items with Condiments on Order Output	<p>Select this option to consolidate parent menu items on Order Device Output, and then to print each condiment with its seat number to which the condiment applies. (The Order Device option, <b>Print Seat Numbers with Individual Items</b> must be enabled). For example, if this option is enabled, and an operator orders Chicken Wings with condiments 'Extra' and 'Sauce' on Seat 1, and Chicken Wings with condiments 'Without' and 'Bleu Cheese' on Seat 2, then the Order Device Output shows the following:</p> <p>Seat 1,2: Chicken Wings S1 Extra S1 Sauce S2 Without S2 Bleu Cheese</p>
43 - Include in CRM/TMS Check Detail Status Update	Select this option to indicate whether a menu item associated with this class is sent to TMS with the check detail status message.
45 - Use KDS/Dining Course Number	Select this option to use KDS/Dining Coursing with the menu item class.
62 - Count Menu Item	<p>Select this option to allow the menu item count to appear on the KDS or at the bottom of the requisition chit from a local or remote printer. To use the Count menu item feature with a KDS, assign a KDS Chit Layout Style containing a menu item count element (for example, #301 - Chit-Std-DOM ). You must also select the Order Devices KDS option <b>11 - Display Menu Item Count</b> for the order device.</p> <p>To be counted, you must send a menu item to at least one KDS Display.</p> <p>This feature informs the expediter or bagger of how many items go into the bag for carry-out or quick service orders.</p>
66 - Print Name 3 on Order Output instead of Name 1	<p>Select this option to print the menu item definition's Third Name, if defined, on order devices for all menu items in this class. If a Third Name is not defined, the First Name is used.</p> <p>Menu Item Classes option <b>18 - Print Name 2 on Order Output instead of Name 1</b> and Order Devices option <b>11 - Print Both Menu Item Names</b> overrides this option.</p>

**Table 19-2 (Cont.) Menu Item Class Options**

Option	Description
68 - Print Name 3 on Checks	Select this option to print the menu item definition's Third Name, if defined, on guest checks for menu items in this class. <b>17 - Print Name 1 and Name 2 on Checks</b> overrides this option.
70 - Use Name 2 on OCB instead of Name 1	Select this option to show the menu item definition's Second Name, if defined, on an Order Confirmation Board (OCB). If a Second Name is not defined, the First Name is used.
74 - Prevent Menu Items from Being Held	Select this option to prevent menu items belonging to this menu item class from being held.
75 - KDS Sort Priority Above Normal	See Prioritizing Menu Item Classes on KDS Displays in the <i>Oracle Hospitality Symphony KDS Configuration and User Guide</i> for more information.

6. Click **Save**.

**Related Topics**

- [Menu Item Classes](#)

**Related Topics**

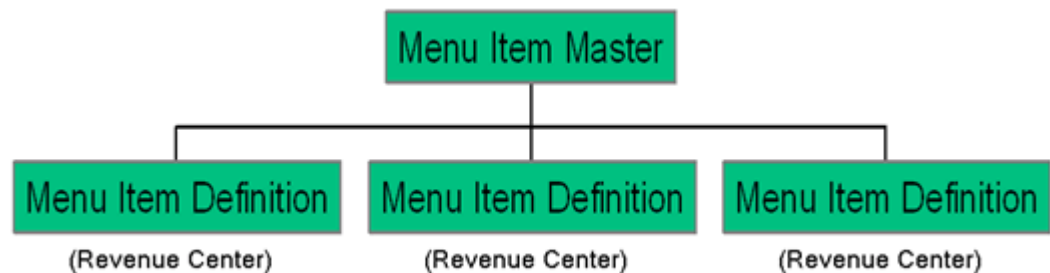
- [Menu Item Classes](#)
- [Condiments](#)

## Menu Item Definitions

A menu item definition record is a revenue center-level menu item record. Menu item definitions determine how menu item master records act, how and when they appear to a workstation operator, including:

- Screen look up (SLU) on which the menu item appears
- Menu item class to which it belongs
- Menu levels where the item is active
- Name of the item that appears on touchscreens

Menu item definitions are the records that customers can order. Menu item definitions appear on touchscreens and print on order chits, guest checks, and customer receipts. A menu item can have up to 64 menu item definitions in a revenue center for a single menu item master. The following figure shows the relationship between the menu item master and menu item definitions.



When customers order menu items (configured as menu item definitions), the sale count of the menu item master increases. This is the purpose of the menu item master record. Only one instance of the item needs to exist in a property, but multiple menu item definitions allow this master record to behave differently.

- [Configuring Menu Item Definitions](#)
- [Allowing Users to Override Restricted Menu Item Ranges](#)

### Related Topics

- [Configuring Menu Item Definitions](#)
- [Allowing Users to Override Restricted Menu Item Ranges](#)

## Configuring Menu Item Definitions

The Major and Family Groups assigned to the corresponding Master are shown here for reference and are generally used for filtering purposes.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.

2. Double-click the menu item master record corresponding to the definition to open it.
3. Click the **General** tab, and then configure the following information:

- **Def Sequence #:** If more than one definition exists for this item, select the Menu Item Definition number to change to another definition of this item. For example, a Vodka menu item can have two definitions: one appears on a SLU and prompts for a modifier; and another as the item that is prompted for, for instance, if a Martini requires the type of Vodka. The definition sequence number is the number of the definition in the revenue center for the master record. Up to 64 definitions can exist in one revenue center for a single Menu Item Master.
- (Optional) **First Name:** Enter the name for the Menu Item Definition, which appears on the workstation, KDS Displays, guest checks, customer receipts, and order device output.
- (Optional) **Second Name:** Enter an alternate second name for the menu item to use on touchscreen keys or order device output depending on Menu Item Classes options **18 - Print Name 2 on Order Output instead of Name 1** and **19 - Use Name 2 on Touchscreens instead of Name 1**. Leave this field blank to use the First Name by default.

The output to order device printers appears double wide, showing fewer characters than single wide output. Oracle recommends enabling option **18 - Print Name 2 on Order Output instead of Name 1**, because only 12 characters print to order devices, but 16 are allowed as the Definition Name.

**Second Name** is sometimes used when the kitchen staff does not use the native language. This field is also used when Order Devices option **11 - Print Both Menu Item Names** is set for a wine order device. This allows the **First Name** of the wine, while the **Second Name** represents the Bin number and type of wine.

- (Optional) **Third Name:** Enter the third name for a definition to use for search operations with the **Order Menu Item By Name 3** function key.
- (Optional) **Long Descriptor:** Enter the descriptor to print on guest checks and receipts, below the menu item and price.
- **Menu Item Class:** Select the Menu Item Class to assign to this definition.
- **Print Class Override:** Select the Print Class for the menu item definition to override its menu item class setting. Select option **0** to use the menu item class setting.
- **Mobile MICROS SLU:** Select the MMH SLU key to which the definition belongs. When the operator presses a SLU button on the Mobile MICROS device, all menu items belonging to that SLU appear. Do not link more than 1,024 menu items to a single MMH SLU.
- (Optional) **Icon:** Select the icon to assign to the menu item as it appears on SLU screens. Use of icons may slow workstation performance.
- (Optional) **NLU Group:** Select the number of the NLU Group to assign to this menu item.
- (Optional) **NLU Number:** Enter a unique NLU number for the menu item. Up to 12 digits are allowed.
- (Optional) **Surcharge:** Enter the surcharge for the menu item, if **4 - Surcharge** is enabled in the Tax Rates module.

- **Guest Count:** Enter the guest count for the menu item to increment the check guest count when added. For example, if a catering order consists of 2 Catering Appetizer Platters, each representing 10 guests as defined here, the guest count on the check will be 20. You must select **11 - Add to Guest Count** in the Menu Item Class module.

This value does not affect the guest count when **8 - Use Number of Seats for Guest Count** is set in the Revenue Center Parameters module. If the workstation operator presses the **Number of Guests** key during a transaction, the guest count no longer increments when menu items are added to the check.

- **Main Level Link:** Select the Main Levels on which the definition is active. Click **All** to make the definition active on all Main Levels. Click **None** to deselect all Main Levels.
- **Sub Level Link:** Select the Sub Levels on which the definition is active. Click **All** to make the definition active on all Sub Levels. Click **None** to deselect all Sub Levels.
- **Prefix Level Override:** Select to allow the condiment prefix to override the price level of the item it modifies. You must select **65 - Support Enhanced Prefix Mode (Parent Only)** in the Menu Item Class module.

4. Click **Save**.

- [Allowing Users to Override Restricted Menu Item Ranges](#)

#### Related Topics

- [Menu Item Definitions](#)

## Allowing Users to Override Restricted Menu Item Ranges

You can allow users to add, edit, and delete menu item master records, definitions, and prices for menu item object numbers that are set as restricted in the Properties module.

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Double-click an employee role.
3. Click the **EMC Modules** tab.
4. From the Menu Items section, select the **Edit** privilege option for **Menu Item Master Restriction**.
5. Click **Save**.

- [Configuring Menu Item Definitions](#)

#### Related Topics

- [Menu Item Definitions](#)

# 21

## Menu Item Pricing

A menu item price is the amount charged for the sale of a menu item. In Symphony, menu item prices are configured per menu item definition. Typically a menu item definition is set with one price. You can set a definition with multiple prices (for example, separate prices for a small, medium, and large soda), or no price (common for condiments).

When multiple prices are active for a menu item definition, the workstation searches the prices assigned to the definition starting with price sequence number 1, then price sequence number 2, and so on. The workstation adds the first price that meets the active level to the check. For example, based on the configuration described in the following table, the item price is \$8.00 when ordered on menu level 7, and \$4.00 when ordered at any other level. The workstation's logic is:

- The current level of the transaction is level 5.
- Price number 1 for the item is active on level 7. Continue to the next price.
- Price number 2 for the item is active on level 0. This represents any level. The item is \$4.00.

**Table 21-1 Correct Menu Prices and Levels**

Price Sequence Number	Price	Level
1	8.00	7 - Double
2	4.00	0 - All Levels

When configuring multiple prices, you must always configure the 0 - All Levels price level as the last price sequence number for the definition. For example, in the following table, the configurations in the previous table are reversed.

**Table 21-2 Incorrect Menu Prices and Levels**

Price Sequence Number	Price	Level
1	4.00	0 - All Levels
2	8.00	7 - Double

The workstation's logic is:

- The current level of the transaction is level 7.
- Price number 1 for the item is active on level 0; this includes all levels. The item is \$4.00.

The item price \$8.00 never becomes active because the 0 - All Levels price level is set as the first price sequence for the definition.

- [Configuring Menu Item Prices](#)

### Related Topics

- [Configuring Menu Item Prices](#)

## Configuring Menu Item Prices

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
2. Click **Search** to show all menu items, and then double-click a menu item master record.
3. Click **Prices**, and then click the **Insert** button on the toolbar.
4. Select **Price Sequence #1**, enter the **Default Price** for the menu item, and then click **OK**.
5. Configure the price record. The following table describes the price record fields:

**Table 21-3 Price Record Configuration Fields**

Field	Description
(Optional) Prep Cost	Enter the menu item prep cost.
Tax Class Override	To allow the menu item price to use a different tax class than the tax class configured for the menu item definition, select a new tax class from the list.  If you select <b>0 - None</b> , the price uses the tax class configured for the menu item class associated with the menu item definition.
Service Charge Group	If the price includes a service charge, select a service charge group from the list.
Active on Level	Select the main or sub menu level in which this price becomes active.  Select <b>0 - All Levels</b> to make the price active for all menu levels.
Options	If the price applies for the item when ordered as a course for a fixed price meal, select <b>1 - Price for Fixed Price Meal Course</b> .  If the price applies when the item is ordered as a course for a fixed price meal as well as when ordered as a normal menu item entry, select <b>2 - Price for Fixed Price Meal Course and Regular Menu Item</b> .
Effectivity Group	To make the price active at a specific date and time, select the corresponding effectivity group from the list.

6. Click **Save**.
7. Repeat Steps 3 through 6 to add price definitions for the menu item.

### Related Topics

- [Menu Item Pricing](#)



## Menu Levels

Menu levels determine where and when a workstation operator exists during a transaction. Symphony uses menu levels to:

- Determine what workstation operators can and cannot access during a transaction. For example, shared revenue centers are often configured so that two revenue centers are active on different transaction levels, making some items visible to one revenue center, while the other revenue center shows different items.
- Allow different prices for one menu item.

A main menu level and a sub menu level are always active. You can determine which levels are active by default (using the menu level hierarchy) and allow workstation operators to change the levels during a transaction using a function key or menu level pop-ups. You can also configure the status bar in the lower area of the workstation to show main and sub level names that are active.

### Auto Menu Level

You can set the main menu level, sub menu level, or both to change automatically at a specific time of day. This configuration is called auto menu level, and controls pricing at different times of a day or week. For example, a revenue center can offer an Early Bird Special (entrées are 20% off) every weekday from 3:00 p.m. to 6:00 p.m. For the Early Bird Special to automatically occur, you can set an auto menu level from 3:00 p.m. to 6:00 p.m. Monday through Friday. Set menu item definitions with multiple prices accordingly (one price for the Early Bird level and another general price).

You can set auto menu levels to overlap (although this is uncommon). In this case, menu levels become active based on the order in which you set the auto menu levels. After the workstation determines that one level is active, it does not look at the other auto menu levels. Therefore, you must pay special attention when configuring multiple auto menu levels that occur on the same days at the same times.

As an example, based on the configuration described in the following table, at 3:00 p.m., the main level becomes 2 - Early Bird. The main level does not change to 3 - Free Drinks at 4:00 p.m. When a transaction begins, the workstation considers the auto menu level table in the order of the configured auto levels. The workstation checks the status of auto menu level and because it is active, the workstation continues to use the Early Bird menu level. In this example, the Free Drinks menu level never becomes active.

**Table 22-1 Example of Incorrect Auto Menu Levels**

Num ber	Main Level	Start	End	Days Active
1	2 - Early Bird	15:00	18:00	Monday–Friday
2	3 - Free Drinks	16:00	17:00	Monday–Friday

According to the configuration in the following table, at 3:00 p.m. the main level become 2 - Early Bird, and at 4:00 p.m. the main level becomes 3 - Free Drinks. This occurs because the Free Drinks level is set at auto level 1, and starts after Early Bird, which is set at auto level 2.

**Table 22-2 Example of Correct Auto Menu Levels**

Number	Main Level	Start Time	End Time	Days Active
1	3 - Free Drinks	16:00	17:00	Monday–Friday
2	2 - Early Bird	15:00	18:00	Monday–Friday

The workstation's logic for these two menu levels is explained in the following table.

**Table 22-3 Workstation Logic**

Time	Logic
15:00	Is auto level 1 active? No Is auto level 2 active? Yes. Active main level is 2 - Early Bird
16:00	Is auto level 1 active? Yes. Active level is 3 - Free Drinks
17:00	Is auto level 1 active? No Is auto level 2 active? Yes. Active main level is 2 - Early Bird
18:00	Is auto level 1 active? No Is auto level 2 active? No The main level is 1 - Regular, which is the default menu level for the revenue center

### Menu Level Hierarchy

The following menu level hierarchy determines which setting controls the default transaction menu levels:

**Table 22-4 Menu Level Hierarchy**

Number	Enterprise Management Console (EMC) Configuration	Description
1	Serving Periods	If the active serving period has a main or sub level that is not 0, that is the active main or sub level.
2	Auto Menu Levels table	If the time of day falls during an active auto menu level, the main or sub level that is specified for that auto menu level is the active level.
3	Transaction Menu Level Defaults	If the main or sub level set in the RVC Parameters module is not 0, that is the active main or sub level.
4	Main 1 and sub 1 are always defaults	If the other hierarchy rules have not been met, the workstation defaults to main level 1 and sub level 1.

### Menu Level Configuration Tasks

Setting up menu levels consists of completing the following tasks:

- Set up main, sub, and custom menu levels
- Configure the default main and sub levels for serving periods
- Configure auto menu levels
- Configure the default menu levels for a revenue center
- Configure the active menu levels for menu item definitions
- Configure the functionality of menu items at the workstation
- [Setting Main, Sub, and Custom Menu Levels](#)
- [Setting the Default Main and Sub Levels for Serving Periods](#)
- [Configuring Auto Menu Levels](#)
- [Setting the Default Menu Levels for a Revenue Center](#)
- [Configuring Active Menu Levels for Menu Item Definitions](#)

### Related Topics

- [Setting Main, Sub, and Custom Menu Levels](#)
- [Setting the Default Main and Sub Levels for Serving Periods](#)
- [Configuring Auto Menu Levels](#)
- [Setting the Default Menu Levels for a Revenue Center](#)
- [Configuring Active Menu Levels for Menu Item Definitions](#)
- [Configuring Menu Item Functionality on the Workstation](#)

## Setting Main, Sub, and Custom Menu Levels

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Level Sets**.
2. To create a custom menu level, insert a new record, and then enter a custom level set name.
3. To define main menu levels, double-click **Main**.
4. To define sub menu levels, double-click **Sub**.
5. To define menu levels for a custom level set, double-click the new custom level that you created in Step 2.
6. Select the appropriate options:
  - a. To change the menu level to the default level when the workstation operator presses a touchscreen button corresponding to any menu level in this menu level set again, select **1 - Pressing level key again reverts to default level**.
  - b. If the menu level set is bound to a Default Master Group and you want the POS client to switch the active parent menu item when the active menu level changes, select **2 - Bound to parent**.
7. (Optional) Select the **Default Master Group** for the menu level set.

8. From the Menu Level Entries section, define the menu levels (for example, Breakfast, Lunch, and Dinner).
9. (Optional) Enter the **Prefix** or **Suffix** for each menu level to show on the check detail area and print on guest checks and customer receipts.
10. To define a menu level as the default level for the menu level set:
  - a. In the Options column, click the ellipsis point (...) button adjacent to the default menu level.
  - b. Select **1 - Default**, and then click **OK**.
11. To define a menu level as an anonymous level for the menu level set:
  - a. In the Options column, click the ellipsis point (...) button adjacent to the anonymous menu level.
  - b. Select **2 - Anonymous**, and then click **OK**.

The Default and Anonymous menu levels are generic, and are typically used with \$0.00 priced menu item definitions that have names such as {SIZE} Hot Drink or {TEMP} Drink.

12. Click **Save**.

- [Setting the Default Main and Sub Levels for Serving Periods](#)
- [Configuring Auto Menu Levels](#)
- [Setting the Default Menu Levels for a Revenue Center](#)
- [Configuring Active Menu Levels for Menu Item Definitions](#)
- [Configuring Menu Item Functionality on the Workstation](#)

#### Related Topics

- [Menu Levels](#)

## Setting the Default Main and Sub Levels for Serving Periods

1. Select the revenue center, click **Configuration**, and then click **Serving Periods**.
2. Double-click a serving period record.
3. On the **General** tab, select the **Default Main Level**, and then select the **Default Sub Level**.
4. Click **Save**.

- [Setting Main, Sub, and Custom Menu Levels](#)
- [Configuring Auto Menu Levels](#)
- [Setting the Default Menu Levels for a Revenue Center](#)
- [Configuring Active Menu Levels for Menu Item Definitions](#)
- [Configuring Menu Item Functionality on the Workstation](#)

#### Related Topics

- [Menu Levels](#)

## Configuring Auto Menu Levels

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Auto Menu Levels**.
  2. In the **Start** column, enter the time at which the menu level becomes active.
  3. In the **End** column, enter the time at which the menu level becomes inactive.
  4. Select the **Main Level**, and then select the **Sub Level**.
  5. Click the ellipsis point (...) button from the **Options** column.
  6. Select **1 - This Entry is Active**, and then select one or more of the following options that correspond with the days that the menu level becomes active:
    - **2 - Active On Sunday**
    - **3 - Active On Monday**
    - **4 - Active On Tuesday**
    - **5 - Active On Wednesday**
    - **6 - Active On Thursday**
    - **7 - Active On Friday**
    - **8 - Active On Saturday**
  7. Click **Save**.
- [Setting Main, Sub, and Custom Menu Levels](#)
  - [Setting the Default Main and Sub Levels for Serving Periods](#)
  - [Setting the Default Menu Levels for a Revenue Center](#)
  - [Configuring Active Menu Levels for Menu Item Definitions](#)
  - [Configuring Menu Item Functionality on the Workstation](#)

### Related Topics

- [Menu Levels](#)

## Setting the Default Menu Levels for a Revenue Center

1. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
2. On the **General** tab, select the **Default Main Level**, and then select the **Default Sub Level**.
3. Click the **Options** tab, and then set the main and sub menu levels as follows:
  - To set the workstation to remain at the current main menu level after completing a transaction, select **23 - Retain Current Main Level after a Transaction**.
  - To set the workstation to remain at the current sub menu level after completing a transaction, select **24 - Retain Current Sub Level after a Transaction**.
4. Click **Save**.

- [Setting Main, Sub, and Custom Menu Levels](#)
- [Setting the Default Main and Sub Levels for Serving Periods](#)
- [Configuring Auto Menu Levels](#)
- [Configuring Active Menu Levels for Menu Item Definitions](#)
- [Configuring Menu Item Functionality on the Workstation](#)

**Related Topics**

- [Menu Levels](#)

## Configuring Active Menu Levels for Menu Item Definitions

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
2. Search for and then double-click a menu item master record.
3. If the menu item has multiple definitions, select a definition, and then click the **General** tab.
4. From the Menu Level Availability section, select the active main and sub levels for the item.
5. To set the menu item definition as active on all menu levels, click **All**.
6. To set the menu item definition as active on a custom menu level:
  - a. Click **Menu Levels Tab**, select a **Menu Level Set**, and then select the menu levels.
  - b. To set the definition as active on all custom levels, select **Active on All Levels**.
7. If the menu item has multiple price records click **Prices**, and then select the **Active Menu Level** for each price definition.

If the menu item belongs to a class that uses sub level pricing (Menu Item Class option **10 - ON = Use Sub Level Pricing; OFF = Use Main Level Pricing** is set), the application only lists sub levels. Otherwise, the application only lists the main levels.

8. Click **Save**.

- [Setting Main, Sub, and Custom Menu Levels](#)
- [Setting the Default Main and Sub Levels for Serving Periods](#)
- [Configuring Auto Menu Levels](#)
- [Setting the Default Menu Levels for a Revenue Center](#)
- [Configuring Menu Item Functionality on the Workstation](#)

**Related Topics**

- [Menu Levels](#)

# 23

## Sales Itemizers

When the workstation operator adds items to a check, Symphony maintains various subtotals, known as itemizers, in the background. An itemizer is a bucket where totals accumulate. Symphony uses sales itemizers to separate menu item sales into categories such as food, beverage, and merchandise. You can configure up to 16 sales itemizers.

- [Configuring Sales Itemizers](#)

### Configuring Sales Itemizers

1. Select the Enterprise level, click **Descriptors**, and then click **Sales Itemizers**.
2. In the **Text** column, enter the names for each descriptor.
3. Click **Save**.

# 24

## Screen Look Up (SLU)

Similar to a number look up (NLU), a screen look up (SLU) is a touchscreen button that gives workstation operators access to a list of items, except the workstation shows each item in the list as a separate touchscreen button. For example, the Open Check SLU shows separate touchscreen buttons for each open check within the revenue center. When a workstation operator presses a SLU (for example, appetizers), the workstation shows all menu items belonging to that SLU group. Typically menu item buttons are not added directly to a touchscreen, but instead menu items are usually linked to SLU groups.

You can configure screen look ups for the following items:

- Menu Items
- Discounts
- Service Charges
- Family Groups
- Major Groups
- Custom Reports
- Open Checks
- [Configuring Screen Look Ups for Menu Items](#)
- [Configuring Screen Look Ups for Discounts](#)
- [Configuring Screen Look Ups for Service Charges](#)
- [Configuring Screen Look Ups for Family Groups](#)
- [Configuring Screen Look Ups for Major Groups](#)
- [Configuring Screen Look Ups for Custom Reports](#)
- [Configuring Screen Look Ups for Open Checks](#)

## Configuring Screen Look Ups for Menu Items

1. Select the Enterprise, property, revenue center, or zone, click **Descriptors**, and then click **Menu Item**.
2. Enter names for menu item screen look up groups (for example, Breakfast, Lunch, and Dinner) in the Text column, and then click **Save**.
3. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
4. Double-click a menu item, and then click **General**.
5. Select the relevant **SLU** group from the Touchscreen Properties section.
6. (Optional) Enter a **SLU Sort Priority** for the menu item.
7. Repeat Steps 4 and 5 for all menu items to appear on screen lookups.



8. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
  9. Double-click the transaction page on which you want the screen look up to appear on the workstation.
  10. Click **Other** in the Page Design toolbar, and then click **Sales SLU**.
  11. Select **Menu Item** from the **Type** drop-down list, select **SLU** as the **Property**, and then select the menu item screen lookup group as the **Value**.
  12. Select the **Menu Item Display Name**, and then click **Save**.
  13. If the revenue center uses hand held POS client devices:
    - a. Select **Dynamic SLU** as the **Property**, and then select a menu item screen look up group as the **SLU Value**.
    - b. Enter a non-zero value for the **Visual State(s)**.

The application uses the Visual State value to link menu item screen look ups with their corresponding Visual State buttons, which workstation operators use to change the menu items that appear in the Dynamic SLU.
    - c. To add more screen look ups to the Dynamic SLU, click **Add**.
    - d. Select the **Menu Item Display Name**, and then click **Save**.
    - e. Insert buttons for each screen look up that you added to the Dynamic SLU.

For example, if you added five screen look up groups to the Dynamic SLU, insert five buttons.
    - f. Select **Function** from the **Type** drop-down list, and then select **Visual State** from the **Function** list.
    - g. In the **Arguments** field, enter the **Visual State** value that you assigned to a screen look up group in Step 13-b.
    - h. Click **Save**.
- [Configuring Screen Look Ups for Discounts](#)
  - [Configuring Screen Look Ups for Service Charges](#)
  - [Configuring Screen Look Ups for Family Groups](#)
  - [Configuring Screen Look Ups for Major Groups](#)
  - [Configuring Screen Look Ups for Custom Reports](#)
  - [Configuring Screen Look Ups for Open Checks](#)

## Configuring Screen Look Ups for Discounts

1. Select the Enterprise, property, or zone, click **Descriptors**, and then click **Discount**.
2. Enter names for discount screen look up groups in the Text column, and then click **Save**.
3. Select the Enterprise property, or zone, click **Configuration**, and then click **Discounts**.
4. Double-click a record, and then click **NLU/SLU**.

5. Select the relevant **SLU** group for the discount, and then click **Save**.
  6. Repeat Steps 3 through 5 for all discounts to appear in screen lookups.
  7. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
  8. Double-click the transaction page on which you want the screen look up to appear on the workstation.
  9. Click **Other** in the Page Design toolbar, and then click **Sales SLU**.
  10. Select **Discount** from the **Type** drop-down list, and then select the discount screen lookup group from the **Value** drop-down list.
  11. Click **Save**.
- [Configuring Screen Look Ups for Menu Items](#)
  - [Configuring Screen Look Ups for Service Charges](#)
  - [Configuring Screen Look Ups for Family Groups](#)
  - [Configuring Screen Look Ups for Major Groups](#)
  - [Configuring Screen Look Ups for Custom Reports](#)
  - [Configuring Screen Look Ups for Open Checks](#)

## Configuring Screen Look Ups for Service Charges

1. Select the Enterprise property, or zone, click **Descriptors**, and then click **Service Charge**.
  2. Enter names for service charge screen look up groups in the **Text** column.
  3. Click **Save**.
  4. Select the Enterprise property, or zone, click **Configuration**, and then click **Service Charges**.
  5. Double-click a record, and then click **NLU/SLU**.
  6. Select the relevant **SLU** group for the service charge.
  7. Click **Save**.
  8. Repeat Steps 4 through 7 for all service charges to appear in screen lookups.
  9. Select the Enterprise, property, revenue center, or zone, click **Configuration** and, and then click **Page Design**.
  10. Double-click the transaction page on which you want the screen look up to appear on the workstation.
  11. Click **Other** in the Page Design toolbar, and then click **Sales SLU**.
  12. Select **Service Charge** from the **Type** drop-down list, and then select the service charge screen lookup group as the **Value**.
  13. Click **Save**.
- [Configuring Screen Look Ups for Menu Items](#)
  - [Configuring Screen Look Ups for Discounts](#)

- [Configuring Screen Look Ups for Family Groups](#)
- [Configuring Screen Look Ups for Major Groups](#)
- [Configuring Screen Look Ups for Custom Reports](#)
- [Configuring Screen Look Ups for Open Checks](#)

## Configuring Screen Look Ups for Family Groups

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Double-click the transaction page on which you want the screen look up to appear on the workstation.
3. Click **Other** in the Page Design toolbar, and then click **Sales SLU**.
4. Select **Menu Item** from the **Type** drop-down list, select **Family Group** as the **Property**, and then select the family group to show in the screen look up as the **Value**.
5. Select the **Menu Item Display Name**.
6. Click **Save**.

- [Configuring Screen Look Ups for Menu Items](#)
- [Configuring Screen Look Ups for Discounts](#)
- [Configuring Screen Look Ups for Service Charges](#)
- [Configuring Screen Look Ups for Major Groups](#)
- [Configuring Screen Look Ups for Custom Reports](#)
- [Configuring Screen Look Ups for Open Checks](#)

## Configuring Screen Look Ups for Major Groups

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Double-click the transaction page on which you want the screen look up to appear on the workstation.
3. Click **Other** in the Page Design toolbar, and then click **Sales SLU**.
4. Select **Menu Item** from the **Type** drop-down list, select **Major Group** as the **Property**, and then select the major group to show in the screen look up as the **Value**.
5. Select the **Menu Item Display Name**.
6. Click **Save**.

- [Configuring Screen Look Ups for Menu Items](#)
- [Configuring Screen Look Ups for Discounts](#)
- [Configuring Screen Look Ups for Service Charges](#)
- [Configuring Screen Look Ups for Family Groups](#)

- [Configuring Screen Look Ups for Custom Reports](#)
- [Configuring Screen Look Ups for Open Checks](#)

## Configuring Screen Look Ups for Custom Reports

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Double-click the transaction page on which you want the screen look up to appear on the workstation.
3. Click **Other** in the Page Design toolbar, and then click **Sales SLU**.
4. Select **Custom Report** from the **Type** drop-down list.
5. Click **Save**.

- [Configuring Screen Look Ups for Menu Items](#)
- [Configuring Screen Look Ups for Discounts](#)
- [Configuring Screen Look Ups for Service Charges](#)
- [Configuring Screen Look Ups for Family Groups](#)
- [Configuring Screen Look Ups for Major Groups](#)
- [Configuring Screen Look Ups for Open Checks](#)

## Configuring Screen Look Ups for Open Checks

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Double-click the transaction page on which you want the screen look up to appear on the workstation.
3. Click **Other** in the Page Design toolbar, and then click **Check SLU**.
4. To set the screen look up (SLU) to show open checks belonging to all employees, select **All Employees**.
5. To set the SLU to show open checks belonging to only the signed in employee, select **Currently Signed In Employee**.
6. Select the type of open checks to appear on the SLU:

**Table 24-1 Open Check Options**

Open Check SLU Option	Description
All Checks	Select this option to show all open checks.
Autofire Checks Only	Select this option to show only open checks that are configured to send to order devices at a preset time.
All Except Autofire Checks	Select this option to hide open checks that are configured to send to order devices at a preset time.

**Table 24-1 (Cont.) Open Check Options**

Open Check SLU Option	Description
Checks with Held Items Only	Select this option to show only open checks with items on hold.
All Except Checks with Held Items	Select this option to hide checks with items on hold.
All Except Autofire and Checks with Held Items	Select this option to hide open checks with items on hold and checks that are configured to send to order devices at a preset time.
Autofire Checks with Held Items Only	Select this option to show only open checks that are configured to send to order devices at a predefined time and have items on hold.

7. To show only open checks that belong to specific order types (for example, Dine-in or Take Out), select one or more **Order Types**, and then click **Add**.
8. Click **Save**.
  - [Configuring Screen Look Ups for Menu Items](#)
  - [Configuring Screen Look Ups for Discounts](#)
  - [Configuring Screen Look Ups for Service Charges](#)
  - [Configuring Screen Look Ups for Family Groups](#)
  - [Configuring Screen Look Ups for Major Groups](#)
  - [Configuring Screen Look Ups for Custom Reports](#)

## Number Look Up (NLU)

A number look up (NLU) is a touchscreen button that allows workstation operators to access a numbered list of items. The workstation operator can select one of the following items in the list or enter the relevant NLU number to apply the item to the transaction:

- Discounts
- Main Levels
- Service Charges
- Sub Levels
- Tender/Media

If you want items to appear in NLU, you must configure a valid NLU number greater than zero (0) for each record. In an improperly configured database, it is possible for two records to have the same NLU number. If this occurs, the workstation applies the lowest numbered record (by object number) to the check. When showing discounts, service charges, and tender/media records, the workstation takes the active menu level of the transaction into consideration.

- [Configuring Number Look Ups for Discounts](#)
- [Configuring Number Look Ups for Service Charges](#)
- [Configuring Number Look Ups for Tender/Media Records](#)
- [Configuring Number Look Ups for Main and Sub Levels](#)

### Configuring Number Look Ups for Discounts

1. Select the Enterprise or property, click **Configuration**, and then click **Discounts**.
  2. Double-click a record, and then click **NLU/SLU**.
  3. Enter a unique **NLU** number for the discount.  
You can enter a value between 1 and 255.
  4. Click **Save**.
  5. Repeat Steps 2 through 4 for all discounts to appear in the number look up.
  6. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
  7. Double-click the transaction page on which you want the number look up to appear on the workstation.
  8. Insert a new button, select **Function** from the **Type** drop-down list, select **Discount NLU** from the **Function** list, and then click **OK**.
  9. Click **Save**.
- [Configuring Number Look Ups for Service Charges](#)

- [Configuring Number Look Ups for Tender/Media Records](#)
- [Configuring Number Look Ups for Main and Sub Levels](#)

## Configuring Number Look Ups for Service Charges

1. Select the Enterprise or property, click **Configuration**, and then click **Service Charges**.
2. Double-click a record, and then click **NLU/SLU**.
3. Enter a unique **NLU** number for the service charge.  
You can enter a value between 1 and 255.
4. Click **Save**.
5. Repeat Steps 2 through 4 for all service charges to appear in the number look up.
6. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
7. Double-click the transaction page on which you want the number look up to appear on the workstation.
8. Insert a new button, select **Function** from the **Type** drop-down list, select **Service Charge NLU** from the **Function** list, and then click **OK**.
9. Click **Save**.

- [Configuring Number Look Ups for Discounts](#)
- [Configuring Number Look Ups for Tender/Media Records](#)
- [Configuring Number Look Ups for Main and Sub Levels](#)

## Configuring Number Look Ups for Tender/Media Records

1. Select the Enterprise or property, click **Configuration**, and then click **Tender/Media**.
2. Double-click a record.
3. Enter a unique **NLU** number for the tender/media record.  
You can enter a value between 1 and 255.
4. Click **Save**.
5. Repeat Steps 2 through 4 for all tender/media records to appear in the number look up.
6. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
7. Double-click the transaction page on which you want the number look up to appear on the workstation.
8. Insert a new button, select **Function** from the **Type** drop-down list, select **Tender/Media NLU** from the **Function** list, and then click **OK**.
9. Click **Save**.

- [Configuring Number Look Ups for Discounts](#)

- [Configuring Number Look Ups for Service Charges](#)
- [Configuring Number Look Ups for Main and Sub Levels](#)

## Configuring Number Look Ups for Main and Sub Levels

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
  2. Double-click the transaction page on which you want the number look up to appear on the workstation.
  3. Insert a new button, select **Function** from the **Type** drop-down list, select either **Main Level NLU** or **Sub Level NLU** from the **Function** list, and then click **OK**.
  4. Click **Save**.
- [Configuring Number Look Ups for Discounts](#)
  - [Configuring Number Look Ups for Service Charges](#)
  - [Configuring Number Look Ups for Tender/Media Records](#)



## Weighed Menu Items

A weighed menu item is measured in ounces, pounds, or kilograms and is priced per unit of measurement (for example, lobster is sold by the pound). You can measure the weight manually or automatically. The workstation calculates the price regardless of the weight entry method.

- Manual: The workstation operator can use the **Item Weight** function key and enter the weight of the item.
- Automatic: A scale attached to a workstation can automatically calculate the weight of the item.
- [Configuring a Weighed Menu Item](#)
- [Understanding Tare Weight](#)
- [Setting the Tare Weight for a Menu Item](#)
- [Understanding Tare Weight](#)

### Related Topics

- [Setting the Tare Weight for a Menu Item](#)
- [Configuring a Weighed Menu Item](#)
- [Configuring a Scale](#)

## Configuring a Weighed Menu Item

There are two ways to configure a weighed menu item:

1. Assign the menu item to a menu item class that has option **15 - Weighed Items** set.
2. Set a Tare Weight for menu item definition. See [Understanding Tare Weight](#) and [Setting the Tare Weight for a Menu Item](#) for more information.

- [Setting the Tare Weight for a Menu Item](#)
- [Configuring a Scale](#)

### Related Topics

- [Weighed Menu Items](#)
- [Understanding Tare Weight](#)

## Understanding Tare Weight

Tare weight is the weight of a container or wrapper that is deducted from the gross weight to obtain the net weight. Tare weight is used to accurately measure the weight of a weighed menu item. For example, in a restaurant with a salad bar where salad is sold by weight, the customer should not be charged for the weight of the container. To

prevent this, a tare weight is configured for the salad menu item, and the weight of the salad's container is automatically subtracted from the weight of the salad.

When a weighed menu item posts to a guest check or customer receipt, the weight and tare weight (if set) appear and factor into the calculations with the same level of precision. The level of precision is determined by the Unit of Measure (UOM) as follows:

- Kilograms: 0.000
- Pounds: 0.00
- Ounces: 0.0

This precision formatting meets the United States Department of Agriculture Weights and Measures requirements for scale certification.

The UOM must match in the Enterprise Management Console (EMC) configuration and on the scale setting. For example, the scale must measure in ounces and EMC must be set to use ounces. You cannot set the scale to measure in ounces and set EMC to measure in pounds. When a mismatch occurs between the scale and EMC, the POS client rejects the posting and informs the workstation operator that there is a UOM mismatch due to configuration in EMC.

- [Weighed Menu Items](#)

#### Related Topics

- [Setting the Tare Weight for a Menu Item](#)
- [Configuring a Weighed Menu Item](#)
- [Configuring a Scale](#)

## Setting the Tare Weight for a Menu Item

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
2. Click **Search** to show all menu items, and then double-click a menu item master record.
3. Click the **Definition Records** tab in the lower area of the screen.
4. In the **Tare Weight** field, enter the weight of the empty package for an item that is sold by weight.
5. Click **Save**.
6. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Control Parameters**.
7. Click the **Options** tab, and then select **13 - Convert Weight to System Unit of Measure**.

You must set this option in the United States to comply with the Department of Agriculture Weights and Measure requirements. Setting this option allows the POS client to convert the item weight to the property's UOM if the UOM received from a scale does not correspond to the UOM set from the Property Parameters module.

8. Click **Save**.
- [Configuring a Weighed Menu Item](#)

- [Configuring a Scale](#)

**Related Topics**

- [Weighed Menu Items](#)
- [Understanding Tare Weight](#)

## Menu Item Waste

Menu Item Waste describes menu items that are not sold to customers due to reasons such as spillage, spoilage and quality standards. There are three main characteristics of a menu item waste check:

- A menu item waste check does not post to sales.
- Inventory is depleted when the application posts waste.
- A menu item waste check closes after posting. Service Total and Print functions close a waste check.

When menu item waste occurs, authorized workstation operators can begin a menu item waste check and then enter wasted menu items. Wasted menu items appear in the waste reports. Managers can generate Waste reports by revenue center, menu item, employee, and waste reason. Depending on the reasons for waste, managers can take action to reduce inventory loss. You can differentiate waste checks from other checks in the Employee Journal Report and the Check Journal Report by the Waste Check banner on the check header.

The following table lists the functional differences between menu item waste checks and guest checks.

**Table 27-1 Differences Between Waste Checks and Guest Checks**

Function	Menu Item Waste Checks	Guest Checks
Kitchen Display Systems (KDS) or screen lookups display the check	No	Yes
Reopen a closed check	No	Yes
Apply discounts	No	Yes
Apply taxes	No	Yes
Apply service charges	No	Yes
Apply guest count	No	Yes
Return item	No	Yes
Edit seat	No	Yes
Split check	No	Yes
Gift card or credit card operations	No	Yes
Send and Stay	No	Yes
Hold and Fire	No	Yes
Transaction void	No	Yes
Transaction return	No	Yes
Menu item availability	No	Yes

Complete the following tasks to set up the Menu Item Waste feature:

- Configure employee privileges to begin waste checks and run waste check reports
- Define reasons for menu items declared as waste
- Configure waste receipt headers and trailers
- (Optional) Hide price details on waste checks
- Add a Declare Waste button to the touchscreen page
- [Allowing Employees to Begin Waste Checks and Run Waste Check Reports](#)
- [Configuring Waste Reasons](#)
- [Configuring Waste Receipt Headers and Trailers](#)
- [Hiding Price Details on Waste Checks](#)
- [Creating the Declare Waste Button](#)
- [Menu Item Waste Reports](#)

## Allowing Employees to Begin Waste Checks and Run Waste Check Reports

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, and then click the **Operations** tab.
3. To allow employees associated with this role to begin waste checks and to authorize other employees to begin waste checks, select **263 - Authorize/Begin Menu Item Waste Check**.
4. Select the appropriate report privileges as described in the following table:

**Table 27-2 Menu Item Waste Report Privileges**

Privilege Name	Allows the Employee to ...
31062 - Run Employee Waste Report	Run the Employee Waste Report from the workstation.
31063 - Run Menu Item Waste Report	Run the Menu Item Waste Report from the workstation.
31064 - Run Waste Summary Report	Run the Waste Summary Report from the workstation.
31065 - Run Waste Detail Report	Run the Waste Detail Report from the workstation.

5. Click **Save**.
- [Configuring Waste Reasons](#)
  - [Configuring Waste Receipt Headers and Trailers](#)
  - [Hiding Price Details on Waste Checks](#)
  - [Creating the Declare Waste Button](#)

### Related Topics

- [Menu Item Waste Reports](#)

## Configuring Waste Reasons

1. Select the Enterprise level, click **Descriptors**, and then click **Void/Return/Waste Reasons**.
2. To add a new waste reason, enter a waste reason in an empty row of the Text column, and then select **2 - Use for Waste** in the Options column.
3. To use an existing void or return reason as a waste reason, select **2 - Use for Waste** in the Options column adjacent to the void or return reason.  
The options work independently of each other; you can set one, both, or none.
4. Click **Save**.

- [Allowing Employees to Begin Waste Checks and Run Waste Check Reports](#)
- [Configuring Waste Receipt Headers and Trailers](#)
- [Hiding Price Details on Waste Checks](#)
- [Creating the Declare Waste Button](#)

### Related Topics

- [Menu Item Waste Reports](#)

## Configuring Waste Receipt Headers and Trailers

When you post a waste check, the guest check printer assigned to the workstation prints a waste receipt.

1. Select the Enterprise level, and then click **Descriptors**.
2. Select one of the following options, depending on whether you want to configure receipt headers or trailers:
  - **Waste Receipt Headers**
  - **Waste Receipt Trailers**
3. Perform one of the following actions:
  - Enter text for the header or trailer in the rows of the Text column.
  - Select a check box in the **Use Logo** column, and then select a logo using the ellipsis point (...) button in the **Logo** column.
4. Click **Save**.

- [Allowing Employees to Begin Waste Checks and Run Waste Check Reports](#)
- [Configuring Waste Reasons](#)
- [Hiding Price Details on Waste Checks](#)
- [Creating the Declare Waste Button](#)

### Related Topics

- [Menu Item Waste Reports](#)

## Hiding Price Details on Waste Checks

A waste check measures the cost of wasted inventory as opposed to a guest check that posts the prices of menu items to the sales totals.

Complete these steps if you do not want to show prices of waste menu items in the check detail area of the workstation screen or print prices on waste receipts.

1. Select the Enterprise level, click **Setup**, and then click **Format Parameters**.
2. Click the **Options** tab, and then select **56 - Do not display/print price for Waste**.
3. Click **Save**.

- [Allowing Employees to Begin Waste Checks and Run Waste Check Reports](#)
- [Configuring Waste Reasons](#)
- [Configuring Waste Receipt Headers and Trailers](#)
- [Creating the Declare Waste Button](#)

### Related Topics

- [Menu Item Waste Reports](#)

## Creating the Declare Waste Button

To declare waste, you need to add the **Declare Waste** function key to a page.

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place the **Declare Waste** button.
3. On the **Edit** tab, select the page area in which to define the **Declare Waste** button.
4. Click **Button** to add a button.
5. On the **General** subtab, enter the button name in the **Legend** field.
6. Select **Function** from the **Type** drop-down list.
7. Click the black arrow directly beneath the **Type** drop-down list, and then select **Declare Waste**.
8. Highlight the **Declare Waste** button.
9. Position and size the button on the page. Use the Style arrow to change the color.
10. Click **Save**.

- [Allowing Employees to Begin Waste Checks and Run Waste Check Reports](#)
- [Configuring Waste Reasons](#)
- [Configuring Waste Receipt Headers and Trailers](#)
- [Hiding Price Details on Waste Checks](#)

### Related Topics

- [Menu Item Waste Reports](#)

## Menu Item Waste Reports

Menu Item Waste Reports provide an overview of discarded menu items resulting from spillage, spoilage, or compromised quality standards so that you can take action to reduce inventory loss in your revenue center. You can generate waste reports by revenue center, menu item, employee, and waste reason. The following Menu Item Waste Reports are available:

- Waste Detail Report
- Waste Summary Report
- Employee Waste Report
- Menu Item Waste Report

The Waste Detail Report shows in-depth information about wasted menu items grouped by the waste reason, as described in the following table. You can filter the report data by waste reason.

**Table 27-3 Waste Detail Report**

Column	Shows
Check #	<ul style="list-style-type: none"> <li>• The reason for discarding the menu items or ingredients.</li> <li>• The waste check number.</li> <li>• The total number of menu items or ingredients discarded for the same waste reason.</li> </ul>
Employee	The name of the employee that created the waste check.
QTY Menu Item	The quantity wasted followed by the name of the wasted menu item or ingredient.
Amount	The price of the wasted menu items or ingredients.

The Waste Summary Report shows an overview of the menu items wasted and the corresponding waste quantity grouped by the waste reason, as described in the following table. You can filter the report data by waste reason.

**Table 27-4 Waste Summary Report**

Column	Shows
Waste Reason	<ul style="list-style-type: none"> <li>• The reason for discarding the menu items or ingredients.</li> <li>• The employee that recorded the waste (created the waste check).</li> <li>• The name of the wasted menu items or ingredients.</li> </ul>
Quantity	<ul style="list-style-type: none"> <li>• The quantity of menu items or ingredients wasted.</li> <li>• The total number of menu items or ingredients discarded for the same waste reason.</li> </ul>

The Employee Waste Report shows a summary of the waste checks created by each employee, as described in the following table. When you filter the Employee Waste



Report for an employee, the report shows a summary of the waste checks created by the selected employee.

**Table 27-5 Employee Waste Report**

Column	Shows
Employee	<ul style="list-style-type: none"> <li>The name of the employee that created the waste check.</li> <li>List of waste reasons added to the waste checks that were created by the employee.</li> </ul>
Quantity	<ul style="list-style-type: none"> <li>The quantity of menu items or ingredients that were wasted for each waste reason.</li> <li>The total number of menu items or ingredients discarded.</li> </ul>

The Menu Item Waste Report shows the waste reason and the quantity of menu items wasted grouped by menu item, as described in the following table. At the end of the report, a summary of menu items wasted for each family group is shown. You can filter the report by the family group.

**Table 27-6 Menu Item Waste Report**

Column	Shows
Item Name	<ul style="list-style-type: none"> <li>The name of the wasted menu item or ingredient.</li> <li>The reason for discarding the menu item or ingredient.</li> </ul>
Quantity	<ul style="list-style-type: none"> <li>The quantity corresponding to each menu item or ingredient wasted.</li> <li>The total number of menu items or ingredients discarded.</li> </ul>
Family Group	The family groups of each menu item wasted appear as a summary at the end of the report.
Quantity	<ul style="list-style-type: none"> <li>The number of menu items or ingredients wasted for each family group.</li> <li>The total number of menu items or ingredients discarded.</li> </ul>

#### Related Topics

- [Allowing Employees to Begin Waste Checks and Run Waste Check Reports](#)
- [Configuring Waste Reasons](#)
- [Configuring Waste Receipt Headers and Trailers](#)
- [Hiding Price Details on Waste Checks](#)
- [Creating the Declare Waste Button](#)

# 28

## Condiments

In Symphony, condiments are often instructions or modifiers, such as the words extra, add, substitute, and without. Condiments typically provide details to the cook preparing the menu item, such as a well-done steak or salad with ranch dressing. Other examples of condiments include ketchup, salt, and chocolate sprinkles.

Setting up condiments consists of completing the tasks listed in the following table:

**Table 28-1 Condiment Configuration Tasks**

Task	More Information
Create condiment groups	<a href="#">Configuring Condiment Groups</a>
Create menu item classes for the condiment groups	<a href="#">Creating Menu Item Classes for Condiment Groups</a>
Create menu item master records for condiments and assign to condiment classes	<a href="#">Creating Menu Item Master Records for Condiments</a>
Create condiment sets and assign condiments	<a href="#">Configuring Condiment Sets</a>
Assign condiments to parent menu item classes	<a href="#">Assigning Condiments to Parent Menu Item Classes</a>
Assign default condiments to parent menu items	<a href="#">Assigning Default Condiments to Parent Menu Items</a>
Create condiment prefixes	<a href="#">Configuring Condiment Prefixes</a>
Configure additional settings for condiment appearance on workstations, guest checks, and customer receipts	<a href="#">Setting Condiment Appearance</a>

- [Condiment Groups and Condiment Sets](#)
- [Configuring Condiment Groups](#)
- [Creating Menu Item Classes for Condiment Groups](#)
- [Creating Menu Item Master Records for Condiments](#)
- [Configuring Condiment Sets](#)
- [Assigning Condiments to Parent Menu Item Classes](#)
- [Assigning Default Condiments to Parent Menu Items](#)
- [Condiment Prefixes](#)
- [Creating Condiment Prefix Menu Items](#)
- [Creating Menu Items Classes for Prefixes](#)
- [Activating Condiment Prefixes](#)
- [Deactivating Condiment Prefixes](#)
- [Configuring Touchscreen Buttons for Condiment Prefixes](#)

- [Setting Condiment Appearance](#)
- [Understanding the Popup Condiment Orderer](#)
- [Configuring a Popup Condiment Orderer Page](#)
- [Configuring a Revenue Center to Use the Popup Condiment Orderer](#)
- [Configuring a Menu Item Class to Use the Popup Condiment Orderer](#)
- [Menu Item Classes](#)

#### Related Topics

- [Configuring Menu Item Classes](#)

## Condiment Groups and Condiment Sets

A condiment set defines the condiments that accompany the parent menu item. For example, a condiment set for a bacon cheeseburger includes the following condiments:

- Bacon
- Cheddar Cheese
- Mayonnaise
- Lettuce
- Ketchup

A condiment group defines the category to which a condiment set belongs and dictates its behavior.

#### Related Topics

- [Configuring Condiment Groups](#)
- [Creating Menu Item Classes for Condiment Groups](#)
- [Creating Menu Item Master Records for Condiments](#)
- [Configuring Condiment Sets](#)
- [Assigning Condiments to Parent Menu Item Classes](#)
- [Assigning Default Condiments to Parent Menu Items](#)
- [Setting Condiment Appearance](#)

## Configuring Condiment Groups

1. Select the Enterprise, property, revenue center, or zone, click **Descriptors**, and then click **Condiment Group Names**.
2. Enter condiment group names (for example, Meat Group or Cheese Group) in the **Text** field.
3. Click **Save**.

- [Creating Menu Item Classes for Condiment Groups](#)
- [Creating Menu Item Master Records for Condiments](#)
- [Configuring Condiment Sets](#)

- [Assigning Condiments to Parent Menu Item Classes](#)
- [Assigning Default Condiments to Parent Menu Items](#)
- [Setting Condiment Appearance](#)

#### Related Topics

- [Condiment Groups and Condiment Sets](#)

## Creating Menu Item Classes for Condiment Groups

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Classes**
2. Insert a new record, enter the class name, and double-click the new record.
3. On the **General** tab, select the **Condiment Order Type** from the drop-down list.
4. Click the **Options** tab, and then select **2 - ON = Condiment Menu Items; OFF = Regular Menu Items**.
5. To set no charge for the condiments in this class, select **8 - Allow Menu Items in this Class to be Non-Priced**.
6. To set each condiment in this class to print to a specific order device, select **22 - ON = Use Own Output Link; OFF = Use Parent's (Condiments Only)**.
7. Click the **Condiment Groups** tab, and then select the **Member Condiment Groups** for the class.

For example, if the condiment class is Deli Meat Class, select Meat Group from the Member Condiment Groups list.

8. Click **Save**.
9. Repeat Steps 2 through 8 to create menu item classes for all condiment groups.

- [Configuring Condiment Groups](#)
- [Creating Menu Item Master Records for Condiments](#)
- [Configuring Condiment Sets](#)
- [Assigning Condiments to Parent Menu Item Classes](#)
- [Assigning Default Condiments to Parent Menu Items](#)
- [Setting Condiment Appearance](#)

#### Related Topics

- [Condiment Groups and Condiment Sets](#)

## Creating Menu Item Master Records for Condiments

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
2. Insert a new record, and then enter the condiment name (for example, Ham).
3. Search for and then double-click the new record
4. Insert a definition record, and then click the **General** subtab.

5. From the Name and Class section, select the **Menu Item Class** for the condiment. For example, if the condiment is Ham, select Deli Meat Class.
6. To set a priced condiment:
  - a. Click the **Prices** subtab, insert a price definition, and then enter the **Price** for the condiment.
  - b. To set the price to become active at a specific menu level, select **Active On Level**, and then select the level.
7. Click **Save**.
8. Repeat Steps 2 through 6 to create menu item master records for all condiments.

- [Configuring Condiment Groups](#)
- [Creating Menu Item Classes for Condiment Groups](#)
- [Configuring Condiment Sets](#)
- [Assigning Condiments to Parent Menu Item Classes](#)
- [Assigning Default Condiments to Parent Menu Items](#)
- [Setting Condiment Appearance](#)

#### Related Topics

- [Condiment Groups and Condiment Sets](#)

## Configuring Condiment Sets

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Condiment Sets**.
2. Insert a new record, enter a name for the condiment group, and then double-click the new record.
3. Click **Add** from the Condiments section.
4. From the Menu Item column, click the ellipsis point (...) button, select a condiment from the list, and then click **OK**.
5. Enter the number of condiments that accompany the condiment group in the **Default Count** field.

For example, if the condiment is a slice of cheddar cheese and you enter number 2 as the default count, 2 slices of cheddar cheese accompany the condiment group.

6. In the **Sort Order** field, enter the order in which the workstation shows the condiment on screen.
7. If you want the condiment to remain in the order when the workstation operator changes a menu item to plain (for example, when a workstation operator changes the order to a plain bacon cheeseburger, the bacon and the cheese are not removed), click the ellipsis point (...) button from the **Options** column, select **1 - Persist On Plain**, and then click **OK**.
8. Enter the **Menu Item Definition Sequence** number that coincides with this condiment.

The Menu Item Definition Sequence number helps workstation operators switch between condiments. For example, the cheeseburger has two menu item

definitions. If the customer orders definition 1, the cheeseburger should have cheddar cheese and if the customer orders definition 2, the cheeseburger should have mozzarella cheese. When configuring the condiment group for the cheeseburger, you must enter 1 as the Menu Item Definition Sequence for the condiment cheddar cheese and 2 as the Menu Item Definition Sequence for the condiment mozzarella cheese.

9. Repeat Steps 3 through 8 to add more condiments to the condiment group.
10. Click **Save**.

- [Configuring Condiment Groups](#)
- [Creating Menu Item Classes for Condiment Groups](#)
- [Creating Menu Item Master Records for Condiments](#)
- [Assigning Condiments to Parent Menu Item Classes](#)
- [Assigning Default Condiments to Parent Menu Items](#)
- [Setting Condiment Appearance](#)

**Related Topics**

- [Condiment Groups and Condiment Sets](#)

## Assigning Condiments to Parent Menu Item Classes

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Classes**.
2. Double-click a parent menu item class.
3. Click the **Condiment Groups** tab, and then select the appropriate **Required Condiment Groups** and **Allowed Condiment Groups** for the class.

For example, if the parent menu item class is Ham Sandwich Class, the required and allowed condiment groups are listed in the following table:

**Table 28-2 Examples of Required and Allowed Condiment Groups**

Condiment Group	Examples
Required Condiment	Meat Group, Bread Group Required condiments are sometimes referred to as forced condiments. Each Required Condiment Group that you select appears on the Forced Condiments tab. From there you can enter the <b>Minimum</b> and <b>Maximum</b> amounts for each item.
Allowed Condiment	Meat Group, Bread Group, Cheese Group, Sauce Group, and Veggie Group

4. (Optional) Click the **Forced Condiments** tab.
5. For each required condiment group, enter the **Minimum** and **Maximum** condiment count required to complete the order.

For example, if you set the minimum condiment count for Meat Group as 2, the workstation operator must add two meat types to complete the order.

6. To limit the number of selections that workstation operators can add from a condiment group at a certain menu level, enter the **Threshold 1** and **Threshold 2** for each required condiment group.

Typically, the menu level controls how much the application charges for a condiment. The threshold values allow you to determine when the price of a condiment changes, based on the number of items selected.

7. Click the **Options** tab, and then select the appropriate options as described in the following table:

**Table 28-3 Condiment Menu Item Class Options**

Option	Description
9 - Condiment Changes Print Group of Parent Menu Item	Select this option to have the menu items in this class use the print group of the condiment.
21 - Require Number of Condiments to Match Number of Parent Items	Select this option to match the number of the required condiments belonging to the menu item class to the number of parent menu items ordered.
23 - Add Condiment Price to the Parent Item's Price on Check Only	Select this option to have guest checks and receipts show only a single price for the parent menu item and its condiments (the price breakdown for each condiment does not appear).
30 - Sort Condiments by Print Group	Select this option to sort condiments according to their print group.
41 - Consolidate Menu Items with Condiments on Order Output	Select this option to have order devices consolidate items with condiments and print each condiment with the seat number to which the condiment applies. You must also select <b>6 - Print Seat Numbers with Individual Items</b> from the Order Devices module at the revenue center level.
42 - Consolidate Parents with Matching Condiments on Order Output	Select this option to have order devices consolidate parent menu items with identical condiments.

8. Click **Save**.
9. Repeat Steps 2 through 8 for all parent menu item classes.

- [Configuring Condiment Groups](#)
- [Creating Menu Item Classes for Condiment Groups](#)
- [Creating Menu Item Master Records for Condiments](#)
- [Configuring Condiment Sets](#)
- [Assigning Default Condiments to Parent Menu Items](#)
- [Setting Condiment Appearance](#)

**Related Topics**

- [Condiment Groups and Condiment Sets](#)

## Assigning Default Condiments to Parent Menu Items

Default condiments are not supported with Transaction Services. If you are using Transaction Services, workstation operators need to add default condiments separately.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
2. Search for and double-click a parent menu item record.
3. Click the **Default Condiments** subtab, and then click **Add**.
4. Click the ellipsis point (...) button from the **Condiment Set** column, select the condiment set, and then click **OK**.
5. (Optional) Enter the sort group number for the condiment set in the **Sort Group** column.

All condiment sets appear in the workstation according to the Sort Group. Condiment sets in Sort Group 0 appear first, followed by 1, 2, and so on. Items that have the same Sort Group number appear as they are listed in the EMC.

6. Click the ellipsis point (...) button from the **Options** column, and then select **1 - Display when in default state**.
7. To always charge customers for the condiment count, select **2 - Charge for entire sales count**, and then click **OK**.

For example, if a burger comes with 2 slices of cheese by default, the customer is charged when there are 1 or 2 slices of cheese on the burger. If you do not select this option, customers are only charged when the condiment count exceeds the default count.

8. Click **Save**.
- [Configuring Condiment Groups](#)
  - [Creating Menu Item Classes for Condiment Groups](#)
  - [Creating Menu Item Master Records for Condiments](#)
  - [Configuring Condiment Sets](#)
  - [Assigning Condiments to Parent Menu Item Classes](#)
  - [Setting Condiment Appearance](#)

### Related Topics

- [Condiment Groups and Condiment Sets](#)

## Condiment Prefixes

Many restaurants allow customers to modify menu items, such as adding, removing, increasing and decreasing the number of condiments on the item. You can insert prefixes (for example, No, Add, Extra) before the condiment on the guest check, order devices, and customer receipts. This allows the workstation operator, server, kitchen staff, and customer to see changes made to a default condiment. It also provides helpful preparation instructions to the kitchen staff and helps to eliminate order confusion.



Complete the following tasks to set up condiment prefixes:

- Create condiment prefix menu items
- Create menu item classes for the prefixes
- Activate and deactivate condiment prefixes
- Configure separate touchscreen buttons for condiment prefixes

#### Related Topics

- [Creating Condiment Prefix Menu Items](#)
- [Creating Menu Items Classes for Prefixes](#)
- [Activating Condiment Prefixes](#)
- [Deactivating Condiment Prefixes](#)
- [Configuring Touchscreen Buttons for Condiment Prefixes](#)

## Creating Condiment Prefix Menu Items

1. Select the Enterprise, click **Configuration**, and then click **Menu Item Maintenance**.
2. Insert a new record and name it Prefixes.  
This is a header menu item record and is used to distinguish the prefixes from other menu items.
3. Select the Prefixes header record and insert a new record. Enter the prefix (for example, ADD) as the name for the new menu item record.
4. Double-click the record you created in Step 3, and then click **Menu Levels Tab**.
5. Select **Active on All Levels**.
6. Click **Prices** and insert a \$0 priced record.
7. Click **Save**.
8. Repeat Steps 3 through 7 to create records for the remaining four prefixes.

- [Creating Menu Items Classes for Prefixes](#)
- [Activating Condiment Prefixes](#)
- [Deactivating Condiment Prefixes](#)
- [Configuring Touchscreen Buttons for Condiment Prefixes](#)

#### Related Topics

- [Condiment Prefixes](#)

## Creating Menu Items Classes for Prefixes

1. Select the Enterprise level, click **Descriptors**, and then click **Condiment Group Names**.
2. In the **Text** field, enter a group name to show in the POS client for the condiment prefixes.
3. Click **Save**.

4. Select the Enterprise level, click **Configuration**, and then click **Menu Item Classes**.
  5. Insert a new record and name it after a prefix (for example, ADD).
  6. Double-click the new record.
  7. On the **General** tab, select the **Condiment Prefix Type** that corresponds to the prefix menu item class that you created in Step 5:
    - **2 - No Prefix**
    - **3 - Add Prefix**
    - **4 - Sub Prefix**
    - **5 - Plain Prefix**
    - **6 - Reset Prefix**
  8. Click the **Options** tab, and then select **2 - ON = Condiment Menu Items; OFF = Regular Menu Items** and **8 - Allow Menu Items in this Class to be Non-Priced**.
  9. Click the **Condiments Group** tab.
  10. From the Member Condiment Groups section, select the condiment group that you created in Step 2.
  11. Click **Save**.
  12. Repeat Steps 5 through 11 to configure menu item classes for the remaining prefixes.
- [Creating Condiment Prefix Menu Items](#)
  - [Activating Condiment Prefixes](#)
  - [Deactivating Condiment Prefixes](#)
  - [Configuring Touchscreen Buttons for Condiment Prefixes](#)

#### Related Topics

- [Condiment Prefixes](#)

## Activating Condiment Prefixes

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Classes**.
2. For all regular menu item classes, select **65 - Support Enhanced Prefix Mode (Parent Only)**, and then click **OK**.  
If you are not using condiment prefixes, do not select **65 - Support Enhanced Prefix Mode (Parent Only)**.

3. Click **Save**.

- [Creating Condiment Prefix Menu Items](#)
- [Creating Menu Items Classes for Prefixes](#)
- [Deactivating Condiment Prefixes](#)
- [Configuring Touchscreen Buttons for Condiment Prefixes](#)

### Related Topics

- [Condiment Prefixes](#)

## Deactivating Condiment Prefixes

You can deactivate condiment prefixes to prevent them from appearing in the Combo/Condiment Orderer.

1. Select the Enterprise level, click **Configuration**, and then click **Menu Item Classes**.
2. Double-click a regular menu item class with condiments.
3. Click the **Condiments Group** tab, and then change all Allowed Condiment Groups to Required Condiment Groups.
4. From the Allowed Condiment Groups section, select the condiment group you created in the section [Creating Menu Items Classes for Prefixes](#).
5. Click the **Forced Condiments** tab, and then set the **Minimum** value for the previously allowed condiment groups to 0 (zero).
6. Repeat Steps 2 through 5 for all regular menu items with condiments.
7. Click **Save**.

- [Creating Condiment Prefix Menu Items](#)
- [Creating Menu Items Classes for Prefixes](#)
- [Activating Condiment Prefixes](#)
- [Configuring Touchscreen Buttons for Condiment Prefixes](#)

### Related Topics

- [Condiment Prefixes](#)

## Configuring Touchscreen Buttons for Condiment Prefixes

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Locate the Combo/Condiment Orderer and deselect **Allowed**.
3. Click **Save**.
4. Insert a new button on the transaction screen, select **Menu Item** as the button type, and then select a prefix as the menu item (for example, ADD).
5. Enter or generate a legend for the button, and then click **Save**.
6. Repeat Steps 4 and 5 to configure touchscreen buttons for the remaining condiment prefixes.

- [Creating Condiment Prefix Menu Items](#)
- [Creating Menu Items Classes for Prefixes](#)
- [Activating Condiment Prefixes](#)
- [Deactivating Condiment Prefixes](#)

### Related Topics

- [Condiment Prefixes](#)

## Setting Condiment Appearance

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Format Parameters**.
2. Click the **Options** tab, and then select the appropriate options:
  - To force as many condiments as possible to print together on each line of guest checks and customer receipts, select **4 - Wrap Condiments on Guest Checks**.
  - To hide previous round condiments and show only the parent menu item when a workstation operator picks up a check, select **35 - Hide Previous Round Condiments on Display**.
  - To set the check detail area to actively sort condiments while they are ordered, select **45 - Sort Current Round Condiments on Screen**. Condiment sorting occurs only when items are in different print groups and the parent allows condiment sorting.
3. Click **Save**.
4. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Control Parameters**.
5. Click the **Options** tab, and then select the appropriate options:
  - To show only condiments that customers are allowed to order with the parent menu item, select **37 - Enable Condiment Masking**.
  - To allow workstation operators to add condiments out of order (conversational ordering), select **44 - Permit Required Condiments To Be Entered Out Of Order**.
6. Click **Save**.
7. Select the revenue center, click **Setup**, and then click **Order Devices**.
8. Double-click a printer record, and then click the **Options** tab.
9. To print condiments in red font, select **10 - Print Condiments in Red (Overrides Print Class Settings)**.
10. Click **Save**.
  - [Configuring Condiment Groups](#)
  - [Creating Menu Item Classes for Condiment Groups](#)
  - [Creating Menu Item Master Records for Condiments](#)
  - [Configuring Condiment Sets](#)
  - [Assigning Condiments to Parent Menu Item Classes](#)
  - [Assigning Default Condiments to Parent Menu Items](#)

### Related Topics

- [Condiment Groups and Condiment Sets](#)

## Understanding the Popup Condiment Orderer

The Popup Condiment Orderer provides a screen workflow that automatically advances to all required condiment groups when ordering menu items.

The Popup Condiment Orderer resides in a template. The workstation operator uses this template to create a page that pops up for required condiments. When adding a menu item (for example, Steak) that requires condiment selection to a transaction, the page with the template appears as a popup where the workstation operator can select the required condiment groups (for example, meat temperature and sauce).

The workstation operator can also recall a Popup Condiment Orderer to modify the required condiments of a previously ordered menu item. The workstation operator can select the parent item or condiment in the check detail or select the Recall Popup Condiment Orderer function key (depending on configuration).

Unlike the regular Condiment Orderer, the Popup Condiment Orderer automatically pops up and closes.

Complete the following tasks to set up the Popup Condiment Orderer:

- Configure a Popup Condiment Orderer page
- Configure a revenue center to use the Popup Condiment Orderer
- Configure a menu item class to use the Popup Condiment Orderer

### Related Topics

- [Configuring a Popup Condiment Orderer Page](#)
- [Configuring a Revenue Center to Use the Popup Condiment Orderer](#)
- [Configuring a Menu Item Class to Use the Popup Condiment Orderer](#)

## Configuring a Popup Condiment Orderer Page

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Insert a record for **Popup Condiment Orderer** if it does not exist.
3. Double-click the record to open it.
4. Select **Specify Template**, and then select **Popup Condiment Orderer** from the **Internal Templates** list.

The template is preset with a Condiment Orderer control and a Done button. You cannot delete these elements from the template, nor can you copy elements to this template. The Popup Condiment Orderer template supports two key functions: Void and Transaction Cancel.

5. From the **Popup Type** drop-down list, select the location for the Popup Condiment Orderer on the page. (The Popup Types do not apply to POS clients running the Android mobile operating system.)
  - **Full Screen**
  - **Centered**
  - **Next to Check Detail Area**

- **In Dynamic Content Area**
- 6. Select **Allow selection in check detail area** to allow workstation operators to select the current menu item and its condiments in the check detail area while the Popup Condiment Orderer is open.
- 7. Select **Manually dismiss Condiment Orderer** to have the Popup Condiment Orderer remain open after the workstation operator selects all required condiments. The workstation operator must use the **Done** button to close the Popup Condiment Orderer.

If you configure required condiment groups with a zero minimum count, select **Manually dismiss Condiment Orderer**. Otherwise the Popup Condiment Orderer automatically closes because the application meets the minimum required count (zero) before the workstation operator orders a condiment in the group.

- 8. (Optional) Change the page settings, such as layout and button styles. You cannot modify the dimmed settings.
- 9. (Optional) Repeat Steps 2 through 8 to create additional Popup Condiment Orderer pages. The POS client requires one page for initial condiment selection and subsequent editing, although you can configure two pages.

When you designate Next Page/Panel for menu items (in menu item classes and on menu item buttons), the POS client goes to the designated page or panel after the Popup Condiment Orderer closes (either manually or automatically).

- 10. Click **Save**.
- [Configuring a Revenue Center to Use the Popup Condiment Orderer](#)
- [Configuring a Menu Item Class to Use the Popup Condiment Orderer](#)

#### Related Topics

- [Understanding the Popup Condiment Orderer](#)

## Configuring a Revenue Center to Use the Popup Condiment Orderer

1. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
2. From the **Default Condiment Ordering Popup** drop-down list, select the default automatic popup to appear when the workstation operator orders a menu item with required condiments for the revenue center:
  - **None**
  - **Popup Condiment Orderer**
3. From the **Default Condiment Editing Popup** drop-down list, select the default automatic popup to appear when the workstation operator selects a menu item with required condiments in the check detail area for the revenue center:
  - **None**
  - **Popup Condiment Orderer**
4. Click **Save**.
- [Configuring a Popup Condiment Orderer Page](#)

- [Configuring a Menu Item Class to Use the Popup Condiment Orderer](#)

#### Related Topics

- [Understanding the Popup Condiment Orderer](#)

## Configuring a Menu Item Class to Use the Popup Condiment Orderer

The Popup Condiment Orderer configuration in the Menu Item Classes module overrides the revenue center configuration in the RVC Parameters module.

If you do not configure a revenue center or menu item class to use the Popup Condiment Orderer, the feature is turned off. You can use a mix of the settings. For example, you can set the revenue center to use the Popup Condiment Orderer, and set specific menu items to use the revenue center parameter, other menu items to use a different Popup Condiment Orderer, and some menu items with no popup.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Classes**.
2. Double-click the menu item class record.
3. From the **Condiment Order Popup** drop-down list, select the automatic popup to appear when the workstation operator orders a menu item with required condiments:
  - **No Popup**
  - **Use Revenue Center Parameter**
  - **Popup Condiment Orderer**
4. From the **Condiment Edit Popup** drop-down list, select the automatic popup to appear when the workstation operator selects a menu item with required condiments in the check detail area:
  - **No Popup**
  - **Use Revenue Center Parameter**
  - **Popup Condiment Orderer**

To use gestures on transaction pages, set the **Condiment Edit Popup** to **No Popup** for the menu item classes, and use the **Recall Popup Condiment Orderer** function key to modify previously ordered required condiments.

5. Click **Save**.
- [Configuring a Popup Condiment Orderer Page](#)
  - [Configuring a Revenue Center to Use the Popup Condiment Orderer](#)

#### Related Topics

- [Understanding the Popup Condiment Orderer](#)

# 29

## Menu Item Components

Components are the individual elements that make up a parent menu item. For example, a burger can consist of the following components:

- Bun
- Patty
- Side salad

Rather than sending the parent menu item to all relevant Prep Stations simultaneously, the menu item components feature allows you to define prep times for individual components, and then sends each component to the designated Prep Station at different times based on the prep time. For example, the following table lists the components of a burger with prep times:

**Table 29-1 Example Components with Prep Time**

Component	Prep Time (Minutes)
Bun	1
Patty	10
Side salad	2

When sending the components of the burger to the Kitchen Display System (KDS), Symphony first sends the patty to the Prep Station because it takes the longest to prepare. After eight minutes, Symphony sends the side salad, and then after one minute, it sends the bun. After ten minutes elapse, all components of the burger are ready. The prep timing ensures that food quality is maintained as components do not spoil while waiting until all other components of the menu item are ready.

When using components, you can configure parent menu items to send to:

- Only the Expo Display
- The Expo Display and a Prep Display

When a parent menu item is configured to fire only to an Expo Display, as in the previous example, Symphony ignores the prep time (if any) configured for the parent menu item in the Menu Item Maintenance module. If the parent menu item also fires to a Prep Station, Symphony considers the prep time of the parent menu item and sends components to Prep Stations in relation to the parent item's prep time. For information on how condiments affect components and the prep time, see [Components with Condiments](#).

Setting up components consist of completing the following tasks:

- [Creating Components](#)
- [Assigning Components to Menu Items](#)

Menu item components are only supported on non-Dynamic Order Mode (DOM) KDS Displays.



- [Components with Condiments](#)
- [Creating Menu Item Components](#)
- [Assigning Components to a Menu Item](#)

## Components with Condiments

Components inherit the required and allowed condiments of the parent menu item. If you override a component assigned to a parent menu item from the property, revenue center, or zone, you must reassign condiments to that component.

When condiments have prep times, Symphony adds or deducts the condiment's prep time from the prep time of its component. However, when the parent menu item also fires to a Prep Station, Symphony adds or deducts from the parent's prep time.

Set up components with condiments in the following order:

1. Create components
2. Assign components to the parent menu item
3. Assign condiments to the components

### Related Topics

- [Creating Menu Item Components](#)
- [Assigning Components to a Menu Item](#)

## Creating Menu Item Components

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Components**.
2. Insert a new Component record, and then double-click the record to open it.
3. (Optional) Enter the name to show on the KDS for the component in the **Display Name** field.

If you do not enter a Display Name, the condiments linked to this component are sent to the KDS, but the component name itself is not.

4. Enter the **Preparation Time** for the component, and then select the **Print Class** that sends the component to the appropriate Prep Station.

You can send components only to Prep Stations.

5. To show all condiments for the parent menu item with the component in the KDS, select **Display All Condiments**.

The KDS shows condiments that are not part of the component within square brackets. This can help with plating food correctly.

6. Click **Save**.
7. If the component has condiments:
  - a. Assign the component to a parent menu item. See [Assigning Components to a Menu Item](#) for more information.
  - b. Reopen or refresh the Components module, and then double-click the component that you assigned to a menu item in Step 7-a to open it.

- c. From the Linked Condiments section, click **Add**, and then click the ellipsis point (...) button on the Linked Condiments column.

The Add link is dimmed when the component is not linked to a menu item definition.

- d. Select a condiment, and then click **OK**.
- e. Repeat Steps 7-c and 7-d to add all condiments for the component.
- f. Click **Save**.

- [Assigning Components to a Menu Item](#)

#### Related Topics

- [Components with Condiments](#)

## Assigning Components to a Menu Item

1. Select the property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
2. Double-click a menu item definition record to open it, and then click the **Components** tab.
3. Click **Add**, click the ellipsis point (...) button from the Components column, select a component, and then click **OK**.
4. Repeat Step 3 to add all components that belong to the menu item.
5. Click **Save**.

- [Creating Menu Item Components](#)

#### Related Topics

- [Components with Condiments](#)

## Combo and Fixed Price Meals

A combo meal consists of two or more menu items grouped together in combo meal groups and sold to the customer for a single price. Quick service restaurants typically sell combo meals to increase business by packaging the most frequently requested menu combinations (for example, hamburger, fries, and a drink) and offering them for a lower price than à la carte items.

A combo meal group allows you to configure the menu items within a group so that the POS client knows which items to combine. Two typical combo meal groups are combo sides and combo drinks. For example, you can configure a meal named Combo 1 with a primary menu item called Combo Sandwiches and additional Combo Groups (such as Combo Drinks and Combo Side Items).

A fixed price meal (FPM) is a complete meal offered at a fixed price. For example, during special occasions or holidays, restaurants sometimes serve multi-course meals with only a few menu item choices for each course, and charge a fixed total price.

There is no restriction on the number of FPMs or side items (courses). The workstation operator can order multiple meals on the same seat. If the parent menu item increments the seat number, ordering multiple meals adds them to different seats (for example, three pre-dinner specials). The sides can default to a placeholder menu item that the workstation operator replaces in a later round. Placeholder menu items can be shown or hidden in the check detail area.

You can configure FPMs like combo meals. [Creating Combo Meal Groups](#) contains more information about assembling required items for a FPM, and assigning alternate groups to allow guests to substitute items.

- [Combo Meal Group Pricing](#)
- [Placeholder Menu Items in Combo Meals](#)
- [Creating Combo Meal Groups](#)
- [Creating Combo Meals](#)
- [Configuring Additional Combo Meal Settings](#)
- [Creating Combo Meal Pages](#)
- [Combo Meal Function Keys](#)

### Combo Meal Group Pricing

You can use many pricing scenarios for combo meal groups, as described in the following examples.

#### **Pricing Combo Meal Groups Based on Side Items**

You can price side items on the combo meal's side items level instead of the traditional pricing at the combo meal groups items level. In some cases, this simplifies combo meal price configuration. If you set prices in both places, the pricing on the combo meal groups item level takes precedence. Consider the following examples:

- (Traditional Pricing) Combo Meal #1 Drinks cost \$0.99
- (Traditional Pricing) Combo Meal #2 Drinks cost \$1.09
- (Side Item Pricing) Milk (drink choice) costs \$1.50 (upcharge)

1 Combo Meal #1: Root Beer \$0.99

1 Combo Meal #1: Milk \$1.50

1 Combo Meal #2: Root Beer \$1.09

### Pricing Combo Meal Groups Based on Size

The following figure illustrates the configuration of a basic combo meal group using different sizes and associated prices. A combo meal group called Combo Drinks contains the menu items Small Coke, Medium Coke and Large Coke. The Medium Coke is the default drink for all applicable Order Types. The workstation operator does not need to make a selection when adding the combo meal item using the workstation. The application automatically adds the Medium Coke as the default selection. (A workstation operator can modify this choice using the sizing or substitute option.) You can use the prices of \$1.00 for the Medium Coke and \$2.00 for the Large Coke. To use the combo size meal functionality, set the Small Coke as the Size 1 Item, the Medium Coke as the Size 2 Item and the Large Coke as the Size 3 Item. You must set Size 1-4 Item settings for all sizable combo group items listed. To allow workstation operators to add or change combo meal item sizes, add Front of House buttons to the combo transaction page using the Page Design module.

Figure 30-1 Example of Pricing Based on Item Size

The screenshot displays the Oracle menu configuration interface. At the top, the 'General' and 'Items' tabs are visible. The 'Current Record' section shows 'Number' 2 and 'Name' 'Combo Drinks'. Below this, the 'Combo Group Items' section lists three items: '14 - Small Coke', '27 - Medium Coke', and '28 - Large Coke'. The 'Prices' tab is active, showing the 'Combo Group Item Configuration' for the '27 - Medium Coke' item. The 'Primary Menu Item' is set to '27 - Medium Coke'. The 'Quantity' is set to 1. The 'Option Bits' section includes checkboxes for '1 - Default when no Order Type declared', '2 - Default for Order Type 1: Dine In', and '3 - Default for Order Type 2: Take Out'. The 'Size 1 Item' is '14 - Small Coke', 'Size 2 Item' is '27 - Medium Coke', and 'Size 3 Item' is '28 - Large Coke'. The 'Size 4 Item' is set to '0 - None'. The 'Size1 Menu Level', 'Size2 Menu Level', 'Size3 Menu Level', and 'Size4 Menu Level' are all set to '0 - None'.

### Pricing Combo Meal Groups Based on Menu Item Definition

The following figure shows another optional pricing convention. You can price any combo meal menu item (for example, a Hamburger Combo to include all combo side and drink items. Set the combo's price in the menu item definition record (in the Menu Item Maintenance module), and deselect option 4 - **Add Side Prices To Meal Price** in the Combo Meals module.

**Figure 30-2 Example of Pricing Based on Menu Item Definition**

The screenshot displays the Oracle menu item definition interface. The 'General' tab is active, and the 'Items' sub-tab is selected. The 'Current Record' section shows 'Number' 2 and 'Name' 'Combo Drinks'. Below this, the 'Combo Group Items' section is visible, containing a list of items: '14 - Small Coke', '27 - Medium Coke', and '28 - Large Coke'. To the right, the 'Prices' sub-tab is active, showing a table for 'Combo Group Item Prices'. The table has columns for '#', 'Price', and 'Active On Level'. A single row is visible with '# 1', 'Price 1.00', and 'Active On Level 0 - All Levels'.

Another method is to lower the combo meal menu item price and then roll the price of the combo sides and combo drink items into the price of the primary combo meal menu item.

- [Placeholder Menu Items in Combo Meals](#)

#### Related Topics

- [Creating Combo Meal Groups](#)
- [Creating Combo Meals](#)
- [Configuring Additional Combo Meal Settings](#)
- [Creating Combo Meal Pages](#)
- [Combo Meal Function Keys](#)

## Placeholder Menu Items in Combo Meals

When ordering a combo meal or FPM, the customer might not be ready to order dessert when placing their initial order. The placeholder functionality allows the workstation operator to add the meal without knowing each of the menu items. Placeholder items can stand in for missing items until the workstation operator changes the placeholder item for the real one in a subsequent service round, as illustrated in the following figure.



You must configure a placeholder menu item as a conventional menu item (MI) including inserting a MI master, MI definition and a \$0.00 price record. Additionally, assign a MI class to its MI definition file using the placeholder option(s). Then add the placeholder menu item to each desired combo meal group (for example, combo sides) so that the application shows the placeholder item on the Child Orderer area of the screen. When the workstation operator selects the placeholder item, it occupies a place in the check to allow service total.

The workstation operator can replace the placeholder menu item at any time prior to tendering or closing the check. After replacing it with a valid item (as shown in the following figure), the workstation operator cannot change the item back to a placeholder item. However, the workstation operator can substitute with another valid item.



- [Combo Meal Group Pricing](#)

#### Related Topics

- [Creating Combo Meal Groups](#)
- [Creating Combo Meals](#)
- [Configuring Additional Combo Meal Settings](#)
- [Creating Combo Meal Pages](#)
- [Combo Meal Function Keys](#)

## Creating Combo Meal Groups

You can configure combo meals using two EMC modules: Combo Meal Groups and Combo Meals. Configure the Combo Meal Groups module first and then configure the Combo Meals module.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Combo Meal Groups**.
2. Insert a record for a new combo meal group, or double-click an existing record.
3. Select the appropriate combo group configuration options:
  - **1 - Allow Discounts:** Select this option to apply discounts to items in the group. The discount being applied must have option **25 - Discount Combo Meal Group Items** set from the Discounts module.
  - **2 - Substitution Group items use this sides price:** Select this option to set the menu item price to the side's combo meal price specified on the combo meal form. The price setting occurs when the workstation operator substitutes

a combo meal side with a menu item from an alternate group. Deselect this option to set the menu item price in the alternate group.

4. (Optional) To allow swappable side items, add **Alternate Groups** using the **Add** link.
  - When **Alternate Groups** are present, workstation operators can substitute combo side items with other combo meal groups. For example, the customer might want to have an onion rings side item that is generally available in Combo Meal #2 with a Combo Meal #4. You can add a Combo Onion Rings alternate group that allows menu item substitution with a Combo Fries group. Configuring alternate side groups allows the application to substitute these side menu items. You must configure an Alternate Side button (using the Page Design module) to substitute items in the POS client.
  - If you are using Symphony version 2.7 MR3 or later, configure FPMs in the **Alternate Groups** field. Customers often want to substitute an appetizer or salad for the entrée portion of an FPM and this field accommodates these substitutions.
5. Click the **Items** tab to configure all menu items within a combo meal group.
6. Click the **Add** and **Delete** links to add or remove menu items from the combo meal group.
7. Enter or select information in the following fields for each item:

**Table 30-1 Combo Meal Group Fields**

Field or Option	Description
Primary Menu Item	Select a menu item to use in the combo meal group.  For example, if the combo group is called Combo Side Items, items in this group could be Small Fries, Medium Fries, Large Fries (if using the Size 1-4 Items), and Onion Rings (among others).  This field shows all menu item master records that contain a definition in the revenue center.
Quantity	Enter the number of times the menu item is needed in the combo group (for example, when a value meal consists of two burgers and a soda).
1 - Default when no Order Type declared	Select this option to make the selected item the default item for the combo group without an Order Type.
2 - 9 Default for Order Types 1-8	Select these options to make the selected item the default item when Order Type 1 (through 8) is active. Deselect these options to have the workstation operator select an item to fulfill the combo meal requirements.



**Table 30-1 (Cont.) Combo Meal Group Fields**

Field or Option	Description
10 - Autofill	Select this option to change the quantity of the side item ordered to the number of remaining items to complete the side requirements when the workstation operator orders one of the combo meals and more than one remaining item is required.
Size 1-4 Items	Select a menu item that will substitute for the Primary Menu Item when using the Combo Size <b>Size 1</b> through <b>Size 4</b> function keys (set in Page Design under Type).  This list shows all menu items assigned to the combo group after saving the items to the database. In the database, the Size 1-4 fields of Combo Meal Group items are part of a self-referencing table. Because of this, EMC has two limitations: you cannot copy or paste combo meal groups, and the Size 1-4 Item fields populate only after you save items to the database. (For example, if you create a new combo group and add the items Soda and Large Soda, you must save these items before selecting either item in this field.)
Size 1-4 Menu Levels	Select a menu level that can affect the price of the substituted Size 1-4 Items.

8. To set specific side items with a different price (upcharge), click the **Prices** subtab. For example, Fries cost \$0.00, but there is an extra charge of \$1.25 when the customer orders Onion Rings.

9. Click the **Add** and **Delete** links to add or remove prices for each item. You can configure up to 8 prices for a single item.

Set the following fields when adding a price:

- **Price:** Enter the price to charge for the item.
- **Prep Cost:** Enter the à la carte price of the combo group item.
- **Active On Level:** Select the menu level on which the price is active.
- (Optional) **Effectivity Group:** Select the effectivity group for this price.
- (Optional) **Date Start** and **Date End:** Enter start and end dates.

10. Click **Save**.

- [Creating Combo Meals](#)
- [Configuring Additional Combo Meal Settings](#)
- [Creating Combo Meal Pages](#)

#### Related Topics

- [Combo Meal Group Pricing](#)
- [Placeholder Menu Items in Combo Meals](#)

- [Combo Meal Function Keys](#)

## Creating Combo Meals

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Combo Meals**.
2. Insert a record for a new combo meal, or double-click an existing record.
3. Click the **Select** link next to the **Menu Item Master** field, select the base menu item that represents the combo meal, and then click **OK**.
4. Click the ellipsis point button, select the **Primary Combo Group**, and then click **OK**.

This is the combo meal group of the primary item for the combo meal. For example, if you have a Burger Combo, you might select a Burgers Combo Meal Group.

5. In the **Priority** field, enter the combo meal priority when workstation operators press the **Auto Combo** function key.
6. From the **Auto Combo Algorithm** drop-down list, select the setting for the application to use when the workstation operator creates a combo meal from menu items already listed on a check. When the workstation operator presses the **Auto Combo** function key, the application uses one of the following options to combine the combo meal items:
  - **0 - First Deal Found:** Select this option to have the application use and combine the first items found.
  - **1 - Best Deal for Customer:** Select this option to combine the most expensive items as a combo meal.
  - **2 - Best Deal for Merchant:** Select this option to combine the least expensive items as a combo meal.
7. Select the appropriate options as described in the following table:

**Table 30-2 Combo Meal Options**

Option	Description
1 - Disable Auto-Combo Recognition	Select this option to prevent the combo meal from being considered when the workstation operator presses the <b>Auto Combo</b> function key.
2 - Allow Auto-Combo in Previous Round	Select this option to allow the combo meal to consider previous-round items when the workstation operator presses the <b>Auto Combo</b> function key.
3 - Is Sized Combo Meal	Select this option to allow the combo meal to use Combo Size <b>Size 1-4</b> function keys, changing the size of the items ordered.
4 - Add Side Prices To Meal Price	Select this option to add the prices of the meal's side items to the price of the meal on the Kitchen Display System (KDS) display and the printed guest check.

**Table 30-2 (Cont.) Combo Meal Options**

Option	Description
5 - Only Print Priced Sides On Guest Check	Select this option to prevent the meal's side items from printing on the guest check when they have no price, or when their price rolls into the price of the meal.
6 - No Charge For Condiments	Select this option when added condiments (to the meal) are non-priced.
7 - No Bulk Order With Quantity Order	Select this option to prompt the workstation operator for each non-default side item per meal. This option controls the ordering process when a workstation operator adds more than one combo meal.  Deselect this option to allow the workstation operator to specify a count when ordering non-default side items. When you deselect this option, the application does not continue to the next side item until all of the combo meals satisfy the side items requirement.
8 - Allow Resizing of Individual Sides	Select this option to allow the workstation operator to change the size of one selected combo meal side item. Deselect this option to allow the workstation operator to resize the entire combo meal.
9 - Do Not Show With Combo Meal Choices	If workstation operators can create multiple combo meals from the existing menu items listed on a check and you select this option, a system-generated list of available choices does not include the combo meal. This combo meal only appears in the list when no combo meals are found.
10 - Keep Last Item Selected after Ordering a New Meal	Select this option if you expect modifications to the combo meal after adding the last side, keeping the combo meal selected. This is particularly useful if the last side is often modified.
11 - Is Defined Combo Meal	Select this option to allow the application to incorporate the meal items in the combo as individual menu items in the Auto Combo On The Fly process.  For example, you can configure a Donut 6 combo meal and set option <b>11</b> . When a customer orders a Donut 6 combo and then adds one more donut, the option allows the application to handle the Donut 6 combo as six individual donuts. The auto combo procedure creates an auto combo meal from the menu items added to the check in the current round and initiates a Donut 7 combo instead of adding a seventh donut at full price. This results in a lower price for the customer.

8. To add a combo group:
  - a. Click the **Add** link in the **Combo Groups** section.

- b. Enter the **Side Count**.
  - c. Click the ellipsis pint button in the **Side Item Group** column, select the side items for the combo meal, and then click **OK**.  
  
For example, if the combo meal is a Burger, Fries, and Soda, the side items include two Combo Meal Groups: Fries and Soda.
9. Do not price items within the combo meal's **Combo Group Price** field for combo size meals as this could cause issues with the **Size 1-4 Items** fields in the Combo Meal Groups module. See [Creating Combo Meal Groups](#) for more information.
  10. Click **Save**.

- [Creating Combo Meal Groups](#)
- [Configuring Additional Combo Meal Settings](#)
- [Creating Combo Meal Pages](#)

#### Related Topics

- [Combo Meal Group Pricing](#)
- [Placeholder Menu Items in Combo Meals](#)
- [Combo Meal Function Keys](#)

## Configuring Additional Combo Meal Settings

You can configure additional combo meal options in various EMC modules.

1. To set tenders with incomplete combo meals:
  - a. Select the Enterprise, property, or zone, click **Configuration**, and then click **Tender/Media**.
  - b. Double-click the tender media record.
  - c. Click the **Options** tab, and then click the **Printing Options** subtab.
  - d. To prevent the tender from being allowed when a meal is missing a side item, select **85 - Not Allowed With Incomplete Meals**.
  - e. Click **Save**.
2. To set workstation operator privileges with incomplete combo meals and placeholder items:
  - a. Select the Enterprise level, click **Configuration**, and then click **Roles**.
  - b. Double-click the role record.
  - c. Click the **Operations** tab, and then click the **Transactions** subtab.
  - d. To allow workstation operators to add a parent item without a required condiment, select **161 - Allow Incomplete Item**.  
  
The parent menu item must have **59 - Allow Item Incomplete Based on Role** set from the Menu Item Classes module.
  - e. To allow workstation operators to perform or authorize tendering a transaction with a placeholder item, select **164 - Authorize/Perform Service Total/Payment with Placeholder item**.

You must also set option **85 - Not Allowed With Incomplete Meals** in the Tender/Media module.

- f. Click **Save**.
3. To set revenue center operating parameters for combo meals:
  - a. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
  - b. Click the **Options** tab.
  - c. To allow the combo key to function with Auto Combo Meal recognition, select **51 - Allow Auto Combo Meal Recognition with the "Combo" key**.
  - d. To allow the Auto Combo Meal recognition to create combo meals from menu items that were ordered in previous rounds, select **52 - Allow Creation of Combo Meals from Previous Round Menu Items**.
  - e. To show a list of combo meal choices when the workstation operator attempts to create meals from menu items already on the check, select **55 - Show Combo Meal Choices**.
  - f. To have the application create combo meals from the menu items added to the check in the current round, select **58 - Auto Combo Items On The Fly**.
  - g. Click **Save**.
4. To set menu item class options:
  - a. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Classes**.
  - b. Double-click the menu item class record.
  - c. Click the **Options** tab.
  - d. To make condiments free when ordered as part of a combo meal, select **47 - Suppress Price with Combo Meal**.
  - e. To allow the workstation operator to add a menu item without satisfying the required condiment's conditions, select **59 - Allow Item Incomplete Based On Role**.  
  
The role privilege **161 - Allow Incomplete Item** must be set for the workstation operator ordering a parent item with this menu item class.
  - f. If the menu item is a placeholder in a combo meal, select **60 - Placeholder**.
  - g. To hide placeholder items from the check detail area, select **61 - No Placeholder Display**.
  - h. Click **Save**.

- [Creating Combo Meal Groups](#)
- [Creating Combo Meals](#)
- [Creating Combo Meal Pages](#)

#### Related Topics

- [Combo Meal Group Pricing](#)
- [Placeholder Menu Items in Combo Meals](#)
- [Combo Meal Function Keys](#)

## Creating Combo Meal Pages

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page (typically the Transaction page) on which to place the combo meal keys and functions.
3. Click **Button**, and then create hardcoded combo meal menu item keys on the Transaction page.

Figure 30-3 Combo Meal Menu Item Key



4. Click **Other...**, and then add a **Condiment/Combo Orderer**.  
Add the Condiment/Combo Orderer to the same Transaction page as the combo menu items and function keys to view the combo meals and substitute side items easier.
5. Select the **Condiment/Combo Orderer**, click the **Data** tab, and then select **Display Title Bar**. This area prompts workstation operators when required combo meal sides or condiments are not ordered.
6. Select **Combo Meal Side** to have the application generate and show combo meal side items.
7. (Optional) Create combo meal size keys (if needed). These keys allow toggling between sizes of combo meal items. You can name the combo size keys for an actual size such as small, medium, or large, or Combo Size 1, Combo Size 2, and so on.

Figure 30-4 Combo Meal Size Key



8. Add the appropriate function keys to the Combo Meal Transaction page (for example **Combo**, **Un-Combo**, **Auto Combo** and **Combo Multi-Selection**).
  9. Configure keys for all individual menu items available (in particular combo groups).
  10. Click **Save**.
- [Creating Combo Meal Groups](#)
  - [Creating Combo Meals](#)
  - [Configuring Additional Combo Meal Settings](#)

**Related Topics**

- [Combo Meal Group Pricing](#)
- [Placeholder Menu Items in Combo Meals](#)
- [Combo Meal Function Keys](#)

## Combo Meal Function Keys

Workstation operators can use the following function keys with combo meals:

Table 30-3 Combo Meal Function Keys

Function Key	Description
Auto Combo	This key allows the workstation operator to create one or more combo meals from existing menu items.
Combo	This key changes the selected item or the last item on the check to a combo meal. The item must be a primary combo item. For example, if the combo meal is a burger with fries and a drink, the burger item must be the highlighted item or the last item ordered before pressing this key.
Combo Alternate Side	This key allows the workstation operator to substitute a combo meal side with a selection from another combo meal group (for example, when a customer orders an appetizer instead of an entree in a combo meal).

**Table 30-3 (Cont.) Combo Meal Function Keys**

Function Key	Description
Combo Bulk Order	This key allows the workstation operator to order multiple combo meals at a time. The workstation operator must meet each combo's side item requirements before moving on to order the next combo's side items.
Combo Multi Selection	This key allows the workstation operator to select existing menu items to combine into a combo meal. This function shows the check details in a window, which allows the workstation operator to select individual items to make up the combo meal. This gives the workstation operator greater control in determining what is included in the combo meal.
Un-Combo	This key separates an existing combo meal into individual à la carte items (non-combo pricing takes effect).
Type - Combo Order Size	This key changes the order size before ordering the combo meal.
Type - Combo Size 1-4	These keys change the combo size after ordering the combo meal. Using these keys causes the workstation to resize the selected combo meal or combo meal side item to selected sizes 1 through 4. If the workstation operator does not select an item, the last item on the check is resized.

**Related Topics**

- [Combo Meal Group Pricing](#)
- [Placeholder Menu Items in Combo Meals](#)
- [Creating Combo Meal Groups](#)
- [Creating Combo Meals](#)
- [Configuring Additional Combo Meal Settings](#)
- [Creating Combo Meal Pages](#)



# 31

## Guest Checks

A guest check contains a record of all sales on the check, from the guest's first order to final payment.

- [Configuring Guest Check Numbers](#)
- [Configuring Guest Check Headers and Trailers](#)
- [Creating a Tender to End the Current Service Round of Checks](#)
- [Adding a Service Total Key to the Transaction Page](#)
- [Understanding Fast Transactions](#)
- [Configuring Fast Transactions](#)
- [Understanding Full Seat Checks](#)
- [Configuring the Workstation to Print Full Seat Checks](#)
- [Creating a Full Seat Check Button](#)
- [Splitting Off an Item](#)
- [Configuring a Split Off Item Button](#)
- [Conversational Ordering](#)
- [Creating Menu Item Master Groups for Conversational Ordering](#)
- [Configuring Menu Level Sets for Conversational Ordering](#)
- [Configuring Menu Item Classes for Conversational Ordering](#)
- [Configuring Menu Items for Conversational Ordering](#)
- [Creating Front of House Buttons for Conversational Ordering](#)
- [Configuring Employee Privileges for Automatic Check Firing](#)
- [Configuring Automatic Check Firing](#)
- [Configuring Employee Privileges for Check Re-firing](#)
- [Configuring the Check Re-fire Button](#)
- [Understanding Suspend and Resume](#)
- [Configuring Suspend and Resume](#)
- [Creating a Suspend and Resume Button](#)
- [Setting the Employee Auto Sign Out Period](#)
- [Understanding Follow Me](#)
- [Configuring Follow Me Checks](#)
- [Order Handling on Open Checks](#)
- [Holding and Sending Items to Order Devices](#)

- [Setting the Service Total to Send Items to be Prepared While the Check Remains Open](#)
- [Setting the Hold and Fire Option](#)
- [Setting the Hold and Fire Tender Notification](#)
- [Setting a Reminder for Items on Hold](#)
- [Setting Checks with Items on Hold to End Current Service Round](#)
- [Setting Check Handling with Held Items When Closing Checks](#)
- [Configuring Item Hold Buttons](#)
- [Team Service](#)
- [Reports and Totals Posting for Team Checks](#)
- [Enabling Team Service](#)
- [Configuring Team Service Privileges](#)
- [Configuring Revenue Centers to Delete Service Teams at the Start of Day](#)
- [Adding Team Service Buttons](#)
- [Printing Multiple Languages on Guest Checks and Customer Receipts](#)
- [Configuring Right to Left Reading Languages](#)
- [Creating a Print Language List Button](#)
- [Creating Print Language Buttons](#)
- [Allowing Employees to Manually Replay Checks through the Workstation](#)
- [Check Add/Transfer](#)
- [Allowing Employees to Add or Transfer Checks](#)
- [Configuring the Add/Transfer Revenue Centers](#)
- [Configuring Add/Transfer Buttons](#)

## Configuring Guest Check Numbers

The guest check number can be between 1 and 9999 (a four-digit number). Generally check numbers start in numeric order. If a workstation operator begins check number 1007, the next check number for the revenue center is 1008.

If the property has multiple revenue centers and wants to keep unique check numbers for each revenue center, you can assign an exclusive range or check numbers per revenue center. For example, Revenue Center 1 could have checks from 1000 to 1999 and Revenue Center 2 could have checks from 2000 to 2999.

1. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
2. To set guest check numbers to generate automatically, enter the **Min Guest Check #** and the **Max Guest Check #** on the **General** tab.

When Symphony generates check numbers automatically, after reaching the Max Guest Check # value, the next check number is the Min Guest Check # value.

3. To set workstation operators to manually assign guest check numbers, click the **Options** tab, and then select **1 - Operator Assigns Check Numbers**.

This option is typically used by properties that have guest checks with pre-printed numbers (rather than using roll printers).

4. Click **Save**.
- [Configuring Guest Check Headers and Trailers](#)
  - [Creating a Tender to End the Current Service Round of Checks](#)
  - [Adding a Service Total Key to the Transaction Page](#)

## Configuring Guest Check Headers and Trailers

Guest check headers and trailers are leading and trailing lines that print on guest checks. Typically, the header lines include the name of the property or revenue center and address. The trailer lines generally show gratitude or promotional information about upcoming events. At hotels, guest check trailers are often configured to show room charge information for the customer to complete. You can also set a header or trailer line to print logos rather than text.

Headers print automatically on guest checks. You must set trailers to print per tender/media record.

1. Select the Enterprise, property, revenue center, or zone, click **Descriptors**, and then click either **Guest Check Headers** or **Guest Check Trailers**.
2. For each row, enter information in the following fields:
  - **Text**: Enter the text to appear on the header or trailer.
  - (Optional) **Use Logo**: Select this option to print a logo rather than text on the guest check header or trailer.
  - (Optional) **Logo**: If you selected **Use Logo**, select an image.
3. Click **Save**.
4. To configure trailers to print for each tender media record, select the Enterprise, property or zone, click **Configuration**, and then click **Tender/Media**.
5. Double-click the tender record.
6. Click the **Options** tab, and then click the **Printing Options** subtab.
7. Set the appropriate options as described in the following table:

**Table 31-1 Trailer Printing Options for a Tender Record**

Option	Description
20 - Print Sales Itemizers	Select this option to print the sales itemizer lines on guest checks, customer receipts, and memo checks when workstation operators use the tender record. Deselect this option to suppress printing of the sales itemizers.

**Table 31-1 (Cont.) Trailer Printing Options for a Tender Record**

Option	Description
21 - Print Summary Totals	Select this option to print the summary totals (subtotal, tax, amount due, and change due) on guest checks, customer receipts, and memo checks when workstation operators press the key. Deselect this option to suppress printing of the summary totals.
22 - Print Check Trailer	Select this option to print the guest check trailer lines at the end of the guest check.
28 - Print Guest Check Trailer on Fast Transaction Customer Receipt	Select this option to print the guest check trailer on the customer receipt when workstation operators use the tender to close a fast transaction. Deselect this option to prevent the trailer from printing on customer receipts.

8. Click **Save**.

- [Configuring Guest Check Numbers](#)
- [Creating a Tender to End the Current Service Round of Checks](#)
- [Adding a Service Total Key to the Transaction Page](#)

## Creating a Tender to End the Current Service Round of Checks

You can configure the following two types of service total tenders that are commonly used in restaurants to end the current service round of guest checks:

- Service total tenders that send menu items to order devices
  - Service total tenders that send menu items to order devices and print the guest check
1. To have the tender send menu items to order devices:
    - a. Select the Enterprise or property, click **Configuration**, and then click **Tender/Media**.
    - b. Insert a new record, enter a name for the new tender record (for example, Send), and then double-click the new tender record.
    - c. From the **Key Type** drop-down list, select **Service Total**.
    - d. Click **Menu Levels**, and then select all main and sub menu levels.
    - e. Click **Save**.
  2. To have the tender send menu items to order devices and print the guest check:
    - a. Select the Enterprise or property, click **Configuration** and **Tender/Media**.
    - b. Insert a new record, enter a name for the new tender record (for example, Print), and double-click the new tender record.
    - c. From the **Key Type** drop-down list, select **Service Total**.

- d. Click **Options** and **Printing Options**.
  - e. Select the following options:
    - **13 - Print Memo Check**
    - **23 - Print Check on Demand**
    - **21 - Print Summary Totals**
    - **20 - Print Sales Itemizers**
  - f. Click **Menu Levels** and select all main and sub menu levels.
  - g. Click **Save**.
- [Configuring Guest Check Numbers](#)
  - [Configuring Guest Check Headers and Trailers](#)
  - [Adding a Service Total Key to the Transaction Page](#)

## Adding a Service Total Key to the Transaction Page

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
  2. Open the page (typically the Transaction page) on which to place the Service Total function key.
  3. On the **Edit** tab, select the page area in which to define the Service Total key.
  4. Click **Button**.
  5. On the **General** subtab, enter the function key name (for example, Service Total or Send and Stay (if you are using Send and Stay functionality)) in the **Legend** field.
  6. From the **Type** drop-down list, select **Tender/Media**.
  7. Click the black arrow beneath the **Type** drop-down list.
  8. Select the **Service Total** tender, and then click **OK**.
  9. Position and size the button on the page. Use the Style arrow to change the color.
  10. Click **Save**.
- [Configuring Guest Check Numbers](#)
  - [Configuring Guest Check Headers and Trailers](#)
  - [Creating a Tender to End the Current Service Round of Checks](#)
  - [Setting the Service Total to Send Items to be Prepared While the Check Remains Open](#)
  - [Setting the Hold and Fire Option](#)
  - [Setting the Hold and Fire Tender Notification](#)
  - [Setting a Reminder for Items on Hold](#)
  - [Setting Checks with Items on Hold to End Current Service Round](#)
  - [Setting Check Handling with Held Items When Closing Checks](#)
  - [Configuring Item Hold Buttons](#)

### Related Topics

- [Order Handling on Open Checks](#)
- [Holding and Sending Items to Order Devices](#)

## Understanding Fast Transactions

A fast transaction does not require a workstation operator to use a **Begin Check** key to start a new transaction. Workstation operators can quickly start transactions by pressing a menu item key or scanning an item. This functionality is often used in a retail or concession environment where a workstation operator stands in one place and quickly begins transactions repeatedly. It is also often used by bartenders who start more transactions than a typical food server, and rarely assign customers to a specific table or check number.

### Related Topics

- [Configuring Fast Transactions](#)

## Configuring Fast Transactions

1. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
2. Click the **Options** tab, and then select **15 - Allow Fast Transactions**.
3. To prevent customer receipts from automatically printing after each fast transaction, select **9 - On Demand Customer Receipts**.
4. Click **Save**.
5. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Format Parameters**.
6. Click the **Options** tab.
7. To print the check number at the bottom of the customer receipt to be used as an order number, select **21 - Print order number at bottom of Receipts**.
8. Click **Save**.
9. Select the Enterprise, property, or zone, click **Configuration**, and then click **Tender/Media**.
10. Double-click the tender record.
11. Click the **Options** tab, and then click the **Printing Options** subtab.
12. To print the guest check trailer on the customer receipt when a workstation operator uses the tender to close a fast transaction, select **28 - Print Guest Check Trailer on Fast Transaction Customer Receipt**.
13. Click **Save**.

### Related Topics

- [Understanding Fast Transactions](#)

## Understanding Full Seat Checks

A full seat check shows each seat's menu items with the subtotal separated by the seat header. Unlike a seat check, each full seat check includes a check header, a check trailer, and a paper cut. This feature is available with Symphony version 2.5 Maintenance Release 1 and later.

**Figure 31-1 Example of Full Seat Check**

```

      Coffee shop
90001 J.Smith
Trans: 85                               WSID: 1
-----
CHK 131                                3/2/2015 11:28 PM    GST 2
-----
      D i n e  I n
*****
              Seat 1
*****
1 Coffee/Pastry                            6.50
      Food                                $6.50
      TS Tax Rate 1                       $0.33
P a y m e n t   D u e                       $ 6 . 83

      Thank you for dining with us!
      Please come again.
```

### Related Topics

- [Configuring the Workstation to Print Full Seat Checks](#)
- [Creating a Full Seat Check Button](#)

## Configuring the Workstation to Print Full Seat Checks

1. Select the Enterprise or property, click **Configuration**, and then click **Tender/Media**.
2. Add a new record, and then double-click it to open in form view.
3. Select **2 - Service Total** from the **Key Type** drop-down list.
4. Click the **Options** tab, and then click the **Printing Options** subtab.
5. Select **16 - Print Full Seat Check**.  
If you also select **14 - Print Seat Check**, option **16** overrides option **14**.
6. Select the following options:
  - **21 - Print Summary Totals**
  - **22 - Print Check Trailer**

- **23 - Print Check on Demand**
  - 7. Click the **Menu Levels** tab, and then select all main and sub menu levels.
  - 8. Click the **Output** tab, and then select the following options:
    - **Print on Customer Receipts**
    - **Print on Guest Checks**
    - **Print on Journal**
  - 9. Click **Save**.
  - 10. Add a touchscreen button for the tender/media record that you created in Step 2. [Creating a Full Seat Check Button](#) contains more information about configuring the touchscreen button.
- [Creating a Full Seat Check Button](#)

#### Related Topics

- [Understanding Full Seat Checks](#)

## Creating a Full Seat Check Button

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
  2. Open the Front of House page on which to place the Full Seat Check button.
  3. On the **Edit** tab, select the page area in which to define the Full Seat Check button.
  4. Click **Button** to add a button.
  5. On the **General** subtab, enter the button name in the **Legend** field.
  6. Select **Tender/Media** from the **Type** drop-down list.
  7. Click the black arrow directly beneath the **Type** drop-down list, and then select **Full Seat Check**.
  8. Highlight the **Full Seat Check** button.
  9. Position and size the button on the page. Use the Style arrow to change the color.
  10. Click **Save**.
- [Configuring the Workstation to Print Full Seat Checks](#)

#### Related Topics

- [Understanding Full Seat Checks](#)

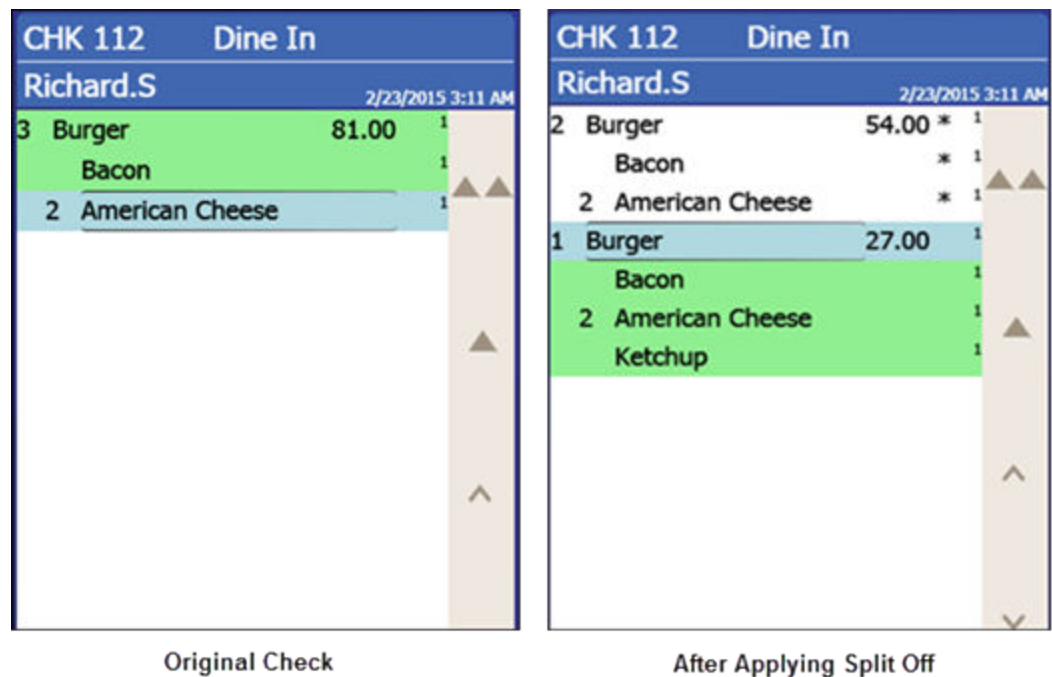
## Splitting Off an Item

A Split Off Item is a function key that enables workstation operators to separate (split) one or more items from a multiple quantity menu item entry so that it can be modified independently from the original item.



For example, a customer orders 3 burgers with 2 pieces of cheese and bacon. The customer then later requests to add ketchup to one burger. The workstation operator uses **Split Off Item** to separate one of the burgers and adds ketchup to it.

**Figure 31-2 Example of a Check Before and After Splitting an Item**



When a workstation operator splits a multiple quantity menu item with condiments (required or non-required condiments) the following results appear on the check:

- The condiments of the original item and their quantities are carried over to each split item.
- The quantity of the original parent menu item is reduced by the number of items split.

For example, if the workstation operator originally adds 3 burgers, after splitting one item, the original item entry shows as 2 burgers while the new split entry shows as 1 burger.

**Related Topics**

- [Configuring a Split Off Item Button](#)

## Configuring a Split Off Item Button

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place the **Split Off Item** button.
3. On the **Edit** tab, select the page area in which to define the **Split Off Item** button.
4. Click **Button** to add a button.

5. On the **General** subtab, enter the button name in the **Legend** field.
6. Select **Function** from the **Type** drop-down list.
7. Click the black arrow directly beneath the **Type** drop-down list, and then select **Menu Item**.
8. Highlight the **Split Off Item** button.
9. Position and size the button on the page. Use the Style arrow to change the color.
10. Click **Save**.

#### Related Topics

- [Splitting Off an Item](#)

## Conversational Ordering

Conversational ordering allows workstation operators to add specially configured menu items for guests who order these items in no particular sequence. For example, in a coffee shop, the workstation operator requires the following items:

- Drink Type (Espresso, Latte, Mocha, Tea)
- Drink Size (Small, Medium, Large)
- Drink Temperature (Hot, Iced)
- Condiments or Modifiers (Whipped Cream, Cinnamon, Skim Milk)

When using conversational ordering, the workstation operator adds the order as a guest states items (for example, an iced mocha, medium size, with whipped cream), improving Speed of Service (SOS), ease of ordering for guests, and overall order accuracy.

Setting up conversational ordering consists of completing the following tasks:

- Creating Menu Item Master Groups
- Configuring Menu Level Sets
- Configuring Menu Item Classes
- Setting Menu Items
- Creating Front of House Buttons

#### Related Topics

- [Creating Menu Item Master Groups for Conversational Ordering](#)
- [Configuring Menu Level Sets for Conversational Ordering](#)
- [Configuring Menu Item Classes for Conversational Ordering](#)
- [Configuring Menu Items for Conversational Ordering](#)
- [Creating Front of House Buttons for Conversational Ordering](#)

## Creating Menu Item Master Groups for Conversational Ordering

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Menu Item Master Groups**.

2. Insert a new Menu Item Master Group.

In the coffee shop example, you could create the following groups: Drinks, Espresso, Latte, Mocha, and Americano.

3. Click **Save**.

- [Configuring Menu Level Sets for Conversational Ordering](#)
- [Configuring Menu Item Classes for Conversational Ordering](#)
- [Configuring Menu Items for Conversational Ordering](#)
- [Creating Front of House Buttons for Conversational Ordering](#)

### Related Topics

- [Conversational Ordering](#)

## Configuring Menu Level Sets for Conversational Ordering

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Level Sets**.

2. Insert a new Menu Level Set.

In the coffee shop example, you could create Size and Temperature Menu Level Sets.

3. Select the **Default Master Group** for each Menu Level Set.

In the coffee shop example, you could select **Drinks** as the Default Master Group.

4. Double-click a Menu Level Set to open it in form view.

5. From the General section, select **2 - Bound to parent** to bind the Menu Item Master Group (for example, Drinks) to the custom Menu Levels (for example, Size and Temperature).

When a guest initially orders a drink by either Size or Temperature, those menu items link to the Menu Item Master Group, which also link to Anonymous Menu Level Entry Options. This allows the workstation operator to add items in the exact order that the guest states or orders them.

6. From the Menu Level Entries section, click **Add**.

7. Enter menu level names for the Menu Level Set (for example, you could add Small, Medium, and Large Menu Level Entries to the Size Menu Level Set).

8. For each Menu Level Entry, select the **Default** and **Anonymous** options.

Selecting these options allows the menu level sets to serve as temporary \$0.00 placeholders for menu items when guests order them out of sequence.

9. Click **Save**.

- [Creating Menu Item Master Groups for Conversational Ordering](#)
- [Configuring Menu Item Classes for Conversational Ordering](#)
- [Configuring Menu Items for Conversational Ordering](#)
- [Creating Front of House Buttons for Conversational Ordering](#)

#### Related Topics

- [Conversational Ordering](#)

## Configuring Menu Item Classes for Conversational Ordering

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Classes**.
2. Insert a new Menu Item Class record.
  - For each menu item that a guest can order through Conversational Ordering, create at least two Menu Item Classes to accommodate the guest in ordering the same menu item in different ways. In the coffee shop example, each coffee type might have two classes: Latte Anonymous and Latte Defined. Create the Anonymous class first.
  - Create a generic Menu Item Class to assign only to Menu Item Definitions that are \$0.00 priced menu items. In the coffee shop example, the Menu Item Class Drink Anonymous can be used for Menu Item Definitions such as {SIZE} Large Drink or {TEMP} Hot Drink. This Menu Item Class is assigned to the Default Master Group named Drinks.
3. Double-click a Menu Item Class to open it in form view.
4. From the General tab, select **2 - Replace in Condiment Group** from the **Condiment Order Type** drop-down list.
 

Setting this option replaces the previously selected condiment with the latest condiment choice when the workstation operator selects condiments. If you set the Increment option, a priced condiment can be added to a transaction, such as a shot of espresso.
5. Click the **Options** tab.
6. For each Menu Item Class with Anonymous in the name, select the following options:
  - **8 - Allow Menu Items in this Class to be Non-Priced**
  - **49 - Participates in Menu Item Master Switching**
  - **50 - Anonymous Menu Item**
7. For each Menu Item Class with Defined in the name, select the following options:
  - **8 - Allow Menu Items in this Class to be Non-Priced**
  - **49 - Participates in Menu Item Master Switching**
8. For the generic Menu Item Class (for example, Drink Anonymous), select the following options:
  - **8 - Allow Menu Items in this Class to be Non-Priced**
  - **49 - Participates in Menu Item Master Switching**
  - **50 - Anonymous Menu Item**

9. Click the **Condiment Groups** tab.
10. For each Menu Item Class, select the appropriate condiment groups:
  - **Required Condiment Groups:** These condiment groups must be entered when a workstation operator adds menu items in this class.
  - **Allowed Condiment Groups:** These condiment groups are allowed to be entered as condiments for menu items in this class.
  - **Member Condiment Groups:** These condiment groups consist of menu items in this class.
11. Click **Save**.

- [Creating Menu Item Master Groups for Conversational Ordering](#)
- [Configuring Menu Level Sets for Conversational Ordering](#)
- [Configuring Menu Items for Conversational Ordering](#)
- [Creating Front of House Buttons for Conversational Ordering](#)

#### Related Topics

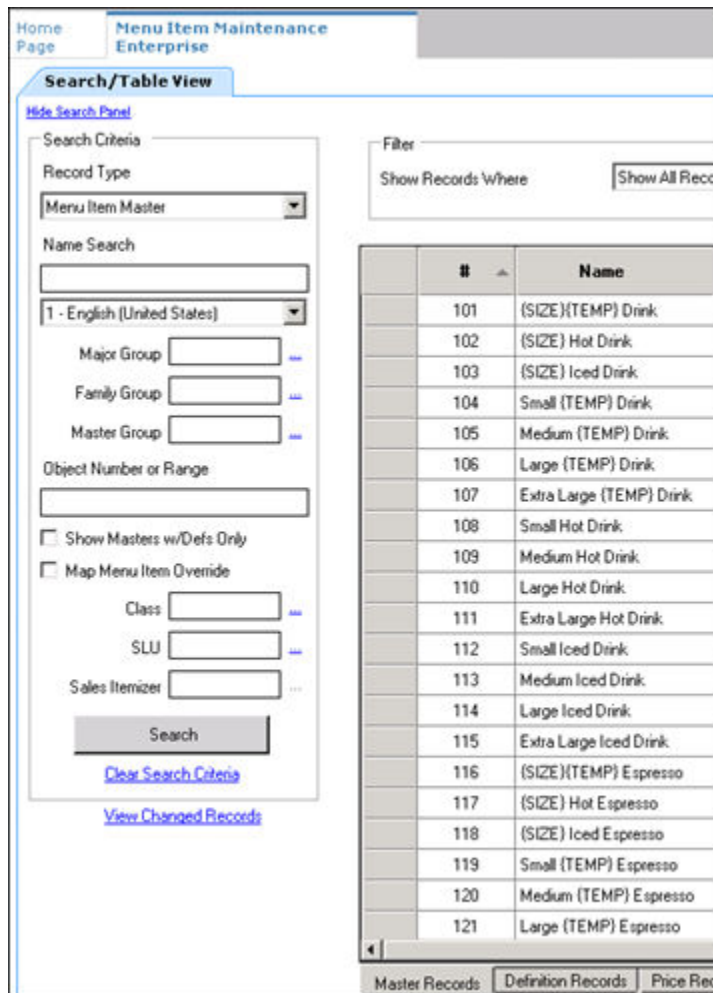
- [Conversational Ordering](#)

## Configuring Menu Items for Conversational Ordering

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
2. Insert a menu item master record for each menu item (including condiments) that can be ordered using conversational ordering. You need to account for all potential ordering combinations a guest might use. Use braces {} to surround the generic variables such as {SIZE} and {TEMP}.

In the coffee shop example shown in the following figure, you might have records for {SIZE} {TEMP} Drink, {SIZE} Hot Drink, and so on.

**Figure 31-3 Menu Item Master Records for Conversationally Ordered Items**



3. Select the **Major Group**, the **Family Group**, and the **Master Group**.
  4. Click the **Definition Records** tab in the lower area of the page.
  5. Set the following for each record:
    - Menu Item Class
    - Menu Item Price
    - Menu Level Availability
    - Default Condiments
  6. Click **Save**.
- [Creating Menu Item Master Groups for Conversational Ordering](#)
  - [Configuring Menu Level Sets for Conversational Ordering](#)
  - [Configuring Menu Item Classes for Conversational Ordering](#)
  - [Creating Front of House Buttons for Conversational Ordering](#)

**Related Topics**

- [Conversational Ordering](#)

## Creating Front of House Buttons for Conversational Ordering

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
  2. Open the Front of House page on which to place menu item master buttons.
  3. On the **Edit** tab, select the page area in which to define the menu items (including condiments) (typically the transaction area).
  4. Click **Button** to add a button.
  5. On the **General** subtab, select the appropriate function from the **Type** drop-down list.
  6. Click the black arrow beneath the **Type** drop-down list.
  7. Position and size the button on the page. Use the Style arrow to change the color.
  8. In the **Legend** field, enter the button name.
  9. Click **Save**.
  10. Repeat these steps to create buttons for each of the menu item master names.
- [Creating Menu Item Master Groups for Conversational Ordering](#)
  - [Configuring Menu Level Sets for Conversational Ordering](#)
  - [Configuring Menu Item Classes for Conversational Ordering](#)
  - [Configuring Menu Items for Conversational Ordering](#)

### Related Topics

- [Conversational Ordering](#)

## Configuring Employee Privileges for Automatic Check Firing

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Double-click an employee role, click the **Operations** tab, and then click the **Guest Checks** subtab.
3. Select the appropriate privileges. The following table describes the privileges corresponding to automatic check firing.

**Table 31-2 Employee Guest Check Privileges for Automatic Check Firing**

Privilege	Description
183 - Begin Autofire Check using [Begin Autofire Check] Key	Select this option to allow employees in this role to create checks that automatically fire at a preset time using the Begin Autofire Check function key.
184 - Authorize/Perform Pickup of Autofire Check Belonging to Another Operator	Select this option to allow employees in this role to pick up and edit checks that fire at a preset time from other employees.

**Table 31-2 (Cont.) Employee Guest Check Privileges for Automatic Check Firing**

Privilege	Description
185 - Authorize/Perform Edit of Autofire Date/Time	Select this option to allow employees in this role to modify the date and time that checks are set to automatically fire.

4. To allow employees in this role to generate the Autofire Open Check Report from the workstation, click the **Ad Hoc Reports** subtab, and then select **31030 - Run Autofire Open Check Report**.
5. Click **Save**.

## Configuring Automatic Check Firing

1. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
2. Click the **Autofire** tab, and then configure the fields as described in the following table:

**Table 31-3 Automatic Check Firing Fields**

Fields and Options	Description
(Optional) Autofire Employee	To allow a specific employee to become the owner of all checks, including those placed using Transaction Services after they fire, select a workstation operator, and then click <b>OK</b> . <ul style="list-style-type: none"> <li>• If you select an Autofire Employee, all sales totals post to the designated workstation operator and the checks appear under the Autofire Employee in the Open Check Report.</li> <li>• If you do not select an Autofire Employee, the check operator remains the owner of the check after the check fires.</li> </ul>
Autofire Workstation	Select the workstation from which the checks fire and print. The application uses this value to determine the order output devices and workstation printers to use when a check fires.
Default Autofire Tender/Media	Select a tender that workstation operators must use to end the current service round of checks that fire automatically. You can assign any service total type tender. Oracle Hospitality recommends configuring a separate service total tender for automatic check firing to allow workstation operators to identify the designated touchscreen button. <a href="#">Creating a Tender to End the Current Round of Checks</a> contains information about configuring a service total tender.



**Table 31-3 (Cont.) Automatic Check Firing Fields**

Fields and Options	Description
Backup Autofire Delay (Mins)	Enter the amount of time (in minutes) that the autofire workstation must try to fire the checks. The default value is 5 minutes.  After the Backup Autofire Delay time elapses, if the autofire workstation is unsuccessful at firing the check, the workstation at which the check was originally created tries to fire the check. If both workstations fail, a memo chit prints and a workstation operator must manually fire the check.
(Optional) Maximum Days	Enter the maximum number of days for which workstation operators can schedule checks to fire automatically.
(Optional) 1 - Print Autofire Memo at Time of Entry	Select this option if you want a memo chit to print when workstation operators create checks to fire automatically.
(Optional) 2 - Print Guest Check at Time of Autofire	Select this option if you want a guest check to print when a check automatically fires to order devices.  If you select this option, guest checks print at the guest check printer assigned to the autofire workstation.
3 - Enable Autofire in this Revenue Center	Select this option to allow the revenue center to create checks that fire automatically.  If you are using DOM, do not enable Autofire or hold and fire.

3. Click **Save**.
4. Select the Enterprise, property, revenue center, or zone, click **Descriptors**, and then click **Autofire Check Offline Header**.
5. From the **Text** column, enter the header lines to print on memo chits when checks fail to fire automatically.
6. To add a logo to the header, select **Use Logo**, click the ellipsis point (...) button from the Logo column, select the logo from the list, and then click **OK**.
7. Click **Save**.
8. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
9. Insert a new button on the transaction page, select **Function** from the **Type** drop-down list, and then select **Begin Autofire Check** from the **Function** list.
10. Click **Save**.

## Configuring Employee Privileges for Check Re-firing

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.

2. Double-click an employee role, click the **Operations** tab, and then click the **Transaction** subtab.
3. To allow employees in this role to re-fire items in a previous round, select **293 - Authorize/perform re-fire Menu item**.
4. Click **Save**.

## Configuring the Check Re-fire Button

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the transaction page on which to place the **Re-fire** button.
3. On the **Edit** tab, select the page area in which to define the **Re-fire** button.
4. Click **Button**.
5. On the **General** subtab, enter the button name (for example, Re-fire Pending Checks) in the **Legend** field.
6. Select **Function** from the **Type** drop-down list.
7. Click the black arrow directly beneath the **Type** drop-down list, select **Re-fire**, and then click **OK**.
8. Position and size the button on the page. Use the Style arrow to change the color.
9. Click **Save**.

## Understanding Suspend and Resume

With the Suspend and Resume feature, workstation operators can:

- Suspend a check started by another employee, and sign on to the workstation.
- Suspend a check when the workstation automatically signs off an employee.
- Suspend a check using a Tender/Media key.

When suspended, the check is stored in the memory until a workstation operator resumes it.

### Related Topics

- [Configuring Suspend and Resume](#)
- [Creating a Suspend and Resume Button](#)
- [Setting the Employee Auto Sign Out Period](#)

## Configuring Suspend and Resume

1. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
2. Click the **Options** tab, and then select **60 - Enable Suspend/Resume**.
3. Click **Save**.
4. Select the Enterprise, property, or zone, click **Configuration**, and then click **Tender/Media**.

5. Insert a record with the tender name.
6. Double-click the tender record.
7. On the **General** tab, select **2 - Service Total** from the **Key Type** drop-down list.
8. Click the **Options** tab, and then click the **Ops Behavior** subtab.
9. Select **74 - Suspend Order**.
10. Click **Save**.

- [Creating a Suspend and Resume Button](#)
- [Setting the Employee Auto Sign Out Period](#)

#### Related Topics

- [Understanding Suspend and Resume](#)

## Creating a Suspend and Resume Button

To allow workstation operators to manually suspend a check, you need to add a button assigned to the service total tender record.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place the Suspend/Resume button.
3. On the **Edit** tab, select the page area in which to define the Suspend/Resume button.
4. Click **Button**.
5. On the **General** subtab, enter the button name in the **Legend** field.
6. Select **Tender/Media** from the **Type** drop-down list.
7. Click the black arrow directly beneath the **Type** drop-down list, select the tender you created for the suspend and resume service total, and then click **OK**.
8. Position and size the button on the page. Use the Style arrow to change the color.
9. Click **Save**.

- [Configuring Suspend and Resume](#)
- [Setting the Employee Auto Sign Out Period](#)

#### Related Topics

- [Understanding Suspend and Resume](#)

## Setting the Employee Auto Sign Out Period

To automatically suspend a check and sign out an employee, you need to define the automatic operator popup interval.

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Control Parameters**.
2. Click the **Configuration** tab.

3. In the **Automatic Operator "Popup" Interval (min:sec)** field, enter the amount of time (in minutes and seconds) that the workstation waits before signing out an inactive popup workstation operator.
4. Click **Save**.

- [Configuring Suspend and Resume](#)
- [Creating a Suspend and Resume Button](#)

#### Related Topics

- [Understanding Suspend and Resume](#)

## Understanding Follow Me

Follow Me extends the functionality of the suspend and resume feature in Symphony. Follow Me allows workstation operators to use suspended checks across workstations in the same revenue center. This feature increases speed of service in a pub and fast casual restaurant environment.

For example, a pub may have three workstations and up to twelve bartenders working simultaneously. Each bartender can sign on and sign off at any workstation. A bartender can begin a check on workstation 1, prepare a drink, and then sign on to workstation 2 to resume the check. The check is suspended on workstation 1 and automatically resumed on workstation 2. Any menu items, discounts, and service charges that were added on workstation 1 appear on workstation 2. A check can be open on only one workstation at a time.

The journal logs the suspend and resume history of each check and lists the workstation on which the suspend and resume transaction was performed.

#### Related Topics

- [Configuring Follow Me Checks](#)

## Configuring Follow Me Checks

1. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
2. Click the **Options** tab, and then select **68 - Enable Follow Me**.

When you set Follow Me, option **60 - Enable Suspend/Resume** dims, and vice versa. You cannot select both Follow Me and Suspend/Resume; they are mutually exclusive. When you set Follow Me, each workstation in the revenue center participates in the Follow Me operation.

3. Select the property, click **Setup**, and then click **Workstations**.
4. On the **General** tab, enter information in the fields as described in the following table:

**Table 31-4 Workstation Timeout Settings**

Timeout Setting	Description
Check Inactivity Timeout	Enter the number of seconds that the workstation waits before prompting the workstation operator to cancel a transaction. If you set this value to 0 (zero), the Cancel dialog does not appear.  If you select <b>68 - Enable Follow Me</b> from the RVC Parameters module, the guest check is automatically suspended rather than cancelled.
Check Inactivity Dialog Timeout	Enter the number of seconds that the workstation shows the Do you need more time? Inactivity dialog before automatically cancelling the transaction. If you set this value to 0 (zero), the Cancel dialog does not appear.

5. Click **Save**.

**Related Topics**

- [Understanding Follow Me](#)

## Order Handling on Open Checks

This section describes how to configure Symphony to:

- Send orders to order devices (such as remote printers or a Kitchen Display System (KDS)) when performing a Service Total while the guest check remains open
- Manually or automatically send items on a guest check to order devices in groups over a period of time at preset times
- [Holding and Sending Items to Order Devices](#)

**Related Topics**

- [Setting the Service Total to Send Items to be Prepared While the Check Remains Open](#)
- [Adding a Service Total Key to the Transaction Page](#)
- [Setting the Hold and Fire Option](#)
- [Setting the Hold and Fire Tender Notification](#)
- [Setting a Reminder for Items on Hold](#)
- [Setting Checks with Items on Hold to End Current Service Round](#)
- [Setting Check Handling with Held Items When Closing Checks](#)
- [Configuring Item Hold Buttons](#)

## Holding and Sending Items to Order Devices

The following table describes how to configure the workstation to hold and send menu items on open guest checks to order devices.

**Table 31-5 Configure Workstations to Hold Items on Guest Checks**

Task	More Information
Enable option to hold items on guest checks and add touchscreen buttons	<a href="#">Setting the Hold and Fire Option</a>
Enable workstation notifications for held menu items when tendering	<a href="#">Setting the Hold and Fire Tender Notification</a>
Configure workstations to remind workstation operators of checks with items on hold after signing into the workstation	<a href="#">Setting a Reminder for Items on Hold</a>
Configure guest checks with items on hold to end current service round and add touchscreen buttons	<a href="#">Setting Checks with Items on Hold to End Current Service Round</a>
Configure how to handle items on hold when closing checks	<a href="#">Setting Check Handling with Items on Hold when Closing Checks</a>
(Optional) Configure Check Screen Look Up (SLU) to display checks with only held items	<a href="#">Configuring Check Screen Lookup (SLU) to Show Checks with only Held Items</a>

- [Order Handling on Open Checks](#)

### Related Topics

- [Setting the Service Total to Send Items to be Prepared While the Check Remains Open](#)
- [Adding a Service Total Key to the Transaction Page](#)
- [Setting the Hold and Fire Option](#)
- [Setting the Hold and Fire Tender Notification](#)
- [Setting a Reminder for Items on Hold](#)
- [Setting Checks with Items on Hold to End Current Service Round](#)
- [Setting Check Handling with Held Items When Closing Checks](#)
- [Configuring Item Hold Buttons](#)

## Setting the Service Total to Send Items to be Prepared While the Check Remains Open

1. Select the property, click **Configuration**, and then click **Tender/Media**.
2. Insert a Service Total tender record if it does not exist.
3. Double-click the record to open it.
4. On the **General** tab, select **2 - Service Total** from the **Key Type** drop-down list.
5. Click the **Options** tab, and then click the **Ops Behavior** subtab.

6. Select **95 - Send Order**.
7. Click **Save**.
8. Add a touchscreen button for the tender/media record that you created in Step 2. [Adding a Service Total Key to the Transaction Page](#) contains more information about configuring a service total touchscreen button.

- [Adding a Service Total Key to the Transaction Page](#)
- [Setting the Hold and Fire Option](#)
- [Setting the Hold and Fire Tender Notification](#)
- [Setting a Reminder for Items on Hold](#)
- [Setting Checks with Items on Hold to End Current Service Round](#)
- [Setting Check Handling with Held Items When Closing Checks](#)
- [Configuring Item Hold Buttons](#)

#### Related Topics

- [Order Handling on Open Checks](#)
- [Holding and Sending Items to Order Devices](#)

## Setting the Hold and Fire Option

1. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
2. Click the **Options** tab, and then select **70 - Enable Hold and Fire**.  
Do not enable hold and fire if you are using Dynamic Order Mode (DOM).
3. Click **Save**.

- [Setting the Service Total to Send Items to be Prepared While the Check Remains Open](#)
- [Adding a Service Total Key to the Transaction Page](#)
- [Setting the Hold and Fire Tender Notification](#)
- [Setting a Reminder for Items on Hold](#)
- [Setting Checks with Items on Hold to End Current Service Round](#)
- [Setting Check Handling with Held Items When Closing Checks](#)
- [Configuring Item Hold Buttons](#)

#### Related Topics

- [Order Handling on Open Checks](#)
- [Holding and Sending Items to Order Devices](#)

## Setting the Hold and Fire Tender Notification

1. Select the revenue center, click **Setup**, and then click **Control Parameters**.
2. Click the **Options** tab, and then select **66 - Enable Hold and Fire Final Tender Notification**.

This notification indicates that unfired menu items are on a check during the final tender process.

3. Click **Save**.
  - [Setting the Service Total to Send Items to be Prepared While the Check Remains Open](#)
  - [Adding a Service Total Key to the Transaction Page](#)
  - [Setting the Hold and Fire Option](#)
  - [Setting a Reminder for Items on Hold](#)
  - [Setting Checks with Items on Hold to End Current Service Round](#)
  - [Setting Check Handling with Held Items When Closing Checks](#)
  - [Configuring Item Hold Buttons](#)

#### **Related Topics**

- [Order Handling on Open Checks](#)
- [Holding and Sending Items to Order Devices](#)

## Setting a Reminder for Items on Hold

1. Select the Enterprise level, click **Setup**, and then click **Control Parameters**.
2. Click the **Configuration** tab.
3. In the **Confirm Threshold Period for Items on Hold (minutes)** field, enter the time that elapses before notifying workstation operators of checks with items on hold.

If you set the **Confirm Threshold Period for Items on Hold (minutes)** to 0, the workstation shows a reminder each time a workstation operator signs on to the workstation.

4. Click **Save**.
  - [Setting the Service Total to Send Items to be Prepared While the Check Remains Open](#)
  - [Adding a Service Total Key to the Transaction Page](#)
  - [Setting the Hold and Fire Option](#)
  - [Setting the Hold and Fire Tender Notification](#)
  - [Setting Checks with Items on Hold to End Current Service Round](#)
  - [Setting Check Handling with Held Items When Closing Checks](#)
  - [Configuring Item Hold Buttons](#)

#### **Related Topics**

- [Order Handling on Open Checks](#)
- [Holding and Sending Items to Order Devices](#)



## Setting Checks with Items on Hold to End Current Service Round

1. Select the property, click **Configuration**, and then click **Tender/Media**.
2. Insert a new record and name it `Hold Order`.
3. Double-click the new tender to open it.
4. On the **General** tab, select **2 - Service Total** from the **Key Type** drop-down list.
5. Click the **Options** tab, and then click the **Ops Behavior** subtab.
6. Select **2- Hold Order** from the **Hold Type** drop-down list. The Hold Type is used with Hold and Fire to establish the order device output instructions for menu items on the guest check. The following options are available.
  - **0 - Fire Order**: Sends all menu items, including items on hold, to order devices. Items that you configure to send at a preset time are exempt from this service total type.
  - **1- Keep Held Status**: Sends all items to the order device except those on hold.
  - **2- Hold Order**: Holds the entire guest check.
7. Click **Save**.
8. Repeat Steps 2 through 7 and configure service total tenders for **Fire Order** and **Keep Held Status**.
9. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
10. Open the Front of House touchscreen page (typically the Transaction page) on which to place the service total buttons.
11. On the Edit tab, select the page area in which to define buttons, and then click **Button**.
12. On the General subtab, select **Tender/Media** from the **Type** drop-down list.
13. Click the black arrow directly beneath the **Type** drop-down list, select the **Hold Order** tender, and then click **OK**.
14. Position and size the button on the page, and then click **Save**.
15. Repeat Steps 11 through 14 and add touchscreen buttons for the **Fire Order** and **Keep Held Status** service total keys.
  - [Setting the Service Total to Send Items to be Prepared While the Check Remains Open](#)
  - [Adding a Service Total Key to the Transaction Page](#)
  - [Setting the Hold and Fire Option](#)
  - [Setting the Hold and Fire Tender Notification](#)
  - [Setting a Reminder for Items on Hold](#)
  - [Setting Check Handling with Held Items When Closing Checks](#)

- [Configuring Item Hold Buttons](#)

**Related Topics**

- [Order Handling on Open Checks](#)
- [Holding and Sending Items to Order Devices](#)

## Setting Check Handling with Held Items When Closing Checks

1. Select the property, click **Configuration**, and then click **Tender/Media**.
2. Double-click a Service Total tender record to open it.
3. Click the **Options** tab, and then click the **Ops Behavior** subtab.
4. In the **Tender Media Hold Types** section, select a **Hold Type** for each type of Service Total tender used when making a payment and closing a guest check. The following table describes the Hold Types and their affect on the workstation messages.

**Table 31-6 Hold Types and Workstation Messages**

Hold Type	Workstation Message When Closing a Check with Items on Hold
0 - Fire Order	Select this option to send all items on hold to the order devices. This is the default Hold Type.
1 - Keep Held Status	Select this option to show a message asking the workstation operator whether to send the items on hold to the order devices or to close the check without sending the items.
2 - Hold Order	Select this option to show a message asking the workstation operator whether to send the items on hold to the order devices or to close the check without sending the items.

5. Click **Save**.
  - [Setting the Service Total to Send Items to be Prepared While the Check Remains Open](#)
  - [Adding a Service Total Key to the Transaction Page](#)
  - [Setting the Hold and Fire Option](#)
  - [Setting the Hold and Fire Tender Notification](#)
  - [Setting a Reminder for Items on Hold](#)
  - [Setting Checks with Items on Hold to End Current Service Round](#)
  - [Configuring Item Hold Buttons](#)

**Related Topics**

- [Order Handling on Open Checks](#)
- [Holding and Sending Items to Order Devices](#)

## Configuring Item Hold Buttons

To allow workstation operators to hold items on a check without sending to order devices, you need to add buttons assigned to the touchscreen page.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
  2. Open the Front of House touchscreen page on which to place the buttons, and then on the Edit tab, select the page area in which to define the buttons.
  3. Click **Button**, and then on the General subtab, select **Function** from the **Type** drop-down list.
  4. Click the black arrow directly beneath the **Type** drop-down list, select **Transaction** from the **Type** pane, and then select one of the following functions:
    - **Hold**: Holds the menu items selected in the check detail area.
    - **Hold Transaction**: Holds every successive menu item added to the check during the current round.
    - **Timed Fire Menu Item**: Holds selected items or an entire check until a predefined time.
    - **View Fire Times**: Shows the time each menu item is configured to send to order devices
  5. Click **OK**, enter a **Legend** for the button, and then position and size the button on the page
  6. Repeat Steps 3 through 5 and configure buttons for the remaining hold functions in Step 4, and then click **Save**.
- [Setting the Service Total to Send Items to be Prepared While the Check Remains Open](#)
  - [Adding a Service Total Key to the Transaction Page](#)
  - [Setting the Hold and Fire Option](#)
  - [Setting the Hold and Fire Tender Notification](#)
  - [Setting a Reminder for Items on Hold](#)
  - [Setting Checks with Items on Hold to End Current Service Round](#)
  - [Setting Check Handling with Held Items When Closing Checks](#)

### Related Topics

- [Order Handling on Open Checks](#)
- [Holding and Sending Items to Order Devices](#)

## Team Service

Team Service allows assignment of more than one service personnel to a check. A team of service personnel can work together when there is a large party requiring more than one server. In some environments (usually high-end fine dining establishments), Team Service is used exclusively, regardless of the party size.

Tip and receipt totals are divided equally on the Employee Tip Report among all team members when a team check is closed. This allows resulting pay out of tips or service charges to be paid equally among the team members. As the Employee Tip Report is used for income reporting purposes for tax authorities, tax liabilities are shared equally among team members. See [Reports and Totals Posting for Team Checks](#) for more information.

Team members can access checks where they are assigned as part of the team, even if they are not the check owner. This is independent of Role option **18 - Authorize/ Perform Pickup of a Check Belonging to Another Operator**.

- [Reports and Totals Posting for Team Checks](#)

**Related Topics**

- [Enabling Team Service](#)
- [Configuring Team Service Privileges](#)
- [Configuring Revenue Centers to Delete Service Teams at the Start of Day](#)
- [Adding Team Service Buttons](#)

## Reports and Totals Posting for Team Checks

Team Service only affects Employee Tip Report totals. The Employee Financial Report is not impacted. When a team check is closed, all totals post as usual to the Employee Financial Report of the check operator. Totals posted to the Employee Tip Report are distributed equally among all members of the team.

The following table shows an example result from totals posting of a team check with three team members. Totals post only to the Employee Financial Report of the check owner (Employee 1) while totals are distributed equally among all team members on the Employee Tip Report.

**Table 31-7 Sample Totals Posting for Team Checks**

Report Name	Total	Employee 1	Employee 2	Employee 3
Employee Financial	Net Sales	\$ 3000.00	\$ 0	\$ 0
Employee Financial	Charge Tips	\$ 300.00	\$ 0	\$ 0
Employee Tip Report	Gross Receipts	\$ 1000.00	\$ 1000.00	\$ 1000.00
Employee Tip Report	Charge Tips	\$ 100.00	\$ 100.00	\$ 100.00

Totals posted to the Employee Tip Report outside of a team check, such as those from regular guest checks or employee tip declarations, are posted in the normal manner.

This reporting is visible in both Ad Hoc Reports available at the workstation and in Reporting and Analytics Reports.

- [Team Service](#)

**Related Topics**

- [Enabling Team Service](#)
- [Configuring Team Service Privileges](#)
- [Configuring Revenue Centers to Delete Service Teams at the Start of Day](#)
- [Adding Team Service Buttons](#)

## Enabling Team Service

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Format Parameters**.
2. Click the **Options** tab, and then select **29 - Enable Team Service**.
3. To print the names of all team members on guest checks, select **41 - Print Team Member Names on Guest Check**.
4. Click **Save**.

- [Configuring Team Service Privileges](#)
- [Configuring Revenue Centers to Delete Service Teams at the Start of Day](#)
- [Adding Team Service Buttons](#)

**Related Topics**

- [Team Service](#)
- [Reports and Totals Posting for Team Checks](#)

## Configuring Team Service Privileges

1. Select the Enterprise, click **Configuration**, and then click **Roles**.
2. Double-click the role type, click the **Operations** tab, and then click the **Miscellaneous** subtab.
3. Select the appropriate privileges. The following table summarizes the privileges associated with Team Service and the recommended roles to have the privilege set:

**Table 31-8 Team Service Privileges**

Option Number	Privilege Name	Allows the Employee to ...	Recommended Roles
190	Authorize/Create Team	Create a team and add initial team members to it, and to authorize others to do so.	Manager
191	Authorize/Add or Delete Team Member to a Team	Add or delete members to an existing team, and to authorize others to do so.	Manager

**Table 31-8 (Cont.) Team Service Privileges**

Option Number	Privilege Name	Allows the Employee to ...	Recommended Roles
192	Authorize/Delete a Team	Delete an existing team, and to authorize others to do so.	Manager
193	Print a list of Teams	Print a team list showing the name of the team and all assigned members, and to authorize others to do so.	Manager
196	Available as Team Service Team Member	Appear in selection lists when assigning team member.	Server

4. Click **Save**.

- [Enabling Team Service](#)
- [Configuring Revenue Centers to Delete Service Teams at the Start of Day](#)
- [Adding Team Service Buttons](#)

**Related Topics**

- [Team Service](#)
- [Reports and Totals Posting for Team Checks](#)

## Configuring Revenue Centers to Delete Service Teams at the Start of Day

You can configure Symphony to automatically remove all teams on a daily basis for locations that use Team Service as a standard of operation. As team members usually change each day based on employee scheduling and availability, this allows managers to create new teams each day without having to edit or delete previous teams.

1. Select the Enterprise or property, click **Configuration**, and then click **Task Schedules**.
2. Insert a new record, and then double-click the record to open it.
3. On the **General** tab, select **7 - Workstation** as the **Service Type**, and then select **3 - Reset Team Service** as the **Task Type**.
4. Select **4 - Recurring - Daily** as the **Schedule Type**, select **Enabled**, and then select the **Start Date**.
5. Click the **Recurrence** tab.
6. In the Daily Frequency section, set the time at which to run the task, and then click **Save**.
7. Repeat Steps 2 through 6 to create another task, but change the **Service Type** to **8 - Check and Posting**.

- [Enabling Team Service](#)
- [Configuring Team Service Privileges](#)
- [Adding Team Service Buttons](#)

#### Related Topics

- [Team Service](#)
- [Reports and Totals Posting for Team Checks](#)

## Adding Team Service Buttons

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place the Team Service buttons, and then on the Edit tab, select the page area in which to define the buttons.
3. Click **Button**, and then on the General subtab, select **Function** from the **Type** drop-down list.
4. Click the black arrow directly beneath the **Type** drop-down list, and then select **Check Begin Pickup** from the **Type** pane.
5. Select **Begin Team Check**, and then click **OK**.

The Begin Team Check key allows workstation operators to start a team check. If the workstation operator is a member of multiple teams, the workstation shows a list of teams.

6. Enter a **Legend** for the button (for example, `Begin Team Check`), and then position and size the button on the page.
7. Click **Save**.
8. Repeat Steps 3 through 7 and add buttons for the following functions:
  - **Create Team Members or Add Team to Check:** Creates, edits, or deletes a team; adds a team to a check; and prints a team list.
  - **Edit Team:** Shows team information and allows member editing.
  - **Remove Team from Check:** Removes the team from a check.

- [Enabling Team Service](#)
- [Configuring Team Service Privileges](#)
- [Configuring Revenue Centers to Delete Service Teams at the Start of Day](#)

#### Related Topics

- [Team Service](#)
- [Reports and Totals Posting for Team Checks](#)

# Printing Multiple Languages on Guest Checks and Customer Receipts

You can show guest check detail and print a receipt showing both primary and secondary languages configured for the property. For example, English and Arabic can appear on the guest check detail area and print on the same receipt. When configured, all areas of the check show both languages, except the check number, table number and employee name and number. These numerals print in the primary language.

## Related Topics

- [Configuring Right to Left Reading Languages](#)
- [Creating a Print Language List Button](#)
- [Creating Print Language Buttons](#)

## Configuring Right to Left Reading Languages

To show guest check detail and print customer receipts and guest checks in the right to left orientation configured for a language, set the following:

- Enterprise Language
  - Workstation Language
  - Secondary Print Language
1. Select the Enterprise level, click **Setup**, and then click **Languages**.
  2. Double-click the language record to open it.
  3. To show the check detail area and customer receipt on the POS client and print in right-to-left orientation, select **Right-To-Left**.
  4. Click **Save**.

You can print custom numerals on a customer receipt or guest check. For example, Arabic digits can print on the receipt rather than Latin digits. Symphony version 2.7 and later does not support custom numerals in the POS client check detail appearance.

5. Select the property, click **Setup**, and then click **Workstations**.
6. From the **Language** drop-down list, select the language to appear on the workstation.

You can override the default language on the workstation for specific employees using the Employee Maintenance module. Employees with a different language configured in Employee Maintenance see that language after signing in to the workstation.

7. Click **Save**.
8. Select the property, click **Setup**, and then click **Property Parameters**.
9. From the **Language 1** and **Language 2** drop-down lists, select the primary and secondary languages.
10. From the **Select Secondary Print Language** drop-down list, select the language.



To print only the default language, select **0 - None**. When printing multiple languages, the application prints item names in the order configured for the property.

11. Click **Save**.
12. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Format Parameters**.
13. Click the **Options** tab, and then select **52 - Print Secondary Language on Guest Checks/Customer Receipt**.
14. Click **Save**.

- [Creating a Print Language List Button](#)
- [Creating Print Language Buttons](#)

#### Related Topics

- [Printing Multiple Languages on Guest Checks and Customer Receipts](#)

## Creating a Print Language List Button

When printing multiple languages, you can have each workstation operator select the language from a list in the POS client using the Print Language List button.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Add a button to the appropriate screen with the function **Print Language List**.
3. Click **Save**.

- [Configuring Right to Left Reading Languages](#)
- [Creating Print Language Buttons](#)

#### Related Topics

- [Printing Multiple Languages on Guest Checks and Customer Receipts](#)
- [Workstation Touchscreen Pages](#)

## Creating Print Language Buttons

The Print Language function allows the workstation operator to select a specific language. For example, if the secondary language is Arabic, the Print Language 2 button prints the customer receipt in Arabic. Follow these steps to create one or more Print Language buttons.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Add a button to the appropriate screen with the function **Print Language 2**. Depending on the number of languages, you can create other Print Language buttons (for example, **Print Language 3** and **Print Language 4**).
3. Click **Save**.

- [Configuring Right to Left Reading Languages](#)

- [Creating a Print Language List Button](#)

#### Related Topics

- [Printing Multiple Languages on Guest Checks and Customer Receipts](#)
- [Workstation Touchscreen Pages](#)

## Allowing Employees to Manually Replay Checks through the Workstation

Beginning with Symphony version 2.9.2, you must grant employees permission to manually replay offline checks through the Property Management Console (PMC), if an offline POS workstation fails to automatically replay its checks before coming back online.

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Double-click the role type record (for example, administrator or manager).
3. Click the **Operations** tab, and then click the **PMC General/Reports** subtab.
4. Select **30001 - Run PMC** to allow employees associated with the role to launch the Property Management Console (PMC) on the workstation using L the Launch PMC function key.
5. Click the **PMC Procedures** subtab, and then select **30069 - Replay Checks** from the Other Procedure Options section.
6. Click **Save**.

## Check Add/Transfer

Transferring checks is a procedure that changes ownership of a guest check. Symphony enables privileged workstation operators to transfer checks from another server to themselves by employee number or by employee ID number. Guest checks may also be transferred across Revenue Centers. The Transfer Checks function only transfers the ownership of the guest check; it does not transfer the check's sales totals for reporting purposes.

Add Check means to combine two checks together while in a transaction.

#### Related Topics

- [Allowing Employees to Add or Transfer Checks](#)
- [Configuring the Add/Transfer Revenue Centers](#)
- [Configuring Add/Transfer Buttons](#)

## Allowing Employees to Add or Transfer Checks

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Double-click the role type record (for example, administrator, manager or server).
3. Click the **Operations** tab, and then click the **Guest Checks** subtab.
4. Select the appropriate permission options for the user role:

- **45 - Authorize Transfer of Checks in the Same Revenue Center:** Select to allow employees with this role to transfer checks from another operator within the same revenue center, and to authorize others to do so.
  - **46 - Authorize Transfer of Checks Between Revenue Centers:** Select to allow employees with this role to transfer checks from another revenue center, and to authorize others to do so.
  - **47 - Authorize Adding of Checks in the Same Revenue Center:** Select to allow employees with this role to add checks (to be in a check, and add another check to it) within a revenue center, and to authorize others to do so.
  - **48 - Authorize Adding of Checks Between Revenue Centers:** Select to allow employees with this role to add checks (to be in a check, and add another check to it) from another revenue center, and to authorize others to do so.
5. Click **Save**.

#### Related Topics

- [Check Add/Transfer](#)

## Configuring the Add/Transfer Revenue Centers

1. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
2. On the General tab, scroll down to the Add/Transfer Revenue Center section, and then select up to eight revenue centers from which checks can be transferred into this revenue center.
3. Click **Save**.
4. Repeat Steps 1 through 3 for all revenue centers in the property.

#### Related Topics

- [Check Add/Transfer](#)

## Configuring Add/Transfer Buttons

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the page on which to place the Add/Transfer buttons.
3. Click the **Edit** tab, and then select the page area in which to define the buttons.
4. Click **Button**, and then on the **General** subtab, select **Function** from the **Type** drop-down list.
5. Click the black arrow directly beneath the **Type** drop-down list, select **Check Add** from the **Type** pane.
6. Select one of the following function keys, and then click **OK**:
  - **Add/Transfer by Number:** Adds or transfers a check within the same revenue center using the check number entered.
  - **Add/Transfer Check by Number RVC Index:** Adds or transfers a check (using the check number) from the revenue center specified in the Index field.

The Index field points to one of the eight revenue centers configured in the Add/Transfer section of the RVC Parameters module.

- **Add/Transfer Check by Number Prompt RVC:** Adds or transfers a check (using the check number) from one of the eight add/transfer revenue centers configured in the RVC Parameters module.
  - **Add/Transfer Check by Table:** Adds or transfers a check within a revenue center. The workstation client prompts for the table number or table ID of the check to be added or transferred.
  - **Add/Transfer Check by Table RVC Index:** Adds or transfers a check (using the table number or table ID) from the revenue center specified in the Index field. The Index field points to one of the eight revenue centers configured in the add/transfer section of the RVC Parameters module.
  - **Add/Transfer Check by Table Prompt RVC:** Adds or transfers a check (using the table number or table ID) from one of the eight add/transfer revenue centers configured in the RVC Parameters module.
  - **Add/Transfer Check From List Prompt RVC:** Prompts users for the revenue center, and then shows all open checks that can be added or transferred from others within the specified revenue center.
  - **Add/Transfer Check From List RVC Index:** Shows all open checks in the revenue center (specified by the Index field) that can be added or transferred from others. The Index field points to one of the eight revenue centers configured in the Add/Transfer section of the RVC Parameters module.
  - **Add/Transfer Check SLU:** Shows a list of checks that can be added or transferred from other workstation operators on the Open Check SLU.
7. Enter a **Legend** for the button, and then position and size the button on the page.
  8. Repeat Steps 4 through 7 to create buttons as needed for the remaining Add/Transfer functions in Step 6.
  9. Click **Save**.

#### Related Topics

- [Check Add/Transfer](#)

# Workstation Touchscreen Pages

Page templates allow you to customize a workstation touchscreen page in various ways. Page templates are categorized into the following types:

- Classic templates: These templates are similar to Symphony First Edition touchscreen templates
- Blank templates: These templates are used for customized pages or a Sign On page
- Tabbed templates: These templates are used for Sign On and Transaction pages

Tabbed templates allow the greatest functionality. With a tabbed template, you can configure multiple tabs on the page. Approximately 50 tabs and subtabs can appear on a page, and each tab and subtab contain up to 50 buttons. Having a large number of buttons on a single page allows you to configure a small number of pages for a revenue center. A tab is used for navigation. Navigation on a page is consistent from page to page (navigation bar and subtabs).

Pages can contain buttons and more sophisticated content, such as dining tables, Screen Lookups (SLUs), numeric entry areas, and background panels for highlighted groups of controls. All buttons performs a function.

The content appearing on a page can be dynamic based on the menu levels, serving period, employee class, or other criteria. For example, you can show a Manager Functions tab only if the manager is assigned to one of three manager employee classes.

When editing pages from the Page Design module, what-you-see-is-what-you-get.

- [Understanding Page Design](#)
- [Configuring Function Keys](#)
- [Assigning Default Touchscreen Pages](#)
- [Changing the Appearance of Workstations and KDS Displays](#)
- [Configuring Macros](#)

## Understanding Page Design

Page templates allow you to customize a workstation touchscreen page in various ways. Page templates are categorized into the following types:

- Classic templates: These templates are similar to Symphony First Edition touchscreen templates
- Blank templates: These templates are used for customized pages or a Sign On page
- Tabbed templates: These templates are used for Sign On and Transaction pages

Tabbed templates allow the greatest functionality. With a tabbed template, you can configure multiple tabs on the page. Approximately 50 tabs and subtabs can appear

on a page, and each tab and subtab contain up to 50 buttons. Having a large number of buttons on a single page allows you to configure a small number of pages for a revenue center. A tab is used for navigation. Navigation on a page is consistent from page to page (navigation bar and subtabs).

Pages can contain buttons and more sophisticated content, such as dining tables, Screen Lookups (SLUs), numeric entry areas, and background panels for highlighted groups of controls. All buttons performs a function.

The content appearing on a page can be dynamic based on the menu levels, serving period, employee class, or other criteria. For example, you can show a Manager Functions tab only if the manager is assigned to one of three manager employee classes.

When editing pages from the Page Design module, what-you-see-is-what-you-get.

#### Related Topics

- [Configuring Function Keys](#)
- [Changing the Appearance of Workstations and KDS Displays](#)
- [Configuring Macros](#)

## Configuring Function Keys

Function keys allow workstation operators to perform a variety of tasks, such as opening a cash drawer, authorizing a credit card, adding and transferring checks, printing customer receipts, and many other operations.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place a function key.
3. On the **Edit** tab, select the page area in which to define the function key.
4. Click **Button**.
5. On the **General** subtab, enter the key name in the **Legend** field.
6. From the **Type** drop-down list, select **Function**.
7. Click the black arrow beneath the **Type** drop-down list.
8. Select the appropriate function, and then click **OK**.
9. Position and size the button on the page. Use the Style arrow to change the color.
10. Click **Save**.

- [Changing the Appearance of Workstations and KDS Displays](#)
- [Configuring Macros](#)

#### Related Topics

- [Understanding Page Design](#)

## Assigning Default Touchscreen Pages

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Assignment**.

2. Click the **Configuration** tab, and then configure the following settings:
  - **Default Sign In Page:** Select the page to show when operators are not signed on to a workstation.
  - **Default Transaction Page:** Select the page to show for workstation operators who sign on to this location when a transaction page is not defined within another configuration (that is, operator, Employee Class, and so on).
  - **Default Training Page:** Select the page to show for workstation operators in training mode. If you select **0 - None**, employees in training mode see the default touchscreen based on the touchscreen hierarchy.
3. Click **Save**.

## Changing the Appearance of Workstations and KDS Displays

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Theme Assignment**.
  2. Change the following settings:
    - **Default Theme:** Select the default theme for the workstation.
    - **Default Palette:** If you selected **Edge** as the **Default Theme**, select the color palette for the theme.
    - **Default Kitchen Display Theme:** Select the theme for the KDS.
  3. Click **Save**.
- [Configuring Function Keys](#)
  - [Configuring Macros](#)

### Related Topics

- [Understanding Page Design](#)
- [Configuring Employee Privileges for Kitchen Themes](#)
- [Creating Kitchen Themes](#)
- [Importing Current Settings to a Kitchen Theme](#)
- [Creating a Kitchen Theme Period](#)

### Related Topics

- [Kitchen Themes](#)

## Configuring Macros

A macro is a button that, when pressed, executes a series of commands. Macros save time when workstation operators frequently enter certain sequences or keystrokes. You can set macros to include menu items, service charges, discounts, tenders, function keys, alphanumeric keys, or a link to another macro.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.

2. Open the Front of House page on which to place the macro button.
3. On the **Edit** tab, select the page area in which to define the macro button.
4. Click **Button** to add a button.
5. On the **General** subtab, enter the button name in the **Legend** field.
6. From the **Type** drop-down list, select **Function**.
7. Click the black arrow directly beneath the **Type** drop-down list, select the **Macro** function, and then click **OK**.
8. Click the **Edit Macro Keys** button, and then add the appropriate steps in the proper sequence.
9. Highlight the macro button.
10. Position and size the button on the page. Use the Style arrow to change the color.
11. Click **Save**.

- [Configuring Function Keys](#)
- [Changing the Appearance of Workstations and KDS Displays](#)

#### **Related Topics**

- [Understanding Page Design](#)



## Resetting Daily Totals

A business day refers to the beginning and end times of a day of business. A business day can have any begin time, but typically a business day starts in the early morning hours during a slow or closed period of operations (for example, 3:00 a.m. or 4:00 a.m.). A calendar day always begins at 12:00 a.m.

To reset daily check and employee totals, a property or revenue center must start a new business day.

- [Start of Day](#)
- [Start of Day Business Rules](#)
- [Start of Day with Offline Workstations or Server](#)
- [Configuring Start of Day](#)

### Start of Day

Start of Day (SOD) is the process that begins a new business day at a property. The SOD can be set to run automatically or manually.

When the time of day occurs that a new business day is automatically configured to start (for example, at 4:00 a.m. each day), the following actions occur in the order listed:

- Symphony increases the Business Day and updates the status of checks and employees.
- The PC Autosequence runs, and typically performs the following actions:
  - Batches and settles credit cards
  - Runs custom applications for a property
- After the SOD Asequence completes, Symphony checks to see whether it is time to run other autosequences (such as Start of Week Autosequence, Start of Pay Period Autosequence, and so on).

Many properties like to start a new business day manually at their own time (after a night auditor balances reports). Often these properties stop their Symphony and property management systems at the same time, roll to a new business day, and then bring the systems back up. An administrator can manually run SOD in Symphony using an interaction called PC Autosequence (from the EMC) or by pressing a button on the workstation. When SOD begins manually, Symphony performs the same actions as if it were run automatically. The only difference is the method by which SOD begins.

- [Start of Day Business Rules](#)
- [Start of Day with Offline Workstations or Server](#)

#### Related Topics

- [Configuring Start of Day](#)

## Start of Day Business Rules

Simphony has business rules to determine how and when a business day can begin, and which business day is beginning. The rules exist for both automatic and manual SOD.

When starting a new business day, the following rules apply:

- SOD cannot be run twice in 8 hours.
- SOD cannot be run twice between midnight and noon.
- SOD cannot be run twice between noon and midnight.
- When a business day is scheduled to run automatically, it is not possible to start the business day manually with a PC Autosequence.

A business day is calculated based on noon (12:00 p.m.) to noon times.

- If SOD is run before noon, Simphony assumes the business day completed is for the previous calendar day. (If SOD runs at 3:05 a.m. on the 17th, the 16th is the business day that is closing, and the 17th is the business day being started.)
- If SOD is run after noon, Simphony assumes the business day completed is for the current calendar day. (If SOD is run at 11:52 p.m. on the 17th, the 17th is the business day that is closing, and the 18th is the business day being started.)

- [Start of Day](#)
- [Start of Day with Offline Workstations or Server](#)

### Related Topics

- [Configuring Start of Day](#)

## Start of Day with Offline Workstations or Server

Workstations are aware of the business date configuration so that offline reports show relevant information. Consider the following scenario:

- Every business day begins at 3:00 p.m.
- On Tuesday at approximately 11:00 a.m., a property loses communication with the database (the property is in Yellow Mode).
- The site is offline until Friday afternoon.

In this situation, workstations run reports as if SOD occurred. For example, a report taken for today on Wednesday at 4:00 p.m, shows data from Wednesday at 3:00 a.m. (the time SOD would have occurred) to the current second when the report was taken. In addition, if days are configured for manual SOD, workstation reports assume that the business day begins 24 hours after the previous SOD occurred. In this situation, a dialog box appears on workstations informing the manager that a new business day has begun.

Catch-Up mode increases the business day after the Simphony server goes offline during an automatically scheduled SOD time period. Consider the following scenario:

- SOD is set to run automatically at 4:00 a.m.
- At 2:00 a.m., the Simphony server experiences a power failure.

- At 6:00 a.m., the Symphony server is online again.

In Catch-Up mode, the SOD Autosequence does not start. With Catch-Up mode, the business day still starts at 4:00 a.m. When Symphony comes online at 6:00 a.m., the PERIOD\_INSTANCE table is populated with rows to indicate that the business day started. The rows do not show a 6:00 a.m. run time, however. Catch-Up mode knows that the application was supposed to have started at 4:00 a.m., so the rows are created with 4:00 a.m. as the start time. Symphony can catch-up from up to two missed automatic start of days and make the appropriate PERIOD\_INSTANCE entries.

- [Start of Day](#)
- [Start of Day Business Rules](#)

#### Related Topics

- [Configuring Start of Day](#)

## Configuring Start of Day

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type (such as manager), click the **Operations** tab, and then click the **PMC Procedures** subtab.
3. Select the appropriate start of day role privileges:
  - **30058 - Run Start of Day from OPS**: Select this option to allow all employees with the role to increment the business date from the property's Check and Posting Service (CAPS) workstation.
  - **30059 - Prevent Running SOD from OPS with Open Checks**: Select this option so that Start of Day (SOD) cannot run when open checks exist.
4. Click **Save**.
5. To allow a manager or administrator to manually run SOD from a workstation, select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**. Otherwise, skip to Step 14.
6. Select the page on which to place the **Start of Day** button.

The **Start of Day** button allows a manager or administrator to manually run the Start of Day on a workstation.
7. Add a Start of Day button:
  - a. In the **Legend** field, enter **Run Start of Day**.
  - b. From the **Type** drop-down list, select **Function**.
  - c. Click the arrow beneath the **Type** drop-down list, and then select **Start of Day**.
  - d. Position and size the new button on the page.
8. Click **Save**.
9. Select the property, click **Setup**, and then click **Property Parameters**.
10. Click the **Options** tab.
11. To allow a manager or administrator to manually run SOD from a workstation, select **48 - Run Start of Day from OPS**.
12. Click the **Calendar** tab.

13. Select **Run Manually** for each day of the week.
14. In the **Manual SOD Safety catch time** field, set the time when the application automatically increments the business date if someone forgets to manually run SOD.  
  
The application checks to see whether SOD occurred within a 24-hour period for the selected property. This time is based on the time zone of the property.
15. Click **Save**.
16. Select the Enterprise level, click **Configuration**, and then click **PC Autosequences**.
17. Insert a PC Autosequence record and name it **Increment Business Day**.
18. Open the record, and then select the **Allowed Properties** to view the autosequence.
19. (Optional) Add **Parameters** as appropriate. For example, you can enter a property number and exclude a revenue center number.
20. On the **Steps** tab, add a step, and then from the **Step Type** drop-down list, select **3 - Increment Business Date**.
21. Click **Save**.

#### Related Topics

- [Start of Day](#)
- [Start of Day Business Rules](#)
- [Start of Day with Offline Workstations or Server](#)

# Updating POS Client Configuration

You can establish the frequency with which database synchronization jobs run on the workstations. By default, the workstations and Kitchen Display System (KDS) Controllers wait 30 minutes to retrieve the latest updates from the database.

The Database Update Frequency setting exists in three EMC modules:

- Property Parameters
- Workstations
- KDS Controller

The Workstations module setting or KDS Controller module setting takes precedence over the Property Parameters setting. If the workstation's Database Update Frequency setting is greater than the Property Parameters setting, the highest configured value within the entire Workstations module for the property is used for the purge jobs event scheduling calculation.

- [Setting the Database Update Frequency](#)

## Setting the Database Update Frequency

1. Select the property, click **Setup**, and then click **Property Parameters**.
2. Click the **Workstations** tab.
3. In the **Database Update Frequency** field, enter the number of seconds that workstations and KDS Controllers wait to retrieve the latest updates from the database.
4. Click **Save**.
5. To override this setting for the workstation, select the property, click **Setup**, and then click **Workstations**.
6. Double-click the workstation.
7. On the **General** tab, set the **Database Update Frequency** timeout value.
8. Click **Save**.
9. To override this setting for the KDS, select the property, click **Setup**, and then click **KDS Controllers**.
10. Double-click the KDS record.
11. On the **General** tab, set the **Database Update Frequency** timeout value.
12. Click **Save**.

## Clearing Totals

If you have the appropriate privileges, you can purge unwanted transaction totals accumulated during testing and training periods prior to going live. Clearing totals immediately purges the totals for all of the designated property's revenue centers from the Enterprise. You cannot clear totals for individual revenue centers.

The Clear Totals operation performs the following tasks:

- Immediately purges the property's transaction totals and check related data on and prior to the selected business date from the Enterprise
- Initiates a request to run a purge job for the reporting database (Oracle Hospitality Reporting and Analytics Advanced) totals
- Purges the MRequest Queues data
- Purges the Journal log file data
- (Optional) Purges Cash Management data

After the Clear Totals operation begins, two data purging events are scheduled to run for the following purge jobs:

- **Check and Posting Service (CAPS) Database:** This event runs first based on the Database Update Frequency setting, plus an additional 30 minutes. When the scheduled time is reached, the application purges the designated property's CAPS database.
- **Workstation DataStore Data:** This event runs second based on the Database Update Frequency setting, plus an additional 45 minutes. When the scheduled time is reached, the application purges the DataStore data from the designated property's workstations.
- [Running the Clear Totals Operation](#)

## Running the Clear Totals Operation

Before clearing totals, you must batch and settle all credit card transactions dated prior to the specified business date. You cannot clear totals when unbatched credit cards exist. Oracle recommends that you generate and save all credit card related reports from either the EMC or Oracle Hospitality Reporting and Analytics for historical reference.

Time Zone synchronization between the Symphony application server and workstations is important for the Clear Totals operation to work correctly. The CAL keeps the time settings on Symphony clients in sync with the Symphony application server. Some devices do not use CAL for configuration, and these devices can become out of sync with the Symphony application server. Therefore, before running the Clear Totals operation, ensure that the time settings on non-CAL devices are set to match the Symphony application server's time settings as closely as possible.

1. Select the property, click **Tasks**, and then click **Clear Totals**.

2. Select the **Business Date** from the drop-down list.
3. Click **Clear Totals**. The Result window shows the status of each purged job.
4. Select the property, click **Setup**, and then click **Workstations**.
5. Look at the column named **Totals Cleared Through**, and verify that the date and time appear in the column for each workstation at the property.
6. Double-click the Check and Posting Service (CAPS) workstation, and then click the **Service Host** tab.
7. Verify that the date and time appear in the **Totals Cleared Through** column for the CAPS workstation.

EGateway log files show the date and time a Clear Totals operation was performed.

## Check and Posting Service (CAPS)

The Check and Posting Service (CAPS) is a required service that runs on-premises at the property. CAPS acts as the bridge between the Enterprise and the property, providing resiliency and increasing system performance. As workstation operators perform transactions and other operations on POS clients, CAPS stores the information and then posts in real-time to the Enterprise. Each property must have CAPS configured because without it, information occurring on the POS clients does not post to the Enterprise.

In the event of a WAN outage, POS clients are largely unaffected as they continue to post transactions to the on-premises CAPS. During a WAN outage, the Enterprise is inaccessible to the property; changes made in EMC are not reflected on POS clients, and Reporting and Analytics reports do not include the live transactions. Other systems and functions that rely on Enterprise connectivity are similarly impacted. When the WAN connection is restored, CAPS posts the information to the Enterprise.

CAPS also serves as the arbitrator of check sharing by maintaining a record of check ownership. This minimizes the likelihood of multiple POS clients having conflicting versions of a check.

Some properties perform a large volume of transactions that overwhelm the POS client workload. For these environments, it may be necessary to run CAPS on a PC with significantly more computing resources and disk space. The information in this chapter explains the variety of configuration methods for CAPS.

- [Overview of CAPS Configuration Methods](#)
- [CAPS Supported Software and Hardware](#)
- [CAPS Configuration Tool](#)
- [Prerequisite Products for CAPS](#)
- [Configuring CAPS on Microsoft IIS with Oracle Database on Enterprise Server](#)
- [Configuring CAPS on Microsoft IIS with Oracle Database on Remote Service Host](#)
- [Configuring CAPS on Microsoft IIS with SQL Server Database on Enterprise Server](#)
- [Configuring CAPS on Microsoft IIS with SQL Server Database on Remote Service Host](#)
- [Upgrading Microsoft IIS CAPS](#)
- [Configuring CAPS as a Windows Service with an Oracle Database](#)
- [Configuring CAPS as a Windows Service with a Microsoft SQL Database](#)
- [Optional CAPS Configuration Tasks](#)
- [CAL Installation Prerequisites for a Workstation without the POS Interface \(CAPS Only Workstation\)](#)



## Overview of CAPS Configuration Methods

Beginning with Symphony version 2.9, you can run the CAPS web application on Microsoft Internet Information Services (IIS) and also have the CAPS database reside on an Oracle database.

Running CAPS as a web service is an alternative method to running CAPS as a Windows service and a workstation-based service. In Symphony versions earlier than 2.9, CAPS runs only on a Microsoft SQL Server database and the embedded Symphony Service Host Webkit web server.

CAPS needs to be on-property regardless of which configuration fits the business architecture. CAPS holds state information of checks and hence, the CAPS service must be on sticky sessions. The CAPS service cannot reside behind a load balancer.

You can run CAPS using one of the following types of configuration methods:

- CAPS Running on a POS Client Workstation (along with the POS client)
- CAPS Running on a POS Client Workstation (without the POS client)
- CAPS Running as a Windows Service with Oracle database (only supported using the Oracle 32-bit client installed on the CAPS service host)
- CAPS Running as a Windows Service with Microsoft SQL Server database
- CAPS Running as a Web Service on Microsoft Internet Information Services (IIS) with Oracle database
- CAPS Running as a Web Service on Microsoft IIS with Microsoft SQL Server database

**Table 36-1 CAPS Configuration Methods**

CAPS Configuration Details	CAPS on a POS Client Workstation	CAPS as a Windows Service		CAPS as a Web Service on Microsoft IIS	
CAPS Database	Microsoft SQL Express	Microsoft SQL Server Database	Oracle Database	Microsoft SQL Server Database	Oracle Database
CAPS Service Host	POS client	CAPS Only	CAPS Only	CAPS Only	CAPS Only
Hardware	All supported Oracle MICROS workstations	All supported Microsoft Windows Servers	All supported Microsoft Windows Servers	All supported Microsoft Windows Servers	All supported Microsoft Windows Servers

- [CAPS Supported Software and Hardware](#)
- [CAPS Configuration Tool](#)
- [Prerequisite Products for CAPS](#)
- [Overview of Setting Up CAPS as a Web Service on Microsoft Internet Information Services \(IIS\)](#)

# CAPS Supported Software and Hardware

## Recommended Workstations for CAPS

- Oracle MICROS Workstation 610
- Oracle MICROS Workstation 620
- Oracle MICROS Workstation 650
- Oracle MICROS PC Workstation 2015 (Microsoft POSReady 7, Microsoft Windows 7 Professional)
- Oracle MICROS Workstation 5A (Microsoft POSReady 7, Microsoft POSReady 2009)

## CAPS Supported Operating Systems

- Microsoft Windows Server 2012 R2
- Microsoft Windows Server 2008 R2
- Microsoft Windows 10 IoT Enterprise (formerly Industry)
- Microsoft Windows 8.1
- Microsoft Windows 7
- Microsoft POSReady 7
- Microsoft POSReady 2009

## CAPS Supported Databases

- Oracle Database 12c
- Microsoft SQL Server 2012 R2 Enterprise or Standard or Express Edition
- Microsoft SQL Server 2008 R2 Enterprise or Standard or Express Edition
- [Overview of CAPS Configuration Methods](#)
- [CAPS Configuration Tool](#)
- [Prerequisite Products for CAPS](#)
- [Overview of Setting Up CAPS as a Web Service on Microsoft Internet Information Services \(IIS\)](#)

# CAPS Configuration Tool

To facilitate CAPS configuration, you can use the CAPS Configuration Tool to configure CAPS. The CAPS Configuration Tool is packaged with Symphony installation, and deploys to the Tools folder on the Symphony server when you upgrade to, or install Symphony version 2.9 or later.

The CAPS Configuration Tool is also available as the CAPSONIIS CAL Package for hosted Symphony installations. This CAL package contains the necessary tools and CAPS software.

The CAPS Configuration Tool creates the CAPS database schema on an Oracle or Microsoft SQL Server database. It also helps to configure the service on IIS. The tool offers an option to upgrade CAPS to future versions of Symphony.

[Configuring CAPS Access](#) contains important information about enabling the privileges to access the CAPS Configuration Tool.

- [Overview of CAPS Configuration Methods](#)
- [CAPS Supported Software and Hardware](#)
- [Prerequisite Products for CAPS](#)
- [Overview of Setting Up CAPS as a Web Service on Microsoft Internet Information Services \(IIS\)](#)

## Prerequisite Products for CAPS

The following prerequisite products are required when using CAPS as a web service on Microsoft Internet Information Services (IIS), unless otherwise noted.

- Symphony Version 2.9 or Later
- Database Platform (one of the following):
  - Oracle Database 12c Server
  - Microsoft SQL Server 2012
- Operating System Components:
  - Microsoft IIS
  - Microsoft .NET Framework 4.6.1
- [Overview of Setting Up CAPS as a Web Service on Microsoft Internet Information Services \(IIS\)](#)
- [Overview of CAPS Configuration Methods](#)
- [CAPS Supported Software and Hardware](#)
- [CAPS Configuration Tool](#)
- [Overview of Setting Up CAPS as a Web Service on Microsoft Internet Information Services \(IIS\)](#)

## Overview of Setting Up CAPS as a Web Service on Microsoft Internet Information Services (IIS)

Setting up CAPS as a web service consists of completing the following tasks:

- Allowing access to the CAPS Configuration Tool
- Enabling users to install and authenticate workstations
- Configuring the Service Host for CAPS in the EMC
- Installing CAPS database software (Oracle or Microsoft SQL Server)
- Configuring the CAPS database
- Configuring the Service on Microsoft IIS

- [Overview of CAPS Configuration Methods](#)
- [CAPS Supported Software and Hardware](#)
- [CAPS Configuration Tool](#)
- [Prerequisite Products for CAPS](#)

## Configuring CAPS on Microsoft IIS with Oracle Database on Enterprise Server

The option to run CAPS on an Enterprise server is only available for licensed Symphony customers. The Symphony cloud services do not support this feature.

[Configuring CAPS Access](#) contains important information about enabling the privileges to access the CAPS Configuration Tool.

- [Configuring CAPS Access](#)
- [Configuring the Service Host for CAPS in EMC](#)
- [Configuring CAPS with an Oracle Database](#)
- [Configuring CAPS on Microsoft IIS](#)

### Configuring CAPS Access

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **Miscellaneous** subtab.
3. Select the following Miscellaneous options:
  - **10061 - Allow Access to the IIS CAPS Configurator Tool**
  - **10065 - Download Software, Install and Authenticate Clients and Service Hosts Using CAL**
4. Click **Save**.

#### Note:

Before you perform an upgrade to Symphony 18.1 from Symphony versions 2.9.x or 2.10, you need to ensure that the options described above are enabled before running the post-upgrade CAPS Configuration Tool. Specifically, if option 10065 is disabled prior to the upgrade, after the upgrade, an error message appears during your login to the CAPS Configuration Tool. If you click **OK** on the error message window, you can log onto the CAPS Configuration Tool, but you cannot utilize the **Authenticate CAPS** button (added to the CAPS Configuration Tool for the Symphony 18.1 release).

### Configuring the Service Host for CAPS in EMC

Follow these steps to configure the Service Host for a hosted Enterprise with Symphony Premium Cloud Service users:

1. Select the Enterprise level, click **Setup**, and then click **Service Hosts**.
2. Insert a new Service Host record, and then double-click it to open in form view.
3. In the **Host Name** field, enter the host name of the Symphony application server where Microsoft IIS is running.
4. Enter the **Subnet Mask** and the **Default Gateway** of the Enterprise server.
5. Click **Save**.
6. Select the property, click **Setup**, and then click **Property Parameters**.
7. Click the **Workstations** tab.
8. From the Service Hosts section, select the CAPS Service Host created in Step 1, and then enter the **Port** number for CAPS configuration. For example, port number 8050.  
  
This Port is the unused port number and is different from the EGateway service port.
9. Click **Save**.

## Configuring CAPS with an Oracle Database

1. Navigate to the directory containing the CAPSConfigurator folder.  
Depending on your configuration method, the path is one of the following:
  - [Drive Letter]:\ MICROS\Symphony2\Tools\CAPSConfigurator
  - [Drive Letter]:\ MICROS\Symphony\CAPSonIIS\Tools\CAPSConfigurator
2. Double-click **CAPSConfigurator.exe**, enter the server and port number of the EGateway, and sign in using your EMC credentials. A list of Service Hosts appears.
3. Click the Service Host to configure.
4. Click **CAPS Schema**.
5. Enter the appropriate information in the CAPS Schema dialog, and then click **Next**.
  - **Database:** Select the Oracle database type.
  - **Server:** Enter the server name.
  - **Port:** Enter the port number.
  - **Service name:** Enter the service name.
  - **Admin User:** Enter the administrative user name used to sign onto the Oracle database server, for example, the system user name. This user name cannot be a DBA user.
  - **Password:** Enter the current user's password to sign onto the Oracle database server.
6. In the next CAPS Schema dialog, enter the **User Name**, **Password**, and **Confirm Password** to create a new database user for the CAPS database, and then click **Next**.
7. Click **OK** to confirm. A message indicates success.

The CAPS Schema dbsettings.xml is configured at one of the following directories (depending on your configuration):

- [Drive Letter]:\MICROS\Symphony2\IISCAPSServiceHost
- [Drive Letter]:\MICROS\Symphony\IISCAPSServiceHost

[Configuring CAPS Access](#) contains important information about enabling the privileges to access the CAPS Configuration Tool.

## Configuring CAPS on Microsoft IIS

In the CAPS Configurator Tool, click **Configure CAPS**.

The CAPS Configurator Tool detects and configures the new Service Host. Upon successful configuration, the configured check box in the UI is automatically selected for the configured Service Host. A browser opens with the configured CAPS URL.

CAPS is configured at [Drive Letter]:\MICROS  
\Symphony2\EgatewayService\IISCAPSServiceHost.

[Configuring CAPS Access](#) contains important information about enabling the privileges to access the CAPS Configuration Tool.

## Configuring CAPS on Microsoft IIS with Oracle Database on Remote Service Host

The CAPS service must run on the same server where the Oracle database is installed.

- [Configuring CAPS Access](#)
- [Configuring the Service Host for CAPS in EMC](#)
- [Preparing the Server to Configure CAPS](#)
- [Configuring CAPS with an Oracle Database](#)
- [Configuring CAPS on Microsoft IIS](#)

## Configuring CAPS Access

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **Miscellaneous** subtab.
3. Select the following Miscellaneous options:
  - **10061 - Allow Access to the IIS CAPS Configurator Tool**
  - **10065 - Download Software, Install and Authenticate Clients and Service Hosts Using CAL**
4. Click **Save**.

 **Note:**

Before you perform an upgrade to Symphony 18.1 from Symphony versions 2.9.x or 2.10, you need to ensure that the options described above are enabled before running the post-upgrade CAPS Configuration Tool. Specifically, if option 10065 is disabled prior to the upgrade, after the upgrade, an error message appears during your login to the CAPS Configuration Tool. If you click **OK** on the error message window, you can log onto the CAPS Configuration Tool, but you cannot utilize the **Authenticate CAPS** button (added to the CAPS Configuration Tool for the Symphony 18.1 release).

## Configuring the Service Host for CAPS in EMC

1. To configure the Service Host for a hosted Enterprise with Symphony Standard Cloud Service users:
  - a. Select the property level, click **Setup**, and then click **Workstations**.
  - b. Insert a new workstation record, and then double-click it to open in form view.
  - c. On the **General** tab, enter the host name of the remote server where CAPS will be configured in the **Address/Host Name** field.
  - d. Enter the **Subnet Mask** and the **Default Gateway** of the remote server where CAPS will be configured.
  - e. If you are configuring CAPS as a Windows Service, select **Is Windows Service**. Otherwise, skip this step.
  - f. Click **Save**.
  - g. Click the **Remove OPS From Service Host** link, and then click **Yes** to confirm.
2. To configure the Service Host for a hosted Enterprise with Symphony Premium Cloud Service users:
  - a. Select the Enterprise level, click **Setup**, and then click **Service Hosts**.
  - b. Insert a new Service Host record, and then double-click it to open in form view.
  - c. In the **Host Name** field, enter the host name of the remote server where CAPS will be configured.
  - d. Enter the **Subnet Mask** and the **Default Gateway** of the remote server.
  - e. If you are configuring CAPS as a Windows Service, select **Is Windows Service**. Otherwise, skip this step.
  - f. Click **Save**.
3. Select the property, click **Setup**, and then click **Property Parameters**.
4. Click the **Workstations** tab.
5. From the Service Hosts section, select the CAPS Service Host created in Step 1 or 2, and then enter the **Port** number for CAPS configuration.

This Port is the unused port number and is different from the Egateway service port.

6. Click **Save**.

## Preparing the Server to Configure CAPS

1. Ensure that the Server has the latest Microsoft Windows patches.
2. Turn on the Microsoft Windows features:
  - Microsoft .NET Framework 3.5
  - Microsoft IIS
3. Install Microsoft .NET Framework 4.6.1.
4. Install the database: either Oracle Database 12c Server or Microsoft SQL Server.  
If using the Oracle Database 12c Server:
  - Deselect the pluggable database option.
  - Select the database admin user system account or equivalent.
5. In the EMC, configure the CAPSONIIS CAL package for deployment to the Remote Service Host.
6. Install the CAL client on the Remote Service Host.
7. In the EMC, deploy the CAPSONIIS CAL Package to the configured Service Host.  
After completion, this package is available in the [Drive Letter]:\Micros\Symphony\CAPSONIIS folder.
8. Navigate to [Drive Letter]:\Micros\, right-click the **Simphony** folder, and then select **Properties**.
9. Click the **Security** tab, and then click the **Edit** button.
10. Click the **Add** button.
11. In the Select Users or Groups dialog, enter `IIS_IUSRS` in the text box, and then click the **Check Names** button.
12. After the system identifies the user, click **OK**.
13. Click **Apply**, and then click **OK** twice in the subsequent windows.

## Configuring CAPS with an Oracle Database

1. Navigate to the directory containing the CAPSConfigurator folder.  
Depending on your configuration method, the path is one of the following:
  - [Drive Letter]:\MICROS\Symphony2\Tools\CAPSConfigurator
  - [Drive Letter]:\MICROS\Symphony\CAPSONIIS\Tools\CAPSConfigurator
2. Double-click **CAPSConfigurator.exe**, enter the server and port number of the EGateway, and sign in using your EMC credentials. A list of Service Hosts appears.
3. Click the Service Host to configure.
4. Click **CAPS Schema**.
5. Enter the appropriate information in the CAPS Schema dialog, and then click **Next**.



- **Database:** Select the Oracle database type.
  - **Server:** Enter the server name.
  - **Port:** Enter the port number.
  - **Service name:** Enter the service name.
  - **Admin User:** Enter the administrative user name used to sign onto the Oracle database server, for example, the system user name. This user name cannot be a DBA user.
  - **Password:** Enter the current user's password to sign onto the Oracle database server.
6. In the next CAPS Schema dialog, enter the **User Name**, **Password**, and **Confirm Password** to create a new database user for the CAPS database, and then click **Next**.
  7. Click **OK** to confirm. A message indicates success.

The CAPS Schema dbsettings.xml is configured at one of the following directories (depending on your configuration):

- [Drive Letter]:\MICROS\Symphony2\IISCAPSServiceHost
- [Drive Letter]:\MICROS\Symphony\IISCAPSServiceHost

[Configuring CAPS Access](#) contains important information about enabling the privileges to access the CAPS Configuration Tool.

## Configuring CAPS on Microsoft IIS

In the CAPS Configurator Tool, click **Configure CAPS**.

The CAPS Configurator Tool detects and configures the new Service Host. Upon successful configuration, the configured check box in the UI is automatically selected for the configured Service Host. A browser opens with the configured CAPS URL.

CAPS is configured at [Drive Letter]:\MICROS  
\Symphony2\EgatewayService\IISCAPSServiceHost.

[Configuring CAPS Access](#) contains important information about enabling the privileges to access the CAPS Configuration Tool.

## Configuring CAPS on Microsoft IIS with SQL Server Database on Enterprise Server

This type of configuration is available only for customers using Symphony Premium Cloud Service, not with Symphony Standard Cloud Service.

- [Configuring CAPS Access](#)
- [Configuring the Service Host for CAPS in EMC](#)
- [Configuring CAPS with a Microsoft SQL Server Database](#)
- [Configuring CAPS on Microsoft IIS](#)

## Configuring CAPS Access

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **Miscellaneous** subtab.
3. Select the following Miscellaneous options:
  - **10061 - Allow Access to the IIS CAPS Configurator Tool**
  - **10065 - Download Software, Install and Authenticate Clients and Service Hosts Using CAL**
4. Click **Save**.

### Note:

Before you perform an upgrade to Symphony 18.1 from Symphony versions 2.9.x or 2.10, you need to ensure that the options described above are enabled before running the post-upgrade CAPS Configuration Tool. Specifically, if option 10065 is disabled prior to the upgrade, after the upgrade, an error message appears during your login to the CAPS Configuration Tool. If you click **OK** on the error message window, you can log onto the CAPS Configuration Tool, but you cannot utilize the **Authenticate CAPS** button (added to the CAPS Configuration Tool for the Symphony 18.1 release).

## Configuring the Service Host for CAPS in EMC

Follow these steps to configure the Service Host for a hosted Enterprise with Symphony Premium Cloud Service users:

1. Select the Enterprise level, click **Setup**, and then click **Service Hosts**.
2. Insert a new Service Host record, and then double-click it to open in form view.
3. In the **Host Name** field, enter the host name of the Symphony application server where Microsoft IIS is running.
4. Enter the **Subnet Mask** and the **Default Gateway** of the Enterprise server.
5. Click **Save**.
6. Select the property, click **Setup**, and then click **Property Parameters**.
7. Click the **Workstations** tab.
8. From the Service Hosts section, select the CAPS Service Host created in Step 1, and then enter the **Port** number for CAPS configuration. For example, port number 8050.

This Port is the unused port number and is different from the EGateway service port.
9. Click **Save**.

## Configuring CAPS with a Microsoft SQL Server Database

1. Navigate to the directory containing the CAPSConfigurator folder.  
Depending on your configuration method, the path is one of the following:
  - [Drive Letter]:\MICROS\Simphony2\Tools\CAPSConfigurator
  - [Drive Letter]:\MICROS\Simphony\CAPSonIIS\Tools\CAPSConfigurator
2. Double-click **CAPSConfigurator.exe**, enter the server and port number of the Egateway, and sign in using your EMC credentials. A list of Service Hosts appears.
3. Click the Service Host to configure.
4. Click **CAPS Schema**.
5. Enter the appropriate information in the CAPS Schema dialog, and then click **Next**.
  - **Database**: Select the SQL Server database type.
  - **Server**: Enter the server name.
  - **Port**: Enter the port number.
  - **CAPS DB**: Enter a name for the CAPS database.
  - **Admin User**: Enter the administrative user name used to connect to the database server.
  - **Password**: Enter the administrative password.
6. Enter the credentials to create a new database user for the CAPS database, and then click **OK**.
  - **User Name**
  - **Password**
  - **Confirm Password**

A message indicates success.

The CAPS Schema dbsettings.xml is configured at one of the following directories (depending on your configuration):

- [Drive Letter]:\MICROS\Simphony2\IISCAPSServiceHost
- [Drive Letter]:\MICROS\Simphony\IISCAPSServiceHost

## Configuring CAPS on Microsoft IIS

In the CAPS Configurator Tool, click **Configure CAPS**.

The CAPS Configurator Tool detects and configures the new Service Host. Upon successful configuration, the configured check box in the UI is automatically selected for the configured Service Host. A browser opens with the configured CAPS URL.

CAPS is configured at [Drive Letter]:\MICROS  
\Simphony2\EgatewayService\IISCAPSServiceHost.

[Configuring CAPS Access](#) contains important information about enabling the privileges to access the CAPS Configuration Tool.

## Configuring CAPS on Microsoft IIS with SQL Server Database on Remote Service Host

The CAPS service must run on the same server where the Microsoft SQL Server database is installed.

- [Configuring CAPS Access](#)
- [Configuring the Service Host for CAPS in EMC](#)
- [Preparing the Server to Configure CAPS](#)
- [Configuring CAPS with a Microsoft SQL Server Database](#)
- [Configuring CAPS on Microsoft IIS](#)

### Configuring CAPS Access

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **Miscellaneous** subtab.
3. Select the following Miscellaneous options:
  - **10061 - Allow Access to the IIS CAPS Configurator Tool**
  - **10065 - Download Software, Install and Authenticate Clients and Service Hosts Using CAL**
4. Click **Save**.

#### Note:

Before you perform an upgrade to Symphony 18.1 from Symphony versions 2.9.x or 2.10, you need to ensure that the options described above are enabled before running the post-upgrade CAPS Configuration Tool. Specifically, if option 10065 is disabled prior to the upgrade, after the upgrade, an error message appears during your login to the CAPS Configuration Tool. If you click **OK** on the error message window, you can log onto the CAPS Configuration Tool, but you cannot utilize the **Authenticate CAPS** button (added to the CAPS Configuration Tool for the Symphony 18.1 release).

### Configuring the Service Host for CAPS in EMC

1. To configure the Service Host for a hosted Enterprise with Symphony Standard Cloud Service users:
  - a. Select the property level, click **Setup**, and then click **Workstations**.
  - b. Insert a new workstation record, and then double-click it to open in form view.
  - c. On the **General** tab, enter the host name of the remote server where CAPS will be configured in the **Address/Host Name** field.

- d. Enter the **Subnet Mask** and the **Default Gateway** of the remote server where CAPS will be configured.
  - e. If you are configuring CAPS as a Windows Service, select **Is Windows Service**. Otherwise, skip this step.
  - f. Click **Save**.
  - g. Click the **Remove OPS From Service Host** link, and then click **Yes** to confirm.
2. To configure the Service Host for a hosted Enterprise with Symphony Premium Cloud Service users:
    - a. Select the Enterprise level, click **Setup**, and then click **Service Hosts**.
    - b. Insert a new Service Host record, and then double-click it to open in form view.
    - c. In the **Host Name** field, enter the host name of the remote server where CAPS will be configured.
    - d. Enter the **Subnet Mask** and the **Default Gateway** of the remote server.
    - e. If you are configuring CAPS as a Windows Service, select **Is Windows Service**. Otherwise, skip this step.
    - f. Click **Save**.
  3. Select the property, click **Setup**, and then click **Property Parameters**.
  4. Click the **Workstations** tab.
  5. From the Service Hosts section, select the CAPS Service Host created in Step 1 or 2, and then enter the **Port** number for CAPS configuration.  
 This Port is the unused port number and is different from the Egateway service port.
  6. Click **Save**.

## Preparing the Server to Configure CAPS

1. Ensure that the Server has the latest Microsoft Windows patches.
2. Turn on the Microsoft Windows features:
  - Microsoft .NET Framework 3.5
  - Microsoft IIS
3. Install Microsoft .NET Framework 4.6.1.
4. Install the database: either Oracle Database 12c Server or Microsoft SQL Server.  
 If using the Oracle Database 12c Server:
  - Deselect the pluggable database option.
  - Select the database admin user system account or equivalent.
5. In the EMC, configure the CAPSONIIS CAL package for deployment to the Remote Service Host.
6. Install the CAL client on the Remote Service Host.
7. In the EMC, deploy the CAPSONIIS CAL Package to the configured Service Host.

After completion, this package is available in the [Drive Letter]:\Micros\Symphony\CAPSONIIS folder.

8. Navigate to [Drive Letter]:\Micros\, right-click the **Simphony** folder, and then select **Properties**.
9. Click the **Security** tab, and then click the **Edit** button.
10. Click the **Add** button.
11. In the Select Users or Groups dialog, enter `IIS_IUSRS` in the text box, and then click the **Check Names** button.
12. After the system identifies the user, click **OK**.
13. Click **Apply**, and then click **OK** twice in the subsequent windows.

## Configuring CAPS with a Microsoft SQL Server Database

1. Navigate to the directory containing the CAPSConfigurator folder.  
Depending on your configuration method, the path is one of the following:
  - [Drive Letter]:\MICROS\Simphony2\Tools\CAPSConfigurator
  - [Drive Letter]:\MICROS\Simphony\CAPSONIIS\Tools\CAPSConfigurator
2. Double-click **CAPSConfigurator.exe**, enter the server and port number of the Egateway, and sign in using your EMC credentials. A list of Service Hosts appears.
3. Click the Service Host to configure.
4. Click **CAPS Schema**.
5. Enter the appropriate information in the CAPS Schema dialog, and then click **Next**.
  - **Database:** Select the SQL Server database type.
  - **Server:** Enter the server name.
  - **Port:** Enter the port number.
  - **CAPS DB:** Enter a name for the CAPS database.
  - **Admin User:** Enter the administrative user name used to connect to the database server.
  - **Password:** Enter the administrative password.
6. Enter the credentials to create a new database user for the CAPS database, and then click **OK**.
  - **User Name**
  - **Password**
  - **Confirm Password**

A message indicates success.

The CAPS Schema dbsettings.xml is configured at one of the following directories (depending on your configuration):

- [Drive Letter]:\MICROS\Simphony2\IISCAPSServiceHost
- [Drive Letter]:\MICROS\Simphony\IISCAPSServiceHost

## Configuring CAPS on Microsoft IIS

In the CAPS Configurator Tool, click **Configure CAPS**.

The CAPS Configurator Tool detects and configures the new Service Host. Upon successful configuration, the configured check box in the UI is automatically selected for the configured Service Host. A browser opens with the configured CAPS URL.

CAPS is configured at [Drive Letter]:\MICROS  
\Symphony2\EgatewayService\IISCAPSServiceHost.

[Configuring CAPS Access](#) contains important information about enabling the privileges to access the CAPS Configuration Tool.

## Upgrading Microsoft IIS CAPS

- [Upgrading Microsoft IIS CAPS on Enterprise Server](#)
- [Upgrading Microsoft IIS CAPS on Remote Service Host](#)

### Upgrading Microsoft IIS CAPS on Enterprise Server

1. Upgrade Symphony on the Enterprise server.
2. Browse to [Drive Letter]:\Micros\Symphony\Tools\CAPSConfigurator.
3. Double-click **CAPSConfigurator.exe**, enter the server and port number of the Egateway, and sign in using your EMC credentials. A list of Service Hosts appears.
4. Select the Service Host configured on this server that needs to be upgraded.
5. Click **Upgrade CAPS**.

The CAPS Configurator Tool detects and configures the Service Host. Upon successful configuration, the configured check box in the UI is automatically selected for the configured Service Host. A browser opens with the configured CAPS URL.

[Configuring CAPS Access](#) contains important information about enabling the privileges to access the CAPS Configuration Tool.

### Upgrading Microsoft IIS CAPS on Remote Service Host

1. Upgrade Symphony on the Enterprise server.
2. In the EMC, deploy the CAPSONIIS CAL package to the configured Service Host.
3. Browse to C:\Micros\Symphony2\CAPSONIIS\Tools\CAPSConfigurator on the remote server.
4. Double-click **CAPSConfigurator.exe**, enter the server and port number of the Egateway, and sign in using your EMC credentials. A list of Service Hosts appears.
5. Select the Service Host configured on this server that needs to be upgraded.
6. Click **Upgrade CAPS**.

The CAPS Configurator Tool detects and configures the Service Host. Upon successful configuration, the configured check box in the UI is automatically selected for the configured Service Host. A browser opens with the configured CAPS URL.

[Configuring CAPS Access](#) contains important information about enabling the privileges to access the CAPS Configuration Tool.

## Configuring CAPS as a Windows Service with an Oracle Database

CAPS must run on the same server where the Oracle database is installed. You can set up CAPS as a Windows service only on remote servers—not on the Enterprise server—for both Symphony Premium Cloud Service and Symphony Standard Cloud Service users.

- [Configuring CAPS Access](#)
- [Configuring the Service Host for CAPS in EMC](#)
- [Preparing the Server to Configure CAPS](#)
- [Configuring CAPS with an Oracle Database](#)
- [Copying the Database Settings](#)
- [Starting the CAPS Service](#)

### Configuring CAPS Access

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **Miscellaneous** subtab.
3. Select the following Miscellaneous options:
  - **10061 - Allow Access to the IIS CAPS Configurator Tool**
  - **10065 - Download Software, Install and Authenticate Clients and Service Hosts Using CAL**
4. Click **Save**.

#### Note:

Before you perform an upgrade to Symphony 18.1 from Symphony versions 2.9.x or 2.10, you need to ensure that the options described above are enabled before running the post-upgrade CAPS Configuration Tool. Specifically, if option 10065 is disabled prior to the upgrade, after the upgrade, an error message appears during your login to the CAPS Configuration Tool. If you click **OK** on the error message window, you can log onto the CAPS Configuration Tool, but you cannot utilize the **Authenticate CAPS** button (added to the CAPS Configuration Tool for the Symphony 18.1 release).



## Configuring the Service Host for CAPS in EMC

1. To configure the Service Host for a hosted Enterprise with Symphony Standard Cloud Service users:
  - a. Select the property level, click **Setup**, and then click **Workstations**.
  - b. Insert a new workstation record, and then double-click it to open in form view.
  - c. On the **General** tab, enter the host name of the remote server where CAPS will be configured in the **Address/Host Name** field.
  - d. Enter the **Subnet Mask** and the **Default Gateway** of the remote server where CAPS will be configured.
  - e. If you are configuring CAPS as a Windows Service, select **Is Windows Service**. Otherwise, skip this step.
  - f. Click **Save**.
  - g. Click the **Remove OPS From Service Host** link, and then click **Yes** to confirm.
2. To configure the Service Host for a hosted Enterprise with Symphony Premium Cloud Service users:
  - a. Select the Enterprise level, click **Setup**, and then click **Service Hosts**.
  - b. Insert a new Service Host record, and then double-click it to open in form view.
  - c. In the **Host Name** field, enter the host name of the remote server where CAPS will be configured.
  - d. Enter the **Subnet Mask** and the **Default Gateway** of the remote server.
  - e. If you are configuring CAPS as a Windows Service, select **Is Windows Service**. Otherwise, skip this step.
  - f. Click **Save**.
3. Select the property, click **Setup**, and then click **Property Parameters**.
4. Click the **Workstations** tab.
5. From the Service Hosts section, select the CAPS Service Host created in Step 1 or 2, and then enter the **Port** number for CAPS configuration.

This Port is the unused port number and is different from the Egateway service port.
6. Click **Save**.

## Preparing the Server to Configure CAPS

1. Ensure that the Server has the latest Microsoft Windows updates.
2. Turn on the Microsoft Windows features:
  - Microsoft .NET Framework 3.5
  - Microsoft IIS
3. Install Microsoft .NET Framework 4.6.1.
4. Install the Oracle 12c 32-bit client.

 **Note:**

CAPS Running as a Windows Service with an Oracle database must install only the Oracle 32-bit client on the CAPS service host. These same CAPS service hosts cannot also have the Oracle 64-bit client installed for this configuration method.

5. Install the Oracle Database 12c Server.
  - a. Deselect the pluggable database option.
  - b. Select the database admin user system account or equivalent.
6. Install Microsoft Visual C++ 2010 x86 Redistributable Package.
7. From the EMC, configure the CAPSONIIS CAL package for deployment to the Remote Service Host.
8. Set up the Service Host prerequisites for deployment to the Remote Service Host.
9. Set up the Service Host for deployment to the Remote Service Host.
10. Install the CAL client on the Remote Service Host.
11. From the EMC, deploy the CAPSONIIS CAL Package to the configured Service Host.
12. Deploy the Service Host prerequisites CAL Package.
13. Deploy the Service Host CAL Package.
14. Stop the CAPS Service.

## Configuring CAPS with an Oracle Database

1. Navigate to the directory containing the CAPSConfigurator folder.  
Depending on your configuration method, the path is one of the following:
  - [Drive Letter]:\ MICROS\Symphony2\Tools\CAPSConfigurator
  - [Drive Letter]:\ MICROS\Symphony\CAPSONIIS\Tools\CAPSConfigurator
2. Double-click **CAPSConfigurator.exe**, enter the server and port number of the EGateway, and sign in using your EMC credentials. A list of Service Hosts appears.
3. Click the Service Host to configure.
4. Click **CAPS Schema**.
5. Enter the appropriate information in the CAPS Schema dialog, and then click **Next**.
  - **Database:** Select the Oracle database type.
  - **Server:** Enter the server name.
  - **Port:** Enter the port number.
  - **Service name:** Enter the service name.

- **Admin User:** Enter the administrative user name used to sign onto the Oracle database server, for example, the system user name. This user name cannot be a DBA user.
  - **Password:** Enter the current user's password to sign onto the Oracle database server.
6. In the next CAPS Schema dialog, enter the **User Name**, **Password**, and **Confirm Password** to create a new database user for the CAPS database, and then click **Next**.
  7. Click **OK** to confirm. A message indicates success.

The CAPS Schema dbsettings.xml is configured at one of the following directories (depending on your configuration):

- [Drive Letter]:\MICROS\Symphony2\IISCAPSServiceHost
- [Drive Letter]:\MICROS\Symphony\IISCAPSServiceHost

[Configuring CAPS Access](#) contains important information about enabling the privileges to access the CAPS Configuration Tool.

## Copying the Database Settings

Copy and replace the dbsettings.xml file from the CAPS\_DIRECTORY\_PATH (for example, copy from [Drive Letter]:\MICROS\Symphony\IISCAPSServiceHost to the [Drive Letter]:\Micros\Symphony2\WebServer\wwwroot\EGateway folder).

## Starting the CAPS Service

After the CAL process is complete, CAPS starts automatically. It may take several seconds to create all tables and to synchronize data the first time on the Microsoft SQL Server CAPS database.

# Configuring CAPS as a Windows Service with a Microsoft SQL Database

CAPS must run on the same server where the Microsoft SQL Server database is installed.

- [Configuring the Service Host for CAPS in EMC](#)
- [Preparing the Server to Configure CAPS](#)
- [Starting the CAPS Service](#)

## Configuring the Service Host for CAPS in EMC

1. To configure the Service Host for a hosted Enterprise with Symphony Standard Cloud Service users:
  - a. Select the property level, click **Setup**, and then click **Workstations**.
  - b. Insert a new workstation record, and then double-click it to open in form view.

- c. On the **General** tab, enter the host name of the remote server where CAPS will be configured in the **Address/Host Name** field.
  - d. Enter the **Subnet Mask** and the **Default Gateway** of the remote server where CAPS will be configured.
  - e. If you are configuring CAPS as a Windows Service, select **Is Windows Service**. Otherwise, skip this step.
  - f. Click **Save**.
  - g. Click the **Remove OPS From Service Host** link, and then click **Yes** to confirm.
2. To configure the Service Host for a hosted Enterprise with Symphony Premium Cloud Service users:
    - a. Select the Enterprise level, click **Setup**, and then click **Service Hosts**.
    - b. Insert a new Service Host record, and then double-click it to open in form view.
    - c. In the **Host Name** field, enter the host name of the remote server where CAPS will be configured.
    - d. Enter the **Subnet Mask** and the **Default Gateway** of the remote server.
    - e. If you are configuring CAPS as a Windows Service, select **Is Windows Service**. Otherwise, skip this step.
    - f. Click **Save**.
  3. Select the property, click **Setup**, and then click **Property Parameters**.
  4. Click the **Workstations** tab.
  5. From the Service Hosts section, select the CAPS Service Host created in Step 1 or 2, and then enter the **Port** number for CAPS configuration.  
This Port is the unused port number and is different from the Egateway service port.
  6. Click **Save**.

## Preparing the Server to Configure CAPS

1. Ensure that the Server has the latest Microsoft Windows patches.
2. Turn on the Microsoft Windows features:
  - Microsoft .NET Framework 3.5
  - Microsoft IIS
3. Install Microsoft .NET Framework 4.6.1.
4. Install Microsoft SQL Server with the instance name SQLEXPRESS. Use the Symphony default `sa` user password during installation.  
The *Oracle Hospitality Symphony Security Guide* contains information on using secure passwords and changing default passwords.
5. In the EMC, set up the Service Host prerequisites for deployment to the Remote Service Host.
6. In the EMC, set up the Service Host for deployment to the Remote Service Host.
7. Install the CAL client on the Remote Service Host.

8. Use CAL to configure the Service Host prerequisites and the CAPS Service Host.

## Starting the CAPS Service

After the CAL process is complete, CAPS starts automatically. It may take several seconds to create all tables and to synchronize data the first time on the Microsoft SQL Server CAPS database.

## Optional CAPS Configuration Tasks

- [Configuring the Show Database Provider Button](#)
- [Encrypting Database Credentials](#)
- [Verifying CAPS Installation](#)
- [Configuring IIS Application Pool Settings](#)

## Configuring the Show Database Provider Button

The following steps are optional:

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Double-click the page on which you want the Show Database Provider button to appear (typically the Sign In page).
3. Insert a new button.
4. On the **General** tab, select **Function** from the **Type** drop-down list, and then click the right arrow beneath the **Type** field.
5. On the left pane, in the **Name** field, enter `Show Database Provider`.
6. On the right pane, select **Show Database Provider** as the result, and then click **OK**.
7. Click **Generate Legend** to set **Show Database Provider** as the button name.
8. Click **Save**.

## Encrypting Database Credentials

The following steps are optional:

1. Browse to [Drive Letter]:\MICROS\Symphony2\Tools\Crypt folder.
2. Run **Crypt.exe**.
3. Enter or copy the complete [CAPS HOSTED DIRECTORY]\DbSettings.xml path (for example, [Drive Letter]:\MICROS\Symphony\IISCAPSServiceHost).
4. Click **Read DB Settings**.
5. Select **CPSERVICEDB** from the drop-down list.
6. Enter the password, and then click **Encrypt Password**.

## Verifying CAPS Installation

The following steps are optional:

1. If CAPS is configured on a Microsoft SQL Server database, expand the CAPS database tree and verify the tables listed.
2. If CAPS is configured on an Oracle database, log in as the CAPS user to verify the tables.
3. Verify the log files on the CAPS EGateway log and the workstation EGateway log folders.
4. Configure a new POS client workstation that points to CAPS from the Property Parameters module (Workstations tab).  
See [Adding a Workstation](#) for more information.
5. Click the **Show Database Provider** button, and then verify that one of the following appears, depending on the CAPS database installation type:
  - CAPS DB: as Oracle
  - CAPS DB: as SQL Server
6. Verify that the CAPS status is online.
7. Add a few test transactions from the workstation.
8. Verify that the transaction details post to the CHECKS table on the workstation datastore database, the CAPS database, and the Symphony transaction database.

## Configuring IIS Application Pool Settings

- [Configuring Recycle Settings for the IIS Application Pool](#)
- [Restarting Microsoft IIS CAPS](#)

## Configuring Recycle Settings for the IIS Application Pool

For instructions on configuring an application pool to recycle at a scheduled time, refer to the Microsoft TechNet Library at <https://technet.microsoft.com/en-us/>. Ensure that the times you set do not coincide with the Start of Day (SOD) or periods of peak sales activity. If you configure the application pool to recycle at a scheduled time using the IIS Manager, consider the following recycle settings for the IIS Application Pools.

- Set the Memory Based Maximums to less than half of the available server memory.
- Set the .NET Integration mode to **Classic** for the CAPS Application Pool.
- Set the **Disable Overlapped Recycle** setting to **True** for the CAPS Application Pool.
- Leave the Application Pool's Pipeline mode settings on the default settings.

## Restarting Microsoft IIS CAPS

The following steps are optional:

1. From Microsoft IIS Manager, recycle the CAPS application pool.

2. Click the configured IIS CAPS application under the website, and switch to Content View.
3. Right-click **EGateway.asmx** and select **Browse**. The new CAPS Egateway.asmx URL opens in the default internet browser.

## CAL Installation Prerequisites for a Workstation without the POS Interface (CAPS Only Workstation)

Before installing CAL on a CAPS-only workstation, perform the following functions:

- Configure a service host for CAPS. See [Configuring the Service Host for CAPS in EMC](#) for instructions.
- Assign the employee privilege to download software, install and authenticate clients and Service Hosts using CAL.

Beginning with Symphony version 2.9.1 (which includes CAL version 139), users must have the employee privilege assigned to the appropriate role to successfully authenticate workstations, Android devices, and Kitchen Display Systems (KDS). After installing or upgrading to Symphony version 2.9.1 or later, you must assign the privilege to a user's role. When the Role option is set, employees can use their EMC logon credentials when CAL'ing devices. See [Allowing Employees to Install and Authenticate POS Clients and Service Hosts](#) for instructions to assign the privilege.

- Set the CAL deployment schedule. See [Configuring the Deployment Schedule to Install CAL on a POS Client Workstation without Ops](#) for instructions.
- [Configuring the Deployment Schedule to Install CAL on a Workstation without the POS Interface](#)
- [Installing CAL on a Workstation without the POS Interface](#)

### Related Topics

- [Configuring the Deployment Schedule to Install CAL on a Workstation without the POS Interface](#)
- [Installing CAL on a Workstation without the POS Interface](#)

## Configuring the Deployment Schedule to Install CAL on a Workstation without the POS Interface

1. Select the Enterprise, click **Setup**, and then click **CAL Packages**.
2. For Symphony version 2.9 and Symphony version 2.9.1:
  - a. If the CAPS workstation is running Microsoft Windows Embedded POSReady 2009, select **Service Host Prereqs** from the left pane.
  - b. If the CAPS workstation is running Microsoft Windows 7 or later, select **Service Host Prereqs (SQL 2012)** from the left pane.
3. For Symphony version 2.9.2, select **Service Host Prereqs** from the left pane for all POS clients.
4. Click the **Deployment Schedule** tab, and then click **Add Deployment**.
5. From the Deployment Type column, select **2 - Specific Service Host**.

6. In the Service Host column, click the ellipsis (...) point button, select the CAPS workstation, and then click **OK**.
7. In the Action To Take column, select **0 - Install**, and then click **Save**.
8. Select **Service Host** from the left pane, and then repeat Steps 4 through 7.

- [Installing CAL on a Workstation without the POS Interface](#)

#### Related Topics

- [CAL Installation Prerequisites for a Workstation without the POS Interface \(CAPS Only Workstation\)](#)

## Installing CAL on a Workstation without the POS Interface

1. On the workstation, press **Start**, select **All Programs**, select **Micros Client Application Loader**, and then select **McrsCAL Config**.
2. Decipher and enter the correct access code, and then press the **Configure CAL** button.

Figure 36-1 MICROS CAL Screen



3. Enter the correct code based on the six-digit number shown at the top, and then press **Next**.
4. In the Enter CAL Server dialog, select **MICROS Symphony** as the **POS Type**. **MICROS Symphony** is used for both Symphony Standard and Premium Cloud Service environments.
5. Set the following values, and then press **Next**:
  - **Server Name**: Leave this field blank.
  - **Server IP/URL**: Leave this field blank.
  - **CAL Enabled**: Select this option if it is not automatically set by default.
  - **Secure Connection**: Select this option to use the Translation Layer Security (TLS) 1.2 Encryption protocol. (If you are installing CAL version 139 or later, this option is set by default.)



- **Server:** Enter the CAPS server name.
- **Port:** Enter 443.
- **Update:** Click the **Update** button to automatically fill the **Server Name** and **Server IP/URL** fields after the application server name is resolved and recognized. You are now required to use an HTTPS secure connection in your Server URL.

**Figure 36-2 Enter CAL Server Dialog**

The screenshot shows a dialog box titled "ORACLE | MICROS CAL - Enter CAL Server". It contains the following fields and controls:

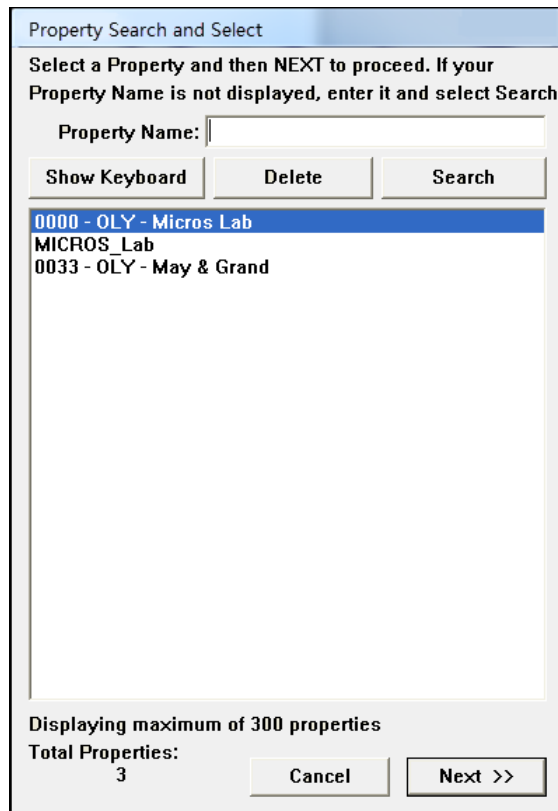
- Server Name:** A text field containing "microscafe.simphony.net".
- Server IP/URL :** A text field containing "https://microscafe.simphon".
- POS Type:** A dropdown menu with "MICROS Symphony" selected.
- CAL Enabled:** A checked checkbox.
- Secure Connection:** A checked checkbox.
- Server:** A text field containing "microscafe.simp".
- Port:** A text field containing "443".
- Update:** A button next to the Server field.
- Cancel:** A button at the bottom left.
- Next >>:** A button at the bottom right.
- Show Keyboard:** A button at the very bottom.

6. If you are using Symphony version 2.9 (CAL version 138), skip to Step 8.
7. Beginning with Symphony version 2.9.1, if you are installed on a Symphony Standard or Premium Cloud Service environment, CAL prompts you to enter your Symphony EMC logon credentials. Enter your **User** name and **Password** in the CAL Authentication dialog, and then press the **Login** button.
8. If the Enterprise has multiple properties, select the property from the Property Search and Select dialog, and then press **Next**.

If the property does not appear in the list, enter the property name in the **Property Name** field, and then press **Search**.

You do not see a property list if only one property is configured or if there are multiple properties, but only one property is using workstations.

**Figure 36-3 Property Search and Select Dialog**



9. In the Select WS Identity dialog, select the **Show Service Hosts** option, select the appropriate service host from the available workstation list, and then press **Save**. Make sure the Service Host ID and Workstation ID populate. The workstation automatically restarts several times when installing the CAL package.

Figure 36-4 Select Workstation Dialog

ORACLE | MICROS CAL - Select WS Identity

**Workstation Identity**

UWS Name: 25KLB-2015

IP Address: 172.23.2.178

Net Mask: 255.255.248.0

Def. Gateway: 172.23.0.1

Automatic DHCP Configuration

**Application Root**

C:\Micros\Simphony\

**Select Workstation ID**

144

**Service Host ID**

157

Show Service Hosts

Show KDS

**Available Workstation List:**

UWS Name	IP Addr	InU...	WS I	SH Id
25Matt-WS5	AUTO-DHCP	N	401	417
25CEWS5-01	AUTO-DHCP	N	381	397
25SG-win32	AUTO-DHCP	N	403	419
25Stan-WS5	AUTO-DHCP	N	402	418
SBKLBKDS1	172.23.1.209	N	461	477
wskdsd	172.23.1.209	N	2	0
WSKSDdisplay	AUTO-DHCP	N	63	0
DinningRoomw...	AUTO-DHCP	N	22	0
Beaches café ws	AUTO-DHCP	N	65	0

Show Keyboard Cancel Save Find

10. If you are using Symphony version 2.9 or Symphony version 2.9.2, after the CAL process completes:
  - a. Browse to [Drive letter]:\MICROS\Simphony\webserver, and then click **AuthenticationServer**.
  - b. For Symphony version 2.9, enter the following details in the Authentication Server application:
    - **Client Service ID:** Enter the Service ID for Check and Posting. You can find the service ID in the Workstations tab of the Property Parameters module.
    - **Installer User Name:** Enter the **Install User Security Username** configured in the Security tab of the Property Parameters module in the EMC. Contact your system administrator for assistance.
    - **Installer Password:** Enter the **Install User Security Password** configured in the Security tab of the Property Parameters module in the EMC. Contact your system administrator for assistance.

Figure 36-5 Authentication Server Application for Symphony 2.9

Authentication Serv

App Server Egateway URL  
http://MICROS-PC:8080/EGateway/EGa

Client Service ID  
0

Installer Username

Installer Password

Autl

Show

- c. For Symphony version 2.9.2, enter the following details in the Authentication Server application:
- **Service Host ID:** The service host ID. This value is automatically populated.
  - **EMC Username:** Enter your EMC user name.
  - **EMC Password:** Enter your EMC password.

**Figure 36-6 Authentication Server Application for Symphony 2.9.2**

Authentication Server

Application Server EGateway URL Valid

https://testserver.test.com:443/EGateway/EGateway.asmx

Service Host ID

1001

EMC Username

EMC Password

Authenticate

Show Keyboard

- d. Click **Authenticate**.
  - e. Restart the workstation.
- [Configuring the Deployment Schedule to Install CAL on a Workstation without the POS Interface](#)

**Related Topics**

- [CAL Installation Prerequisites for a Workstation without the POS Interface \(CAPS Only Workstation\)](#)

# 37

## Printers

Printers and order devices are critical types of hardware that allow communication between the Front of House and other areas of a restaurant, such as the kitchen and bar.

- [Print Controller](#)
- [Roll Printer](#)
- [Slip Printer](#)
- [Internet Protocol \(IP\) Printer](#)
- [Bluetooth Printer](#)
- [Printer Groups](#)
- [Configuring a Printer](#)
- [Creating, Editing, and Removing Printer Groups](#)
- [Configuring the Change Default Printer Destination Button](#)
- [Printer DIP and Memory Switch Settings](#)

## Print Controller

A Print Controller is a service that sends print jobs to a printer. Each POS client process has a built-in Print Controller. A workstation typically acts as a Print Controller. When a workstation operator performs an action that causes a guest check, order receipt, or other printing type to print, the POS client process does not communicate directly with the printer receiving the print job. Instead, the POS client process sends a message to the Print Controller (usually a workstation) that controls the printer. This Print Controller then receives notification that the print job succeeded or failed, and routes the success or failure information back to the workstation that sent the print job.

Ensure that employees in a revenue center know which workstations act as Print Controllers for remote printers. This knowledge helps in troubleshooting printing problems.

Oracle Hospitality recommends that you have both a primary printer and a backup printer, and that primary and backup printers reside on two different Print Controllers. This configuration prevents a single point of failure from causing multiple remote printers to stop printing.

A single Print Controller can control multiple printers. For example, one workstation can control the following printers:

- Local printer that is physically attached to the workstation (used for guest checks and customer receipts)
- Hot food printer that is a remote Ethernet kitchen printer (used for order receipts)

In this configuration, if the workstation loses power or network connectivity, other workstations cannot print to either of these printers. This is generally not a problem because the print jobs print to the backup printer as appropriate.

In another example, one workstation can control the following printers:

- Local printer that is physically attached to the workstation
- Hot food printer that is a remote Ethernet kitchen printer
- Cold food printer that is a remote Ethernet kitchen printer and backs up the hot food printer

Oracle Hospitality does not recommend this configuration. In this example, if the workstation loses power or network connectivity, other workstations cannot print to any of these printers. In this scenario, no order receipts print to the hot or cold printers in the kitchen. Kitchen operations would likely be severely impacted.

- [Roll Printer](#)
- [Slip Printer](#)
- [Internet Protocol \(IP\) Printer](#)
- [Bluetooth Printer](#)
- [Printer Groups](#)

#### Related Topics

- [Configuring a Printer](#)
- [Creating, Editing, and Removing Printer Groups](#)
- [Configuring the Change Default Printer Destination Button](#)

## Roll Printer

A roll printer uses a roll of paper as its source media. Thermal printers and impact printers are two types of roll printers that you can use with Symphony.

#### Thermal Printer

A thermal printer does not use ink. Special thermal paper is provided for these printers to burn the text onto the paper. Thermal printers are primarily used as guest check and customer receipt printers. They are used infrequently in kitchens due to the heat reaction. Thermal printers are ideal in public areas as the printing operation is quiet.

#### Impact Printer

An impact printer is something of a retronym. All printers were impact printers prior to the invention of the thermal printer. An impact printer is primarily used in kitchens to print order receipts. Impact printers can print in black and red, and they can be used with two-ply paper.

- [Print Controller](#)
- [Slip Printer](#)
- [Internet Protocol \(IP\) Printer](#)
- [Bluetooth Printer](#)

- [Printer Groups](#)

**Related Topics**

- [Configuring a Printer](#)
- [Creating, Editing, and Removing Printer Groups](#)
- [Configuring the Change Default Printer Destination Button](#)

## Slip Printer

A slip printer does not contain paper. The workstation operator must add a piece (or slip) of paper per print job. Properties who use custom stationery (often containing a company logo or other similar artwork) generally use slip printers for guest checks and customer receipts. Slip printers are also used for check endorsement printing. The slips that are used by these printers are often called hard checks because they are usually made of card stock.

- [Print Controller](#)
- [Roll Printer](#)
- [Internet Protocol \(IP\) Printer](#)
- [Bluetooth Printer](#)
- [Printer Groups](#)

**Related Topics**

- [Configuring a Printer](#)
- [Creating, Editing, and Removing Printer Groups](#)
- [Configuring the Change Default Printer Destination Button](#)

## Internet Protocol (IP) Printer

An IP printer communicates with the Print Controller through a computer network that uses the IP address for communication.

- [Print Controller](#)
- [Roll Printer](#)
- [Slip Printer](#)
- [Bluetooth Printer](#)
- [Printer Groups](#)

**Related Topics**

- [Configuring a Printer](#)
- [Creating, Editing, and Removing Printer Groups](#)
- [Configuring the Change Default Printer Destination Button](#)



## Bluetooth Printer

Bluetooth printing refers to printing from an Oracle MICROS Tablet E-Series to a wireless printer through the Bluetooth protocol.

There is a one-to-one relationship between a tablet and a Bluetooth printer. After you identify and configure a Bluetooth printer and manually pair it with a specific Oracle MICROS Tablet E-Series as the Print Controller Service Host, you cannot assign another Oracle MICROS Tablet E-Series to the same Bluetooth printer.

- [Print Controller](#)
- [Roll Printer](#)
- [Slip Printer](#)
- [Internet Protocol \(IP\) Printer](#)
- [Printer Groups](#)

### Related Topics

- [Configuring a Printer](#)
- [Creating, Editing, and Removing Printer Groups](#)
- [Configuring the Change Default Printer Destination Button](#)

## Printer Groups

If the property is large and has many printers disbursed over a wide area, you may find it useful to configure a limited list of printers that are selectable by workstation operators. The workstation operator can select a printer that is nearby from the list at the POS client (usually a mobile tablet device), and optionally set this printer as the default printer for future print jobs. When a workstation operator selects a default destination printer, the selection automatically resets at Start of Day.

A default printer group named **All Destination Printers** exists in the Printer Groups module. You cannot change this default printer group. If you do not create printer groups, all printers with the option **Destination Printer** (set in the Printers module) belong to the **All Destination Printers** printer group. The **All Destination Printers** default printer group is useful for properties that need only one group of destination printers.

- [Print Controller](#)
- [Roll Printer](#)
- [Slip Printer](#)
- [Internet Protocol \(IP\) Printer](#)
- [Bluetooth Printer](#)

### Related Topics

- [Configuring a Printer](#)
- [Creating, Editing, and Removing Printer Groups](#)
- [Configuring the Change Default Printer Destination Button](#)

## Configuring a Printer

1. Select the property, click **Setup**, and then click **Printers**.
2. Insert a printer record, name the printer, and then click **OK**.
3. Double-click the printer record to open it.
4. Select the **Workstation** from the drop-down list.
5. Select the **Printer Type** from the drop-down list.  
Select **Epson Bluetooth Printer** for all Bluetooth printers.
6. If the roll printer is a thermal printer, select **Thermal printer** in the **Printer Options** section.
7. (Optional) To set the printer to print logos, select **Enable Logo Printing**.  
Symphony does not support logo printing on printers with multi-language cards.

When configuring Epson TM-P60 and TM-T88 Ethernet Thermal printers, configure the logo to print in the center of the guest check or customer receipt by selecting the paper size of the printer from the **Center Logo Using** drop-down list.

- Epson TM-P60 Ethernet Thermal printers: Set the paper size to **2 1/4" (58mm) Paper**.
- Epson TM-T88 Ethernet Thermal printers: Set the paper size to **3 1/8" (80mm) Paper**.

[Logo Printing](#) contains more information about setting up logos to print on guest checks and customer receipts.

8. To allow the printer to be selectable by workstation operators (typically used with mobile POS client devices), select **Destination Printer**.  
Bluetooth printers are not selectable.
9. Configure the appropriate values for the printer type. Specific fields become active based on the printer type you selected.

The following table lists the printer types and indicates information for each applicable field. Enter or select information for the fields based on the printer you are configuring. Fields denoted as Not applicable are not needed for the printer type.

**Table 37-1 Printer Configuration by Printer Type**

Field	Roll Printer	Slip Printer	IP Printer	Bluetooth Printer
COM Port	Select the communications port for the printer.	Select the communications port for the printer.	Not applicable	Not applicable
Baud Rate	Select the baud rate for the printer.	Select the baud rate for the printer.	Not applicable	Not applicable
Parity	Select the parity for the printer.	Select the parity for the printer.	Not applicable	Not applicable

**Table 37-1 (Cont.) Printer Configuration by Printer Type**

Field	Roll Printer	Slip Printer	IP Printer	Bluetooth Printer
Data Bits	Select the data bits for the printer.	Select the data bits for the printer.	Not applicable	Not applicable
Stop Bits	Select the stop bits for the printer.	Select the stop bits for the printer.	Not applicable	Not applicable
PIN	Not applicable	Not applicable	Not applicable	Set the four-digit passkey that must be entered into the device before printing.
ID	Not applicable	Not applicable	Not applicable	(Optional) Enter the Bluetooth ID of the printer. You can leave this field blank to allow configuration from a mobile device when using different printers per event.
Number of Columns	Not applicable	Not applicable	Not applicable	This setting determines the report width so that guest checks and reports print with center alignment. By default, the width is set to <b>32</b> columns.  Select <b>40</b> for Bixolon SPP-R300 and SPP-R310 Bluetooth printers.
Address	Not applicable	Not applicable	Enter the IP address or hostname of the printer. If you are using the printer for banquet checks, enter the hostname.	Not applicable
Port	Not applicable	Not applicable	Enter the port number for the IP printer.	Not applicable

10. Click **Save**.

11. Select the property, click **Setup**, and then click **Workstations**.
12. Double-click the workstation to open it.
13. Click the **Printers** tab.
14. Click the **Select** link to set the appropriate **Printer** for each type of print job. Click the **Set for All Destination Printers** link to set the same printer for each type of print job.

The printer defined here (primary or backup) always appears in the Destination Printers list on the POS client, even if you do not add it to the **Destination Printer Group**. [Creating, Editing, and Removing Printer Groups](#) contains more information.

Oracle Hospitality recommends that you assign the same printer model and format for the backup printer to ensure that checks format properly on other printers.

15. Click the **Select** link and assign each printer type to a **Destination Printer Group**. Click the **Set for All Destination Printers** link to set the same printer type for all destination printer groups.

Selecting a **Destination Printer Group** overrides the printer selected for the printer type.

Printers with the option **Selectable as Destination Printer** set belong to a default **Destination Printer Group** called **All Destination Printers**.

If you define a **Destination Printer Group** for the Backup Printer, the workstation operator is prompted at the time of printing for both the primary printer (if it has a group defined) and the Backup Printer.

16. Click the **Options** tab.
17. To automatically disable the Destination Printers prompt (if configured) when a dockable workstation (tablet device) is attached to the stand and has access to an attached printer, leave the option **60 - Prompt for Destination Printer when docked** deselected. Select option **60** to have the POS client prompt to select a printer when a workstation is docked.
18. Click **Save**.
19. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Format Parameters**.
20. Click the **Configuration** tab, and then enter the appropriate information in the following fields:

**Table 37-2 Print Output Configuration**

Field	Description
Lines on First Page	Enter the maximum number of lines to print on the first page of the guest check before prompting for a new check to begin a new order receipt.
Lines on Other Pages	Enter the maximum number of lines to print on successive pages of the guest check before prompting for a new check to begin a new order receipt.

**Table 37-2 (Cont.) Print Output Configuration**

Field	Description
Line Feeds Before First Page	Enter the number of lines to advance before printing the guest check header. You can add extra space for the check so it appears properly in custom check presentation binders.
Line Feeds Before Other Pages	Enter the number of lines to advance before printing begins on the next successive page. The line feeds set here are included in the number configured for the Lines on Other Pages field. For example, if you set this field to 5 and set Lines on Other Pages to 30, the pages have 25 lines of text.
Minimum Lines Per Roll Check/Receipt	Enter the minimum number of lines to print on guest checks and customer receipts. Blank lines are added after printing to achieve the minimum.  Use this field if you want guest checks and customer receipts that are printed on a roll printer to have a minimum length in order to fit into guest check covers.
Number of Guest Check Information Lines	Enter the number of detail lines (0 through 30) that can be entered in a System Interface Module (SIM) dialog box.

21. Click the **Options** tab.
22. Select the appropriate printing options:
  - **57 - Do Not Print Change/Payment Due in Double Wide:** Select this option if you do not want double-wide formatting on the Change Due line of a receipt or the Total Due line of a check.
  - **58 - Do Not Consolidate Current Round Items in Printed Guest Check:** Select this option if you do not want to combine identical items which are ordered in multiples in the current round when printing a receipt.
23. Click **Save**.

**Related Topics**

- [Print Controller](#)
- [Roll Printer](#)
- [Slip Printer](#)
- [Internet Protocol \(IP\) Printer](#)
- [Bluetooth Printer](#)
- [Printer Groups](#)

## Creating, Editing, and Removing Printer Groups

1. Select the property, click **Setup**, and then click **Printer Groups**.
2. Insert a printer group record, name the printer group, and then click **OK**.

3. Double-click the printer group record to open it.
4. To add a printer to the printer group, click the **Add** link, click the ellipsis button, and then select the printer.  
  
You can add any printer to any printer group, regardless of the **Destination Printer** option setting. You can add one printer to multiple printer groups.
5. Repeat Steps 1 through 4 for to create more printer groups and to add printers to the groups.
6. To delete a printer from a printer group, select the printer, and then click the **Delete** link.
7. Click **Save**.
8. To edit a printer group, highlight the record, change the values, and then click **Save**.
9. To remove a printer group, highlight the record, and then click **Delete** on the toolbar.

**Related Topics**

- [Print Controller](#)
- [Roll Printer](#)
- [Slip Printer](#)
- [Internet Protocol \(IP\) Printer](#)
- [Bluetooth Printer](#)
- [Printer Groups](#)

## Configuring the Change Default Printer Destination Button

You need to create a button which allows workstation operators to set and reset the default printer selection.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place the Change Default Printer Destination button,
3. On the **Edit** tab, select the page area in which to define the button.
4. Click **Button**.
5. On the **General** subtab, enter the button name in the **Legend** field.
6. From the **Type** drop-down list, select **Function**.
7. Click the black arrow beneath the **Type** drop-down list, select **Change Default Printer Destination**, and then click **OK**.
8. Position and size the button on the page. Use the Style arrow to change the color.
9. Click **Save**.

**Related Topics**

- [Print Controller](#)
- [Roll Printer](#)

- [Slip Printer](#)
- [Internet Protocol \(IP\) Printer](#)
- [Bluetooth Printer](#)
- [Printer Groups](#)

## Printer DIP and Memory Switch Settings

The following links explain the settings of printer DIP and memory switches:

- [Epson Printer Setup for IDN Module](#)
- [Printer DIP Switch/Memory Switch Setting when using UB-IDN \(IDN02\) Interface](#)
- [Printer DIP Switch/Memory Switch Setting when using UB-IDNML \(IDNML02\) Interface](#)
- [Printer DIP Switch/Memory Switch Setting when using UB-E02 \(E03\) Interface](#)
- [Printer DIP Switch/Memory Switch Setting when using UB-EML Interface](#)
- [Printer DIP Switch/Memory Switch Setting when using UB-EML02 Interface](#)
- [DIP Switch Definitions](#)

## Epson Printer Setup for IDN Module

Setup the module DIP switches as follows:

**Table 37-3 Printer ID**

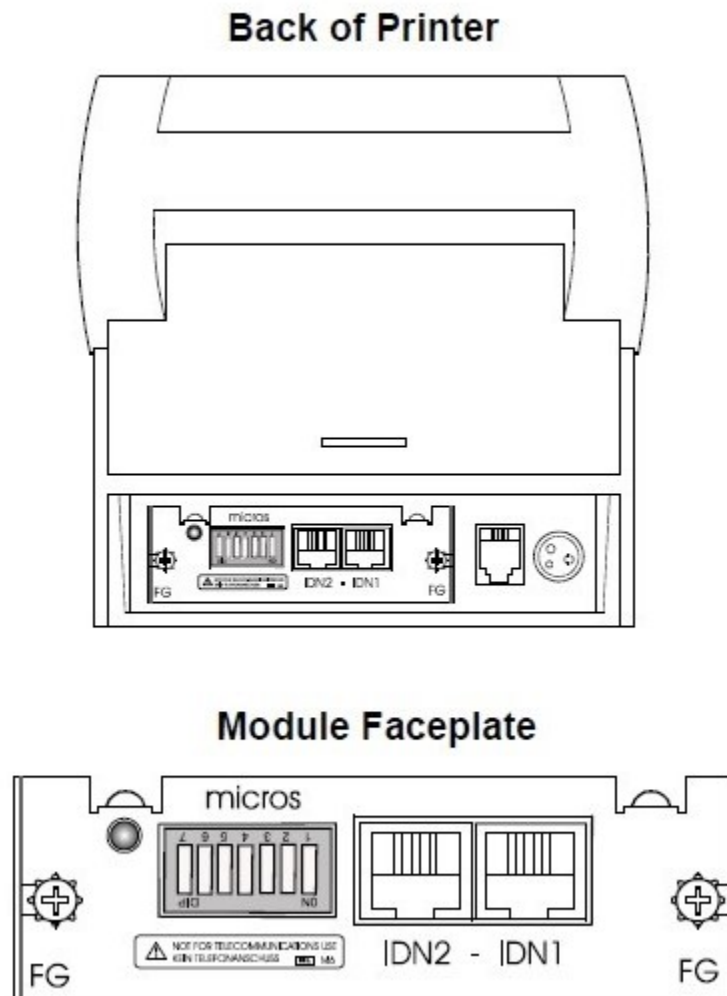
DEVICE #	DS1	DS2	DS3	DS4
01	-	-	-	ON*
02	-	-	ON	-
03	-	-	ON	ON
04	-	ON	-	-
05	-	ON	-	ON
06	-	ON	ON	-
07	-	ON	ON	ON
08	ON	-	-	-
09	ON	-	-	ON
10	ON	-	ON	-
11	ON	-	ON	ON
12	ON	ON	-	-
13	ON	ON	-	ON
14	ON	ON	ON	-
15	ON	ON	ON	ON

**Table 37-4 Baud Rate**

BAUD RATE	DS5	DS6
9600	-*	-*
19200	ON	-
38400	-	ON

\*Factory Default

**Figure 37-1 Back of Printer and Module Faceplate**



Set the annunciator to OFF by doing the following:

1. Make sure the printer is off.
2. Set the switches to the necessary parameters.



3. Turn the printer on. The Status sheet should be subsequently print.
4. Turn the printer off. Set IDN switches back to their default setting.

## Printer DIP Switch/Memory Switch Setting when using UB-IDN (IDN02) Interface

**Table 37-5 TM-U200, TM-U220, TM-U2300**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	x	OFF	OFF	OFF	OFF	OFF	x	ON*	x	x	x	x	x	x	x

**Table 37-6 TM-T88 Series**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	x	OFF	OFF	OFF	OFF	ON	OFF	x	x	x	x	x	x	x	x

**Table 37-7 TM-T90, TM-L90 (Non-Peeler & Peeler)**

		DIP		SW		2	
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8
x	ON	OFF	OFF	OFF	OFF	ON	OFF

**Table 37-8 TM-T70**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	x	OFF	OFF	OFF	OFF	ON	OFF	x	x	x	x	x	x	x	x

**Table 37-9 TM-T70II**

No DIP SW or Memory SW change is necessary.  
Use GS (E command (Fn=11)) to set Serial Port Communication Parameters.

**Table 37-10 Legend**

OFF	ON	= Mandatory Setting
OFF*	ON*	= Recommended Setting
x		= Don't Care

## Printer DIP Switch/Memory Switch Setting when using UB-IDNML (IDNML02) Interface

**Table 37-11 TM-U200A**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	ON	x	x	x	x	x	ON	ON	x	x	x	x	x	x	ON

**Table 37-12 TM-U200B/D**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	ON	x	x	x	x	x	ON	ON	x	x	ON	x	x	x	x

**Table 37-13 TM-U220 A/B/D (STD)**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	ON	x	x	x	x	x	ON	ON	x	x	x	x	x	x	ON

**Table 37-14 TM-U220 B/D (STD US), TM-U230**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	ON	x	x	x	x	x	ON	ON	x	x	ON	x	x	x	x

**Table 37-15 TM-U230 with firmware x.xx RV-EMC**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
OFF	ON	x	x	x	x	x	ON	ON	x	x	ON	x	x	x	x

**Table 37-16 TM-T88III/IV/V**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	x	x	x	x	x	x	x	ON	x	x	x	x	x	x	ON

**Table 37-17 TM-T90, TM-L90 (Peeler & Non-Peeler) — DIP Switch**

DIP SW 1							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8

**Table 37-17 (Cont.) TM-T90, TM-L90 (Peeler & Non-Peeler) — DIP Switch**

								DIP	SW	1								
x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		

**Table 37-18 TM-T90, TM-L90 (Peeler & Non-Peeler) — Memory Switch**

								Mem	SW	1								
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	1-4	1-5	1-6	1-7	1-8						
x	x	ON	x	x	x	x	x	x	x	x	x	x				ON		

**Table 37-19 TM-T70**

								DIP	SW	1									DIP	SW	2
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8						
x	x	x	x	x	x	x	x	ON	x	x	x	x	x	x	ON						

**Table 37-20 TM-T70II**

No DIP SW or Memory SW change is necessary.

**Table 37-21 Legend**

OFF	ON	= Mandatory Setting
OFF*	ON*	= Recommended Setting
x		= Don't Care

## Printer DIP Switch/Memory Switch Setting when using UB-E02 (E03) Interface

**Table 37-22 TM-U200A**

								DIP	SW	1									DIP	SW	2
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8						
x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	ON						

**Table 37-23 TM-U200B/D**

								DIP	SW	1									DIP	SW	2
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8						
x	x	x	x	x	x	x	x	x	x	x	ON	x	x	x	x						

**Table 37-24 TM-U220 A/B/D (STD)**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	ON

**Table 37-25 TM-U220 B/D (STD US), TM-U230**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	x	x	x	x	x	x	x	x	x	x	ON	x	x	x	x

**Table 37-26 TM-T88III/IV/V**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	ON

**Table 37-27 TM-T90, TM-L90 (Peeler & Non-Peeler) — DIP Switch**

DIP		SW		1			
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8
x	x	x	x	x	x	x	x

**Table 37-28 TM-T90, TML90 (Peeler & Non-Peeler) — Memory Switch**

Mem		SW		1			
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8
x	x	x	x	x	x	x	ON

**Table 37-29 TM-T70**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	ON

**Table 37-30 TM-T70II**

No DIP SW or Memory SW change is necessary.

**Table 37-31 Legend**

OFF	ON	= Mandatory Setting
OFF*	ON*	= Recommended Setting
x		= Don't Care

## Printer DIP Switch/Memory Switch Setting when using UB-EML Interface

**Table 37-32 TM-U200A**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
OFF	ON	x	x	x	x	x	ON	ON	x	OFF	x	ON	OFF	OFF	ON

**Table 37-33 TM-U200B/D**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
OFF	ON	x	x	x	x	x	ON	ON	x	OFF	ON	OFF	OFF	OFF	x

**Table 37-34 TM-U220 A/B/D (STD)**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
OFF	ON	x	x	x	x	x	ON	ON	x	x	OFF	x	OFF	OFF	ON

**Table 37-35 TM-U220 B/D (STD US)**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
OFF	ON	x	x	x	x	x	ON	ON	x	OFF	ON	x	OFF	x	OFF

**Table 37-36 TM-U230**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
OFF	ON	x	x	x	x	x	ON	ON	x	OFF	ON	OFF	OFF	OFF	x

**Table 37-37 TM-T88III/IV/V**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
OFF	x	x	x	x	x	x	x	ON	OFF	x	x	x	OFF	OFF	ON

**Table 37-38 TM-T90 — DIP Switch**

DIP		SW		1			
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8

**Table 37-38 (Cont.) TM-T90 — DIP Switch**

			DIP	SW	1			
x	x	x	x	x	x	x	x	x

**Table 37-39 TM-T90 — Memory Switch 1**

			Mem	SW	1			
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	
x	x	x	OFF	x	OFF	OFF	ON	

**Table 37-40 Memory Switch 2**

			Mem	SW	2			
2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8	
ON	x	x	x	x	x	x	x	

**Table 37-41 Memory Switch 8**

			Mem	SW	8			
8-1	8-2	8-3	8-4	8-5	8-6	8-7	8-8	
x	x	OFF	x	x	x	OFF	OFF	

**Table 37-42 Legend**

OFF	ON	= Mandatory Setting
OFF*	ON*	= Recommended Setting
x		= Don't Care

## Printer DIP Switch/Memory Switch Setting when using UB-EML02 Interface

**Table 37-43 TM-U220 A/B/D (STD)**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
OFF	ON	x	x	x	x	x	ON	ON	x	x	OFF	x	OFF	OFF	ON

**Table 37-44 TM-U220 B/D (STD US)**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
OFF	ON	x	x	x	x	x	ON	ON	x	OFF	ON	x	OFF	x	OFF

**Table 37-45 TM-T88IV/T88V**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
OFF	x	x	x	x	x	x	x	ON	OFF	x	x	x	OFF	OFF	ON

**Table 37-46 TM-T90/L90 — DIP Switch 1**

DIP		SW		1			
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8
x	x	x	x	x	x	x	x

**Table 37-47 TM-T90/L90 — Memory Switch 1**

Mem		SW		1			
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8
x	x	x	OFF	x	OFF	OFF	ON

**Table 37-48 TM-T90/L90 — Memory Switch 2**

Mem		SW		2			
2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
ON	x	x	x	x	x	x	x

**Table 37-49 TM-T90/L90 — Memory Switch 8**

Mem		SW		8			
8-1	8-2	8-3	8-4	8-5	8-6	8-7	8-8
x	x	OFF	x	x	x	OFF	OFF

**Table 37-50 TM-T70**

DIP SW 1								DIP SW 2							
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8	2-1	2-2	2-3	2-4	2-5	2-6	2-7	2-8
OFF	x	x	x	x	x	x	x	ON	OFF	x	x	x	OFF	OFF	ON

**Table 37-51 TM-T70II — DIP Switch**

No DIP Switch.

**Table 37-52 TM-T70II — Memory Switch**

Mem		SW		1			
1-1	1-2	1-3	1-4	1-5	1-6	1-7	1-8

**Table 37-52 (Cont.) TM-T70II — Memory Switch**

		Mem	SW	1			
x	x	ON	x	OFF	x	x	x

**Table 37-53 Legend**

OFF	ON	= Mandatory Setting
OFF*	ON*	= Recommended Setting
x		= Don't Care

## DIP Switch Definitions

### TM-U200A

1. RS-232 serial interface model

**Table 37-54 DIP Switch 1**

Switch No.	Function	ON	OFF	Default Settings
1	Data reception error	Ignored	Prints “?”	Off
2	Receive buffer capacity	40 bytes	ANK model: 1000 bytes Multilingual model: 512 bytes	Off
3	Handshaking	XON/XOFF	DTR/DSR	Off
4	Word length	7 bit	8 bit	Off
5	Parity check	Yes	No	Off
6	Parity selection	Even	Odd	Off
7	Baud rate selection	4800 bps	9600 bps	Off
8	BUSY condition	Receive buffer- full	Off-line Receive buffer-full	Off

**Table 37-55 DIP Switch 2**

Switch No.	Function	ON	OFF	Default Settings
1	Selects number of characters per line (cpl) 7x9 font / 9x9 font	42 cpl / 35 cpl	40 cpl / 33 cpl	Off
2	For internal use only (*1) (Autocutter)	Enabled	Disabled	On
3	For internal use only (*1) (Autocutter)	Asynchronous	Synchronous with clock	Off



**Table 37-55 (Cont.) DIP Switch 2**

Switch No.	Function	ON	OFF	Default Settings
4	Undefined	–	–	Off
5	For internal use only (*1) (Semi-autoloading)	For type A	For type B/D	On
6	For internal use only (*1) (Flash memory rewriting)	Enabled	Disabled	Off
7	Pin 6 reset signal	Used	Not used	Off
8	Pin 25 reset signal	Used	Not used	Off

## 2. Parallel interface model

**Table 37-56 DIP Switch 1**

Switch No.	Function	ON	OFF	Default Settings
1	Auto line feed	Enabled	Disabled	Off
2	Receive buffer	40 bytes	–	Off
3–7	Undefined	–	–	Off
8	Busy condition	Receive buffer-full	Off-line Receive buffer-full	Off

**Table 37-57 DIP Switch 2**

Switch No.	Function	ON	OFF	Default Settings
1	Selects number of characters per line (cpl) 7x9 font / 9x9 font	42 cpl / 35 cpl	40 cpl / 33 cpl	Off
2	For internal use only (*1) (Autocutter)	Enabled	Disabled	On
3	For internal use only (*1) (Interface synchronization)	Asynchronous	Synchronous with clock	Off
4	Undefined	–	–	Off
5	For internal use only (*1) (semi-autoloading)	For Type A	For type B/D	On
6	For internal use only (*1) (Flash memory rewriting)	Enabled	Disabled	Off
7	Undefined	–	–	Off
8	Pin 31 reset signal	Used	Not Used	On

**TM-U200B/D**

## 1. RS-232 serial interface model

**Table 37-58 DIP Switch 1**

Switch No.	Function	ON	OFF	Default B	Default D
1	Data reception error	Ignored	Prints “?”	Off	Off
2	Receive buffer capacity	40 bytes	ANK model: 1000 bytes Multilingual model: 512 bytes	Off	Off
3	Handshaking	XON/XOFF	DTR/DSR	Off	Off
4	Word length	7 bit	8 bit	Off	Off
5	Parity check	Yes	No	Off	Off
6	Parity selection	Even	Odd	Off	Off
7	Baud rate selection	4800 bps	9600 bps	Off	Off
8	BUSY condition	Receive buffer-full	Off-line Receive buffer-full	Off	Off

**Table 37-59 DIP Switch 2**

Switch No.	Function	ON	OFF	Default B	Default D
1	Selects number of characters per line (cpl) 7x9 font / 9x9 font	42 cpl / 35 cpl	40 cpl / 33 cpl	Off	Off
2	For internal use only (*1) (Autocutter)	Enabled	Disabled	On	Off
3	Pin 6 reset signal	Used	Not used	Off	Off
4	Pin 25 reset signal	Used	Not used	Off	Off
5	For internal use only (*1) (Semi-autoloading)	For type A	For type B/D	Off	Off
6	For internal use only (*1) (Flash memory rewriting)	Enabled	Disabled	Off	Off
7	For internal use only (*1) (Interface synchronization)	Asynchronous	Synchronous with clock	Off	Off
8	Undefined	–	–	Off	Off

\*1: Do not change the settings of DIP switches 2–2, 2–5, 2–6, and 2–7.

2. Parallel interface model

**Table 37-60 DIP Switch 1**

Switch No.	Function	ON	OFF	Default B	Default D
1	Auto line feed	Enabled	Disabled	Off	Off

**Table 37-60 (Cont.) DIP Switch 1**

Switch No.	Function	ON	OFF	Default B	Default D
2	Receive buffer	40 bytes	ANK Model: 1000 bytes Multilingual mode: 512 bytes	Off	Off
3–7	Undefined	–	–	Off	Off
8	Busy condition	Receive buffer-full	Off-line Receive buffer-full	Off	Off

**Table 37-61 DIP Switch 2**

Switch No.	Function	ON	OFF	Default B	Default D
1	Selects number of characters per line (cpl) 7 x 9 / 9 x 9 font	42 cpl / 35 cpl	40 cpl / 33 cpl	Off	Off
2	For internal use only (*1) (Autocutter)	Enabled	Disabled	On	Off
3	Undefined	–	–	Off	Off
4	Pin 31 reset signal	Used	Not used	On	On
5	For internal use only (*1) (semi- autoloading)	For type A	For type B/D	Off	Off
6	For internal use only (*1) (Flash memory rewriting)	Enabled	Disabled	Off	Off
7	For internal use only (*1) (Interface synchronization)	Asynchrono us	Synchronou s with clock	Off	Off
8	Undefined	–	–	Off	Off

\*1: Do not change the settings of DIP switches 2–2, 2–5, 2–6, and 2–7.

**TM-U220A/B/D (STD)**

**1. Serial interface model**

**Table 37-62 DIP Switch 1**

Switch No.	Function	ON	OFF	Default A	Default B	Default D
1	Data reception error	Ignored	Print “?”	Off	Off	Off
2	Receive buffer capacity	40 bytes	4 KB	Off	Off	Off

**Table 37-62 (Cont.) DIP Switch 1**

Switch No.	Function	ON	OFF	Default A	Default B	Default D
3	Handshaking	XON/ XOFF	DTR/DSR	Off	Off	Off
4	Word length	7 bits	8 bits	Off	Off	Off
5	Parity check	Yes	No	Off	Off	Off
6	Parity selection	Even	Odd	Off	Off	Off
7	Transmission speed selection	4800 bps	9600 bps	Off	Off	Off
8	BUSY condition	Receive buffer-full	Offline Receive buffer-full	Off	Off	Off

**Table 37-63 DIP Switch 2**

Switch No.	Function	ON	OFF	Default A	Default B	Default D
1	Selects number of characters per line (cpl) (*)	42 cpl / 35 cpl	40 cpl / 33 cpl	Off	Off	Off
2	Reserved (Autocutter)	Enabled	Disabled	On	On	Off
3	Undefined	—	—	Off	Off	Off
4	Serial communication set selection	By memory switch	By DIP switch	Off	Off	Off
5	Undefined	—	—	Off	Off	Off
6	Reserved (Flash memory rewriting)	Enabled	Disabled	Off	Off	Off
7	Pin 6 reset signal	Used	Not used	Off	Off	Off
8	Pin 25 reset signal	Used	Not used	Off	Off	Off

(\*) Selection of dots between characters: On = 2 half dots, Off = 3 half dots

The number of characters per line in the Table indicates for the 76 mm-width paper.

2. Parallel interface model

**Table 37-64 DIP Switch 1**

Switch No.	Function	ON	OFF	Default A	Default B	Default D
1	Auto line feed	Enabled	Disabled	Off	Off	Off
2	Receive buffer	40 bytes	4KB	Off	Off	Off

**Table 37-64 (Cont.) DIP Switch 1**

Switch No.	Function	ON	OFF	Default A	Default B	Default D
3	Undefined	–	–	Off	Off	Off
4	Undefined	–	–	Off	Off	Off
5	Undefined	–	–	Off	Off	Off
6	Undefined	–	–	Off	Off	Off
7	Undefined	–	–	Off	Off	Off
8	BUSY condition	Receive buffer-full	Offline Receive buffer-full	Off	Off	Off

**Table 37-65 DIP Switch 2**

Switch No.	Function	ON	OFF	Default A	Default B	Default D
1	Selects number of characters per line (cpl) (*)	42 cpl / 35 cpl	40 cpl / 33 cpl	Off	Off	Off
2	Reserved (Autocutter)	Enabled	Disabled	On	On	Off
3	Undefined	–	–	Off	Off	Off
4	Undefined	–	–	Off	Off	Off
5	Undefined	–	–	Off	Off	Off
6	Reserved (Flash memory rewriting)	Enabled	Disabled	Off	Off	Off
7	Undefined	–	–	Off	Off	Off
8	Pin 31 reset signal	Used	Not used	On	On	On

(\*) Selection of dots between characters: On = 2 half dots, Off = 3 half dots.  
The number of characters per line in the Table indicates for the 76 mm-width paper.

**TM-U220B/D (US STD)**

**1. Serial interface model**

**Table 37-66 DIP Switch 1**

Switch No.	Function	ON	OFF	Default B	Default D
1	Printing mode	Right side up printing mode	Normal printing mode	Off	Off
2	Receive buffer capacity	40 bytes	4KB	Off	Off
3	Handshaking	XON/XOFF	DTR/DSR	Off	Off

**Table 37-66 (Cont.) DIP Switch 1**

Switch No.	Function	ON	OFF	Default B	Default D
4	Word length	7 bits	8 bits	Off	Off
5	Parity check	Yes	No	Off	Off
6	Parity selection	Even	Odd	Off	Off
7	Transmission speed selection	4800 bps	9600 bps	Off	Off
8	BUSY condition	Receive buffer-full	Offline Receive buffer-full	Off	Off

**Table 37-67 DIP Switch 2**

Switch No.	Function	ON	OFF	Default B	Default D
1	Selects number of characters per line (cpl) (*)	42 cpl / 35 cpl	40 cpl / 33 cpl	Off	Off
2	Reserved (Autocutter)	Enabled	Disabled	On	Off
3	Pin 6 reset signal	Used	Not used	Off	Off
4	Pin 25 reset signal	Used	Not used	Off	Off
5	Undefined	–	–	Off	Off
6	Reserved (Flash memory rewriting)	Enabled	Disabled	Off	Off
7	Undefined	–	–	Off	Off
8	Serial communication set selection	By memory switch	By DIP switch	Off	Off

(\*) Selection of dots between characters: On = 2 half dots, Off = 3 half dots.

The number of characters per line in the Table indicates for the 76 mm-width paper.

2. Parallel interface model

**Table 37-68 DIP Switch 1**

Switch No.	Function	ON	OFF	Default B	Default D
1	Printing mode	Right side up printing mode	Normal printing mode	Off	Off
2	Receive buffer	40 bytes	4KB	Off	Off
3	Undefined	–	–	Off	Off
4	Undefined	–	–	Off	Off
5	Undefined	–	–	Off	Off
6	Undefined	–	–	Off	Off

**Table 37-68 (Cont.) DIP Switch 1**

Switch No.	Function	ON	OFF	Default B	Default D
7	Undefined	–	–	Off	Off
8	BUSY condition	Receive buffer-full	Offline Receive buffer-full	Off	Off

**Table 37-69 DIP Switch 2**

Switch No.	Function	ON	OFF	Default B	Default D
1	Selects number of characters per line (cpl) (*)	42 cpl / 35 cpl	40 cpl / 33 cpl	Off	Off
2	Reserved (Autocutter)	Enabled	Disabled	On	Off
3	Undefined	–	–	Off	Off
4	Pin 31 reset signal	Used	Not used	On	On
5	Undefined	–	–	Off	Off
6	Reserved (Flash memory rewriting)	Enabled	Disabled	Off	Off
7	Undefined	–	–	Off	Off
8	Undefined	–	–	Off	Off

(\*) Selection of dots between characters: On = 2 half dots, Off = 3 half dots.

The number of characters per line in the Table indicates for the 76 mm-width paper.

**TM-T88III/IV/V**

**TM-T70**

**1. Serial interface specification**

**Table 37-70 DIP Switch 1**

SW 1	Function	ON	OFF	Factory Setting
1	Data reception error	Ignored	Prints “?”	OFF
2	Receive buffer capacity	45 bytes	4 KB	OFF
3	Handshaking	XON/XOFF	DTR/DSR	OFF
4	Word length	7 bits	8 bits	OFF
5	Parity check	Yes	No	OFF
6	Selection of parity	Even	Odd	OFF
7	Selection of transmission speed	See Table 18	See Table 18	ON

**Table 37-70 (Cont.) DIP Switch 1**

SW 1	Function	ON	OFF	Factory Setting
8	Selection of transmission speed	See Table 18	See Table 18	OFF

**Table 37-71 Transmission Speed**

Transmission speed (bps)	SW 1-7	SW 1-8
(*1)	ON	ON
4800	OFF	ON
9600	ON	OFF
19200	OFF	OFF

bps: bits per second

**Table 37-72 DIP Switch 2**

SW 2	Function	ON	OFF	Factory Setting
1	Handshaking (Condition or BUSY)	Receive buffer full	Offline Receive buffer-full	OFF
2	Reserved (Do not change settings)	Fixed to OFF	Fixed to OFF	OFF
3	Selects print density	See Table 20	See Table 20	OFF
4	Selects print density	See Table 20	See Table 20	OFF
5	Setting the conditions that cancel the receive buffer BUSY state (This function is effective when the receive buffer capacity is set to 4 KB.)	Cancels the BUSY state when the remaining capacity of the receive buffer reaches 138 bytes.	Cancels the BUSY state when the remaining capacity of the receive buffer reaches 256 bytes.	OFF
6	Reserved (Do not change settings)	Fixed to OFF	Fixed to OFF	OFF
7	I/F pin 6 reset signal	Enabled	Disabled	OFF
8	I/F pin 25 reset signal	Enabled	Disabled	OFF

**Table 37-73 DIP Switch 2-3 and 2-4**

Switch No. 3	Switch No. 4	Function
OFF	OFF	Print density (Standard)
ON	OFF	Print density (Medium)
OFF	ON	Print density (Dark)
ON	ON	Prohibited

2. Parallel interface specification



**Table 37-74 DIP Switch 1**

SW	Function	ON	OFF	Factory Setting
1	Auto line feed	Always enabled	Always disabled	OFF
2	Receive buffer capacity	45 bytes	4 KB	OFF
3	Selects paper sensors to output paper-end signals (default value of ESC c 3)	Disabled	Roll paper end sensor enabled; roll paper near-end sensor enabled	OFF
4	Sets error signal	Disabled	Enabled	OFF
5–8	Undefined	–	–	OFF

**Table 37-75 DIP Switch 2**

SW	Function	ON	OFF	Factory Setting
1	Handshaking (Condition for BUSY)	Receive buffer full	Offline Receive buffer full	OFF
2	Reserved (Do not change settings)	Fixed to OFF	Fixed to OFF	OFF
3	Selects print density	See Table 23	See Table 23	OFF
4	Selects print density	See Table 23	See Table 23	OFF
5	Setting the conditions that cancel the receive buffer BUSY state (this function is effective when the capacity of the receive buffer is set to 4 KB).	Cancels the BUSY state when the remaining capacity of the receive buffer reaches 138 bytes.	Cancels the BUSY state when the remaining capacity of the receive buffer reaches 256 bytes.	OFF
6	Reserved (Do not change settings)	Fixed to OFF	Fixed to OFF	OFF
7	Reserved (Do not change settings)	Fixed to OFF	Fixed to OFF	OFF
8	Interface pin 31 reset signal (Do not change settings)	Fixed to ON	Fixed to ON	ON

**Table 37-76 DIP Switch 2–3 and 2–4**

3	4	Function
OFF	OFF	Print density (Standard)
ON	OFF	Print density (Medium)
OFF	ON	Print density (Dark)
ON	ON	Prohibited

## TM-T70II

Table 37-77 Memory Switch 1

Memory Switch	Function	Setting Value — 48 (OFF)	Setting Value — 49 (ON)	Defaults
1-1	(Reserved)	–	–	48 (OFF)
1-2	Receive buffer capacity	4 KB	45 bytes	48 (OFF)
1-3	Condition for BUSY	Receive buffer full or offline	Receive buffer full	48 (OFF)
1-4	Data processing for receiving error	Replaced with “?”	Ignored	48 (OFF)
1-5	Automatic line feed	Always disabled	Always enabled	48 (OFF)
1-6	(Reserved)	–	–	48 (OFF)
1-7	(Reserved)	–	–	48 (OFF)
1-8	(Reserved)	–	–	48 (OFF)

Table 37-78 Memory Switch 2

Memory Switch	Function	Setting Value — 48 (OFF)	Setting Value — 49 (ON)	Defaults
2-1 to 2-8	(Reserved)	–	–	48 (OFF)

Table 37-79 Memory Switch 3

Memory Switch	Function	Setting Value — 48 (OFF)	Setting Value — 49 (ON)	Defaults
3-1 to 3-8	(Reserved)	–	–	48 (OFF)

Table 37-80 Memory Switch 4

Memory Switch	Function	Setting Value — 48 (OFF)	Setting Value — 49 (ON)	Defaults
4-1 to 4-8	(Reserved)	–	–	48 (OFF)

Table 37-81 Memory Switch 5

Memory Switch	Function	Setting Value — 48 (OFF)	Setting Value — 49 (ON)	Defaults
5-1	Sets USB power-saving function *1	Enabled	Disabled	48 (OFF)

**Table 37-81 (Cont.) Memory Switch 5**

Memory Switch	Function	Setting Value — 48 (OFF)	Setting Value — 49 (ON)	Defaults
5-2	Sets recovery conditions from receive buffer BUSY (Enabled when the receive buffer capacity is set to 4 KB)	Recovers when the remaining receive buffer capacity becomes 256 bytes	Recovers when the remaining receive buffer capacity becomes 138 bytes	48 (OFF)
5-3	Selects paper sensors to output paper-end signals (default value of ESC c 3)	Roll paper end sensor enabled; roll paper near-end sensor enabled	Disabled	48 (OFF)
5-4	Sets error signal	Enabled	Disabled	48 (OFF)
5-5	(Reserved)	—	—	48 (OFF)
5-6	(Reserved)	—	—	48 (OFF)
5-7	(Reserved)	—	—	48 (OFF)
5-8	(Reserved)	—	—	48 (OFF)

\*1: Valid only when the USB interface communication condition is set to the vendor-defined class and the system configuration is set so that the USB driver can support the USB power-saving function.

### Function 11

```
<Function 11> GS ( E pL pH fn a d1...dk (fn = 11)
```

---

[Name]	Set the configuration item for the serial interface	
[Format]	ASCII	GS ( E pL pH fn a d1 ... dk
	Hex	1D 28 45 pL pH fn a d1 ... dk
	Decimal	29 40 69 pL pH fn a d1 ... dk
[Range]	$3 \leq (pL + pH \times 256) \leq 65535$ ( $0 \leq pL \leq 255, 0 \leq pH \leq 255$ ) $fn = 11$ $1 \leq a \leq 4$ $48 \leq d \leq 57$	
[Default (upon shipment)]	$d1...dk = "115200"$ $d1...dk = "9600"$ $d1...dk = "38400"$	[ANK model, Japanese model, South Asia model] [Traditional Chinese model, Simplified Chinese model] [ANK model (T88V command compatibility mode enabled)]

### Function 11 — Descriptions

- Sets the configuration item for the serial interface specified by *a* to the values specified by *d*.

<i>a</i>	Configuration Item
1	Transmission speed
2	Parity
3	Handshaking
4	Bit length

- Transmission speed settings (*a* = 1)

<b>d1...dk</b>	<b>Transmission Speed</b>
"2400"	2400 bps
"4800"	4800 bps
"9600"	9600 bps
"19200"	19200 bps
"38400"	38400 bps
"57600"	57600 bps
"115200"	115200 bps

- Parity settings (a =2)

<b>d1</b>	<b>Parity</b>
48	None
49	Odd
50	Even

- Handshaking settings (a = 3)

<b>d1</b>	<b>Handshaking</b>
48	DTR/DSR control
49	XON/XOFF control

- Bit length settings (a = 4)

<b>d1</b>	<b>Bit Length</b>
55	7 bits
56	8 bits

## Logo Printing

You can print the logo of your Enterprise, property, or revenue center on guest checks, customer receipts, and credit card vouchers. Symphony only supports monochrome bitmap image files. Use Microsoft Paint to convert an image to a monochrome bitmap. Adhere to the following rules governing the size of your logo:

- The image area must not exceed 98,304 pixels. (Keep in mind that a logo that is 512 x 384 pixels exceeds 98,304 pixels.)
- The image width must not exceed 512 pixels.
- The image height must not exceed 384 pixels.
- The bitmap file must not exceed 8 kilobytes in size.

Symphony does not support logo printing on printers with multi-language cards.

Complete the following tasks to set up logo printing:

- Upload a logo to Symphony
- Assign a logo to guest checks, customer receipts, and credit card vouchers
- Set the printer to print the logo
- Ensure that the DIP settings for the printer's buffer are set to the higher value to accommodate the logo's additional data

For more information on DIP settings, please refer to the following: [Printer DIP and Memory Switch Settings](#)

- [Uploading a Logo to Symphony](#)
- [Assigning a Logo to Guest Checks and Customer Receipts](#)

## Uploading a Logo to Symphony

1. Select the Enterprise level, click **Configuration**, and then click **Print Logos**.
  2. Insert a new record, and then double-click it to open in form view.
  3. Click **Load Image**.
  4. Select the image, and then click **Open** to upload it to Symphony. After the logo uploads, an image preview appears.
  5. Alternately, you can copy the image to your clipboard, and then click **Paste Image** to upload it to Symphony.
  6. Click **Save**.
- [Assigning a Logo to Guest Checks and Customer Receipts](#)

## Assigning a Logo to Guest Checks and Customer Receipts

1. Select the Enterprise, property, revenue center, or zone, click **Descriptors**, and then click **Guest Check Headers**.

2. Select a check box in the **Use Logo** column.

If you select **Use Logo** for an existing record that has content in the **Text** column, that text no longer appears on printed guest checks and customer receipts.

3. Click the ellipsis point (...) button in the **Logo** column, select the image you uploaded, and then click **OK**.

4. Click **Save**.

5. To assign the logo to customer receipts and guest check trailers, repeat these steps, selecting the **Guest Check Trailers** and **Customer Receipt Headers** modules in Step 1.

You must also select **28 - Print Guest Check Trailer on Fast Transaction Customer Receipt** for tender records from the Tender/Media options. If you do not set this option, trailers do not print on customer receipts when the tender is used to close a fast transaction.

6. Click **Save**.

- [Uploading a Logo to Symphony](#)

# Kitchen Display System

An order device generally refers to hardware used to print orders that need to be prepared, such as hot and cold items that print in the kitchen, or alcoholic beverages that print at the bar. Often an order device is a roll printer, but it may also be a Kitchen Display System (KDS) display. Remote printers and remote kitchen printers are often used interchangeably with order device.

- [KDS Controller](#)
- [Configuring a KDS Controller](#)
- [Configuring a KDS Display](#)
- [Configuring the KDS Bump Bar](#)
- [Configuring the KDS Toolbar](#)
- [KDS Bump Bar and Toolbar Functions](#)
- [Configuring KDS Course Overrides](#)
- [Configuring a Backup KDS Controller](#)
- [Creating a KDS Order Device](#)
- [Prep Station Linking](#)
- [Linking Prep Stations](#)
- [Understanding Order Receipt Layouts](#)
- [Configuring an Order Receipt Layout](#)
- [KDS Chit Layout Styles](#)
- [SEI KDS Chit Layout Styles](#)
- [KDS Load Balancing](#)
- [Creating KDS Distribution Groups](#)
- [Assigning a KDS Prep Display to a Distribution Group](#)
- [Kitchen Themes](#)
- [Workstation Alerts for Unsuccessful Sending to Order Devices](#)
- [Enabling Workstation Alerts](#)
- [Configuring Employee Privileges for Kitchen Themes](#)
- [Creating Kitchen Themes](#)
- [Importing Current Settings to a Kitchen Theme](#)
- [Creating a Kitchen Theme Period](#)
- [Changing the Appearance of Workstations and KDS Displays](#)
- [Upgrading the RDC Order Device](#)
- [Upgrading the RDC Operating System](#)

- [Resetting the RDC Factory Settings](#)
- [Installing the KDS Client](#)
- [CAL Installation Prerequisites for KDS](#)
- [Allowing Employees to Install and Authenticate POS Clients and Service Hosts](#)
- [Configuring the Deployment Schedule to Install CAL on KDS](#)
- [Installing CAL on the KDS](#)

## KDS Controller

A KDS Controller is a Microsoft Windows service that controls KDS Displays and performs other KDS-related functions. KDS Controllers move data to and from the KDS Displays. When an order is placed on a workstation, the KDS Controller routes the order to the appropriate KDS Displays. When an order is bumped from a KDS Display, the KDS Controller routes the information about the order to the reporting database. Updates to KDS Displays (changing a Tool Bar or Bump Bar button) are routed through the KDS Controller.

### Related Topics

- [Configuring a KDS Controller](#)
- [Configuring a KDS Display](#)
- [Configuring the KDS Bump Bar](#)
- [Configuring the KDS Toolbar](#)
- [Configuring KDS Course Overrides](#)
- [Configuring a Backup KDS Controller](#)
- [Creating a KDS Order Device](#)
- [KDS Bump Bar and Toolbar Functions](#)
- [KDS Load Balancing](#)

### Related Topics

- [Configuring a KDS Controller](#)
- [Creating KDS Distribution Groups](#)
- [Assigning a KDS Prep Display to a Distribution Group](#)
- [Configuring the KDS Bump Bar](#)
- [Configuring the KDS Toolbar](#)

## Configuring a KDS Controller

1. Select the property, click **Setup**, and then click **KDS Controllers**.
2. Insert a new record, enter a record name, and then click **OK**.
3. Double-click the new record to open it.
4. On the **General** tab, configure the settings as described in the following table:



**Table 39-1 KDS Controller Fields**

<b>Fields and Options</b>	<b>Description</b>
1 - Prevent Chit Bump on Expo Display if Chit Exists on Prep Display	Select this option to prevent a chit from being bumped from an Expo Display if the chit still exists on one of the Prep Displays.
2 - Display Next Course after Previous Course Complete	If the property is using dining courses, select this option to show one course at a time on the KDS. That is, menu items from course 2 appear on KDS Displays only after menu items from course 1 are bumped.
3 - Show Only Active Orders	Select this option to allow a Speed of Service (SOS) Display to show only tables that have open orders.
4 - Expo-only Items Display as Done	Select this option to change the status of menu items that do not go to Prep Stations to Done when they fire.
5 - Exclude CAL Updates from Service Host Change	If the property does not use the CAL, select this option to exclude updates to CAL for Service Host changes made in the KDS Controller.
6 - Enable Item Started Timings	<p>If the KDS is not using Dynamic Order Mode (DOM) and is configured to show every item in an order on separate chits (from the Order Devices module set KDS Option <b>3 - Single Item Per Sub-Order</b>), select this option to have KDS recalculate an order's target done time (TDT) when the kitchen staff starts on the item with the longest prep time.</p> <p>After the KDS recalculates the TDT, the system adjusts all of the fire times for the remaining items (based on individual prep times) to ensure that all items complete at the new TDT.</p> <p>When using this feature, Symphony automatically starts unstarted orders when bumped from KDS Displays.</p>
7 - Include Theme In The Device Name	Select this option to have the KDS show the current Kitchen Theme after the name of the device on the KDS status bar.
8 - Enable load balancing	<p>Select this option to turn on KDS load balancing for the KDS Controller.</p> <p>Load balancing distributes new orders to KDS Prep Stations based on which station has the least number of items. KDS Prep Stations are assigned to distribution groups and orders route to the KDS Prep Station with the fewest un-bumped menu items within a distribution group.</p>
9 - Enable Backup Controller Automatic Takeover	If the KDS Controller has a backup service host, select this option to allow the backup KDS Controller to take over automatically when the primary controller is down.

Table 39-1 (Cont.) KDS Controller Fields

Fields and Options	Description
10 - Start Hides Other Preps	Select this option to have orders disappear from all other KDS Prep Stations when a kitchen staff member marks an order chit as started using <b>Order Start</b> or <b>Order Start First</b> on one KDS Prep Station.
Database Update Frequency	Enter the number of seconds you want the KDS Controller to wait to retrieve the latest updates from the database.
Wait for Prep Suborder	If the property is using dining courses, enter the number of seconds that you want the KDS to wait for Prep Suborders before displaying an expo order as All Prep Done. Oracle recommends entering a value of 1 or 2. The value 0 (zero) does not work with KDS Prep Times.
Media Viewer URL	Enter the URL of the Microsoft Internet Information Services (IIS) website where you defined the Media Viewer (for example, MyPC:8080).
Expo Recall Action	Select the location for orders to appear when they are recalled from an Expo or SOS display: <ul style="list-style-type: none"> <li>• <b>0 - All:</b> Returns the order to all displays that handled the original order. This is the default selection.</li> <li>• <b>1 - Recall Expo Only:</b> Returns the order only to the Expo Display.</li> <li>• <b>2 - Not Marked as Done:</b> Returns the order to any Prep Station that did not mark the order as done before it was marked done at the Expo Display.</li> </ul>
Number of Zones	Select the number of kitchen zones to use for collecting food orders.  You can define up to 26 zones. The default value is 0, indicating that zones are not used.
Production Count Increment Type	Select when to add ordered items to the production counter: <ul style="list-style-type: none"> <li>• To increase the production counter as soon as workstation operators end the current round of a check, select <b>1 - Sent from POS</b>.</li> <li>• To increase the production counter when workstation operators send checks to the KDS, select <b>2 - Sent (Fired) from EXPO</b>. Oracle recommends using this option in a non-DOM environment.</li> </ul>

**Table 39-1 (Cont.) KDS Controller Fields**

Fields and Options	Description
Production Count Decrement Type	Select when to decrease the count of items from the production counter: <ul style="list-style-type: none"> <li>If menu items appear on two or more prep stations and you want the application to decrease the count when any prep station bumps the item, select <b>First Prep Done</b>.</li> <li>To decrease the count when all prep stations bump the item, select <b>All Prep Done</b>. When using this option, you must set all order devices to DOM when the revenue center is in DOM and all order devices to non-DOM when the revenue center is in non-DOM.</li> <li>To decrease the count when the Expo station bumps the order, select <b>Expo Done</b>.</li> </ul>
Time (sec)	Enter the number of seconds to elapse before automatically bumping all closed orders after reaching the Check Count.
Check Count	Enter the number of checks that are allowed to appear on the KDS before automatically bumping.

- Click the **Service Host** tab.
- Click the **Select** link adjacent to the **Service Host** field, select a service host from the list, and then click **OK**.
- (Optional) Click the **Backup Service Host** tab, and then configure a backup KDS Controller. [Configuring a Backup KDS Controller](#) contains more information about configuring a backup KDS Controller.
- (Optional) Click the **Item Status Colors** tab, and then select the colors in which you want items to appear on KDS Expo Displays when the status of items change. The following table describes the Item Status Color fields.

**Table 39-2 Item Status Colors Fields**

Field	Description
Status Sent Color	Select the color in which items appear when workstation operators send orders to the KDS.
Status Fired Color	Select the color in which items appear when they fire to the Prep Display.
Status Bumped Color	Select the color in which items appear when they are bumped from the Prep Display.
Status Started Color	Select the color in which items appear when they are Prep started.  This feature only functions with KDS Prep stations, in non-DOM Mode, and with Item Started Timings deactivated.

**Table 39-2 (Cont.) Item Status Colors Fields**

Field	Description
Item Select Color	Select the color in which items show when kitchen staff selects an item on the order.
Item Mark Color	Select the color in which items appear when kitchen staff places items on hold.
Item Recall Color	Select the color in which items appear when kitchen staff recalls an order.
Item Recallable Color	Select the color in which recallable items appear.

- (Optional) Click the **Layout Colors Override** tab, and then click **Custom Color** adjacent to the relevant field to select the colors for orders and the KDS screen layout. The following table describes the Layout Colors Override fields.

**Table 39-3 Layout Colors Override Fields**

Field	Description
Alert 1	Select the background color for the order when it exceeds the first alert time.
Alert 2	Select the background color for the order when it exceeds the second alert time.
Background	Select the background panel color for the KDS Display. The default color is black. When an order is All Prep Done, the border of the order appears in the same color as the panel background.
Order Selection	Select in which color the border (highlight) of an order appears when an item is selected. The default color is green.
Order Background	Select the background color for orders chits. The default color is white.
Void Item	Select in which color voided items appear. The default color is red. Dynamic Order Mode Highlight Scheme colors assigned in the Order Devices module overrides this option.
Course 1 Item	Select in which color Course 1 items appear. The default color is blue. The KDS highlight scheme assigned for a menu item class overrides this option.

- Click **Save**.
- Select the property, click **Setup**, and then click **RVC Configuration**.
- Double-click the revenue center for which you want to assign the KDS Controller.
- On the **General** tab, select the **KDS Controller** from the drop-down list.
- Click **Save**.

- [Configuring a KDS Display](#)

- [Configuring the KDS Bump Bar](#)
- [Configuring the KDS Toolbar](#)
- [Configuring KDS Course Overrides](#)
- [Configuring a Backup KDS Controller](#)
- [Creating a KDS Order Device](#)

**Related Topics**

- [KDS Controller](#)
- [KDS Bump Bar and Toolbar Functions](#)

**Related Topics**

- [KDS Controller](#)
- [KDS Load Balancing](#)

## Configuring a KDS Display

1. Select the property, click **Setup**, and then click **KDS Displays**.
2. Insert a new record, enter a name for the KDS Display, and then click **OK**.  
If you are configuring a Windows 32 KDS Display, append the prefix `WSKDS` to the KDS Display name, for example, `WSKDSDISPLAY1`. Do not include a space between the prefix and the display name.
3. Double-click the new KDS Display record.
4. Select the **KDS Controller** from the drop-down list.
5. Enter the **IP Address** of the display.
6. Select a **KDS Tool Bar** and a **Bump Bar** from the drop-down lists.
7. Select the appropriate display platform from the **Platform Type** drop-down list:
  - **0 - PC-based**: Select this option if the KDS is PC-based.
  - **1 - SEI OASYS**: Select this option if you are using an OASYS KDS Display.
8. If you selected **1 - SEI OASYS** in Step 6, select the **Card ID** or slot number of the SEI card in the OASYS box and the **Video ID** to identify the KDS Display.
9. From the **Display Orientation** drop-down list, select the orientation type for the display.
10. Select option **1 - Enable Item Select**.
11. To prevent other KDS displays from remotely viewing orders on this display, deselect **7 - Allow Remote View**.
12. To prevent other KDS displays from remotely performing actions on this display, deselect **8 - Allow Remote Actions**.
13. If the display is a Speed of Service (SOS) Display, select the appropriate options as described in the following table:

**Table 39-4 SOS Display Options**

Option	Description
2 - Only Active Tables	Select this option to show only tables that are currently active on the display.
3 - Dynamic Display	Select this option to turn on the Dynamic Display feature.
4 - Display Zone	Select this option to show KDS zones (collection points) on the display. This option only becomes active when you select <b>3 - Dynamic Display</b> .
5 - Display Rvc Separator	Select this option to separate orders by revenue center. This option only becomes active when you select <b>3 - Dynamic Display</b> .

14. Click the **Display** tab.
15. Configure the Display Screen Options as described in the following table:

**Table 39-5 KDS Display Screen Options**

Field	Description
Display Type	Select the type of KDS Display: <ul style="list-style-type: none"> <li>• <b>1 - SOS</b></li> <li>• <b>2 - Expo</b></li> <li>• <b>3 - Prep</b></li> </ul>
Tool Bar Position	If you selected the <b>Platform Type 0 - PC-based</b> in Step 6, select the location of the tool bar on the display.  When you select <b>Left</b> or <b>Right</b> for a KDS display at a property that is using Symphony version 2.8.3 or earlier, the toolbar appears at the top of the KDS display.
Panels	Select the number of panels or logical monitors to appear on the display.  A KDS Display can contain one or two panels to allow various order devices to print to a different section of the display. The left side represents hot items and the right side represents cold items.
Panel Layout	If you selected <b>2</b> from the <b>Panels</b> drop-down list, select whether the panels appear side-by-side or one on top of the other.
Table Detail Toolbar	If you selected <b>1 - SOS</b> from the <b>Display Type</b> drop-down list, you can optionally select a toolbar from the <b>Table Detail Toolbar</b> drop-down list to use when viewing Table Detail mode on a Speed of Service (SOS) KDS display.

16. Configure the order chit appearance in the display as described in the following table:

**Table 39-6 KDS Chit Display Options**

Fields	Description
KDS Chit Layout Style	Select the type of layout for the order chits on the display. Depending on the chit layout style that you select, the <b>Order Type Font</b> drop-down list becomes active.  To preview the chit layout styles, click the <b>Help</b> link adjacent to the <b>KDS Chit Layout Style</b> drop-down list, and then select the chit style.
Serpentine Mode	Select the arrangement of order chits on the display: <ul style="list-style-type: none"> <li>To set incoming orders to appear starting from the top left corner, filling the first column, then spilling into the top of the next column, and so on, select <b>0 - TSR</b>. TSR Mode only works on PC-based clients.</li> <li>To set incoming orders to appear from left to right, row by row, starting from the top left corner and moving across, select <b>1 - Horizontal</b>.</li> <li>To set incoming orders to appear starting from the bottom right corner, moving up and then moving to the left, select <b>2 - Vertical</b>.</li> </ul>
Menu Item Font	Select the font size for menu items to appear on the display.
Order Type Font	Select the font size for the Order Type text to appear on the display.
Chit Columns	Enter the number of columns to use on the display for order chits.
Chit Rows	If you selected <b>Horizontal</b> or <b>Vertical</b> from the <b>Serpentine Mode</b> drop-down list, select the number of rows to use on the display for order chits.

17. If the display is an SOS Display:
- a. In the **Table Columns** field, enter the number of columns to use to present table numbers for the SOS Table Display.
  - b. In the **SOS Timeout** field, enter the amount of time the kitchen staff can view a table in the regular Expo Display screen before the display returns to the SOS Table Display.
  - c. If you selected **3 - Dynamic Display** in Step 12 for the SOS Display, configure the following settings:

**Table 39-7 Dynamic SOS Display Settings**

Field	Description
SOS Zone Font	Select the font size for SOS zones to appear on the display. Oracle recommends using values between <b>10</b> and <b>12</b> .
SOS Sort Method	Select the sort method for the display: <ul style="list-style-type: none"> <li>To sort by table number, select <b>0 - Sort by Table Number</b>.</li> <li>To sort by the elapsed time of the oldest order on the table from oldest to newest, select <b>1 - Sort Oldest to Newest</b>. You must deselect <b>5 - Display Rvc Separator</b>.</li> <li>To sort by the elapsed time of the oldest order on the table from newest to oldest, select <b>2 - Sort Newest to Oldest</b>. You must deselect <b>5 - Display Rvc Separator</b>.</li> </ul>
Min Table State	This field is not supported.
Max Table State	This field is not supported.

18. To set each column on the KDS Recall and Review list, click the **Recall/Review List** tab, select the Column Type to display on **Column 1** to **Column 6**, and then enter the **Width** for each column relative to the total screen width.
19. To specify which production items show on the KDS Display:
  - a. Click the **Production Item** tab.
  - b. From the **KDS Production Location** drop-down list, select where to place the production items on the display.
    - To set production items to appear above the order chit, select **1 - Top**.
    - To set production items to appear below the order chit and above the KDS toolbar (if used), select **2 - Bottom**.
  - c. From the **KDS Production Columns** drop-down list, select the number of production items to show per line or production bar. When possible, the KDS displays the maximum number of items in each bar. If there are not enough items to fill the last bar, the remaining items are evenly distributed across the line.
  - d. From the Production Items section, click **Add**, and then select a production item to appear on the KDS. Repeat this step until all of the production items to display on the KDS appear in the list.
20. Click **Save**.
21. Select the Enterprise, property, or zone, click **Configuration**, and then click **Theme Assignment**.
22. Click the **Configuration** tab.
23. From the **Default Kitchen Display Theme** drop-down list, select the default theme for KDS displays:
  - Classic** (gray)



- **Ocean** (blue)

24. Click **Save**.

- [Configuring a KDS Controller](#)
- [Configuring the KDS Bump Bar](#)
- [Configuring the KDS Toolbar](#)
- [Configuring KDS Course Overrides](#)
- [Configuring a Backup KDS Controller](#)
- [Creating a KDS Order Device](#)

#### Related Topics

- [KDS Controller](#)
- [KDS Bump Bar and Toolbar Functions](#)

## Configuring the KDS Bump Bar

KDS bump bars are physical devices attached to KDS displays. Workstation operators use bump bars to select and bump orders. You can also configure KDS bump bars to perform other functions.

1. Select the Enterprise, property, or zone, click **Setup** , and then click **KDS Bump Bars**.
2. Insert a **KDS Bump Bar** record if it does not exist.
3. Double-click the record to open it.
4. To configure the KDS bump bar with Oracle default Scancode Values and Functions, click **Create Default**.
5. To configure the KDS bump bar with specific Scancode Values and Functions, click **Add**, and then follow these steps:
  - a. Enter the **Scancode Value** of the button. The bump bar manufacturer sets the Scancode Value.
  - b. Select the corresponding **Function**.
  - c. Continue to add all appropriate KDS bump bar functions. [KDS Bump Bar Functions](#) contains a list of the KDS bump bar functions.
6. Click **Save**.

- [Configuring a KDS Controller](#)
- [Configuring a KDS Display](#)
- [Configuring the KDS Toolbar](#)
- [Configuring KDS Course Overrides](#)
- [Configuring a Backup KDS Controller](#)
- [Creating a KDS Order Device](#)

#### Related Topics

- [KDS Controller](#)

- [KDS Bump Bar and Toolbar Functions](#)

#### Related Topics

- [KDS Controller](#)
- [KDS Load Balancing](#)

## Configuring the KDS Toolbar

1. Select the Enterprise, property, or zone, click **Setup**, and then click **KDS Tool Bars**.
2. Insert a **KDS Tool Bar** record if it does not exist, and then double-click the record to open it.
3. (Optional) Enter the **Button Height** and the **Button Width**, and then select the **Background Color** for the toolbar.
4. To configure the KDS toolbar with Oracle Hospitality default functions, click **Create Default**.
5. To configure the KDS toolbar with specific functions:
  - a. Click **Add**, select the **Function**, enter the **Legend** for the toolbar button, and then if applicable, enter the **Parameter** for the selected function.
  - b. (Optional) Select the **Background Color** for the toolbar button, and then select the **Legend Color**.
  - c. Repeat Steps 5-a and 5-b to add all appropriate KDS toolbar functions. [KDS Bump Bar and Toolbar Functions](#) contains a list of the KDS toolbar functions.
6. To reposition the function buttons on the toolbar, in the column with the number sign (#), click the position number of the function, and then click the up and down arrow buttons to move the position.
7. Click **Save**.

- [Configuring a KDS Controller](#)
- [Configuring a KDS Display](#)
- [Configuring the KDS Bump Bar](#)
- [Configuring KDS Course Overrides](#)
- [Configuring a Backup KDS Controller](#)
- [Creating a KDS Order Device](#)

#### Related Topics

- [KDS Controller](#)
- [KDS Bump Bar and Toolbar Functions](#)

#### Related Topics

- [KDS Controller](#)
- [KDS Load Balancing](#)

## KDS Bump Bar and Toolbar Functions

KDS Bump Bars list many of the functions in the following table as a P1 or P2 variant. These are used with the split screen monitor function to indicate whether the action applies to Panel 1 or Panel 2 on the KDS Display.

**Table 39-8 KDS Bump Bar and Toolbar Functions**

Function	Description
Arrow up	In list mode, the KDS Display moves up to the next line
Arrow down	In list mode, the KDS Display moves down to the next line
Arrow left	In chit mode, the KDS Display moves one chit at a time to the left
Arrow right	In chit mode, the KDS Display moves one chit at a time to the right
Cancel	Exit the transaction
Cook Summary	View a consolidated list of items sorted by status
Close	Close the KDS application
Done	Mark an order as complete and remove the chit from the screen
Done and Select First	Mark the first order on the display as complete and select the next order
Done Item	Mark an item on the chit as complete
End	Move to the last page of the KDS Display
Fire All	Send all items in an order that are on hold because of prep timing to their Prep Stations before they automatically fire This function only works on Expo Displays
Fire Item	Send an item on hold because of prep timing to its' Prep Station before it automatically fires This function only works on Expo Displays
Home	Move to the first page of the KDS Display
Mark	Keep an order on the KDS Display and prevent kitchen staff from bumping the order
Mark First	Keep the first order on the KDS Display and prevent kitchen staff from bumping the order
Mark Item	Keep an item in an order on the KDS Display and prevent kitchen staff from bumping the item
Media Viewer	View media files: <ul style="list-style-type: none"> <li>• Related to the items in an order</li> <li>• On recipe preparations or other work-related tasks</li> </ul>
Minimize	Minimize the KDS application to the toolbar (Microsoft Windows 32-bit displays)
Order Started	Mark an order as started
Order Started First	Mark the first order on the current page as started
Page down	Scroll down the page
Page up	Scroll up the page

**Table 39-8 (Cont.) KDS Bump Bar and Toolbar Functions**

<b>Function</b>	<b>Description</b>
Page left	Scroll to the previous page
Page right	Scroll to the next page
Panel Swap	In a split screen display, the KDS Display moves the focus between the left and right panels
Prep Start/Stop	Change an item's status to start for the Prep Station (only for single item per suborder chits (SIPS))
Priority Order 1-8	Reorder the chit by priority, with Priority 1 being the highest and Priority 8 being the lowest
Production Summary	View a list of all production items in the kitchen
Pull Order	Pull an order from another KDS Prep Station in the Prep Station's primary distribution group
Push Order	Push an order to another KDS Prep Station in the revenue center
Recall Last Item	Recall the last order marked as complete and restart the timer
Recall	Recall an order from the 50 orders marked as complete during the last 15 minutes and restart the timer The system lists the orders in a table
Recall Item	Recall an item marked as complete
Recall Last Item	Recall the last item marked as complete
Recall with Panel	Recall an order from the 50 orders marked as complete during the last 15 minutes and restart the timer The system shows the orders as order chits
Remote View List	Remotely view orders on another KDS Display by selecting from a list of displays that allows remote viewing
Remote View Next	Remotely view orders on the first available KDS Display by record number and then go through all KDS Displays that allow remote viewing on subsequent key presses
Remote View Specific	Remotely view orders on a specific KDS Display without having to select from a list You must enter the record number of the KDS Display that you want to remotely view from the <b>Parameters</b> field
Review	Recall an order from the 50 orders marked as complete during the last 15 minutes, without restarting the timer
Review Last	Review the last order marked as complete, without restarting the timer
Review with Panel	In chit mode, review an order from the 50 orders marked as complete in the last 15 minutes, without restarting the timer
Summary Condensed	View a consolidated list of active orders for the display station, without condiments
Select First Unstarted	Select the first order on the display that is not yet started
Summary Expanded	View a consolidated list of active orders for the display station, including condiment items
Select and Done	Mark the first order on the display as complete and remove the chit from the screen

**Table 39-8 (Cont.) KDS Bump Bar and Toolbar Functions**

Function	Description
Select Next	Select the next order on the display
Select Previous	Select the previous order on the display
Select Next Item	Select the next item on the chit
Select Next Unstarted	Select the next order that is not yet started
Select Previous Item	Select the previous item on the chit
Start and Select First Unstarted	Start the current order and select the next unstarted order
Table Detail	View table details in the Speed of Service (SOS) display for checks begun by table

**Related Topics**

- [KDS Controller](#)
- [Configuring a KDS Controller](#)
- [Configuring a KDS Display](#)
- [Configuring the KDS Bump Bar](#)
- [Configuring the KDS Toolbar](#)
- [Configuring KDS Course Overrides](#)
- [Configuring a Backup KDS Controller](#)
- [Creating a KDS Order Device](#)

## Configuring KDS Course Overrides

You can allow wait staff to override the normal delivery of a menu item's course and have the change appear on the KDS Display. For example, a guest can order an appetizer and the staff can deliver it at the same time as the other guest's entrée, making the prep staff aware of this course change through the order receipts shown on the KDS Displays.

1. Select the revenue center, click **Setup**, and then click **Order Devices**.
2. Double-click a KDS order device, and then click the **Options** tab.
3. From the KDS Options section, select **17 - Print Course Header** to include the course header on the KDS chit display.
4. Click **Save**.
5. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
6. Click the **Options** tab, and then deselect **50 - Enable Dynamic Order Mode (DOM)**.
7. Click **Save**.
8. Select the property, click **Setup**, and then click **KDS Controllers**.
9. Double-click a KDS controller, and then select **2 - Display Next Course after Previous Course Complete**.

10. Enter **2** in the **Wait for Prep Suborder** field.
11. Click **Save**.
12. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
13. Add condiment menu items for courses with the following names (or use similar names):
  - As Appetizer
  - As Entrée
14. Click **Save**.
15. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Classes**.
16. Add menu item classes for courses with the following names (or use similar names):
  - As Appetizer
  - As Entrée
17. Add condiment menu item classes to apply course name overrides as necessary.
18. For each new condiment menu item class, select the following options:
  - **2 - ON = Condiment Menu Items; OFF = Regular Menu Items**
  - **8 - Allow Menu Items in this Class to be Non-Priced**
  - **45 - Use KDS/Dining Course Number**
  - **46 - Override KDS Course Number of Parent Class**
19. Click the **General** tab, select the appropriate **KDS/Dining Course** for each menu item class, and then click **Save**.
20. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Print Classes**.
21. Create print class records that output to all appropriate KDS Displays.
22. Click **Save**.
  - [Configuring a KDS Controller](#)
  - [Configuring a KDS Display](#)
  - [Configuring the KDS Bump Bar](#)
  - [Configuring the KDS Toolbar](#)
  - [Configuring a Backup KDS Controller](#)
  - [Creating a KDS Order Device](#)

#### **Related Topics**

- [KDS Controller](#)
- [KDS Bump Bar and Toolbar Functions](#)

## Configuring a Backup KDS Controller

1. Select the property, click **Setup**, and then click **KDS Controllers**.
2. Double-click the KDS Controller for which you want to assign a backup KDS Controller.
3. Click the **Backup Service Host** tab.
4. Click the **Select** link adjacent to the **Service Host** field, select a backup service host from the list, and then click **OK**.
5. To set the backup KDS Controller to automatically take over when the primary KDS Controller is down:
  - a. Click the **General** tab.
  - b. Select **9 - Enable Backup Controller Automatic Takeover**
6. Click **Save**.
7. Select the Enterprise level, click **Configuration**, and then click **Roles**.
8. Double-click an employee role, click the **Operation** tab, and then click the **PMC Procedures** subtab.
9. Select **30057 - Backup/Restore KDS Controller**, and then click **Save**.
10. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
11. Insert a new button on the transaction page, select **Function** from the **Type** drop-down list, and then select **Restore Primary KDS**.

This touchscreen button allows workstation operators to activate the primary KDS Controller that the current revenue center is using when it comes back online, if the backup KDS Controller is currently active.
12. If you did not configure the backup KDS Controller to automatically take over for the primary KDS Controller, insert another new button on the transaction page.
  - a. Select **Function** from the **Type** drop-down list.
  - b. Select **Active Backup KDS** from the **Function** list.
13. Click **Save**.

- [Configuring a KDS Controller](#)
- [Configuring a KDS Display](#)
- [Configuring the KDS Bump Bar](#)
- [Configuring the KDS Toolbar](#)
- [Configuring KDS Course Overrides](#)
- [Creating a KDS Order Device](#)

### Related Topics

- [KDS Controller](#)
- [KDS Bump Bar and Toolbar Functions](#)

## Creating a KDS Order Device

1. Select the revenue center, click **Setup**, and then click **Order Devices**.
2. Insert an order device record for the KDS, and then double-click the record to open it.
3. On the **General** tab, select **1 - Remote** from the **Device Type** drop-down list, select **1 - KDS** from the **Primary Device Type** drop-down list, and then select the appropriate KDS Display record from the **Device** drop-down list.
4. If you have a backup printer, select it from the **Backup Device** drop-down list.

A backup device can only be configured as a printer device. A configured printer for a backup device only works for a KDS when the KDS Controller or Service Host is down; it does not work when the RDC is offline or powered off.

5. From the **Order Device Redirect** drop-down list, select the KDS order device that you created in Step 2.
6. Click the **KDS** tab, and then configure the following settings as required:

**Table 39-9 Order Devices KDS Fields**

Field	Description
Course 1 First/Second Alert Timeout	If you are using the KDS Coursing function, enter the time in seconds when course 1 items display the first alert and second alert respectively. Chits showing a first alert are shaded yellow, while the chits showing a second alert are shaded red.
Other Course First/Second Alert Timeout	If you are using the KDS Coursing function, enter the time in seconds when any course except course 1 displays the first and second alert respectively. Chits showing a first alert are shaded yellow, while the chits showing a second alert are shaded red.
Primary Runner Chit Printer	Select a printer where runner chits print when orders are bumped from the KDS device.
Backup Runner Chit Printer	Select a printer where runner chits print when orders are bumped from the KDS device if the application cannot establish communication to the primary runner chit printer.
Send To Panel	Select the panel where orders sent to this device should display. This field is only active when the order device contains two panels.



**Table 39-9 (Cont.) Order Devices KDS Fields**

Field	Description
DOM Type	Select the Dynamic Order Mode (DOM) type for the KDS Display: <ul style="list-style-type: none"> <li>• <b>Fire On Fly:</b> Items appear on the KDS immediately</li> <li>• <b>Fire On Next:</b> An item appears on the KDS after the next item is ordered</li> <li>• <b>Fire On Tender:</b> All items appear on the KDS when a workstation operator ends the current service round</li> </ul>
Add Sort Rule	Select the sorting type to use when the quantity of an item is changed. This feature is only supported with DOM.
Modify Sort Rule	Select the sorting type to use when existing items on an order are modified. This feature is only supported with DOM.
Void Sort Rule	Select the sorting type to use when an item is voided on an order. This feature is only supported with DOM.
Add Highlight Scheme	Select the color configuration to use to show items when the quantity of an item changes. For example, if 1 Hamburger is ordered initially, and then it changes to 2 Hamburgers, the item appears in the color that you configure here, indicating to the kitchen staff that the quantity has changed. This feature is only supported with DOM.
Modify Highlight Scheme	Select the color configuration to use to show items when workstation operators modify the items on the order. This feature is only supported with DOM.
Void Highlight Scheme	Select the color configuration to use to show items on orders when workstation operators void items from the order. This feature is only supported with DOM.
Beep On New Order	Select the sound type to emit when an order is received on the device. If you select <b>2 - WAV File</b> , the application uses the default WAV file set for the operating system.
Display New Order Notification	Select this option to make new orders flash when they appear on the KDS Display. This feature is not supported with DOM.
New Order Notification Timeout (seconds)	Enter the length of time in seconds that newly added items should flash on the screen. When this threshold is reached, items appear normally. This field is only active when you select <b>Display New Order Notification</b> .

**Table 39-9 (Cont.) Order Devices KDS Fields**

Field	Description
Beep On Prioritize (Increase)	Select the sound type to emit when an order is assigned a priority and also when the priority of an order is increased on the order device. If you select <b>2 - WAV File</b> the application uses the default WAV file set for the operating system.
KDS Display Backup	<p>Select the backup order device for the KDS Display. The backup order device must be another KDS Display linked to the current revenue center's KDS Controller.</p> <ul style="list-style-type: none"> <li>• If the POS client cannot communicate with the KDS Controller, orders are sent to the backup device configured on the General tab.</li> <li>• If the POS client can communicate with the KDS Controller, but the controller fails to communicate with the desired KDS Display, orders are sent to the backup order device.</li> </ul> <p>If the device has multiple panels defined, backup chits always go to panel 1 of the physical device to which the backup order device is linked.</p>

7. Click the **Options** tab, and then select the appropriate KDS Options as described in the following table:

**Table 39-10 Order Devices KDS Options**

Option	Description
1 - Enable KDS Consolidation	<p>Select this option to consolidate identical items with different modifiers onto one line, preceded by the quantity on the KDS Display.</p> <p>KDS Consolidation is not supported with DOM or with any DOM KDS chit layout style.</p>
2 - Sort Voids to Top (not DOM)	<p>Select this option to sort voided items to the top of the display.</p> <p>This feature is not supported with DOM.</p>
3 - Single Item Per Sub-Order	<p>Select this option to show every item on an order on its own chit. This option is enabled for KDS Menu Item Prep Timing.</p> <p>If you are using KDS load balancing, Oracle Hospitality recommends that you set this option for the most equal distribution of menu items.</p>
4 - Print on Prep Done	Select this option to print a runner chit when the order is marked as Done at a Prep Station. Only items from this Prep Station print.

**Table 39-10 (Cont.) Order Devices KDS Options**

Option	Description
5 - Print on Expo Done	Select this option to print a runner chit when the order is marked as Done at the Expo Station.
6 - Print on All Prep Done	Select this option to print a runner chit when an order is complete at all Prep Stations and before the order is bumped from the Expo Display.
7 - Sort by Seat	Select this option to sort check detail by seat number. Deselect this option to have items display in the order in which they were ordered.
8 - Re-sort when All Prep Done	Select this option to cause the Expo Display to re-sort a chit to the beginning of the list on the Expo Display, when all Prep Stations have marked the chit as Complete. This option only applies to Expo Displays.
9 - Display Subtotal	Select this option to cause the KDS to display the order subtotal. This feature is only supported by some DOM KDS chit layout styles.
10 - Do Not Display Voids	Select this option to remove voided items from the KDS Display. When selected, items are removed from the display as soon as they are voided. When deselected, the letter V appears next to the item that was voided. This option presumes that DOM is enabled and the item is already sent to the KDS.
11 - Display Menu Item Count	Select this option to cause the KDS to display the menu item count. This feature is only supported with DOM.
12 - No Expo Done Before Paid	Select this option to prevent KDS users from bumping an order from the Expo Display until the customer pays for the order. This feature is only supported with DOM.
13 - Unconsolidate Items After Condiment Entry	Select this option to unconsolidate multiple quantities of menu items if condiments are selected for each item. This option only works when using DOM or when <b>1 - Enable KDS Consolidation</b> is set for the order device.
14 - Multiple Condiments Per Line	Select this option to display condiments in a continuous line on each order chit. Deselect this option to print each condiment on a separate line beneath the referenced menu item. To compress the condiments into a single line, you must not print condiments in red.
15 - Display New Order Notification	Select this option to make new orders flash when they appear on the KDS Display. This feature is not supported with DOM.

**Table 39-10 (Cont.) Order Devices KDS Options**

Option	Description
16 - Expo Done Exempt	Select this option to prevent an Expo Station from marking a suborder as Done, when it is marked as Done on another Expo Station.
17 - Print Course Header	Select this option to include the course header on the KDS chit display.
18 - Do Not Consolidate	<p>Select this option to print identical items separately if they are posted separately. Deselect this option to consolidate identical items onto one line, preceded by the quantity.</p> <p>Menu items with condiments do not consolidate. Options <b>7 - Sort by Seat</b> and <b>1 - Enable KDS Consolidation</b> override this option. To disable consolidation, you must select this option and then deselect <b>1 - Enable KDS Consolidation</b></p> <p>The output format depends on the settings of <b>7 - Sort by Seat</b> and <b>18 - Do Not Consolidate</b>.</p>
19 - No Prep Done Before Paid	<p>Select this option to prevent KDS users from bumping an order from the Prep Station until the customer pays for the order.</p> <p>This feature is only supported with DOM.</p>
20 - Show Previous Course Indicator	<p>Select this option to show an icon on order chits from any course other than the first to indicate that a previous course exists for this check.</p> <p>This option is for systems using KDS Coursing functionality that have the <b>Display Next Course after Previous Course Complete</b> KDS Controller option set.</p> <p>This feature is not supported with DOM.</p>
21 - Disable Double Touch Bump	Select this option to prevent KDS users from bumping an order by touching a chit twice on the display.
26 - Bump Marked Items	<p>Select this option to allow KDS users to bump marked items and orders from this display.</p> <p>If option <b>12 - No Expo Done Before Paid</b> or <b>19 - No Prep Done Before Paid</b> is also selected, KDS users cannot bump marked items or orders until the check is paid.</p>

8. Click **Save**.

- [Configuring a KDS Controller](#)
- [Configuring a KDS Display](#)
- [Configuring the KDS Bump Bar](#)
- [Configuring the KDS Toolbar](#)

- [Configuring KDS Course Overrides](#)
- [Configuring a Backup KDS Controller](#)

**Related Topics**

- [KDS Controller](#)
- [KDS Bump Bar and Toolbar Functions](#)

## Prep Station Linking

In a typical restaurant kitchen, orders are divided and assigned to the kitchen staff, according to the preparation requirements. Hot foods are handled by one station, salads are given to another, and desserts are handled by a third. Generally, as the size of the restaurant increases, the number of Prep Stations expand and the range of menu items handled by the stations is subdivided into smaller groups. For example, in a busy steak house, hot entrée-type menu items are divided into two groups: Grill Preps (steak, burgers, chicken) and Hot Preps (soups and vegetable sides).

The process works well in establishments with a large and diverse menu. However, in a quick service restaurant (QSR), where volume is high, but the range of menu items is small, subdividing Prep Stations is not that simple. Usually, several kitchen staff will work on the same set of items.

Prep Station linking allows multiple Prep Stations to show the same orders and to be controlled by a single bump bar. When an order is received, it appears at all linked Prep Stations. When the order is marked done at the KDS client to which Prep Stations are linked and bumped from the display, the order is removed from all its linked Prep Stations simultaneously. Similarly, if an order is recalled to the Prep Station, it is recalled to all its linked order devices. All other functions are maintained at each local Prep Station.

This feature is available with Symphony version 2.9.2 and later.

**Related Topics**

- [Linking Prep Stations](#)

## Linking Prep Stations

Once a Prep Station is linked, you cannot change its display type or link it to another order device without first removing the connection.

1. Select the revenue center, click **Setup**, and then click **Order Devices**.
2. Double-click a KDS Prep Station order device record to open it, click the **KDS** tab, and then scroll down to the Links section.
3. Click **Add**, and then select a Prep Station to link from the **Linked Order Device** drop-down list.
4. Repeat Step 3 to link another Prep Station.  
You can link up to eight Prep Stations to a single order device.
5. Click **Save**.

**Related Topics**

- [Prep Station Linking](#)

## Understanding Order Receipt Layouts

You can configure the style of an order receipt (sometimes called a chit) that appears on a Kitchen Display System (KDS) Display. You can choose from a variety of layout styles to meet the customer requirements. Order receipt layouts generally fall into the categories described in the following table:

**Table 39-11 Order Receipt Layouts**

Order Receipt Layout	Description
Standard chits	These chits do not show information (for example, seats or order types). They only show menu items.
Chits with seats	These chits are used in revenue centers with seat handling.
Chits with order types	These chits are used in revenue centers with order types (for example, to distinguish between Dine-In and Take-Out orders).
Chits with seats and order types	These chits are used in revenue centers where both seat handling and order types are important to the operations.
Lists	The list views do not show individual chits. Each menu item is listed on top of the next item (similar to a spreadsheet).

### Related Topics

- [Configuring an Order Receipt Layout](#)
- [KDS Chit Layout Styles](#)
- [SEI KDS Chit Layout Styles](#)

## Configuring an Order Receipt Layout

1. Select the property, click **Setup**, and then click **KDS Displays**.
2. Click the **Display** tab.
3. From the Chit Display Options section, click the **Select** link, select the **KDS Chit Layout Style**, and then click **OK**.

To see sample chit styles, click the **Help** link.

4. From the **Serpentine Mode** drop-down list, select one of the following modes:
  - **0 - TSR:** Select this mode to arrange the KDS with the number of vertical columns set in the **Chit Columns** drop-down list.
  - **1 - Horizontal:** Select this mode to arrange the KDS with the number of horizontal rows set in the **Chit Rows** drop-down list.
  - **2 - Vertical:** Select this mode to arrange the KDS with the number of vertical columns set in the **Chit Columns** drop-down list, and using the **Chit Rows** drop-down list to set the number of rows to appear.

5. From the **Menu Item Font** drop-down list, select the font size for menu items on the KDS Display.
6. From the **Order Type Font** drop-down list, select the font size for order type text on the KDS Display.
7. Click **Save**.

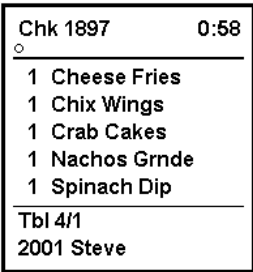
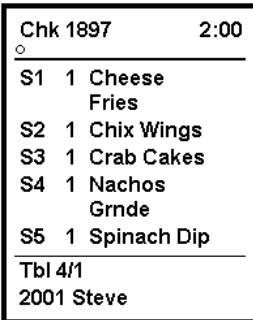
#### Related Topics

- [Understanding Order Receipt Layouts](#)
- [KDS Chit Layout Styles](#)
- [SEI KDS Chit Layout Styles](#)

## KDS Chit Layout Styles

The following table describes the chit layout styles available for standard Kitchen Display Systems:

**Table 39-12 KDS Chit Layout Styles**

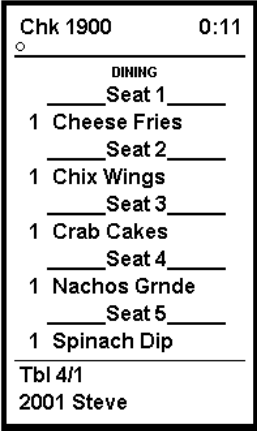

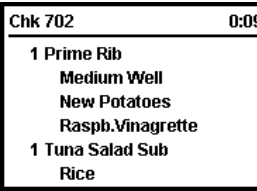
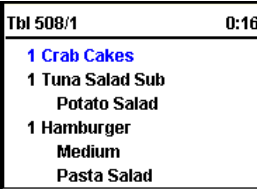
No.	Layout Name	Sample	Description
101	Standard chit	 <p>The sample shows a chit layout with a header containing 'Chk 1897' and a timer '0:58'. Below the header is a list of items: '1 Cheese Fries', '1 Chix Wings', '1 Crab Cakes', '1 Nachos Grnde', and '1 Spinach Dip'. At the bottom, there is a trailer with 'Tbl 4/1' and '2001 Steve'.</p>	<p>The body of the standard chit layout lists the ordered items relevant to the display station.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer.</p> <p>The trailer shows table/group number, employee number, and the server name.</p>
102	Chit with seat (Chit w/Seat)	 <p>The sample shows a chit layout with a header containing 'Chk 1897' and a timer '2:00'. Below the header, each item is preceded by a seat number: 'S1 1 Cheese Fries', 'S2 1 Chix Wings', 'S3 1 Crab Cakes', 'S4 1 Nachos Grnde', and 'S5 1 Spinach Dip'. At the bottom, there is a trailer with 'Tbl 4/1' and '2001 Steve'.</p>	<p>The body of this chit lists the ordered items relevant to the display station. Additionally, seat numbers show to the left of each selection.</p> <p>The header includes either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer.</p> <p>The trailer shows the table/group number, employee number, and the server name.</p>

**Table 39-12 (Cont.) KDS Chit Layout Styles**


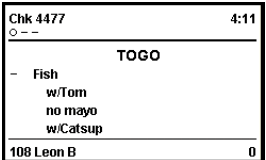
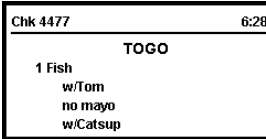
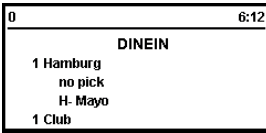
No.	Layout Name	Sample	Description
103	Chit with seat separator (Chit w/ Seat Separator)		<p>The body of this chit lists the ordered items relevant to the display station with entries grouped according to seat number.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer.</p> <p>The trailer shows the table/group number, employee number, and the server name.</p>
104	Chit with order type (Chit w/ Order Type)		<p>The body of this chit shows the order type and lists the ordered items relevant to the display station. Icons show to the left of each item to indicate its current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer.</p> <p>The trailer shows the table/group number, employee number, and the server name.</p> <p>This chit layout does not show menu items in quantities, even if the items are ordered using the quantity key.</p>
105	Chit with seat and order type (Chit w/Seat and OT)		<p>The body of this chit shows the order type and lists the ordered items relevant to the display station. Additionally, seat numbers appear to the left of each item.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer.</p> <p>The trailer shows the table/group number, employee number, and the server name.</p>



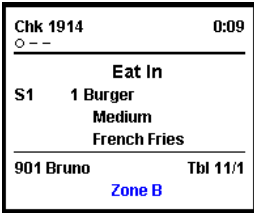
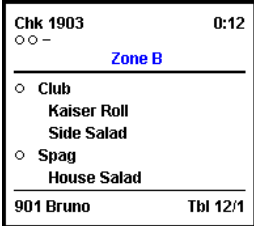
**Table 39-12 (Cont.) KDS Chit Layout Styles**

No.	Layout Name	Sample	Description
106	Chit with seat separators and order type (Chit w/Seat Sep. and OT)		<p>The body of this chit shows the order type and lists the ordered items relevant to the prep station. Additionally, entries are grouped according to the seat number.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer.</p> <p>The trailer shows the table/group number, employee number, and the server name.</p>
107	Chit with item status (Chit-Std. w/Item Status)		<p>The body of this chit lists the ordered items relevant to the display station. Additionally, icons appear to the left of each item to indicate its current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer.</p> <p>The trailer shows the table/group number, employee number, and the server name.</p> <p>This layout is only supported on Expo and SOS Displays.</p>
108	Chit header with check number (Chit-Header w/Chk)		<p>The body of this chit lists ordered items relevant to the display station.</p> <p>This layout includes a header with either the check ID (if available) or the check number on the left and an active timer on the right. The timer indicates how long the order has been in the system.</p>
109	Check header with table number (Chit-Header w/Tbl)		<p>The body of this chit lists order items relevant to the display station.</p> <p>This layout includes a header with the table number on the left and an active timer on the right. The timer indicates how long the order has been in the system.</p>

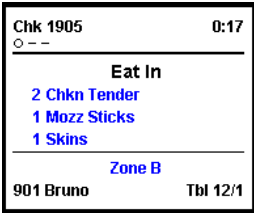
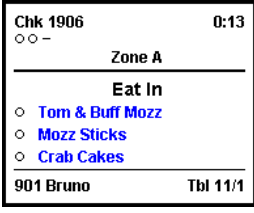
**Table 39-12 (Cont.) KDS Chit Layout Styles**

No.	Layout Name	Sample	Description
110	Items only (Chit-Items Only)		This chit layout lists only the ordered items relevant to the display station. No headers or trailers are included.
111	Chit with order type and item status (Chit-Std-OT w/Item Status)		<p>The body of this chit shows the order type and lists the ordered items relevant to the display station. Additionally, icons appear to the left of each item to indicate its current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer.</p> <p>The trailer shows the employee number, and the server name. This layout does not show menu items in quantities, even if the items are ordered using the quantity key.</p> <p>The layout is only supported on Expo and SOS Displays.</p>
112	Chit header with order type and check number (Chit-Header-OT w/ Chk)		The body of this chit shows the order type and the ordered items relevant to the display station. This layout includes a header with either the check ID (if applicable) or the check number on the left and an active timer on the right. The timer indicates how long the order has been in the system.
113	Chit header with order type and table number (Chit-Header-OT w/ Tbl)		The body of this chit shows the order type and the ordered items relevant to the display station. This layout includes a header with the table number on the left and an active timer on the right. The timer indicates how long the order has been in the system.

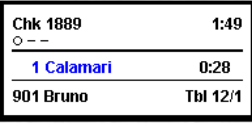

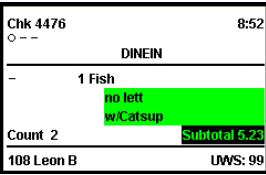
**Table 39-12 (Cont.) KDS Chit Layout Styles**

No.	Layout Name	Sample	Description
115	Standard with order type, seat numbers, and zone identifier (Chit-Std-OT-Seat-Z)	 <p>The sample shows a chit with the following content: 'Chk 1914' and '0:09' in the top right; '0--' below the check number; a horizontal line; 'Eat In' centered; 'S1' on the left, '1 Burger' in the middle, 'Medium' below it, and 'French Fries' below that; another horizontal line; '901 Bruno' on the left and 'Tbl 11/1' on the right; and 'Zone B' centered at the bottom.</p>	<p>The body of this chit shows the order type and lists the ordered items relevant to the display station. Seat numbers appear to the left of each item to identify the guest.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are also identified by icons placed beneath the timer display.</p> <p>The trailer shows the employee number, server name, and the table/group number. A zone identifier appears centered on the bottom of the chit.</p>
118	Chit with item status and zone identifier (Chit-Std w/Item Status Z)	 <p>The sample shows a chit with the following content: 'Chk 1903' and '0:12' in the top right; '0--' below the check number; 'Zone B' centered below the status icons; a horizontal line; 'Club' on the left, 'Kaiser Roll' in the middle, and 'Side Salad' below it; 'Spag' on the left, 'House Salad' in the middle; another horizontal line; '901 Bruno' on the left and 'Tbl 12/1' on the right.</p>	<p>The body of this chit lists the ordered items relevant to the display station. Additionally, icons appear to the left of each item to indicate its current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer. A zone identifier appears centered above the dividing line of the chit header.</p> <p>The trailer shows the employee number, server name, and the table/ group number. This layout is only supported on Expo and SOS Displays.</p>

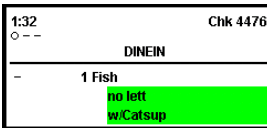
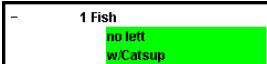
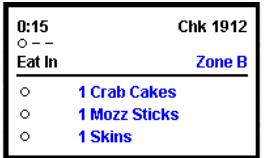
**Table 39-12 (Cont.) KDS Chit Layout Styles**

No.	Layout Name	Sample	Description
119	Chit with order type and zone identifier (Chit-Standard-OT Z)	 <p>The sample shows a chit header with 'Chk 1905' and '0:17'. Below the header, there are status icons 'o--' and a horizontal line. Under the line, it says 'Eat In'. The items listed are '2 Chkn Tender', '1 Mozz Sticks', and '1 Skins'. Below the items, there is another horizontal line, followed by 'Zone B'. The footer contains '901 Bruno' and 'Tbl 12/1'.</p>	<p>The body of this chit identifies the order type and lists the ordered items relevant to the display station. Icons appear to the left of each item to indicate its current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer.</p> <p>The trailer shows a centered zone identifier, followed by the employee number, server name, and the table/group number.</p>
120	Chit with order type, item status, and zone identifier (Chit-Std-OT w/Item Status Z)	 <p>The sample shows a chit header with 'Chk 1906' and '0:13'. Below the header, there are status icons 'oo--' and a horizontal line. Under the line, it says 'Zone A'. Below that, it says 'Eat In'. The items listed are 'Tom &amp; Buff Mozz', 'Mozz Sticks', and 'Crab Cakes', each preceded by a status icon 'o'. Below the items, there is another horizontal line. The footer contains '901 Bruno' and 'Tbl 11/1'.</p>	<p>The body of this chit identifies the order type and lists the ordered items relevant to the display station. Additionally, icons appear to the left of each item to indicate its current status.</p> <p>The header shows the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer. A zone identifier appears centered above the dividing line of the chit header.</p> <p>The trailer shows the employee number, server name, and the table/group number. This chit layout does not show menu items in quantities, even if the items are ordered using the quantity key.</p> <p>This layout is only supported on Expo and SOS Displays. The layout does not appear properly if consolidation is used. To use this layout, deselect KDS option <b>1 – Enable KDS Consolidation</b> and select option <b>18 - Do Not Consolidate</b> from the Order Devices module.</p>

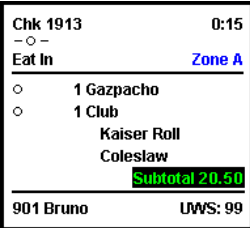
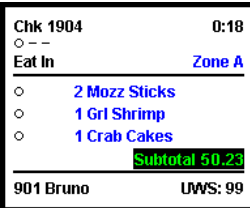
**Table 39-12 (Cont.) KDS Chit Layout Styles**

No.	Layout Name	Sample	Description
121	Standard with cook time (Chit-Standard Cook Time)		<p>The body of this chit lists the ordered items relevant to the display station. A cook timer appears to the right of a parent menu item, after that item is started.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor their progress. VIP orders, rush orders, and so on, are identified by icons placed beneath the timer display.</p> <p>The trailer shows the employee number, server name, and the table/group number.</p>
122	Items only with cook time (Chit-Items Only Cook Time)		<p>This chit lists only the ordered items relevant to the display station. A cook timer appears for each parent menu item, after that item is started. No headers or trailers are shown.</p>
301	Standard DOM (Chit-Std-DOM)		<p>The body of this chit lists the ordered items relevant to the display station. Icons appear to the left of each item to indicate current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer.</p> <p>This chit shows the item count and subtotal amount above the dividing line of the chit trailer. The trailer shows the employee number, server name, and the workstation number.</p> <p>This layout is recommended for Expo Displays.</p>

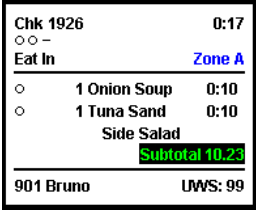
**Table 39-12 (Cont.) KDS Chit Layout Styles**

No.	Layout Name	Sample	Description
302	Standard DOM 2 (Chit-Std-DOM2)		<p>The body of this chit lists the ordered items relevant to the display station. Icons appear to the left of each item to indicate current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper right corner) and an active timer to indicate how long the order has been in the system (upper left corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor progress. VIP orders, rush orders, and so on, are identified by icons beneath the timer.</p> <p>This layout is recommended for Expo Displays.</p>
303	Standard DOM 3 (Chit-Std-DOM3)		<p>The body of this chit lists the ordered items relevant to the display station. Icons appear to the left of each item to indicate current status. No headers or trailers are shown.</p>
304	Standard DOM 2 with order type and zone (Chit-Std-DOM2-OT-Z)		<p>The body of this chit lists the ordered items relevant to the display station. Icons appear to the left of each item to indicate current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system appear beneath the check number to monitor progress. The check's order type is listed below the header. If applicable, VIP orders, rush orders, and so on are identified by icons beneath the timer. A zone identifier appears beneath the VIP orders.</p> <p>This layout is recommended for Expo Displays.</p>

**Table 39-12 (Cont.) KDS Chit Layout Styles**

No.	Layout Name	Sample	Description
305	Standard DOM with order type and zone (Chit-DOM-OT-Z)		<p>The body of this chit lists the ordered items relevant to the display station. Icons appear to the left of each item to indicate current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor progress. The check's order type appears beneath suborders. If applicable, VIP orders, rush orders, and so on, are identified by icons beneath the timer. A zone identifier appears beneath the VIP orders.</p> <p>This chit shows the subtotal amount above the dividing line of the chit trailer. The trailer shows the employee number, server name, and the workstation number.</p>
315	Standard DOM with zone identifier (Chit-Std-DOM Z)		<p>The body of this chit lists the ordered items relevant to the display station. Icons appear to the left of each item to indicate current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor progress. The check's order type appears beneath suborders. If applicable, VIP orders, rush orders, and so on, are identified by icons beneath the timer. A zone identifier appears beneath the VIP orders.</p> <p>This chit shows the subtotal amount above the dividing line of the chit trailer. The trailer shows the employee number, server name, and the workstation number.</p> <p>This layout is recommended for Expo workstations</p>

**Table 39-12 (Cont.) KDS Chit Layout Styles**

No.	Layout Name	Sample	Description
317	DOM with order type, zone, and cook time (Chit-DOM-OT-Z Cook Time)		<p>The body of this chit lists the ordered items relevant to the display station. Icons appear to the left of each item to indicate current status. A cook timer appears to the right of each parent menu item, after that item is started.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). If there are suborders at other Prep Stations, status icons (one per suborder) appear beneath the check number to monitor progress. The check's order type appears beneath suborders. If applicable, VIP orders, rush orders, and so on, are identified by icons placed beneath the timer. A zone identifier appears beneath the VIP orders.</p> <p>This chit shows the subtotal amount above the dividing line of the chit trailer. The trailer shows the employee number, server name, and the workstation number.</p> <p>This layout is recommended for Expo Displays.</p>

- [SEI KDS Chit Layout Styles](#)

**Related Topics**

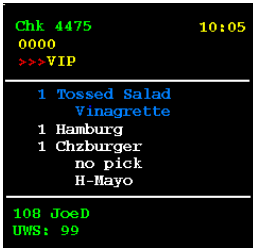

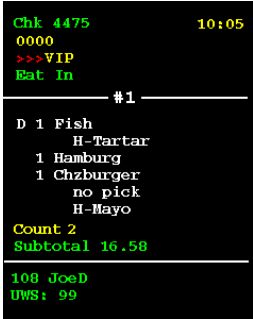
- [Understanding Order Receipt Layouts](#)
- [Configuring an Order Receipt Layout](#)

## SEI KDS Chit Layout Styles


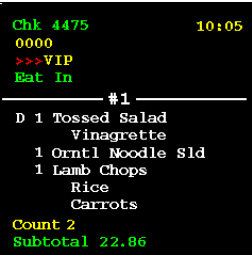

The following table describes the chit layout styles available for Select Electronics, Inc. (SEI) Kitchen Display Systems:



**Table 39-13 SEI KDS Chit Layout Styles**

No.	Layout Name	Sample	Description
501	SE standard	 <pre> Chk 4475          10:05 0000 &gt;&gt;&gt;VIP ----- 1 Tossed Salad   Vinagrette 1 Hamburg 1 Chzburger   no pick   H-Mayo ----- 108 JoeD UWS: 99           </pre>	<p>The body of this chit layout lists the ordered items relevant to the display station.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). The timer status is indicated by color:</p> <ul style="list-style-type: none"> <li>White: Normal</li> <li>Yellow: Alert 1 has been reached</li> <li>Blinking red: Alert 2 has been reached</li> </ul> <p>If there are suborders at other Prep Stations, status markers (one per suborder) appear beneath the check number to monitor progress. Markers for VIP, rush, and so on appear in a row beneath the prep status.</p> <p>The trailer shows the server name, employee number, and the workstation or table number.</p>
502	SE standard with order type (SE-Standard-OT)	 <pre> Chk 4475          10:05 0000 &gt;&gt;&gt;VIP ----- Eat In D 1 Fish   H-Tartar 1 Hamburg 1 Chzburger   no pick   H-Mayo           </pre>	<p>The body of this chit shows the order type and lists the ordered items relevant to the display station. Markers appear to the left of each item to indicate current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). The timer status is indicated by color:</p> <ul style="list-style-type: none"> <li>White: Normal</li> <li>Yellow: Alert 1 has been reached</li> <li>Blinking red: Alert 2 has been reached</li> </ul> <p>If there are suborders at other Prep Stations, status markers (one per suborder) appear beneath the check number to monitor progress. Markers for VIP, rush, and so on appear in a row beneath the prep status.</p> <p>This layout does not show menu items in quantities, even if the items are ordered using the quantity key.</p>
601	SE standard DOM 4 (SE-Std-DOM-4)	 <pre> Chk 4475          10:05 0000 &gt;&gt;&gt;VIP Eat In ----- #1 ----- D 1 Fish   H-Tartar 1 Hamburg 1 Chzburger   no pick   H-Mayo Count 2 Subtotal 16.58 ----- 108 JoeD UWS: 99           </pre>	<p>Dynamic Order Mode 4 is identical to DOM 1, except that it includes an order queue number in the first divider line. This number identifies a chit when using the Order Number Done feature.</p> <p>The trailer shows the item count, subtotal amount, server name, employee number, and the workstation or table number.</p>

**Table 39-13 (Cont.) SEI KDS Chit Layout Styles**

No.	Layout Name	Sample	Description
602	SE standard DOM 1 (SE-Std- DOM-1)		<p>The body of this chit lists the ordered items relevant to the display station. Markers appear to the left of each item to indicate current status.</p> <p>The header shows either the check ID (if available) or the Check Number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). The timer status is indicated by color:</p> <ul style="list-style-type: none"> <li>• White: Normal</li> <li>• Yellow: Alert 1 has been reached</li> <li>• Blinking red: Alert 2 has been reached</li> </ul> <p>If there are suborders at other Prep Stations, status markers (one per suborder) appear beneath the check number to monitor progress. Markers for VIP, rush, and so on appear in a row beneath the prep status.</p> <p>The trailer shows the item count, subtotal amount, server name, employee number, and the workstation or table number.</p>
603	SE standard DOM 5 (SE-Std- DOM-5)		<p>Dynamic Order Mode 5 is identical to DOM 2, except that it includes an order queue number in the first divider line. This number identifies a chit when using the Order Number Done feature.</p> <p>The trailer shows the item count and subtotal amount.</p>
604	SE standard DOM 2 (SE-Std- DOM-2)		<p>The body of this chit lists the ordered items relevant to the display station. Markers appear to the left of each item to indicate current status.</p> <p>The header shows either the check ID (if available) or the check number of the order (upper left corner) and an active timer to indicate how long the order has been in the system (upper right corner). The timer status is indicated by color:</p> <ul style="list-style-type: none"> <li>• White: Normal</li> <li>• Yellow: Alert 1 has been reached</li> <li>• Blinking red: Alert 2 has been reached</li> </ul> <p>If there are suborders at other prep stations, status markers (one per suborder) appear beneath the check number to monitor progress. Markers for VIP, rush, and so on appear in a row beneath the prep status.</p> <p>The trailer shows the item count and subtotal amount.</p>

**Table 39-13 (Cont.) SEI KDS Chit Layout Styles**

No.	Layout Name	Sample	Description
605	SE standard DOM 3 (SE-Std- DOM-3)	<pre>1 Fish   no lett   w/Catsup 1 Club   no tom</pre>	The body of this chit lists the ordered items relevant to the display station. No headers, trailers, or status markers are shown.
606	SE standard DOM 6 (SE-Std- DOM-6)	<pre>-----#1----- 1 Fish   no lett   w/Catsup 1 Club   no tom</pre>	Dynamic Order Mode 6 is identical to DOM 3, except that it includes an order queue number in the top divider line. This number identifies a chit when using the Select and Done feature.  No headers, trailers, or status markers are shown.

- [KDS Chit Layout Styles](#)

**Related Topics**

- [Understanding Order Receipt Layouts](#)
- [Configuring an Order Receipt Layout](#)

## KDS Load Balancing

KDS load balancing helps the kitchen to better manage orders by automatically routing new orders to KDS Prep Stations with the least number of active items. This feature also allows the kitchen staff to manually:

- Push orders to other Prep Stations
- Take orders from other Prep Stations

Prep Stations are assigned to distribution groups and orders route to the Prep Station with the fewest items within that distribution group. Similarly, kitchen staff can only push and pull orders from Prep Stations belonging to the same distribution group.

To achieve the most equal distribution of menu items, Oracle Hospitality recommends configuring the KDS to show every item for an order on its own chit.

Setting up KDS load balancing consists of completing the following tasks:

1. Enabling KDS load balancing. See [Configuring a KDS Controller](#) for more information on enabling KDS load balancing.
2. [Creating KDS Distribution Groups](#)
3. [Assigning a KDS Display to a Distribution Group](#)
4. [Configuring the KDS Toolbar](#) or [Configuring the KDS Bump Bar](#)

- [KDS Controller](#)

**Related Topics**

- [Configuring a KDS Controller](#)
- [Creating KDS Distribution Groups](#)

- [Assigning a KDS Prep Display to a Distribution Group](#)
- [Configuring the KDS Bump Bar](#)
- [Configuring the KDS Toolbar](#)

## Creating KDS Distribution Groups

1. Select the revenue center, click **Setup**, and then click **KDS Distribution Groups**.
2. Insert a record, and then double-click to open it.
3. From the **Order Devices List**, select the KDS Prep Displays that belong to the distribution group.
4. Click **Save**.

### Related Topics

- [KDS Controller](#)
- [KDS Load Balancing](#)

## Assigning a KDS Prep Display to a Distribution Group

1. Select the revenue center, click **Setup**, and then click **Order Devices**.
2. Double-click the KDS record to assign to a distribution group.
3. Select the **Primary Distribution Group** for the KDS record.
4. Click **Save**.

### Related Topics

- [KDS Controller](#)
- [KDS Load Balancing](#)

## Kitchen Themes

During the business day, a restaurant can open and close portions of the facility to accommodate the changing needs of its customers and trade. For example, restaurants commonly close a portion of the seats during mid-morning hours that are normally filled during the breakfast and lunch time rushes. Similarly, the bar can close at lunch time, but open in the evening for happy hour and dinner. The number of employees required during the day varies with the amount of customers and as sections or revenue centers (for example, bars, retail shops, drive-thru) open and close. The number of workstations, printers, and other peripheral devices used also changes. The manager must determine order device activity levels and time frames. If the restaurant is large, it is cumbersome to implement the changes.

Kitchen themes speeds the transition phase between shifts or active periods by storing common sets of order device configurations in a separate table in the database. Each data set or theme is assigned a name for easy identification (for example, Breakfast Theme, Lunch Theme, Dinner Theme, Happy Hour, Corporate Banquets, or Private Banquets). When a change is required, managers can change the order direction and output of the entire restaurant by activating a new theme. The system automatically copies the new settings to the appropriate device and reloads the database.

The main benefits of the kitchen themes feature are:

- **Efficiency:** Simple and direct re-configuration of restaurant devices, saving time
- **Accuracy:** Reduces the amount of error caused by manual re-configuration
- **Variety:** No limits to the number of themes you can store
- **Flexibility:** You control when the configuration changes
- **Consistency:** Repeatable results

#### Related Topics

- [Configuring Employee Privileges for Kitchen Themes](#)
- [Creating Kitchen Themes](#)
- [Importing Current Settings to a Kitchen Theme](#)
- [Creating a Kitchen Theme Period](#)
- [Changing the Appearance of Workstations and KDS Displays](#)

## Workstation Alerts for Unsuccessful Sending to Order Devices

You can enable alerts to notify workstation operators when menu items fail to send to an order device/KDS or kitchen printer. The unsuccessful sending of items can occur:

- When POS client tablet devices lose wireless network connection. The workstation operator can return to the range of Wi-Fi coverage to ensure that items are sent to the order device/KDS.
- When the kitchen printer runs out of paper. The workstation operator can add a paper roll to the printer.
- When the KDS Controller or Print Controller is powered off. The workstation operator can start the KDS/Print Controller.

A flashing **Alerts** button appears on the POS client device only when the system does not receive confirmation that an order was successfully sent to an order device/KDS. The workstation operator must then confirm that the items did not reach the kitchen, and notify the kitchen of the items that were not successfully sent.

The alert notification ensures that orders do not get lost or duplicated, the server can continue to take orders, and the order is sent or printed as soon as possible.

Workstation alerts do not appear on the POS client:

- When redirects or backups are configured for the KDS Controller or Print Controller. Alerts will appear if the backup or redirect order devices are down.
- When the Restaurant Display Controller (RDC) of the KDS is offline or powered off.
- When Dynamic Order Mode (DOM) is enabled and the **DOM Type** is set to **Fire On Fly** or **Fire On Next**. When DOM is enabled and the **DOM Type** is set to **Fire On Tender**, alerts will appear when tendered. [Creating a KDS Order Device](#) contains more information on the **DOM Type** configuration.
- For Timed Fire and AutoFire items. Alerts appear for these two types when the order is fired.

### Related Topics

- [Enabling Workstation Alerts](#)

## Enabling Workstation Alerts

1. Select the property, click **Setup**, and then click **Property Parameters**.
2. On the **Options** tab, select **53 - Enable Workstation Alerting**.
3. Click **Save**.
4. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
5. To configure the **Alerts** function key:
  - a. Open the transaction page, and then click either the top status bar or the bottom status bar.
  - b. Select **Enable Alerts** in the left pane. A red **Alerts** function key appears on the selected status bar.

If the Property Parameters option **53 - Enable Workstation Alerting** is deselected, alerts will not appear in the POS client when an order fails to send to an order device. In addition, the **Alerts** function key is not visible in the POS client.

If necessary, repeat Steps 5-a and 5-b to enable the **Alerts** key for the other status bar.
6. To configure the **Show Checks With Failed Prints To KDS/Order Device** function key:
  - a. Open the page on which to place the **Show Checks With Failed Prints To KDS/Order Device** key.
  - b. On the **Edit** tab, select the page area in which to define the function key.
  - c. Click **Button**.
  - d. On the **General** subtab, enter the function key name in the **Legend** field.
  - e. Select **Function** from the **Type** drop-down list.
  - f. Click the black arrow directly beneath the **Type** drop-down list, enter **Order Device** in the **Name** field, select **Order Device**, select **Show Checks With Failed Prints To KDS/Order Device**, and then click **OK**.
7. Click **Save**.

### Related Topics

- [Workstation Alerts for Unsuccessful Sending to Order Devices](#)

## Configuring Employee Privileges for Kitchen Themes

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **PMC Procedures** subtab.
3. Select **30054 - Set Active Kitchen Themes**.

4. Click **Save**.

- [Creating Kitchen Themes](#)
- [Importing Current Settings to a Kitchen Theme](#)
- [Creating a Kitchen Theme Period](#)
- [Changing the Appearance of Workstations and KDS Displays](#)

**Related Topics**

- [Kitchen Themes](#)

## Creating Kitchen Themes

Revenue centers that share KDS Displays must set the same kitchen themes for each revenue center.

1. Select the property, click **Setup**, and then click **Kitchen Themes**.
2. Insert a new kitchen theme record, and then double-click the new record to open it in form view.
3. On the **General** tab, select the revenue center types to which the kitchen theme applies.

A kitchen theme becomes available in revenue centers only when the following conditions exist:

- The **RVC Type** is selected for the kitchen theme.
  - The same **RVC Type** is assigned for the revenue center where a transaction is taking place.
4. Click the **Workstation** tab, and then configure the appropriate workstation order devices for the kitchen theme:
    - a. When all workstations in the revenue center are active for the theme, click the **Add All** link.
    - b. When specific workstations are active for the theme, click the **Add** link, click the ellipsis point (...) button in the Workstation column, and then select the workstation.
    - c. For each workstation, click the ellipsis point (...) button in the Order Devices column, and then select the order devices that are accessible for the workstation when the theme is active.
  5. Click the **KDS Client** tab, and then select the KDS Displays that are active for the kitchen theme:
    - a. When all KDS Displays in the revenue center are active for the theme, click the **Add All** link.
    - b. When specific KDS Displays are active for the theme, click the **Add** link, click the ellipsis point (...) button in the KDS Display column, and then select the KDS Display.
    - c. Select the following details:
      - **Tool Bar**: Select the tool bar to use.
      - **Bumpbar Layout**: Select the bump bar layout to use.

- **Panels:** Select the number of panels or logical monitors for the KDS station when the kitchen theme is active.
  - **Panel Layout:** If the KDS station has 2 panels, select the panel appearance.
  - **Serpentine Mode:** Select the order flow on the KDS station when the kitchen theme is active.
- d. Repeat Step 5-c for all KDS Displays associated with the kitchen theme.
6. Click the **Order Device** tab, select the revenue center, and then configure the order device settings for the revenue centers associated with the kitchen theme.
- The same settings that are in the Order Devices module appear here. For field and option descriptions, see [Creating a KDS Order Device](#).
7. Click the **Order Type** tab, select the revenue center, and then select the order devices for each order type when the kitchen theme is active.
8. Click **Save**.
- [Configuring Employee Privileges for Kitchen Themes](#)
  - [Importing Current Settings to a Kitchen Theme](#)
  - [Creating a Kitchen Theme Period](#)
  - [Changing the Appearance of Workstations and KDS Displays](#)

#### Related Topics

- [Kitchen Themes](#)

## Importing Current Settings to a Kitchen Theme

You can import existing configuration information to a kitchen theme record.

1. Select the property, click **Setup**, and then click **Kitchen Themes**.
  2. In table view, right-click the record to which you want to import the settings, and then select **Import Current Settings to Kitchen Theme**.
  3. Change the settings as appropriate, and then click **Save**.
- [Configuring Employee Privileges for Kitchen Themes](#)
  - [Creating Kitchen Themes](#)
  - [Creating a Kitchen Theme Period](#)
  - [Changing the Appearance of Workstations and KDS Displays](#)

#### Related Topics

- [Kitchen Themes](#)

## Creating a Kitchen Theme Period

1. Select the revenue center, click **Configuration**, and then click **Kitchen Theme Period**.
2. Insert a new kitchen theme period record, and then double-click the record to open it in form view.



3. Select the appropriate **Kitchen Theme** for this period, or select **0 - None** to use the default configuration.
4. Click the **Effectivity** tab.
5. (Optional) Select the **Start Date** and the **End Date** for the kitchen theme.

When both the **Start Date** and **End Date** are disabled, the record is considered active.

6. Select on which days of the week the kitchen theme is active, and then select the **Active Start Time** and the **Active End Time** for the theme.

Only one kitchen theme can be active at a time. Do not overlap the **Active Start Time** and **Active End Time** settings.

When both the **Active Start Time** and **Active End Time** are disabled, the record is considered active all day. When the **Active Start Time** is disabled, the record is considered active from midnight. When the **Active End Time** is disabled, the record is considered active until midnight the next day.

7. Click **Save**.

- [Configuring Employee Privileges for Kitchen Themes](#)
- [Creating Kitchen Themes](#)
- [Importing Current Settings to a Kitchen Theme](#)
- [Changing the Appearance of Workstations and KDS Displays](#)

#### Related Topics

- [Kitchen Themes](#)

## Changing the Appearance of Workstations and KDS Displays

1. Select the Enterprise, property, or zone, click **Configuration**, and then click **Theme Assignment**.
2. Change the following settings:
  - **Default Theme:** Select the default theme for the workstation.
  - **Default Palette:** If you selected **Edge** as the **Default Theme**, select the color palette for the theme.
  - **Default Kitchen Display Theme:** Select the theme for the KDS.
3. Click **Save**.

- [Configuring Function Keys](#)
- [Configuring Macros](#)

#### Related Topics

- [Understanding Page Design](#)
- [Configuring Employee Privileges for Kitchen Themes](#)
- [Creating Kitchen Themes](#)

- [Importing Current Settings to a Kitchen Theme](#)
- [Creating a Kitchen Theme Period](#)

#### Related Topics

- [Kitchen Themes](#)

## Upgrading the RDC Order Device

You might need to upgrade the Restaurant Display Controller (RDC) in order to run Kitchen Display System (KDS) version 2.1. This is available with Symphony version 2.3 and later.

There are two RDC models (GX and LX) and each model has a different platform. The part number on the RDC indicates the model. The RDC Platform Update is version 4.2.2.0 and it can automatically identify which model of RDC is being used and install the correct files.

Upgrading an order device consists of completing the following tasks:

- Upgrading the operating system to the required platform
- Resetting factory settings
- Installing the KDS Client

#### Related Topics

- [Upgrading the RDC Operating System](#)
- [Resetting the RDC Factory Settings](#)
- [Installing the KDS Client](#)

## Upgrading the RDC Operating System

The RDCPlatformUpdate.zip file consists of two self-extracting files that you need to execute on an existing CAL server.

### 1. Run the **CALClientUpdate(4.1.3.66).exe**.

This is a self-extracting file that contains the updated CAL client for both RDC models (GX and LX). This executable file creates the CAL package on the CAL server to deploy the CAL client to the RDC.

This is the same version of CAL client that ships with newer RDCs, so you may notice that the CAL package does not appear to update some RDCs.

### 2. Run the **ClientOSUpdate(4.2.2.0).exe**. Each of these CAL packages restarts the RDC several times during the update.

This is a self-extracting file that contains the updated RDC operating system image for both RDC models (GX and LX). This executable file creates the CAL package on the CAL server to deploy the operating system update to the RDC.

- [Resetting the RDC Factory Settings](#)
- [Installing the KDS Client](#)

#### Related Topics

- [Upgrading the RDC Order Device](#)

## Resetting the RDC Factory Settings

Previous configuration data on the device might interfere with the new platform and software. To facilitate the best possible upgrade, return the unit to the factory settings prior to loading the new KDS software.

1. From the RDC, click **Start**, click **Settings**, and then click **Control Panel**.
2. Click the **Default Settings** tab.
3. Select the **Reset to Default Settings** option, and then click **Yes**.
4. Save the settings. The device restarts after resetting the configuration.
5. Set the current date and time on the unit.

If the date and time on the unit do not match that of the server, the CAL software does not work properly. Typically, the property list fails to load when these values are not correct.

6. Set the Internet Protocol (IP) address of the RDC to be a static value that works on the network. Some units cannot pick up a Dynamic Host Configuration Protocol (DHCP) issued IP address after the upgrade.
  - a. To test the network configuration, open Microsoft Internet Explorer on the RDC.
  - b. Enter the URL for the Symphony Egateway service that is hosting the CAL server (for example, `http://[http://:8050/egateway/egateway.asmx]`). If you can access this URL, the network is ready to connect to the server.

The unit does not require Domain Name System (DNS) or Windows Internet Name Service (WINS) entries.

- [Upgrading the RDC Operating System](#)
- [Installing the KDS Client](#)

### Related Topics

- [Upgrading the RDC Order Device](#)

## Installing the KDS Client

Follow the KDS instructions to install and configure the KDS client software.

1. If you type with a keyboard and nothing appears in the fields, press the **F12** key and try again.
2. When selecting the Restaurant Display Controller (RDC) from the list:
  - a. Ensure that the **Automatic DHCP Address** is turned off.
  - b. Ensure that there are values in the **Netmask** and **Default Gateway** fields.
  - c. Ignore the value in the **Select Product to Install on Workstation** field.

- [Upgrading the RDC Operating System](#)
- [Resetting the RDC Factory Settings](#)

### Related Topics

- [Upgrading the RDC Order Device](#)

## CAL Installation Prerequisites for KDS

Beginning with Symphony version 2.9.1, KDS Displays must have an authenticated identity. If you are using KDS environments with Symphony versions 2.9 and earlier, you must perform CAL authentication before upgrading to Symphony version 2.9.1. You must enter your logon credentials during the initial authentication process.

Before installing CAL on KDS Displays, perform the following functions:

- Connect a USB keyboard to the KDS Display.
- Assign the employee privilege to download software, install and authenticate clients and Service Hosts using CAL. Beginning with Symphony version 2.9.1 (which includes CAL version 139), users must have the employee privilege assigned to the appropriate role to successfully authenticate workstations, Android devices, and Kitchen Display Systems (KDS). EMC users do not automatically acquire this privilege during an upgrade to version 2.9.1. After installing or upgrading to Symphony version 2.9.1, you must assign the privilege to a user's role. When the Role option is set, employees can use their EMC logon credentials when CAL'ing devices. See [Allowing Employees to Install and Authenticate POS Clients and Service Hosts](#) for instructions to assign the privilege.
- Set the CAL deployment schedule. See [Configuring the Deployment Schedule to Install CAL on KDS](#) for instructions.

## Allowing Employees to Install and Authenticate POS Clients and Service Hosts

Beginning with Symphony version 2.9.1 and later, you must allow employees to download software, install, and authenticate clients and service hosts using CAL version 139. When this privilege is granted, the User Security Credentials configured in the Property Parameters module become inactive, allowing employees to use their EMC login credentials when setting up POS clients.

1. Select the Enterprise, click **Configuration**, and then click **Roles**.
  2. Double-click an employee role.
  3. Click the **Operations** tab, click the **Miscellaneous** subtab, and then select **10065 - Download Software, Install and Authenticate Clients and Service Hosts Using CAL**.
  4. Click **Save**.
- [Installing the CAL Client on the Windows Device](#)
  - [Initiating CAL Authentication on the Windows Device](#)

## Configuring the Deployment Schedule to Install CAL on KDS

1. Select the Enterprise, click **Setup**, and then click **CAL Packages**.

2. Expand **WS KDS Display** from the left pane, and then select the latest KDS CAL package.
3. Click the **Deployment Schedule** tab, and then click **Add Deployment**.
4. Select **1- Property/ Enterprise** as the **Deployment Type**, select a **Property**, and then select **0 - Install** as the **Action to Take**.
5. If the property has Microsoft Windows 32 clients that are not configured as KDS Displays:
  - a. Click **Add Deployment** again, and then select **2 - Specific Service Host** as the **Deployment Type**.
  - b. In the Service Host column, click the ellipsis (...) point button, select a Microsoft Windows 32 workstation client that is not a KDS Display, and then click **OK**.
  - c. Select **1 - Skip** as the **Action to Take**.
  - d. Repeat Steps 5-a through 5-c for all Microsoft Windows 32 clients that are not KDS Displays.
6. Click **Save**.

## Installing CAL on the KDS

To initiate CAL authentication on a KDS Display:

1. On the KDS Display, press **Start**, select **All Programs**, select **Micros Client Application Loader**, and then select **McrsCAL Config**.
2. Decipher and enter the correct access code, and then press the **Configure CAL** button.

Figure 39-1 MICROS CAL Screen



3. In the Enter CAL Server dialog, set the following values, and then press **Next**:
  - **Server Name**: Leave this field blank.
  - **Server IP/URL**: Leave this field blank.

- **POS Type:** Oracle recommends that you select **MICROS Symphony** (not **Simphony Multi-Tenant**), regardless of running on a Simphony Standard or Premium Cloud Service environment.
- **CAL Enabled:** Select this option if it is not automatically set by default.
- **Secure Connection:** Select this option if Simphony uses the Translation Layer Security (TLS) 1.2 Encryption protocol. (If you are installing CAL version 139 or later, this option is set by default.)
- **Server:** Enter your Simphony application server name as a fully qualified domain name (FQDN) using the USB keyboard attached to the KDS Display. For example, if the server name is abc2012app1, you need to enter the following: abc2012app1.[hostname].[domain].com.

If you are using static IP addresses, the KDS display network card will need to be updated with a DNS server entry.

- **OrgPa:** If you are installing CAL version 139 in a Simphony Standard or Premium Cloud Service environment, do not enter anything, regardless of which **POS Type** is set.
- **Port:** Enter your port number. Enter 443 if Simphony uses the TLS 1.2 Encryption protocol. (This is the default port number and is configurable at the Enterprise.) Other examples are 8443 or 9443.

CAL version 139 only supports CAL authentication on HTTPS with TLS 1.1/1.2 encryption. Entering `HTTP` or `8080` for the port will result in an installation issue.

- **Update:** Click the **Update** button to automatically fill the **Server Name** and **Server IP/URL** fields after the application server name is resolved and recognized. You are now required to use an HTTPS secure connection in your Server URL.

4. Beginning with Simphony version 2.9.1, if you are installed on a Simphony Standard or Premium Cloud Service environment, CAL prompts you to enter your Simphony EMC logon credentials. Enter your **User** name, **Password**, and **Organization** name in the CAL Authentication dialog, and then press the **Login** button. If you are using Simphony (licensed) (on premises, self-hosted), you do not need to enter the **Organization**.

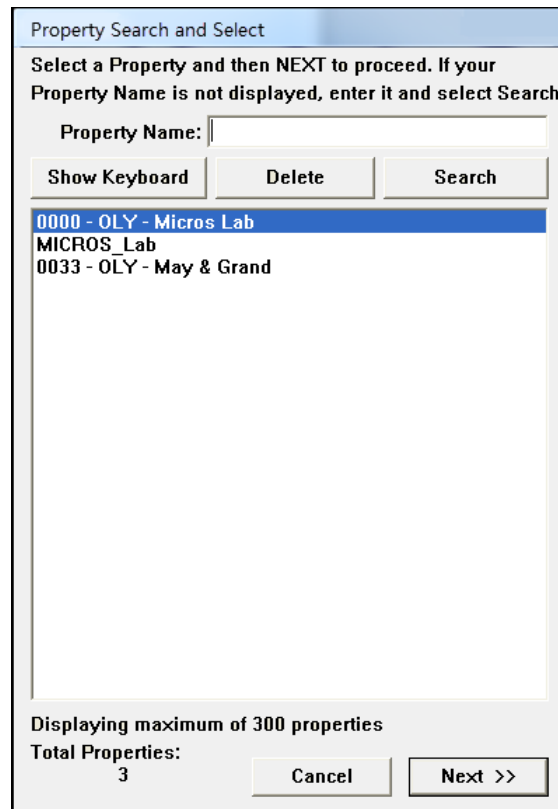
If you are using Simphony version 2.9 or earlier, you must enter the **Install User Security Username** and **Password** configured in the Security tab of the Property Parameters module in the EMC. Contact your system administrator for assistance.

5. If the Enterprise has multiple properties, select the property from the Property Search and Select dialog, and then press **Next**.

If the property does not appear in the list, enter the property name in the **Property Name** field, and then press **Search**.

You do not see a property list if only one property is configured or if there are multiple properties, but only one property is using workstations.

Figure 39-2 Property Search and Select Dialog



6. In the Select WS Identity dialog, select the workstation from the **Select Workstation ID** drop-down list, and then press the **Save** button. CAL automatically performs the initial authentication using the cached EMC credentials. Each workstation must use a unique Service Host ID. If two workstations use the same Service Host ID, the first one authenticated will lose authentication when the second is authenticated.

Figure 39-3 Select Workstation Dialog

ORACLE | MICROS CAL - Select WS Identity

**Workstation Identity**

UWS Name: 25KLB-2015

IP Address: 172.23.2.178

Net Mask: 255.255.248.0

Def. Gateway: 172.23.0.1

Automatic DHCP Configuration

**Application Root**

C:\Micros\Simphony\

**Select Workstation ID**

144

**Service Host ID**

157

Show Service Hosts

Show KDS

**Available Workstation List:**

UWS Name	IP Addr	InU...	WS I	SH Id
25Matt-WS5	AUTO-DHCP	N	401	417
25CEWS5-01	AUTO-DHCP	N	381	397
25SG-win32	AUTO-DHCP	N	403	419
25Stan-WS5	AUTO-DHCP	N	402	418
SBKLBKDS1	172.23.1.209	N	461	477
wskdsd	172.23.1.209	N	2	0
WSKSDdisplay	AUTO-DHCP	N	63	0
DinningRoomw...	AUTO-DHCP	N	22	0
Beaches café ws	AUTO-DHCP	N	65	0

Show Keyboard Cancel Save Find

When CAL restarts it performs a re-authentication, and may prompt for credentials again. After validation, the POS client application starts and workstation operators can resume normal KDS Display functions.



# Peripheral Devices

Peripheral devices connect with and relay information to or from Symphony. For example, common POS peripheral devices include magnetic card readers, cash drawers, coin dispensers, printers, pole displays, and scales.

- [Assigning and Unassigning a Cash Drawer](#)
- [Configuring a Cash Drawer](#)
- [Coin Dispenser](#)
- [Configuring a Coin Dispenser](#)
- [Magnetic Stripe Reader](#)
- [Installing the MSR Sleeve for Oracle MICROS Tablet E-Series 8-Inch and 11-Inch Devices](#)
- [Configuring a Magnetic Stripe Reader](#)
- [Testing the MSR Sleeve for Oracle MICROS Tablet E-Series 8-Inch and 11-Inch Devices](#)
- [Barcode Reader Setup Methods](#)
- [Configuring a Barcode Reader Using the Barcodes Module Method](#)
- [Configuring a Barcode Reader Using the Number Lookup \(NLU\) Method](#)
- [Fingerprint Scanning](#)
- [Configuring the Biometrics CAL Package Deployment](#)
- [Configuring Employee Privileges for the Fingerprint Reader](#)
- [Setting the Front of House to Assign Employee Personal Identification Number \(PIN\)](#)
- [Configuring the Workstation Employee Fingerprint Sign In Options](#)
- [Scanning a Fingerprint](#)
- [Configuring a Scale](#)
- [Sales Recording Module \(SRM\)](#)
- [Enabling SRM for a Property](#)
- [Configuring SRM Payment Types for Tenders](#)
- [Enabling SRM for Printers](#)
- [Configuring the Quebec SRM Control Button](#)
- [Allowing Employees to Enable and Disable SRM from the Workstation](#)

## Assigning and Unassigning a Cash Drawer

You can assign a cash drawer in the following ways:

- By Workstation
- By Workstation Operator

Giving multiple employees access to a single cash drawer is less secure than requiring employees to be assigned to a cash drawer.

When you set the option **Assign Cash Drawer By User Workstation** from the Workstations module, workstation operators can assign themselves to a cash drawer using the one of the following function keys:

- 848 - Assign Cash Drawer
- 839 - Assign Cash Drawer 1
- 840 - Assign Cash Drawer 2

The following table compares these function keys:

**Table 40-1 Assign Cash Drawer Function Key Comparison**

848 - Assign Cash Drawer	839 - Assign Cash Drawer 1 and 840 - Assign Cash Drawer 2
Assigns the drawer to the workstation operator who is signed in.	Assigns the drawer to the workstation operator who is signed in.
If two drawers are used with the workstation, the application assigns drawer 1 if both are unassigned. If drawer 1 is assigned, the application assigns drawer 2, and vice-versa.	If two drawers are used with the workstation, these keys allow the workstation operator to select the drawer he or she wants to assign. (To offer a choice, you must configure both keys on the touchscreen.)
Using this key opens the cash drawer.	Using this key does not open the cash drawer.
If the cash drawer is unassigned, using this key prompts the workstation operator to assign the cash drawer number.	If the cash drawer is unassigned, using this key prompts the workstation operator to assign the cash drawer number, while the top of the screen shows INACTIVE (no one is assigned).
If a workstation operator attempts to assign the drawer when another workstation operator is already assigned, the following error message appears: All Cash Drawers Currently Assigned.	If the workstation operator attempts to assign the drawer when another workstation operator is already assigned, no error message appears. The top of the screen show NAME (of the person assigned to the drawer). Thus, one person may assign the drawer and override the workstation operator who is already assigned.
All workstation operators can use this function key.	All workstation operators cannot use this function key.
At the end of a shift, the workstation operator or a privileged manager needs to unassign the drawer to allow another workstation operator to use the drawer.	At the end of a shift, it is not necessary to unassign the drawer because another workstation operator may override the assigned workstation operator.

The **849 - Unassign Cash Drawer** function key unassigns the drawer from the workstation operator, regardless of whether the workstation operator assigned the drawer using function 848 or 839/840. All workstation operators can always unassign themselves from a drawer. You can prevent this by removing the **Unassign Cash Drawer** function key from the touchscreen or restrict its access using a lockout macro.

**Related Topics**

- [Configuring a Cash Drawer](#)

## Configuring a Cash Drawer

1. Select the property, click **Setup**, and then click **Workstations**.
2. Double-click the workstation to be used with the cash drawer.
3. Click the **Transactions** tab.
4. Select the number of **Cash Drawers** (0, 1, or 2) that are physically installed at the workstation.
5. In the **Cash Drawer Beep Timeout** field, enter the number of seconds the cash drawer can be open before the workstation begins beeping. If you set this value to 0 (zero), beeping does not occur.
6. In the **Cash Drawer Notify Timeout** field, enter the number of seconds the cash drawer can be open before the workstation posts a message to the journal log file. If you set this value to 0 (zero), the message does not post to the journal log.
7. Click the **Options** tab, and then click the **Hardware/Cash Drawer** subtab.
8. Select the appropriate cash drawer options.

**Table 40-2 Cash Drawer Workstation Options**

Option	Description
Require Cash Drawer to be Closed Before New Transaction	Select this option to require the workstation operator to close the cash drawer before beginning a new transaction. Deselect this option to allow transactions to begin while a cash drawer is open.
Assign Cash Drawer By User Workstation	Select this option to allow workstation operators to assign themselves to the cash drawer using the one of the function keys ( <b>848 - Assign Cash Drawer</b> , <b>839 - Assign Cash Drawer 1</b> , or <b>840 - Assign Cash Drawer 2</b> ). Only the workstation operator assigned to the drawer can open it.
Use Other Cash Drawer for Other Currency	Select this option if two cash drawers are in use for the workstation and one is dedicated to foreign currency.
Require Cash Drawer Assignment to Begin Transaction	Select this option to require a workstation operator to have a cash drawer assigned prior to beginning a transaction at the workstation.

9. Click **Save**.
10. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Control Parameters**.
11. Click the **Options** tab.
12. Select the appropriate cash drawer options.

**Table 40-3 Cash Drawer Control Options**

Option	Description
23 - Open Drawer Only if Balance Due is 0.00	<p>Select this option to prevent a tender/media key from opening the cash drawer unless the balance due is \$0.00. Deselect this option to allow a tender/media key to open the cash drawer even if there is a balance due on the transaction.</p> <p>If the transaction's subtotal is \$0.00 and you set <b>36 - Do Not Open Cash Drawer if Subtotal is 0.00</b>, the setting of option <b>23</b> is irrelevant.</p>
33 - Employee ID Required With [No Sale] Key	<p>Select this option to prompt for the signed-on workstation operator's employee ID after pressing the <b>No Sale</b> key. Deselect this option to allow workstation operators to use the <b>No Sale</b> key any time a privileged employee is signed on.</p> <p>This feature is used by staydown operators (such as bartenders or sales clerks) who typically walk away from the workstation, and by prompting for employee ID, mischievous persons cannot open the drawer.</p>
36 - Do Not Open Drawer if Subtotal is 0.00	<p>Select this option to prevent the cash drawer from opening for transactions in which the subtotal is \$0.00. Deselect this option to allow the cash drawer to open whenever a workstation operator uses a tender/media key that is configured to open the drawer.</p>
42 - Always Open Cash Drawer if Change Due	<p>Select this option to allow the cash drawer to open when there are no tenders on the check that should usually open the drawer. The transaction must have change due, and the current tender must not be configured to open the drawer.</p> <p>This option is typically used for Tender/Media records such as gift certificates, where change is issued only if the gift certificate exceeds the value of the transaction (thus, the drawer should be opened to issue change), but the drawer remains closed when the gift certificate does not exceed the transaction's total.</p>
65 - Allow open of Cash Drawer on Service Charge	<p>Select this option to allow the cash drawer to open for transactions where the service charge has a value greater than \$0.00, but the subtotal is \$0.00.</p> <p>If you selected <b>36 - Do Not Open if Subtotal is \$0.00</b>, you must also select this option to allow the cash drawer to open for service charge only guest checks.</p>

13. Click **Save**.
14. Select the Enterprise, click **Configuration**, and then click **Roles**.

15. Select the role type, click the **Operations** tab, and then click the **Miscellaneous** subtab.
16. Select the appropriate options for cash drawer privileges.

**Table 40-4 Cash Drawer Privilege Options**

Option	Description
17 - Authorize/Perform unassignment of cash drawer from others	Select this option to allow employees in the employee class to use the <b>Unassign Cash Drawer</b> function key to unassign cash drawers from other workstation operators.  Do not select this option for every employee; set it only for management employee classes.  Setting this option allows workstation operators in the employee class to use function keys <b>839 - Assign Cash Drawer 1</b> and <b>840 - Assign Cash Drawer 2</b> .
34 - Authorize Open Cash Drawer Using the [No Sale] Key	Select this option to allow employees associated with the role to open the cash drawer outside of a transaction using the <b>No Sale</b> key, and to authorize non-privileged employees to do so.
88 - Authorize Cash Drawer Reconnection	Select this option to allow employees associated with the role to authorize a cash drawer cable reconnection on a workstation.

17. Click **Save**.

**Related Topics**

- [Assigning and Unassigning a Cash Drawer](#)

## Coin Dispenser

A coin dispenser (sometimes called a coin changer) is a device attached to a workstation that holds coins. A coin dispenser is not assigned to a workstation or server. When connected to a workstation and configured, a cash tender sends commands to the coin dispenser to dispense coins. The coin dispenser controls only the coin portion of a cash transaction. If the customer presents \$20.00 to pay a \$16.45 guest check, the coin dispenser automatically dispenses \$0.55, but the workstation operator must give the remaining \$3.00 to the customer.

The coin dispenser hardware varies the coins that are dispensed to avoid depleting a single type of coin. For example, if the device dispenses \$0.55 three times in a row, it is probable that both of the following combinations dispense at least once:

- 1 Quarter and 3 Dimes
- 2 Quarters and 1 Nickel

**Related Topics**

- [Configuring a Coin Dispenser](#)

## Configuring a Coin Dispenser

1. Select the property, click **Setup**, and then click **Workstations**.
2. Double-click the workstation to open it in form view.
3. Click the **Devices** tab.
4. From the Peripheral Device Configuration section, click **Add**.
5. From the **Select Peripheral Device Type** drop-down list, select **Coin Dispenser**.
6. Enter the **COM Port**, and then click **OK**.
7. Click **Save**.
8. On the workstation, allow the configuration change to download to the POS client.
9. Connect the coin dispenser's serial cable to the appropriate COM port.
10. Restart the workstation.
11. If the workstation is a Win32 client, modify the device settings for the COM port to match the COM Port you set in Step 6.

Ensure that a workstation with an attached coin dispenser does not have a printer or other device configured for the same COM port as the coin dispenser. Having another device connected but not in use can cause problems with coin dispenser operations.

12. Restart the workstation.
13. Verify that the coin dispenser is connected and ready for operation:
  - a. Sign on to the workstation as an employee with PMC privileges.
  - b. Launch PMC, and then click the **Functions** tab.
  - c. Click **Device Diagnostics**.
  - d. Click **Dispense Change**. The coin dispenser dispenses a penny when successfully connected.

### Related Topics

- [Coin Dispenser](#)

## Magnetic Stripe Reader

Workstation operators scan magnetic stripe cards using a magnetic stripe reader (MSR) attached to a workstation. Magnetic cards are commonly used as:

- Credit Cards
- Gift Cards
- Employee Identification Cards

### Related Topics

- [Configuring a Magnetic Stripe Reader](#)

## Installing the MSR Sleeve for Oracle MICROS Tablet E-Series 8-Inch and 11-Inch Devices

The MSR sleeve for Oracle MICROS Tablet E-Series 8-inch and 11-inch devices supports Transaction Vault Second Generation (TV2G) and data encryption.

Before installing the MSR sleeve driver for Oracle MICROS Tablet E-Series devices, ensure that the device has the following prerequisite requirements:

- Microsoft Windows 8.1 operating system
- Microsoft .NET Framework 4.0 or later

Contact Oracle Support to obtain the VeriFone E23x card reader driver before you begin the following steps.

1. If a previous version of the driver exists, uninstall the old driver components before installing the new driver.
  - a. From the Control Panel, select **Programs and Features**.
  - b. Uninstall the following program components:
    - E23x Driver Installer versions
    - E23x OPOS DLL
    - Microsoft POS for .NET 1.12
    - OPOS Common Control Objects 1.13.001

2. Run the **E23xDriverInstaller\_1.2.0.exe** file, and click **Yes** each time you are prompted.

3. Run the **E23x\_OPOS\_DLL\_Install\_1.5.2.0.exe** file, and click **Yes** each time you are prompted.

The driver and OPOS DLL installation configures a default OPOS device name for the magnetic stripe reader (MSR). Configure Symphony to use the exact name with the MSR.

### Related Topics

- [Configuring a Magnetic Stripe Reader](#)
- [Testing the MSR Sleeve for Oracle MICROS Tablet E-Series 8-Inch and 11-Inch Devices](#)

## Configuring a Magnetic Stripe Reader

1. Select the property, click **Setup**, and then click **Workstations**.
2. Double-click the workstation to be used with the MSR.
3. Click the **Options** tab, and then click the **Display/Security** subtab.
4. Select the appropriate MSR options.

**Table 40-5 MSR Workstation Options**

Option	Description
12 - Mag Card Entry Required for Employee ID	Select this option to allow all employee ID entries at the workstation to be made by swiping a magnetic employee ID card. The workstation does not accept an employee ID number entered through the keyboard or touchscreen.
50 - Mag Card or Fingerprint Scan Required for Employee ID	Select this option to allow all employee ID entries at the workstation to be made using a fingerprint scan or by swiping a magnetic card. That is, employees must swipe a card or scan a fingerprint.
51 - Mag Card and Fingerprint Scan Required for Employee ID	Select this option to allow all employee ID entries at the workstation to be made using a fingerprint scan and by swiping a magnetic card. That is, employees must both swipe a card and scan a fingerprint.

5. If you are using an encrypted MSR (for example, the MSR sleeve for Oracle MICROS Tablet E-Series 8-inch and 11-inch devices with Transaction Vault Second Generation (TV2G)), complete the following steps:
  - a. Click the **Hardware/Cash Drawer** subtab.
  - b. Select **55 - Enable Encrypted Magnetic Stripe Reader Support**.  
After you select this option, you cannot turn it off. Before setting this option, ensure that the credit card processor or gateway supports encryption functionality.
6. Click the **Devices** tab.
7. Click **Add**, and then select a magnetic stripe reader from the **Select Peripheral Device Type** drop-down list.
8. Select the COM Port Settings (if necessary), and then click **OK**.
9. Click **Save**.

**Related Topics**

- [Magnetic Stripe Reader](#)
- [Testing the MSR Sleeve for Oracle MICROS Tablet E-Series 8 and 11 Inch Devices](#)

## Testing the MSR Sleeve for Oracle MICROS Tablet E-Series 8-Inch and 11-Inch Devices

You can test the MSR swiper functionality after you install the driver and configure the MSR.

1. Copy the **e23xservice.exe** and **e23xD.dll** files to the [Drive Letter]:\Program Files \Verifone\E23xOPOS folder.
2. Close the ServiceHost application.



3. Run **e23xservice.exe**.
4. In the OPOS MSR section of the dialog box, select the following options:
  - **Open**
  - **Claim**
  - **Enable**
  - **D. Ev** (Data Events)

After each successful swipe attempt, the D. Ev option is deselected.

5. Swipe the magnetic card. If the card swipe was successful, a message appears with the card data.

#### Related Topics

- [Installing the MSR Sleeve for Oracle MICROS Tablet E-Series 8-Inch and 11-Inch Devices](#)
- [Configuring a Magnetic Stripe Reader](#)

## Barcode Reader Setup Methods

A barcode is an optical machine-readable representation of data. Barcodes are used to quickly order items. Workstation operators scan barcodes using barcode scanners attached to workstations. When a barcode is scanned, the workstation software processes the data and matches it with a menu item configured in the Symphony database.

The following two methods allow you to configure barcode menu item ordering:

- Use the Barcodes module from the EMC
- Use the number lookup (NLU) method

The following table outlines the differences between the two methods:

**Table 40-6 Barcode Reader Setup Methods**

Barcodes Module Method	NLU Method
Greater configuration flexibility	Less flexible configuration
More complex configuration	Simplified configuration
Associate many different barcodes with the same menu item (for example, pricing chewing gum items the same)	Not supported
Associate two different prices of one definition with different barcodes (for example, small or large coffee)	Not supported
Allows up to 14-digit barcode	Allows up to 12-digit barcode

#### Related Topics

- [Configuring a Barcode Reader Using the Barcodes Module Method](#)
- [Configuring a Barcode Reader Using the Number Lookup \(NLU\) Method](#)

## Configuring a Barcode Reader Using the Barcodes Module Method

1. Select the Enterprise, property, or revenue center click **Configuration**, and then click **Barcodes**.
2. Insert a barcode record.
3. In the **Barcode** column, enter the numeric value that the barcode represents.
4. Click the ellipsis point (...) button in the **Master** column, select the master menu item to be ordered when the barcode is entered, and then click **OK**.
5. In the **Definition** column, select the Menu Item Definition (belonging to the selected Menu Item Master) to be ordered when the barcode is entered. If you select **0 - All Definitions**, the workstation determines which definition to order at the time the barcode is entered, based on active Menu Levels and other criteria.  

This column is only active when you set the Menu Item Master column to a value other than **0 - None**.
6. In the **Price #** column, select the Menu Item Price (belonging to the selected Menu Item Definition) to be ordered when the barcode is entered. If you select **0 - All Prices**, the workstation determines which price to order at the time the barcode is entered, based on active Menu Levels and other criteria.  

This column is only active when you set the Menu Item Definition column to a value other than **0 - All Definitions**.
7. In the **Alternate Price** column, enter the price to charge for the item when the barcode is entered.  

This value is used only when you set a value greater than 0.00; if the value is 0.00, the price from the Menu Item Price record is used.
8. In the **Alternate Prep Cost** column, enter the prep cost to use for the item when it is ordered by the barcode.  

This value is used only when you set a value greater than 0.00; if the value is 0.00, the prep cost from the Menu Item Price record is used.
9. Click **Save**.
10. Select the Enterprise or property, click **Setup**, and then click **Barcode Format Sets**.
11. Insert a barcode format set record, and then double-click it.
12. Click **Add**.
13. In the **Input Length** field, enter the number of digits in the scanned barcodes.
14. In the **Returned Start** field, enter the first digit to use in the numeric value to return.
15. In the **Returned Length** field, enter the number of digits to read as the numeric value to return.
16. Click **Save**.
17. Select the property, click **Setup**, and then click **Workstations**.
18. Double-click the workstation to be used with the barcode reader.

19. Click the **Transactions** tab.
20. Select the **Barcode Format Set** for the workstation to use.  
The Barcode Format Set determines how the workstation reads barcodes of various lengths.
21. Click the **Devices** tab.
22. Click **Add**, and then select the barcode reader from the **Select Peripheral Device Type** drop-down list.
23. Select the COM Port Settings (if necessary), and then click **OK**.
24. Click **Save**.
25. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
26. From the **Barcode Menu Item NLU Group #** drop-down list, select the number lookup (NLU) that is reserved for barcodes.  
When you select a value other than **0 - None**, workstation operators can order any Menu Item Definition associated with the Barcode Group by scanning or manually entering a barcode. For example, if you set this field to **3 - Barcode**, the menu item **NLU Group 3** function key can be added to a touchscreen, and the workstation operator can manually enter a barcode and press the key to order the item.
27. Click **Save**.

- [Configuring a Barcode Reader Using the Number Lookup \(NLU\) Method](#)

#### Related Topics

- [Barcode Reader Setup Methods](#)

## Configuring a Barcode Reader Using the Number Lookup (NLU) Method

1. Select the Enterprise, property, revenue center, or zone, click **Descriptors**, and then click **NLU Names**.
2. Enter the name of the NLU descriptor (for example, Barcode Items) in the **Text** field.
3. Click **Save**.
4. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
5. From the **Barcode Menu Item NLU Group #** drop-down list, select the number lookup (NLU) that you created in Step 2.
6. Click the **Options** tab.
7. To perform a check digit verification (CDV) on every NLU entry, select **33 - Enable UPC Algorithm for Barcode NLU Entries**.
8. To expand barcodes entered in 8-digit UPC-E format to 12-digit UPC-A format, select **34 - Convert UPC-E to UPC-A**. If you selected option **33** in Step 7, select option **34** as well.
9. Click **Save**.

10. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Menu Item Maintenance**.
11. Search for and select a menu item definition record for a menu item that can be ordered by barcode.
12. Select the **NLU Group** from the drop-down list. This is the same NLU that you created in Step 2.
13. Enter the barcode value for the menu item in the **NLU Number** field.
14. Click **Save**.

- [Configuring a Barcode Reader Using the Barcodes Module Method](#)

#### Related Topics

- [Barcode Reader Setup Methods](#)

## Fingerprint Scanning

This section describes fingerprint scanning. Fingerprint scanning provides greater security by verifying an employee's identity. You can use an external USB fingerprint reader with the following devices to scan fingerprints:

- Oracle MICROS Tablet E-Series
- Oracle MICROS Workstation 6 Series
- Oracle MICROS Workstation 5a
- Oracle MICROS PC Workstation 2015
- A PC running a Symphony version 2.x client that is attached to the PC with a USB connection

You can require employees to scan fingerprints when performing the following operations:

- Signing in to a workstation
- Clocking in and out
- Authorizing privileged operations

Privileged employees can perform the following actions:

- Enroll themselves and other employees' fingerprints in Symphony
- Register up to ten different fingers (in the event that employee digits become incapacitated (cut, removed, or bandaged))

At registration, the employee places a finger on the fingerprint reader. The reader scans the fingerprint and captures its characteristics (an array of pixels) as Fingerprint Image Data (FID). The reader then extracts fingerprint features as Fingerprint Minutiae Data (FMD) and creates a data record that is stored in database tables in the cloud and in the POS clients where the employee signs in. At sign-in, the reader captures fingerprint data and then uses FMD records to search the local database for a match. If a match is found, the action is performed (such as sign-in). The system does not store pictures, photographs, or images of the fingerprint. There is no way to reconstruct the fingerprint using the stored data.

Auditors can determine whether an employee performed an authorization using a fingerprint reader, manual entry, or magnetic card swipe.

#### Related Topics

- [Configuring the Biometrics CAL Package Deployment](#)
- [Configuring Employee Privileges for the Fingerprint Reader](#)
- [Setting the Front of House to Assign Employee Personal Identification Number \(PIN\)](#)
- [Configuring the Workstation Employee Fingerprint Sign In Options](#)
- [Scanning a Fingerprint](#)

## Configuring the Biometrics CAL Package Deployment

1. Select the Enterprise level, click **Setup**, and then click **CAL Packages**.
2. Select **Biometrics** from the navigation tree.
3. Click the **Deployment Schedules** tab.
4. Click **Add Deployment**.
5. Select **1 - Property/Enterprise** from the **Deployment Type** drop-down list.
6. Select **0 - Enterprise** from the **Property** field.
7. Select **0 - Install** from the **Action to Take** drop-down list.
8. Click **Save**.

- [Configuring Employee Privileges for the Fingerprint Reader](#)
- [Setting the Front of House to Assign Employee Personal Identification Number \(PIN\)](#)
- [Configuring the Workstation Employee Fingerprint Sign In Options](#)
- [Scanning a Fingerprint](#)

#### Related Topics

- [Fingerprint Scanning](#)

## Configuring Employee Privileges for the Fingerprint Reader

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **PMC General/Reports** subtab.
3. To allow employees associated with the role to open the Property Management Console (PMC) using function key 300, select **30001 - Run PMC**.
4. Click the **PMC Procedures** subtab.
5. Select **30055 - Assign Employee Fingerprint Scan** and **30052 - Assign Employee PIN**.
6. Click **Save**.

- [Configuring the Biometrics CAL Package Deployment](#)

- [Setting the Front of House to Assign Employee Personal Identification Number \(PIN\)](#)
- [Configuring the Workstation Employee Fingerprint Sign In Options](#)
- [Scanning a Fingerprint](#)

**Related Topics**

- [Fingerprint Scanning](#)

## Setting the Front of House to Assign Employee Personal Identification Number (PIN)

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House Home or Sign In page.
3. On the **Edit** tab, click **Button**.
4. On the **General** subtab, enter **Assign PIN** in the **Legend** field.
5. Select **Function** from the **Type** drop-down list.
6. Click the black arrow directly beneath the **Type** drop-down list, and then select **Assign Employee PIN**.
7. Position and size the button on the page. Use the Style arrow to change the color.
8. Click **Save**.

- [Configuring the Biometrics CAL Package Deployment](#)
- [Configuring Employee Privileges for the Fingerprint Reader](#)
- [Configuring the Workstation Employee Fingerprint Sign In Options](#)
- [Scanning a Fingerprint](#)

**Related Topics**

- [Fingerprint Scanning](#)

## Configuring the Workstation Employee Fingerprint Sign In Options

1. Select the property, click **Setup**, and then click **Workstations**.
2. Double-click the workstation to use with a fingerprint reader.
3. Click the **Options** tab.
4. Select the appropriate security options as described in the following table.

**Table 40-7 Employee Security Options**

Option	Selecting This Option Requires That All Employees ...
47 - Fingerprint Scan Required for Employee ID	Scan a fingerprint.
48 - Employee ID or Fingerprint Scan Required for Employee ID	Scan a fingerprint or enter the employee ID number.
49 - Employee ID and Fingerprint Scan Required for Employee ID	Scan a fingerprint and enter the employee ID number.
50 - Mag Card or Fingerprint Scan Required for Employee ID	Scan a fingerprint or swipe an employee ID card.
51 - Mag Card and Fingerprint Scan Required for Employee ID	Scan a fingerprint and swipe an employee ID card.

5. Click **Save**.

- [Configuring the Biometrics CAL Package Deployment](#)
- [Configuring Employee Privileges for the Fingerprint Reader](#)
- [Setting the Front of House to Assign Employee Personal Identification Number \(PIN\)](#)
- [Scanning a Fingerprint](#)

**Related Topics**

- [Fingerprint Scanning](#)

## Scanning a Fingerprint

You can scan (also called enroll) a fingerprint using a workstation or from the EMC.

If you upgrade Symphony to version 2.9.1, you must deploy the Biometrics 5.0 CAL package, and then re-enroll fingers with an Oracle MICROS or DigitalPersona fingerprint reader. To re-enroll, attach an Oracle MICROS or DigitalPersona fingerprint reader to the workstation, scan an already enrolled finger to sign on to the workstation, and then click **OK** at the prompt to re-enroll.

1. To scan (initially enroll) a fingerprint using a workstation:
  - a. Sign on to the workstation as an employee with the proper role privileges, using an employee ID.
  - b. Click the **PMC** button, and then click the **Functions** tab.
  - c. Click the **Edit Employee PIN** function.
  - d. Select the employee whose fingerprints need to be scanned.
  - e. Click the **Enroll Fingerprint** button.
  - f. Follow the prompts to enroll up to three fingers for one employee. Click **Yes** at the prompt to scan the same finger four times, or click **No** to return to the Select Employee dialog.
  - g. Place the finger to scan on the fingerprint reader, and then remove it when the scan is complete. Each finger is scanned four times. The scanner flashes

while scanning and remains lit after the scan is complete. Repeat this step for each finger.

2. To scan (initially enroll) a fingerprint using the EMC:
    - a. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Employee Maintenance**.
    - b. Search for and select the employee record.
    - c. On the **General** subtab, click the **Fingerprint Enrollment** button.
    - d. Follow the prompts to enroll one or more fingerprints.
- [Configuring the Biometrics CAL Package Deployment](#)
  - [Configuring Employee Privileges for the Fingerprint Reader](#)
  - [Setting the Front of House to Assign Employee Personal Identification Number \(PIN\)](#)
  - [Configuring the Workstation Employee Fingerprint Sign In Options](#)

#### Related Topics

- [Fingerprint Scanning](#)

## Configuring a Scale

A scale connects to the workstation and is used for menu items that are priced by weight (for example, salad bar). You can configure Symphony to calculate weight in ounces, pounds, or kilograms.

1. Select the property, click **Setup**, and then click **Workstations**.
2. Double-click the workstation to open it in form view.
3. Click the **Devices** tab.
4. From the Peripheral Device Configuration section, click **Add**.
5. From the **Select Peripheral Device Type** drop-down list, select **Scale (Serial)**.
6. Enter the **COM Port** to which the scale connects.
7. Select the following settings, and then click **OK**:
  - **Baud Rate**: 9600
  - **Parity**: E
  - **Data Bits**: 7
  - **Stop Bits**: 1
8. Click the **Options** tab, and then click the **Hardware/Cash Drawer** subtab.
9. Select **13 - Enable Scale Interface** to allow communication between the workstation and scale.
10. (Optional) If you are using an Oracle MICROS Tablet E-Series, click the **Display/Security** subtab, and then deselect **39 - Floating tablet**.
11. Click **Save**.
12. On the workstation, allow the configuration change to download to the POS client.



13. Connect the scale's serial cable to the workstation's serial COM port.
  14. Connect the scale's power cord to the outlet.
  15. Restart the workstation.
  16. Verify that the scale is connected and ready for operation:
    - a. Sign on to the workstation as an employee with PMC privileges.
    - b. Launch PMC, and then click the **Functions** tab.
    - c. Click **Device Diagnostics**.
    - d. Click **Get Scale Weight**.
    - e. Place a weighed menu item on the scale and add the menu item to a guest check.
- [Setting the Tare Weight for a Menu Item](#)
  - [Configuring a Weighed Menu Item](#)

#### Related Topics

- [Weighed Menu Items](#)
- [Understanding Tare Weight](#)
- [Configuring a Weighed Menu Item](#)
- [Setting the Tare Weight for a Menu Item](#)

## Sales Recording Module (SRM)

An SRM is a microcomputer designed to be connected to a cash register or POS system. It records transaction information such as sales and tax data in a secure memory. After data transmission begins, the SRM device sends the necessary information to a printer which prints a customer receipt with a barcode and information about the restaurant. The SRM is used to produce reports such as a Periodic Sales Summary Report which contains information on sales and transactions carried out over a given period.

Restaurant owners who are also a Quebec Sales Tax (QST) registrant must produce customer receipts using an SRM device and submit a receipt to the customer upon sale of a meal.

#### Related Topics

- [Enabling SRM for a Property](#)
- [Configuring SRM Payment Types for Tenders](#)
- [Enabling SRM for Printers](#)
- [Configuring the Quebec SRM Control Button](#)
- [Allowing Employees to Enable and Disable SRM from the Workstation](#)

## Enabling SRM for a Property

1. Select the property, click **Setup**, and then click **Property Parameters**.

2. On the Options tab, select **38 - Enable Sales Recording Module**, and then click **Save**.

- [Configuring SRM Payment Types for Tenders](#)
- [Enabling SRM for Printers](#)
- [Configuring the Quebec SRM Control Button](#)
- [Allowing Employees to Enable and Disable SRM from the Workstation](#)

#### Related Topics

- [Sales Recording Module \(SRM\)](#)

## Configuring SRM Payment Types for Tenders

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Tender/Media**.
2. Double-click a Tender Media record to open it.
3. On the General tab, select the appropriate **SRM Payment Type** for the tender.

The SRM payment types are:

- **1 - ARG**: Select this option for cash payments.
  - **2 - CRE**: Select this option for credit card payments.
  - **3 - DEB**: Select this option for Canadian debit card payments.
  - **4 - AUT**: Select this option for other payment types such as gift cards.
  - **5 - PKG**: Select this option for full payments where the check value posts to a third party system.
4. If you selected SRM payment type **5 - PKG**, click the **Options** tab, click the **Taxing Options** subtab, and then click **Select All** to exempt all taxes from the tender.  
  
If you do not exempt all taxes, they will post both to the SRM as well the third-party application, resulting in duplicate tax entries.
  5. Click the **Options** tab, click the **Printing Options** subtab, and then select the following options:
    - **8 - Print Customer Receipt**
    - **21 - Print Summary Totals**
    - **22 - Print Check Trailer**
    - **23 - Print Check on Demand**
    - **28 - Print Guest Check Trailer on Fast Transaction Customer Receipt**
  6. To have the tender print a special/duplicate receipt for the merchant, click the **Miscellaneous Options** subtab, and then select **84 - Quebec SRM Duplicate**.

The printed receipt does not include a barcode. This option is used with the Quebec SRM Printer type.

When option **84** is enabled for the assigned **Default Reprint Check Tender/Media**, the system does not print barcodes on receipts for split checks.

7. Click **Save**.

8. Repeat Steps 2 through 7 for all tenders that you have configured.
- [Enabling SRM for a Property](#)
  - [Enabling SRM for Printers](#)
  - [Configuring the Quebec SRM Control Button](#)
  - [Allowing Employees to Enable and Disable SRM from the Workstation](#)

**Related Topics**

- [Sales Recording Module \(SRM\)](#)

## Enabling SRM for Printers

1. Select the property, click **Setup**, and then click **Printers**.
2. Double-click the record for a printer that has an SRM device attached, select **Quebec SRM Device**, and then click **Save**.
3. Repeat Step 2 for all printers that have an SRM device.

- [Enabling SRM for a Property](#)
- [Configuring SRM Payment Types for Tenders](#)
- [Configuring the Quebec SRM Control Button](#)
- [Allowing Employees to Enable and Disable SRM from the Workstation](#)

**Related Topics**

- [Sales Recording Module \(SRM\)](#)

## Configuring the Quebec SRM Control Button

You can configure a touchscreen button to allow workstation operators to enable and disable the SRM device locally through the POS client.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Double-click the page on which you want the button to appear on the workstation.
3. Insert a new button.
4. On the General tab, select **Function** as the **Type**, and then click the right arrow directly beneath the **Type** drop-down menu.
5. Select **Fiscal** from the Type pane, select **Quebec SRM Control** from the Results pane, and then click **OK**.
6. Enter a **Legend**, and click **Save**.

- [Enabling SRM for a Property](#)
- [Configuring SRM Payment Types for Tenders](#)
- [Enabling SRM for Printers](#)
- [Allowing Employees to Enable and Disable SRM from the Workstation](#)

### Related Topics

- [Sales Recording Module \(SRM\)](#)

## Allowing Employees to Enable and Disable SRM from the Workstation

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
  2. Double-click the role type record (for example, administrator, manager or server).
  3. Click the Operations tab, click the Miscellaneous sub-tab, scroll down to Miscellaneous Options , and then select **162 - Authorize/Use Quebec SRM Control Function**.
  4. Click **Save**.
- [Enabling SRM for a Property](#)
  - [Configuring SRM Payment Types for Tenders](#)
  - [Enabling SRM for Printers](#)
  - [Configuring the Quebec SRM Control Button](#)

### Related Topics

- [Sales Recording Module \(SRM\)](#)

# Reporting

Simphony provides reports at the Enterprise and property levels. Oracle Hospitality Reporting and Analytics provides the report information to Simphony. You can assign privileges to allow employees to run reports.

- [Allowing Employees to Run Reports](#)
- [List of Workstation PMC Reports](#)
- [Configuring Employee Privileges for Oracle Hospitality Reporting and Analytics](#)
- [Configuring the Log Files for Oracle Hospitality Reporting and Analytics](#)
- [Viewing Move History Logs](#)
- [Configuring Data Retention Limits](#)

## Allowing Employees to Run Reports

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **PMC General/ Reports** sub-tab.
3. Select **30001 - Run PMC** to allow employees associated with the role to launch the Property Management Console (PMC) on the workstation using Function Key 300, Launch PMC.
4. Select **10022 - Run PMC Reports in Another Revenue Center** to allow employees associated with the role to run PMC Autosequences (Reports) for revenue centers other than the revenue center to which they are assigned.
5. Click the **Ad Hoc Reports** tab.
6. From the Report Options section, select the reports you want employees to run.
7. Click **Save**.

- [Configuring Employee Privileges for Oracle Hospitality Reporting and Analytics](#)
- [Configuring the Log Files for Oracle Hospitality Reporting and Analytics](#)

### Related Topics

- [List of Workstation PMC Reports](#)

## List of Workstation PMC Reports

### Online PMC Reports

Authorized employees can run the following Property Management Console (PMC) reports when the workstation is in online mode:

**Table 41-1 PMC Reports in Online Mode**

<b>Report</b>	<b>Description</b>
Financial Report	Provides financial reporting for a property, revenue center, or employee.  The Employee Financial Report is based on all sales-related entries, such as checks opened, menu items ordered, and the number and amount of service charges, discounts, and tenders applied. You can use this report to balance the server's bank, to determine tips paid, and to track individual performance.
Employee Open Check Report	Provides a list of all open checks belonging to an employee at the time the report is taken. Checks are grouped in the following order: employee, property or revenue center, and event.
Employee Closed Check Report	Provides a list of all checks that have been closed by an employee, including reopened checks that were closed again and checks closed as memo checks. In addition, special symbols on the report indicate whether the check was transferred, re-opened, split, or added. Checks are grouped in the following order: employee, property or revenue center, and event.
Employee Tip Report	Summarizes the total tip activity by employee.
Employee Labor Detail Report	Provides an account of work performed by each employee. The report includes the dates, times, and job rates of each clock-in and clock-out, the total hours of regular and overtime worked at each job code, and the gross pay earned.
Employee Labor Summary Report	Provides a summary of the regular and overtime hours worked by each employee at each of their assigned pay rates.
Cashier Financial Report	Provides financial information for each cashier, including tenders and tips paid.
Major Group Sales Report	Provides sales totals for each major group.
Family Group Sales Report	Provides sales totals for each family group.
Menu Item Summary Report	Summarizes all menu items.
Menu Item Sales Report	Provides sales totals for each menu item.
Time Period Detail Report	Shows each time period as a full report, with a similar format to a system financial report (sales, check profiles, tracking group).
Time Period Summary Report	Shows each time period on a single line with sales information.
Serving Period Financial Report	Provides financial reporting by serving period.
Table Sales Report	Provides sales totals for each table.
Clock-in Status Report	Provides a list of employees who are currently clocked in or on a break.

**Table 41-1 (Cont.) PMC Reports in Online Mode**

<b>Report</b>	<b>Description</b>
Labor Availability Report	Provides a count of all employees clocked in or on break as of the time the report is taken.
Job Code Report	Summarizes all accumulated employee labor totals by job code.
Employee Autofire Open Check Report	Provides a list of all checks that are scheduled for autofire at the time the report is run. Checks are grouped by employee, property or revenue center, and event, and sorted by scheduled date and time. Event details appear in the check information.
Employee Journal Report	Provides a journal of all sales transactions by a specific employee shown in a check detail layout.
Check Journal Report	Provides a journal of all sales transactions in a check detail layout.
Tax Summary Report	Provides a list of tax rates.

### Offline PMC Reports

Authorized employees can run the following Property Management Console (PMC) reports when the workstation is in offline mode:

**Table 41-2 PMC Reports in Offline Mode**

<b>Report</b>	<b>Description</b>
Offline Revenue Center Financial Report Offline Employee Financial Report	Provides financial reporting for a revenue center or employee.  The Employee Financial Report is based on all sales-related entries, such as checks opened, menu items ordered, and the number and amount of service charges, discounts, and tenders applied. You can use this report to balance the server's bank, to determine tips paid, and to track individual performance.
Offline Cashier Financial Report	Provides financial information for each cashier, including tenders and tips paid.
Offline Employee Open Check Report	Provides a list of all open checks belonging to an employee at the time the report is taken. Checks are grouped in the following order: employee, revenue center, and event. Event details appear in the check information.  Unlike the online version of this report, the offline version functions only for a revenue center; it is not possible to take a report for the property.

### Related Topics

- [Allowing Employees to Run Reports](#)

- [Configuring Employee Privileges for Oracle Hospitality Reporting and Analytics](#)
- [Configuring the Log Files for Oracle Hospitality Reporting and Analytics](#)

## Configuring Employee Privileges for Oracle Hospitality Reporting and Analytics

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Employee Maintenance**.
2. Search for the employee record.
3. Click the **Employee Records** tab near the lower area of the screen, and then double-click the object number of the appropriate record.
4. Click the **Reporting** tab to configure an employee's settings as they pertain to logging in to Reporting and Analytics.
5. To grant the employee an active account in the Reporting and Analytics database, select **Active**.
6. To make the employee a default user for all Reporting and Analytics employee records associated with the same role, select **Default User**. This allows new employees in Reporting and Analytics who share the same role to use the same settings as this employee.
7. From the **Role** drop-down list, select **Workstation Report**.
8. Click **Save**.

The *Oracle Hospitality Reporting and Analytics User Guide*, located at <http://docs.oracle.com/en/industries/hospitality/>, contains information about enabling reports in Reporting and Analytics.

- [Allowing Employees to Run Reports](#)
- [Configuring the Log Files for Oracle Hospitality Reporting and Analytics](#)

### Related Topics

- [List of Workstation PMC Reports](#)

## Configuring the Log Files for Oracle Hospitality Reporting and Analytics

1. Select the Enterprise level, click **Setup**, and then click **Enterprise Parameters**.
2. Click the **mymicros.net** tab, and then enter the appropriate information. The following table describes the fields.

**Table 41-3 Reporting and Analytics Settings**

Field	Description
Logs to Keep	Enter the number of Data Transfer Service (DTS) logs to retain.



**Table 41-3 (Cont.) Reporting and Analytics Settings**

Field	Description
Error Files to Keep (days)	Enter the number of days the application retains error file logs.
Verbosity	Select the Verbosity level for DTS logging. You should typically set this value to <b>Normal</b> . Set verbose logging to <b>Extended</b> or <b>Super</b> for troubleshooting as these elevated levels create large log files and slow performance.
mymicros.net Machine Name	Enter the name of the Reporting and Analytics server computer using the format <code>http://[YourReportingAndAnalyticsUrl]</code> .
Enterprise mylabor URL	If DTS uses a different Internet Protocol (IP) address to connect to Oracle Hospitality Labor Management, enter the URL. Use the format <code>http://[Name or IP address of the Reporting and Analytics portal server]</code> .  If you leave this field blank, DTS uses the Reporting and Analytics machine name to post Labor Management. Workstations do not use this URL.
Organization ID	Do not change this value unless instructed by your Oracle representative.  This field represents the Enterprise organization ID used for reporting to Oracle Hospitality Reporting and Analytics.
17 - Send selected translations to Symphony Reports	Select this option to send definition translations to Symphony reports. You must also select the <b>Send Translations for this Language to Symphony Reports</b> option from the Language module for each language to be sent to Symphony reports.

**3. Click Save.**

The *Oracle Hospitality Reporting and Analytics User Guide*, located at <http://docs.oracle.com/en/industries/hospitality/>, contains information about enabling reports in Reporting and Analytics.

- [Allowing Employees to Run Reports](#)
- [Configuring Employee Privileges for Oracle Hospitality Reporting and Analytics](#)

**Related Topics**

- [List of Workstation PMC Reports](#)

## Viewing Move History Logs

Database administrators can use the EMC to verify Reporting and Analytics Daily Aggregation and to review the Move History logs of the database. The self-service access to information in EMC eliminates the need to consult the Data Transfer Service (DTS) log on the application server. Daily Aggregation is logged for each property and each business date.

This feature is compatible with Reporting and Analytics version 9.0 Patch 8 and later.

1. Select the Enterprise level, click **Configuration**, and then click **PC Autosequences**.
2. Double-click the Reporting and Analytics Daily Aggregation record to open it.
3. Click the **Execution History** tab, and then click **Get History**. The list of all Move History Logs appears.

The Move History logs of the database are listed by date, along with details such as ID, Insert Date, Start Date, Finish Date, Property, and Complete Code (status). If the Complete Code shows Failed, the **Reprocess** button becomes active for a specific property and business date. You can click the **Reprocess** button to set a flag for the DTS to update the Reporting and Analytics Aggregation service to process the record again.

4. To limit the information shown, select the **Property**, and the **Date Range**, and then click the **Filter** button.

The maximum date range is 7 days. If you do not select a date at the beginning (default state), the system shows only yesterday and today's dates.

5. Highlight a record in the Execution History section, and then click **Show Details**. The Execution Detail section shows the date and time that the autosequence started and stopped and additional messages, such as property, location, and status (success or error).
6. Click **Save**.

## Configuring Data Retention Limits

Database administrators can set the length of time data (for example, ECM and Reporting and Analytics aggregation) remains present in the database at the Enterprise and property levels.

1. Select the Enterprise level, click **Setup**, and then click **Enterprise Parameters**.
2. Click the **Miscellaneous** tab.
3. To set data retention limits, in the Purging section, enter the **Days To Keep** for the **Purge Type**.

This is the number of days from the time a transaction is reported to the enterprise that the application retains it for use in reporting and auditing (for example, from 1 day to 999 days). After the number of days to keep expires, a scheduled event purges the data. By default, the purging jobs purge 1000 records per batch.

- To set ECM data retention, enter the number of days for **ECM Transaction Detail**.
- To change the PC Autosequences data retention, enter the number of days for the **Pcsequence Log**.

Oracle recommends that you leave the default value set at **90** days, and that a subject matter expert change this setting if necessary. The **Pcsequence Log Purge Type** is available in Symphony version 2.10 and later and is compatible with Reporting and Analytics version 9.0 Patch 8 and later.

4. Click **Save**.

# Auditing

Simphony allows you to examine and evaluate various application activities at the Enterprise and property levels.

- [Understanding the Audit Trail](#)
- [Using the Audit Trail](#)
- [Understanding Audit This Record](#)
- [Using Audit This Record](#)

## Understanding the Audit Trail

You can use the Audit Trail module to view changes made to the Simphony application. The Audit Trail records and reports all additions, changes, and deletions made through the EMC and through PMC Procedures. In addition, the Audit Trail reports on successful and failed logins to EMC, PMC Report takers, Key Manager activity, and Audit Trail purges.

### Related Topics

- [Using the Audit Trail](#)

## Using the Audit Trail

You must have the privilege to access the audit trail at the Enterprise or property level. When an Audit Trail report is taken, the activity is logged to the Audit Trail. All Audit Trail Reports taken are logged as an Enterprise level activity.

1. Select the Enterprise or property, click **Tasks**, and then click **Audit Trail**.
2. To perform a quick search on the **Search** tab:
  - a. Select the timeframe from the **All Changes In** drop-down list.
  - b. Click the **Run Quick Search** button.

When you perform a quick search, the application ignores the values in the standard search fields.

3. To perform a standard search, enter or select information in the following fields, and then click the **Search** button.

**Table 42-1 Audit Trail Standard Search Fields**

Field	Description
Application	Select an application from the drop-down list.  Depending on your selection, the <b>Module</b> drop-down list is active or dimmed. For example, when you select <b>EMC</b> , the <b>Module</b> drop-down list shows a list of EMC modules.
Module	Select a module from the drop-down list. This field is active only when the <b>Application</b> selection allows a choice of modules.  Depending on your selection, the <b>Object Numbers</b> field is active or dimmed. For example, when you select <b>EMC</b> from the <b>Application</b> drop-down list and <b>Discounts</b> from the <b>Module</b> drop-down list, the <b>Object Numbers</b> field becomes active.
(Optional) Object Numbers	Enter an object number or range to retrieve results based on specific records only. Leave this field blank to have the search engine find all object numbers.
Operation	Select an operation from the drop-down list. This field is active based on a combination of the <b>Application</b> and <b>Module</b> selections.
Zone/Location	Select a zone or location.  When you open the Audit Trail from the Enterprise level, this field allows a selection of any property, zone, or revenue centers. When you open the Audit Trail from the property level, this field allows a selection of revenue centers within the property.
Employee	Click the <b>Select</b> link, select an employee, and then click <b>OK</b> . When you select a specific employee, only changes made by that employee are included in the list.  Click the <b>Me</b> link to include only the logged-in employee.
Date Range	Select the date range to use to query the Audit Trail.  Select <b>User-Defined</b> to activate the <b>Start</b> and <b>End</b> fields.
(Optional) Start and End	To narrow your query to a specific date or date range, select the start and end dates and times.  Select <b>All Dates</b> to include all dates in the query.
(Optional) Old/New Values	Enter text for use in the query. This can be useful in finding a specific change to a record, such as "When was the item Hamburger renamed to Cheeseburger?".

**Table 42-1 (Cont.) Audit Trail Standard Search Fields**

Field	Description
Preserve Previous Results	Select this option to merge the search results with the previous search results, instead of overwriting them. Deselect this option to see only the results of the most recent search.
4.	If the number of results that will be returned exceeds the pre-set thresholds for Audit Trail results (for example, 10,000 records or more), the application prompts you to confirm the action.
5.	To view the search results for a quick search or a standard search, click the <b>Results</b> tab. <ol style="list-style-type: none"> <li>To save the results, click the <b>Save to Disk</b> button, select the directory, and then click the <b>Save</b> button.</li> <li>To copy the results into another application (such as Notepad or email) without storing the information, click the <b>Formatted Results</b> button, and then click the <b>Copy</b> button.</li> </ol>
6.	To manually remove old records from the Audit Trail table in the database, click the <b>Purge</b> tab.  The <b>Purge</b> tab is visible only at the Enterprise level, and you must have the Purge Audit Trail privilege.
7.	Select the date before which the records will be purged, and then click the <b>Purge</b> button. For example, if you select 9/1/2016, the application deletes all records from September 1, 2016 and earlier.  Records are deleted based on the UTC date of the Audit Trail record.  In addition to this manually initiated purge, the Data Transfer Service (DTS) purges Audit Trail records automatically.

**Related Topics**

- [Understanding the Audit Trail](#)

## Understanding Audit This Record

In almost every module, you can audit an individual record or a group of similar records. The results usually show the record or records at a specific position. For example, consider the following actions:

1. Add a Tender Media record at Object Number 1234.
2. Change the record's name to Cash.
3. Delete the record.
4. Add a new record at Object Number 1234.
5. Change the record's name to MasterCard.

After performing these steps, the Audit This Record results show all five of the changes (not just the changes for steps 4 and 5). Although the first Tender Media record was deleted, it is considered "this record" for functional purposes. In short, all

records at the same object number are treated as “this record” and are included in the results.

#### Related Topics

- [Using Audit This Record](#)

## Using Audit This Record

1. Select the Enterprise or property, and then open a module that contains at least one record.
2. Highlight one or more records, right-click inside the first column, and then select either **Audit This Record** (single record) or **Audit Selected Records** (multiple records). The **Audit Record** tab shows the information for the selected records.  
  
Alternatively, from the EMC toolbar, click **Edit**, and then select **Audit This Record**.
3. To run specific queries on the selected record or records, click the **Show Advanced Options** link.
4. Use the same search parameters that are available in the Audit Trail module. See [Using the Audit Trail](#) for more information.

#### Related Topics

- [Understanding Audit This Record](#)

## Importing and Exporting Data

If you are using Symphony version 2.8 or later, the Symphony Import/Export Service allows you to:

- Import and export Symphony application data in a comma-separated values (CSV) format, to or from spreadsheet applications
- Import configuration data into the Symphony application database that can be called by external systems, such as a web service application programming interface (API)
- Export configuration data from Symphony that can be called by external systems, such as an on premise inventory management application

The main benefits of this service are:

- Allows you to load configuration data in bulk (for example, making a large number of price changes for menu items, which reduces the amount of time it takes to configure systems)
- Allows third parties to integrate with customer databases (either self-hosted or hosted within an Oracle facility), without providing direct access to the application file server or database
- Allows third parties to build custom interfaces
- [Configuring the Import/Export Service Privileges](#)
- [Configuring the Import/Export Service](#)
- [Increasing the Import File Size](#)
- [Import/Export Service Components](#)

### Configuring the Import/Export Service Privileges

You need to set privileges to allow the appropriate employees to use the Symphony Import/Export Service.

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
  2. Select the role type, and then click the **EMC Modules** tab.
  3. To allow the import of information, select **Edit**, **Add**, **Delete**, and **Add Override** for the appropriate entities in the **File** column.
  4. To allow export of information, select **View** for the appropriate entities in the **File** column.
  5. Click **Save**.
- [Configuring the Import/Export Service](#)
  - [Increasing the Import File Size](#)

**Related Topics**

- [Import/Export Service Components](#)

## Configuring the Import/Export Service

Before configuring the Import/Export Service, you must have the appropriate EMC Enterprise privileges assigned to you.

1. Select the Enterprise level, click **Setup**, and then click **Enterprise Parameters**.
2. Click the **Import/Export** tab.
3. Enter the appropriate values in the fields. The following table describes the settings that you can configure for the Import/Export service.

**Table 43-1 Import/Export Service Settings**

Field or Option Name	Description
Root Path for Export/Import File Operations	Beginning with Symphony version 2.9.1, this field is disabled. Do not enter information in this field.
Max No. of Records to Commit Per Batch	Enter the maximum number of records to commit per batch when importing. You can enter a value from 1000 through 20000.  If you change the default value, restart the MICROS Data Request Processing Service for the changes to take effect.
Default Date Time Format	Select the date and time format to use when processing import and export requests.

4. Click **Save**.

- [Configuring the Import/Export Service Privileges](#)
- [Increasing the Import File Size](#)

**Related Topics**

- [Import/Export Service Components](#)

## Increasing the Import File Size

Complete these steps if the Enterprise requires you to import files larger than the default 4MB size.

1. Browse to [Drive Letter]:\MICROS\Symphony2\SymphonyImportExport\WebApp\ and open the Web.config file.

2. Add the following line within a comment:

```
<httpRuntime targetFramework="4.5" />
```

3. Uncomment the following line:

```
<httpRuntime targetFramework="4.5" executionTimeout="240"
maxRequestLength="10243" />
```

4. Enter the maximum import file size for the maxRequestLength parameter in Kilobits. By default, this value is set to 10 MB.



5. Save the changes.

- [Configuring the Import/Export Service Privileges](#)
- [Configuring the Import/Export Service](#)

#### Related Topics

- [Import/Export Service Components](#)

## Import/Export Service Components

The Symphony Import/Export Service is comprised of four components, plus a Microsoft Windows service. The following table lists the components and their capabilities.

**Table 43-2** Symphony Data Import/Export Components

Component	Functionality
EGateway URL	Provides access to the Symphony configuration for self-hosted and Enterprise hosting center environments.
Web Service (REST API)	Assists developers with programmatic integration and the development of third-party application programming interfaces (API).
Web Service (SOAP API)	The SOAP API has the same functionality as the REST API, except this web service is constructed using the SOAP format rather than the REST format.
Web Application	This user interface (UI) allows you to: <ul style="list-style-type: none"> <li>• Import and export data manually</li> <li>• Export data automatically using the scheduler</li> <li>• Review the status of completed import and export jobs</li> </ul> The Web Application is available for all users with Symphony EMC logon credentials.
MICROS Data Request Processing Service (Microsoft Windows Service)	This Microsoft Windows service runs as part of throttling and scheduling processes (rather than on demand servicing requests).

#### Related Topics

- [Configuring the Import/Export Service Privileges](#)
- [Configuring the Import/Export Service](#)
- [Increasing the Import File Size](#)

# Loyalty and Gift Card Interfaces and Drivers

Oracle Hospitality Gift and Loyalty is a customer relationship management (CRM) application that allows properties to manage point-based loyalty card programs and stored value cards (SVC) (also known as gift cards). Gift and Loyalty tracks customer activities (such as frequency of visits, spending, and loyalty account balance) and reports the information through Symphony's enterprise reporting module. Symphony then sends this information to Gift and Loyalty.

The following table lists common types of loyalty programs:

**Table 44-1 Types of Loyalty Programs**

Loyalty Program	Description
Points earned per transaction or per visit	An award given for X number of visits. The award could be a discount, coupon for future visit, or stored value added to the loyalty account for later redemption.
Points earned per dollar spent	An award given for X dollars spent. The award could be a discount, coupon for future visit, or stored value added to the loyalty account for later redemption.
Discount card	Each time the workstation operator swipes a card, the check receives an automatic discount. Restaurants typically use discount cards to control employee meal discounts.
Category club card	The customer earns points when ordering a specific type of menu item (for example, burgers).

A stored value program allows a guest to establish a prepaid account to use for purchases at a property. The prepaid payment vehicle is a stored value card with an associated monetary value. A gift card is an example of a stored value card containing a prepaid amount.

- [Loyalty and Stored Value Configuration Prerequisites](#)
- [Loyalty Configuration Tasks](#)
- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Loyalty Options](#)
- [Configuring the Loyalty Driver](#)
- [Configuring the Loyalty Module](#)
- [Stored Value Configuration Tasks](#)
- [Setting Stored Value Options](#)
- [Configuring the Stored Value Driver](#)
- [Configuring the Stored Value Module](#)

- [Creating Front of House Loyalty and Stored Value Buttons](#)
- [Voiding Points on a Re-opened Check](#)
- [XProcessor Extension Application Migration](#)

## Loyalty and Stored Value Configuration Prerequisites

Simphony supports the Gift and Loyalty drivers only on Microsoft Windows CE and Microsoft Windows 32-bit operating systems.

Complete the following tasks before configuring the Loyalty and Stored Value Interfaces and Drivers:

1. Install Simphony version 2.5 Maintenance Release (MR) 1 or later at the property.
2. Obtain access to the EMC within Simphony.
3. Configure unique Tender/Media and Discount records for loyalty transactions. Take note of the record number and type as you need the values to post transactions for Oracle Hospitality Reporting and Analytics and third-party loyalty applications.

Reporting and Analytics and third-party loyalty applications use the configured Simphony Tender/Media and Discount records to post loyalty transactions to the guest check.

4. (Optional) If the property is using the XProcessor Extension Application for Gift and Loyalty, configure the Gift and Loyalty interface and XProcessor Extension Application at the Enterprise level. Deploy each interface only to the correct locations and clients. After you upgrade the appropriate clients to Simphony version 2.5 MR1 or later, see [XProcessor Extension Application Migration](#) for instructions.
  - a. Leave the XProcessor installed at the Enterprise level until all clients have been upgraded to Simphony version 2.5 MR1 or later and are using the Gift and Loyalty interface.
  - b. Retrieve the data extension overrides for each property (such as URL, userid, user\_password, and timeout\_seconds). Take note of these settings as you need this information to create the integrated Gift and Loyalty interface.
  - c. Take note of the current functions the site uses through XProcessor. You need this information to create buttons for the Gift and Loyalty interface.
5. (Optional) If a third party developed a driver, use the driver configuration settings provided by the third party. Third-party drivers may have unique fields.

- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Loyalty Options](#)
- [Configuring the Loyalty Driver](#)
- [Configuring the Loyalty Module](#)
- [Creating Front of House Loyalty and Stored Value Buttons](#)
- [Voiding Points on a Re-opened Check](#)
- [XProcessor Extension Application Migration](#)

**Related Topics**

- [Loyalty Configuration Tasks](#)

## Loyalty Configuration Tasks

Complete the following tasks to set up the loyalty interface:

- Complete the configuration prerequisites
- Configure loyalty privileges
- Set loyalty options
- Configure the Loyalty driver
- Configure the Loyalty module
- Create Front of House loyalty buttons
- Allow workstation operators to void loyalty points issued on re-opened checks
- (If applicable) Migrate the XProcessor Extension Application

**Related Topics**

- [Loyalty and Stored Value Configuration Prerequisites](#)
- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Loyalty Options](#)
- [Configuring the Loyalty Driver](#)
- [Configuring the Loyalty Module](#)
- [Creating Front of House Loyalty and Stored Value Buttons](#)
- [Voiding Points on a Re-opened Check](#)
- [XProcessor Extension Application Migration](#)

## Configuring Loyalty and Stored Value Privileges

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **Stored Value Cards** subtab.
3. Select the appropriate options for the privileges. The following table summarizes the privileges associated with Loyalty and Stored Value functionality.

**Table 44-2 Loyalty and Stored Value Privileges**

Section	Option Number	Privilege Name	Select This Option to Allow Employees to...
Issue Functions	104	Authorize/Perform Issue Stored Value Function	Issue a stored value card
Issue Functions	105	Authorize/Perform Void Issue Stored Value Entry	Void an issued card

**Table 44-2 (Cont.) Loyalty and Stored Value Privileges**

<b>Section</b>	<b>Option Number</b>	<b>Privilege Name</b>	<b>Select This Option to Allow Employees to...</b>
Issue Functions	106	Authorize/Perform Issue Stored Value Batch Function	Issue a batch of stored value cards
Issue Functions	107	Authorize/Perform Void Issue Stored Value Batch Entry	Void a batch of stored value cards
Issue Functions	108	Authorize/Perform Activate Stored Value Function	Activate a stored value card
Issue Functions	109	Authorize/Perform Void Activate Stored Value Entry	Void the activation of a stored value card
Issue Functions	110	Authorize/Perform Activate Stored Value Batch Function	Activate a batch of stored value cards
Issue Functions	111	Authorize/Perform Void Activate Stored Value Batch Entry	Void the activation of a batch of stored value cards
Reload and Redeem Functions	112	Authorize/Perform Reload Stored Value Function	Reload (add credit) a dollar amount to an existing stored value card
Reload and Redeem Functions	113	Authorize/Perform Void Reload Stored Value Entry	Void a reload transaction
Reload and Redeem Functions	114	Authorize/Perform Redeem Authorization Stored Value Function	Perform a redemption authorization
Reload and Redeem Functions	115	Authorize/Perform Void Redeem Authorization Stored Value Entry	Void a redemption authorization
Reload and Redeem Functions	116	Authorize/Perform Redeem Stored Value Function	Perform a redemption transaction (a customer makes a purchase using a stored value card, and the application deducts a dollar amount from the customer's account)
Reload and Redeem Functions	117	Authorize/Perform Void Redeem Stored Value Entry	Void a redemption transaction
Reload and Redeem Functions	118	Authorize/Perform Manual Redemption Stored Value Function	Perform a manual redemption
Reload and Redeem Functions	119	Authorize/Perform Void Manual Redemption Stored Value Entry	Void a manual redemption transaction

**Table 44-2 (Cont.) Loyalty and Stored Value Privileges**

Section	Option Number	Privilege Name	Select This Option to Allow Employees to...
Point Functions	120	Authorize/Perform Issue Stored Value Points Function	Issue points to a stored value card
Point Functions	121	Authorize/Perform Void Issue Stored Value Points Entry	Void the issued points on a stored value card
Point Functions	122	Authorize/Perform Redeem Stored Value Points Function	Perform a points redemption transaction
Point Functions	123	Authorize/Perform Void Redeem Stored Value Points Entry	Void a points redemption transaction
Other Stored Value Card Options	103	Authorize/Perform Manual Entry of Stored Value Card Number	Manually enter the stored value card account number
Other Stored Value Card Options	124	Authorize/Perform Stored Value Cash Out Function	Debit some or all of the remaining balance on a stored value card
Other Stored Value Card Options	179	Authorize/Perform Void Stored Value Cash Out Function	Void a cash out transaction
Other Stored Value Card Options	125	Authorize/Perform Stored Value Balance Inquiry Function	Check a stored value card balance
Other Stored Value Card Options	126	Authorize/Perform Stored Value Balance Transfer Function	Transfer the balance from one stored value card to another
Other Stored Value Card Options	127	Authorize/Perform Stored Value Point Inquiry Function	Check a stored value card point balance
Other Stored Value Card Options	128	Authorize/Perform Stored Value Report Generation Function	Generate stored value card reports
Loyalty Options	166	Authorize/Perform Loyalty Coupon Inquiry	Request a list of coupons that are available for a loyalty account
Loyalty Options	167	Authorize/Perform Accept Loyalty Coupon Function	Redeem a coupon associated with a loyalty account
Loyalty Operations	168	Authorize/Perform Void Accept Loyalty Coupon Entry	Void the coupon redemption
Loyalty Operations	169	Authorize/Perform Issue Loyalty Coupon Function	Issue a coupon to a loyalty account
Loyalty Operations	170	Authorize/Perform Issue Loyalty Points Function	Issue points to a loyalty account

**Table 44-2 (Cont.) Loyalty and Stored Value Privileges**

Section	Option Number	Privilege Name	Select This Option to Allow Employees to...
Loyalty Operations	171	Authorize/Perform Void Issue Loyalty Points Entry	Void the point issuance
Loyalty Operations	172	Authorize/Perform Redeem Loyalty Points Function	Accept or redeem points to apply towards the balance of a check
Loyalty Operations	173	Authorize/Perform Void Redeem Loyalty Points Entry	Void the points redemption
Loyalty Operations	174	Authorize/Perform Redeem and Issue Loyalty Points Function	Redeem points and issue additional points to a loyalty account
Loyalty Operations	175	Authorize/Perform Void Redeem and Issue Loyalty Points Entry	Void the points redemption and issuance
Loyalty Operations	176	Authorize/Perform Loyalty Balance Inquiry Function	Request a points balance for a loyalty account
Loyalty Operations	177	Authorize/Perform Loyalty Unique Item Inquiry Function	Request a list of unique menu items that were ordered on a program associated with a loyalty account
Loyalty Operations	178	Authorize/Perform Loyalty Balance Transfer Function	Transfer the points balance associated with one loyalty account number to another loyalty account
Loyalty Operations	180	Authorize/Perform Apply Loyalty Card to Check	Use the Oracle Hospitality Gift and Loyalty operation that applies a card account against the guest check. Depending on the configuration in Gift and Loyalty, setting this privilege could trigger one or more operations, such as redeem points, apply coupons, redeem a gift card, and issue points.

4. Click the **Transactions** tab.
5. Select the appropriate Stored Value coupon privileges from the Service Charge and Discount Options section:
  - **130 - Authorize/Perform “Accept Coupon” Stored Value Function:** Select this option to allow employees to perform the Accept Coupon stored value function.

- **131 - Authorize/Perform “Void Accept Coupon” Stored Value Function:**  
Select this option to allow employees to perform the Void Accept Coupon stored value function.
6. Click **Save**.
- [Loyalty and Stored Value Configuration Prerequisites](#)
  - [Setting Loyalty Options](#)
  - [Configuring the Loyalty Driver](#)
  - [Configuring the Loyalty Module](#)
  - [Creating Front of House Loyalty and Stored Value Buttons](#)
  - [Voiding Points on a Re-opened Check](#)
  - [XProcessor Extension Application Migration](#)

**Related Topics**

- [Loyalty Configuration Tasks](#)
- [Setting Stored Value Options](#)
- [Configuring the Stored Value Driver](#)
- [Configuring the Stored Value Module](#)
- [Creating Front of House Loyalty and Stored Value Buttons](#)
- [XProcessor Extension Application Migration](#)

**Related Topics**

- [Stored Value Configuration Tasks](#)

## Setting Loyalty Options

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Loyalty**.
2. Insert a record, enter **Loyalty** as the name, and then click **OK**.
3. Double-click the record to open it.
4. Select the appropriate Loyalty Options as described in the following table.

**Table 44-3 Loyalty Options**

Option	Description
Support Offline Transactions	Select this option to allow offline loyalty transactions.
Always Print Loyalty Results	Select this option to automatically print a chit after each successful loyalty operation.
Never Display Loyalty Results	Select this option to require the workstation operator to touch the workstation in order to show loyalty results.
Remove Loyalty Results Print Button	Select this option to hide the Print button from the loyalty results screen. Select this option in conjunction with the <b>Always Print Loyalty Results</b> option.



**Table 44-3 (Cont.) Loyalty Options**

Option	Description
Remove Guest Name Lookup Button	Select this option to hide the Guest Name Lookup button from the account number entry screen. This option deactivates the Guest Name Lookup function.
Remove Phone Number Lookup Button	Select this option to hide the Phone Number Lookup button from the account number entry screen. This option deactivates the Phone Number Lookup function.

5. Click **Save**.

- [Loyalty and Stored Value Configuration Prerequisites](#)
- [Configuring Loyalty and Stored Value Privileges](#)
- [Configuring the Loyalty Driver](#)
- [Configuring the Loyalty Module](#)
- [Creating Front of House Loyalty and Stored Value Buttons](#)
- [Voiding Points on a Re-opened Check](#)
- [XProcessor Extension Application Migration](#)

**Related Topics**

- [Loyalty Configuration Tasks](#)

## Configuring the Loyalty Driver

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Loyalty Driver**.
2. Insert a record and enter an appropriate gift and loyalty driver name.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **LoyaltyCommandModule.dll**, and then click **Open**.
6. Click the **Configuration** tab.
7. From the Assembly/Class section, enter information in the following fields:

**Table 44-4 Assembly/Class Fields**

Field	Description
Module ID	Enter the module identification (for example, LoyaltyDriver).
Display Name	Enter the name that should appear in Symphony Front of House windows and dialogs (for example, [Provider Name] Loyalty).
Description	Enter a description for the module (for example, Loyalty Driver). Do not leave this field blank.

8. From the iCareDriver Properties section, enter information in the following fields:

**Table 44-5 iCareDriver Properties Fields**

Field	Description
Certificate File	If the property implemented a unique certificate file, specify the location of the certificate file on the local machine.
Communications Offline Retry Count	This value is the number of transactions that workstation operators can complete offline before attempting an online transaction. You cannot change the value in this field as it is based on the Tender Media or Service Charge records configured for offline use.
Communications Timeout Seconds	You cannot change the value in this field as it is based on the Tender Media or Service Charge records configured for offline use.
Ignore Server Certificate	Select <b>True</b> when the property is not implementing a unique certificate file. This allows secure communication between the driver and endpoint.
Log iCare Client Debug Data	If the client is using Gift and Loyalty, indicate whether the application includes debug information in the log file.
Log iCare Client Message Data	If the client is using Gift and Loyalty, indicate whether the application includes client messages in the log file.
Login	Leave this field blank at the Enterprise level. This value is set at the property level.
Password	Leave this field blank at the Enterprise level. This value is set at the property level.
Web Address	Enter the path to Gift and Loyalty, including location, port number and service path. Use the following format: <code>https://[GiftLoyaltyLocation]:[GiftLoyaltyPortNumber]/ws/services/StoredValueService</code> .  If the property is using a third-party payment provider application (rather than Gift and Loyalty), enter the path to the third-party payment provider application. This can be a Web address or a local path.

9. Click **Save**.

- [Loyalty and Stored Value Configuration Prerequisites](#)
- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Loyalty Options](#)
- [Configuring the Loyalty Module](#)
- [Creating Front of House Loyalty and Stored Value Buttons](#)
- [Voiding Points on a Re-opened Check](#)
- [XProcessor Extension Application Migration](#)

#### Related Topics

- [Loyalty Configuration Tasks](#)

## Configuring the Loyalty Module

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Loyalty Module**.
2. Insert a record, enter **LoyaltyModule** as the name, and then click **OK**.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **LoyaltyCommandModule.dll**, and then click **Open**.
6. Click the **Configuration** tab.
7. From the Assembly/Class section, enter information in the following fields:
  - **Module ID**: Enter a value that identifies the module.
  - **Display Name**: Enter the name to show in Symphony Front of House windows and dialogs (for example, [Provider Name] Loyalty).
  - **Description**: Enter a description of the loyalty module. Do not leave this field blank.
8. From the Common Properties section, enter information in the following fields:
  - **Currency ISO Code**: Enter the code (three alpha characters) that represents the currency being used (for example, USD).  
See <http://www.currency-iso.org/en/home/tables/table-a1.html> for a list of Currency ISO 4217 codes.
  - **Language ISO Code**: Enter the code (two alpha characters) that represents the language being used (for example, EN).  
See [http://www.loc.gov/standards/iso639-2/php/code\\_list.php](http://www.loc.gov/standards/iso639-2/php/code_list.php) for a list of Language ISO 639-1 codes.

If the currency or language is different at the property, override these values at the property level.
9. From the Loyalty Module Properties section, enter information in the following fields:
  - **Account Number Maximum Length**: Enter the maximum length of a loyalty account number (up to 24 digits).
  - **Account Number Minimum Length**: Enter the minimum length of a loyalty account number (down to 7 digits).
  - **Cash Module Name**: Enter the name of the cash module to use for redemptions (for example, Cash:Cash).
10. Click **Save**.
11. Select the property, click **Setup**, and then click **Loyalty Driver**.
12. Double-click the gift and loyalty driver record to open it.
13. Click the **Override This Record** link, and then click **Yes** to confirm.
14. Click the **Configuration** tab.
15. From the iCare Driver Properties section, enter information in the following fields:

- **Login:** Enter the login for the property ID or the login for the provider.
- **Password:** Enter the password for the property ID or the provider.

16. Click **Save**.

- [Loyalty and Stored Value Configuration Prerequisites](#)
- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Loyalty Options](#)
- [Configuring the Loyalty Driver](#)
- [Creating Front of House Loyalty and Stored Value Buttons](#)
- [Voiding Points on a Re-opened Check](#)
- [XProcessor Extension Application Migration](#)

#### **Related Topics**

- [Loyalty Configuration Tasks](#)

## Stored Value Configuration Tasks

Complete the following tasks to set up the stored value interface:

- Carry out the configuration prerequisites
- Configure stored value privileges
- Set stored value options
- Configure the Stored Value driver
- Configure the Stored Value module
- Create Front of House stored value buttons
- Allow workstation operators to void loyalty points issued on re-opened checks
- (If applicable) Migrate the XProcessor Extension Application

#### **Related Topics**

- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Stored Value Options](#)
- [Configuring the Stored Value Driver](#)
- [Configuring the Stored Value Module](#)
- [Creating Front of House Loyalty and Stored Value Buttons](#)
- [XProcessor Extension Application Migration](#)

## Setting Stored Value Options

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Stored Value**.
2. Insert a record, enter **Stored Value** as the name, and then click **OK**.
3. Double-click the record to open it.

4. Select the appropriate Stored Value Options. The following table describes the options.

**Table 44-6 Stored Value Options**

Option	Description
Support Offline Transactions	Select this option to allow offline stored value transactions.
Always Print Stored Value Results	Select this option to automatically print a chit after each successful stored value operation.
Never Display Stored Value Results	Select this option to require the workstation operator to tap the workstation to show loyalty results.
Remove Stored Value Results Print Button	Select this option to hide the Print button from the stored value results screen. Select this option in conjunction with the <b>Always Print Stored Value Results</b> option.
Remove Guest Name Lookup Button	Select this option to hide the <b>Guest Name Lookup</b> button from the account number entry screen. This option deactivates the Guest Name Lookup function.
Remove Phone Number Lookup Button	Select this option to hide the <b>Phone Number Lookup</b> button from the account number entry screen. This option deactivates the Phone Number Lookup function.

5. Click **Save**.
  - [Configuring Loyalty and Stored Value Privileges](#)
  - [Configuring the Stored Value Driver](#)
  - [Configuring the Stored Value Module](#)
  - [Creating Front of House Loyalty and Stored Value Buttons](#)
  - [XProcessor Extension Application Migration](#)

**Related Topics**

- [Stored Value Configuration Tasks](#)

## Configuring the Stored Value Driver

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Stored Value Driver**.
2. Insert a record, enter an appropriate stored value card driver name, and then click **OK**.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Symphony2\EgatewayService\handlers, select **StoredValueCommandModule.dll**, and then click **Open**.

6. Click the **Configuration** tab.
7. From the Assembly/Class section, enter information in the following fields:

**Table 44-7 Assembly/Class Fields**

Field	Description
Module ID	Enter a value that identifies the module (for example, SVCDriver).
Display Name	Enter the name to appear in Symphony Front of House windows and dialogs (for example, [Provider Name] Stored Value).
Description	Enter a description of the module (for example, SVC Driver). Do not leave this field blank.

8. From the iCareDriver Properties section, enter information in the following fields:

**Table 44-8 iCareDriver Properties Fields**

Field	Description
Certificate File	If the property implemented a unique certificate file, enter the location of the certificate file on the local machine.
Communications Offline Retry Count	This value is the number of transactions that workstation operators can complete offline before attempting an online transaction. You cannot change the value in this field as it is based on the Tender Media or Service Charge records configured for offline use.
Communications Timeout Seconds	You cannot change the value in this field as it is based on the Tender Media or Service Charge records configured for offline use.
Ignore Server Certificate	Select <b>True</b> when the property is not implementing a unique certificate file. This allows secure communication between the driver and endpoint.
Log iCare Client Debug Data	If the client is using Gift and Loyalty, indicate whether the application includes debug information in the log file.
Log iCare Client Message Data	If the client is using Gift and Loyalty, indicate whether the application includes client messages in the log file.
Login	Leave this field blank at the Enterprise level. This value is set at the property level.
Password	Leave this field blank at the Enterprise level. This value is set at the property level.

**Table 44-8 (Cont.) iCareDriver Properties Fields**

Field	Description
Web Address	<p>Enter the path to Gift and Loyalty, including location, port number and service path. Use the following format: https:// [GiftLoyaltyLocation]: [GiftLoyaltyPortNumber]/ws/services/ StoredValueService.</p> <p>If the property is using a third-party payment provider application (rather than Gift and Loyalty), enter the path to the third-party payment provider application. This can be a Web address or a local path.</p>

9. Click **Save**.

- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Stored Value Options](#)
- [Configuring the Stored Value Module](#)
- [Creating Front of House Loyalty and Stored Value Buttons](#)
- [XProcessor Extension Application Migration](#)

#### Related Topics

- [Stored Value Configuration Tasks](#)

## Configuring the Stored Value Module

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Stored Value Module**.
2. Insert a record, enter **SVModule** as the name, and then click **OK**.
3. Double-click the record to open it.
4. On the **General** tab, click the **Import from a file** link.
5. Browse to [Drive Letter]:\MICROS\Simphony2\EgatewayService\handlers, select **StoredValueCommandModule.dll**, and then click **Open**.
6. Click the **Configuration** tab.
7. From the Assembly/Class section, enter information in the following fields:
  - **Module ID:** Enter the module identification.
  - **Display Name:** Enter the name to appear in Simphony Front of House windows and dialogs.
  - **Description:** Enter a description of the stored value module. Do not leave this field blank.
8. From the Common Properties section, enter information in the following fields:
  - **Currency ISO Code:** Enter the code (three alpha characters) that represents the currency being used (for example, USD).  
See [www.currency-iso.org/en/home/tables/table-a1.html](http://www.currency-iso.org/en/home/tables/table-a1.html) for a list of Currency ISO 4217 codes.

- **Language ISO Code:** Enter the code (two alpha characters) that represents the language being used (for example, EN).  
See [www.loc.gov/standards/iso639-2/php/code\\_list.php](http://www.loc.gov/standards/iso639-2/php/code_list.php) for a list of Language ISO 639–1 codes.

If the currency or language is different at the property, override these values at the property level.

9. From the Stored Value Module Properties section, enter information in the following fields:
  - **Account Number Maximum Length:** Enter the maximum length of a stored value account number (up to 24 digits).
  - **Account Number Minimum Length:** Enter the minimum length of a stored value account number (down to 7 digits).
  - **Cash Module Name:** Enter the name of the cash module to use for redemptions (for example, Cash:Cash).
  - **Max Card Activation Quantity:** Enter the maximum number of stored value cards that can be activated with the Activate Multiple card operation.
  - **Max Card Issue Quantity**  
: Enter the maximum number of stored value cards that can be issued with the Activate Multiple card operation.
10. Click **Save**.
11. Select the property, click **Setup**, and then click **Stored Value Driver**.
12. Double-click the stored value card driver record to open it.
13. Click the **Override This Record** link, and then click **Yes** to confirm.
14. Click the **Configuration** tab.
15. From the iCare Driver Properties section, enter information in the following fields:
  - **Login:** Enter the login for the property ID or the login for the provider.
  - **Password:** Enter the password for the property ID or the provider.
16. Click **Save**.

- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Stored Value Options](#)
- [Configuring the Stored Value Driver](#)
- [Creating Front of House Loyalty and Stored Value Buttons](#)
- [XProcessor Extension Application Migration](#)

#### Related Topics

- [Stored Value Configuration Tasks](#)

## Creating Front of House Loyalty and Stored Value Buttons

You can create buttons on a page for the loyalty and stored value functions.



1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place loyalty and stored value buttons.
3. On the **Edit** tab, select the page area in which to define the loyalty and stored value functions (typically the payment or function area).
4. Click **Button**.
5. On the **General** subtab, select the appropriate function from the **Type** drop-down list.
  - **Loyalty Function**
  - **Stored Value Function**
6. Click the black arrow beneath the **Type** drop-down list.
7. Select either **iCare Loyalty** or **iCare Stored Value**, and then click **OK**.
8. From the Loyalty or Stored Value Operation Selection dialog, select the appropriate **Module Type** (**iCareLoyaltyModule** or **iCareSVCModule**), select the appropriate function from the **Functions** drop-down list, and then click **OK**.
9. Position and size the button on the page. Use the Style arrow to change the color.
10. In the **Legend** field, enter the button name, and then click **Save**. The following tables list the loyalty and stored value button names and functions.

Buttons marked with an asterisk (\*) are only available with Gift and Loyalty; these functions are not available with third-party payment providers. Do not use the Look Up Patron operation as it is not functional alone. Instead, see [Setting Loyalty Options](#) for information about lookup methods.

**Table 44-9 Loyalty Buttons**

Button Name	Function
Balance Inquiry	Request a points balance for a loyalty account.
Unique Items Inquiry*	Request a list of unique menu items that have been ordered on a program associated with a loyalty account.
Issue Points	Issue points to a loyalty account.
Coupon Inquiry	Request a list of coupons that are available for a loyalty account.
Redeem Coupon	Redeem a coupon to apply towards the balance of a guest check.
Issue Coupon	Issue an ad hoc coupon from Gift and Loyalty to a guest loyalty account.
Transfer Loyalty Account	Transfer the points balance and customer personal information associated with one loyalty account number to another loyalty account.

**Table 44-9 (Cont.) Loyalty Buttons**

Button Name	Function
Apply Card to Check*	<p>The Apply Card to Check function sends an Apply request to Gift and Loyalty for the account number. Based on Gift and Loyalty configuration, the workstation operator can select the following actions:</p> <ul style="list-style-type: none"> <li>• Apply Coupon</li> <li>• Redeem Points</li> <li>• Redeem Stored Value Card (SVC)</li> <li>• Apply Coupon and Redeem SVC</li> <li>• Issue Points</li> </ul> <p>The Apply Card to Check function requires a special configuration to share data between the Loyalty and Stored Value modules. To configure the <b>Apply Card to Check</b> button on the <b>General</b> tab, in the <b>Text</b> field, enter the <b>SVCModule Name</b> and <b>Record Number</b>. Use the format SVCModuleName:RecordNumber to process SVC actions associated with this function. You can find the Record Number and Module Name in EMC by highlighting the Enterprise, selecting <b>Setup</b>, and then clicking <b>Stored Value Module</b>.</p> <p>A property can load more than one type of loyalty module, although Oracle does not recommend doing so. If the property uses multiple loyalty modules, manually enter the module name in the Arguments field for the second module.</p>

**Table 44-10 Stored Value Buttons**

Button Name	Function
Balance Inquiry	Request the current monetary value for a stored value account or gift card.
Issue SVC	Issue one stored value account number for a dollar value that is determined at the time of purchase.
Issue Multiple SVCs*	Issue multiple stored value account numbers for a dollar value that is determined at the time of purchase.
Activate SVC	Activate one stored value account. The application prompts the workstation operator to enter the pre-defined dollar value for validation.
Activate Multiple SVCs*	Activate multiple stored value account numbers for a dollar value that is determined at the time of purchase. The application prompts the workstation operator to enter the pre-defined dollar value for validation.
Reload	Add funds to an existing stored value account.
Transfer	Transfer the funds and customer personal information (if applicable) associated with one stored value account to another stored value account.
Authorize	Authorize a gift card for use as payment on a guest check.
Redeem	Pay a guest check balance using a gift card.
Cash Out	Obtain a cash payment for any remaining balance on a stored value account.

**Table 44-10 (Cont.) Stored Value Buttons**

Button Name	Function
Redeem SVC/Issue Points*	<p>The Redeem SVC/Issue Points function combines the Redeem SVC and Loyalty Issue Points functions. The application prompts the workstation operator to redeem a gift card, and then automatically issues points.</p> <p>The Redeem SVC/Issue Points function requires a special configuration to share data between the Loyalty and Stored Value modules. To configure the <b>Redeem SVC/Issue Points</b> button on the <b>General</b> tab, in the <b>Text</b> field, enter the <b>LoyaltyModule Name</b> and <b>Record Number</b>. Use the format <b>LoyaltyModuleName:RecordNumber</b> to process loyalty actions associated with this function. You can find the Record Number and Module Name in EMC by highlighting the Enterprise level, clicking <b>Setup</b>, and then clicking <b>Loyalty Module</b>.</p> <p>A property can load more than one type of stored value module, although Oracle does not recommend doing so. If the property uses multiple stored value modules, manually enter the module name in the Arguments field for the second module.</p>

11. Repeat the preceding steps to create buttons for each of the loyalty and stored value functions listed in the tables.

- [Loyalty and Stored Value Configuration Prerequisites](#)
- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Loyalty Options](#)
- [Configuring the Loyalty Driver](#)
- [Configuring the Loyalty Module](#)
- [Voiding Points on a Re-opened Check](#)
- [XProcessor Extension Application Migration](#)

**Related Topics**

- [Loyalty Configuration Tasks](#)
- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Stored Value Options](#)
- [Configuring the Stored Value Driver](#)
- [Configuring the Stored Value Module](#)
- [XProcessor Extension Application Migration](#)

**Related Topics**

- [Stored Value Configuration Tasks](#)

## Voiding Points on a Re-opened Check

To allow workstation operators to void loyalty points issued on re-opened guest checks, the check number must remain the same after reopening a check. By default,

a guest check number increments each time a workstation operator re-opens the check, preventing the voiding of points due to check numbering mismatch.

1. Select the revenue center, click **RVC Parameters**, and then click **Options**.
2. Select **37 - Keep The Same Check Number When a Check is Reopened**.

This allows a re-opened guest check to retain its original guest check number. When you deselect this option, Symphony assigns a re-opened guest check to a new check number.

3. Click **Save**.

- [Loyalty and Stored Value Configuration Prerequisites](#)
- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Loyalty Options](#)
- [Configuring the Loyalty Driver](#)
- [Configuring the Loyalty Module](#)
- [Creating Front of House Loyalty and Stored Value Buttons](#)
- [XProcessor Extension Application Migration](#)

#### Related Topics

- [Loyalty Configuration Tasks](#)

## XProcessor Extension Application Migration

If you are using Symphony version 2.5 MR1 or later, you can install the Loyalty driver for Gift and Loyalty Advanced at the property (in place of the XProcessor Extension Application). Upgrade the POS clients to Symphony version 2.5 MR1 or later before completing the steps in this section.

1. Browse to the CAL server's Microsoft Windows 32-bit or Microsoft Windows CE subdirectory for Gift and Loyalty Advanced:
  - CAL\Win32\ICareProcessor2.0 directory
  - CAL\WinCE\ICareProcessor2.0 directory
2. Delete the ICareProcessor2.0 directory.
3. From the EMC, select the Enterprise level, click **Setup**, and then click **CAL Packages**.
4. Delete the CAL Client package that was used to deploy the ICareProcessor2.0 directory to the workstations.
5. Delete the following files from the disk:
  - Micros.XProcessor.dll
  - Micros.XProcessor.SVC.dll
  - Micros.XProcessor.SVC.ICare.dll
6. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Extension Application**.
7. Delete the Extension Application for XProcessor.

8. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Payments**.
9. Delete the XProcessor Payment driver.
10. Select the Enterprise or property, click **Configuration**, and then click **Tender/Media**.
11. Delete XProcessor Close Check.
12. Delete the iCareSvcProcessor.icare.xml file.
13. Select the Enterprise level, click **Configuration**, and then click **Data Extensions**.
14. Delete the data extensions for each property.
15. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
16. Double-click the page record containing Gift and Loyalty buttons to open it.
17. Delete all Gift and Loyalty buttons.

Depending on the property's Gift and Loyalty configuration, additional menu items, discounts, service charges, or tenders may have been used. If these items are in use, leave these additional items and do not delete them.

18. If the property was using the Check Reprocessor service, remove the installed check reprocessor files from the Enterprise Service Host as the Gift and Loyalty interface has its own plug-ins.
19. Browse to the Handlers directory where the Check Reprocessor ran and open the ChkReprocSvcHost.DLL.config file.
20. Delete the following tag:

```
<pluginAssembly displayName="XProcessor Reprocessor"
fullname="Micros.XProcessor.SVC.dll, Version=0.0.0.0, Culture=neutral,
PublicKeyToken=null" />
```

Leave the tags `<pluginAssemblies>` and `</pluginAssemblies>`.

21. Delete the following files from the Handlers directory:
    - Micros.XProcessor.Payment.dll
    - Micros.Ops.Extensibility.dll
    - Micros.XProcessor.dll
    - Micros.XProcessor.SVC.dll
    - Micros.XProcessor.SVC.iCare.dll
- [Loyalty and Stored Value Configuration Prerequisites](#)
  - [Configuring Loyalty and Stored Value Privileges](#)
  - [Setting Loyalty Options](#)
  - [Configuring the Loyalty Driver](#)
  - [Configuring the Loyalty Module](#)
  - [Creating Front of House Loyalty and Stored Value Buttons](#)
  - [Voiding Points on a Re-opened Check](#)

### **Related Topics**

- [Loyalty Configuration Tasks](#)
- [Configuring Loyalty and Stored Value Privileges](#)
- [Setting Stored Value Options](#)
- [Configuring the Stored Value Driver](#)
- [Configuring the Stored Value Module](#)
- [Creating Front of House Loyalty and Stored Value Buttons](#)

### **Related Topics**

- [Stored Value Configuration Tasks](#)

# 45

## Events

An event is a group of transactions that occur within a specific date and time range in one or more revenue centers at a property. Examples of events include sporting events and games, banquets, weddings, and receptions. Setting an event allows you to accurately track sales and inventory, particularly when multiple events occur in a single business day (for example, a baseball double header).

You can configure events from the EMC, update event status and associate checks with a specific event at the POS client, view various event reports in Reporting and Analytics, import and export event totals. You initiate events in the following ways:

- Automatically
- On a predefined schedule
- Through a call to an event service
- Using a function key on the workstation

Symphony retains all event information (including changes to events) for use in reporting and auditing.

- [Configuring Event Privileges and Permissions](#)
- [Specifying Ad Hoc Reports](#)
- [Enabling Events](#)
- [Configuring Event Types and Sub Types](#)
- [Creating an Event](#)
- [Configuring an Event Area](#)
- [Linking Events](#)
- [Breaking Linked Events](#)
- [Cancelling an Event](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)
- [Event Information in Reporting and Analytics Reports](#)

## Configuring Event Privileges and Permissions

You can assign event privileges to employees.

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Double-click the role type, and click the **EMC Modules** tab.

3. For each of the following event-related items listed in the File column, select the appropriate employee privileges (**View**, **Edit**, **Add**, and **Delete**):
  - **Event Types:** This file controls the ability to view, change, create, and delete event types and sub types.
  - **Event Areas:** This file controls the ability to view, change, create, and delete event areas.
  - **Event Definitions:** This file controls the ability to view, change, create, and delete events.

[Setting Employee Roles](#) contains more information about setting employee privileges.

4. To set field level permissions, click the **Fields** tab.
5. Select **Event Definitions** from the EMC Modules list.
6. For **Areas** and **Cancel Event**, select the appropriate permissions from the **Access** drop-down list.
7. To set event check privileges, click the **Operations** tab, and then click the **Transactions** subtab.
8. Select the appropriate options for the privileges. The following table summarizes the check privileges associated with event functionality and the recommended roles to have the privilege set.

**Table 45-1 Event Check Privileges**

Option Number	Privilege Name	Allow the Employee to Authorize or Perform ...	Recommended Roles
270	Authorize/Perform association of a new check to an ended event	Creating a new check and linking it to a closed or ended event	Manager
271	Authorize/Perform override of the "Event association to a Check is mandatory" option (Control Parameters)	Beginning a check without linking it to an event	Manager

9. Click the **Miscellaneous** subtab.
10. Select the appropriate options for the privileges. The following table summarizes the workstation privileges associated with event functionality and the recommended roles to have the privilege set.

**Table 45-2 Event Privileges**

Option Number	Privilege Name	Allow the Employee to Authorize or Perform ...	Recommended Roles
272	Authorize/Perform Start an Event	Starting an event	Manager



**Table 45-2 (Cont.) Event Privileges**

Option Number	Privilege Name	Allow the Employee to Authorize or Perform ...	Recommended Roles
273	Authorize/Perform End an Event	Ending an event	Manager
276	Authorize/Perform Select an Event	Selecting an active event as the workstation operator's default event	Manager
277	Allow selection of 'No Default Area Selected' when assigning default event	Selecting a default event without selecting a default area.	Manager

**11. Click **Save**.**

- [Specifying Ad Hoc Reports](#)
- [Enabling Events](#)
- [Configuring Event Types and Sub Types](#)
- [Creating an Event](#)
- [Configuring an Event Area](#)
- [Linking Events](#)
- [Breaking Linked Events](#)
- [Cancelling an Event](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)

**Related Topics**

- [Event Information in Reporting and Analytics Reports](#)

## Specifying Ad Hoc Reports

You must assign privileges to the employee to run event-related reports from a workstation at the property.

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click **Operations**, and then click **Ad Hoc Reports**.
3. Select the appropriate event report privileges.

**Table 45-3 Event Report Privileges**

Report Privilege	Description
31068 - Run Property Financial Event Report	Provides information about events for each property, total event and non-event sales for selected dates, and outstanding (open) checks associated with events.
31069 - Run Employee Financial Event Report	Provides information about individual employee performance for specific events.
31070 - Run Menu Item Sales Event Report	Provides a summary of the menu item sales by revenue center and by employee for each event.
31071 - Run Event Financial Report	Provides a summary of the daily financials by event broken down by area.

4. Click **Save**.

- [Configuring Event Privileges and Permissions](#)
- [Enabling Events](#)
- [Configuring Event Types and Sub Types](#)
- [Creating an Event](#)
- [Configuring an Event Area](#)
- [Linking Events](#)
- [Breaking Linked Events](#)
- [Cancelling an Event](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)

**Related Topics**

- [Event Information in Reporting and Analytics Reports](#)

## Enabling Events

You need to turn on events to associate transactions with events and to use event reporting.

1. Select the property, click **Setup**, and then click **Property Parameters**.
2. Click the **Options** tab, and then select **51 - Enable Events Reporting**.
3. Click **Save**.

- [Configuring Event Privileges and Permissions](#)
- [Specifying Ad Hoc Reports](#)
- [Configuring Event Types and Sub Types](#)

- [Creating an Event](#)
- [Configuring an Event Area](#)
- [Linking Events](#)
- [Breaking Linked Events](#)
- [Cancelling an Event](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)

#### Related Topics

- [Event Information in Reporting and Analytics Reports](#)

## Configuring Event Types and Sub Types

An employee with the event types privileges can configure event types and sub types.

1. Select the Enterprise level, click **Setup**, and then click **Event Types**.
2. Insert a record for the event (for example, Baseball Double Header or Social), and then click **OK**.
3. Double-click the event record to open it in form view.
4. To create event sub types related to the event type, in the Event Sub-Types section click **Add**, and then enter an event sub type name (for example, Baseball Game 1, Baseball Game 2, or Wedding).
5. To delete an event sub-type, highlight the Event Sub-Type, and then click **Delete** in the Event Sub-Types section.
6. (Optional) Select the **Menu Level Link** and the **Sub Level Link** to associate with the event type. You must select a main menu level before you can set a sub menu level.

When you assign main or sub levels to an event type, the event transactions at the POS client use these menu levels rather than the default levels. This configuration is useful when a venue and customer agree to a specific pricing level for the event type. For example, a Happy Hour menu level can be set for an event type of Social. This configuration allows a wedding event to apply Happy Hour prices at the workstation, overriding default menu levels set at the revenue center level.

7. Click **Save**.
- [Configuring Event Privileges and Permissions](#)
  - [Specifying Ad Hoc Reports](#)
  - [Enabling Events](#)
  - [Creating an Event](#)
  - [Configuring an Event Area](#)
  - [Linking Events](#)
  - [Breaking Linked Events](#)

- [Cancelling an Event](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)

#### Related Topics

- [Event Information in Reporting and Analytics Reports](#)

## Creating an Event

1. Select the property, click **Configuration**, and then click **Event Definitions**.
2. Insert a new record, enter a name for the event definition, and then double-click the new record.
3. From the Event Data section, enter information in the fields as described in the following table:

**Table 45-4 Event Data Fields**

Field	Description
Short Code	Enter an alphanumeric event code. The application appends this code with an automatically generated code to make the value unique.
Type	Select an event type for the event.
Sub Type	Select an event sub type for the event.
Event Start and Event End	Select the event start and end dates.  Select <b>Auto Start</b> and <b>Auto End</b> to have the event automatically start or end when the Event Start or End date and time are reached. Dates and times are required when selecting the <b>Auto Start</b> and <b>Auto End</b> options.  When a workstation is offline and has no connection to the Check and Posting Service (CAPS), events cannot start or end (automatically and manually).
(Optional) Attendance	Enter the number of people attending the event. You can enter this number during or after the event.

4. Click the **Revenue Centers** tab.
5. Select one or more revenue centers where the event occurs.

To select multiple revenue centers at once, select the revenue center group from the **RVC Groups** drop-down list, and then click the **Add** button. All revenue centers included in the revenue center group are automatically selected.

If the **RVC Groups** field is dimmed, you need to add at least one revenue center group. [Configuring a Revenue Center Group](#) contains more information about setting up revenue center groups.

6. Click **Save**.
7. Events are set as optional by default. To set the event as mandatory:
  - a. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Control Parameters**.
  - b. Select **67 - Association of an Event to every Guest Check is mandatory where Event feature is enabled**.

Setting option **67** requires workstation operators to select an event when beginning a check.

You can override this setting for an employee from the Roles module by selecting Transaction Control option **271 - Authorize/Perform override of the "Event association to a Check is mandatory" option (Control Parameters)**. Overriding option **67** allows the workstation operator to post transactions to no event.

- c. Click **Save**.
- [Configuring Event Privileges and Permissions](#)
  - [Specifying Ad Hoc Reports](#)
  - [Enabling Events](#)
  - [Configuring Event Types and Sub Types](#)
  - [Configuring an Event Area](#)
  - [Linking Events](#)
  - [Breaking Linked Events](#)
  - [Cancelling an Event](#)
  - [Configuring Event Information to Print on Checks and Receipts](#)
  - [Creating Task Schedules](#)
  - [Configuring the Front of House Event Status Bar](#)
  - [Configuring the Front of House Event Buttons](#)

#### Related Topics

- [Event Information in Reporting and Analytics Reports](#)

## Configuring an Event Area

An employee with event areas privileges can set the areas within a property where events take place. An area can be part of one or more revenue centers, or independent of revenue centers. For example, a banking conference might be held in the banquets revenue center, in several rooms (such as banquet bar, banquet restaurant, banquet cocktail, and ballroom). You can associate these room areas with the event. When the workstation operator signs in to an event that has multiple areas, the operator must select the area in which to work. Each transaction is associated with either one area or no area. The event organizer can view information for each area on workstation reports and Reporting and Analytics reports.

1. Select the property, click **Configuration**, and then click **Event Areas**.
2. Insert a new record, and then enter a name for the event area (for example, Ballroom).

3. Click **Save**.

- [Configuring Event Privileges and Permissions](#)
- [Specifying Ad Hoc Reports](#)
- [Enabling Events](#)
- [Configuring Event Types and Sub Types](#)
- [Creating an Event](#)
- [Linking Events](#)
- [Breaking Linked Events](#)
- [Cancelling an Event](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)

**Related Topics**

- [Event Information in Reporting and Analytics Reports](#)

## Linking Events

After creating an event, you can link two or more events so that when one finishes, the other starts (for example, a baseball double header). The linked child event (Game 2) inherits the attributes of the parent event (Game 1), including revenue centers, event areas, and menu levels.

1. Select the property, click **Configuration**, and then click **Event Definitions**.
2. Double-click the event record to open it in form view.
3. Click the **Links** tab.
4. To create a subsequent (child) event for the selected event, select **Add Linked Event**, and then click **Yes** at the confirmation.
5. Double-click the linked event record.
6. From the Linked Event Details dialog, enter information as described in the following table:

**Table 45-5 Linked Event Details Fields**

Field	Description
Event Code	You cannot enter a value. The application appends the short code with an automatically generated code to make the event code value unique.
Short Code	Enter the alphanumeric event code for the event.
Event Name	Enter a descriptive name for the event.

**Table 45-5 (Cont.) Linked Event Details Fields**

Field	Description
(Optional) Attendance	Enter the number of people attending the event. You can enter this number during or after the event.
Event End	Enter the end date and time for the event.

7. Click the **Save Changes** button.

Linked events are not available in the event search list and do not appear in full in the Event Definitions module table view.

- [Configuring Event Privileges and Permissions](#)
- [Specifying Ad Hoc Reports](#)
- [Enabling Events](#)
- [Configuring Event Types and Sub Types](#)
- [Creating an Event](#)
- [Configuring an Event Area](#)
- [Breaking Linked Events](#)
- [Cancelling an Event](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)

#### Related Topics

- [Event Information in Reporting and Analytics Reports](#)

## Breaking Linked Events

There are two methods you can use to break the link of events, each producing a different outcome for the events:

- Break the link between the last linked event and its parent, making the last event the parent event
  - Change a linked event to become the parent event, with subsequent events as the new parent's linked events
1. Select the property, click **Configuration**, and then click **Event Definitions**.
  2. Double-click the event record to open it in form view.
  3. Click the **Links** tab.
  4. To break the link between the last event and its parent:
    - a. Click the **Break Link** link.
    - b. Click **Yes** at the confirmation. The last linked event in the list is removed, and it now appears in the Event Definitions module search/table view as a parent event.

5. To change a linked event into a parent event:
  - a. On the Links tab, double-click the linked event record (for example, select linked event 3 of 5) to open the Linked Event Details dialog.
  - b. Click the **Break Link** button.
  - c. Click **Yes** at the confirmation. Linked event 3 becomes a parent event, and linked events 4 and 5 become its child linked events 1 and 2.

A linked event that has the chain broken from its parent event in the Linked Event Details dialog is available in the Event Definitions module search/table view, and contains any subsequent linked events as its linked events.

- [Configuring Event Privileges and Permissions](#)
- [Specifying Ad Hoc Reports](#)
- [Enabling Events](#)
- [Configuring Event Types and Sub Types](#)
- [Creating an Event](#)
- [Configuring an Event Area](#)
- [Linking Events](#)
- [Cancelling an Event](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)

#### Related Topics

- [Event Information in Reporting and Analytics Reports](#)

## Cancelling an Event

When cancelling an event, consider the following rules:

- You can only cancel an event that has the Uninitialized status.
  - You can cancel a linked event if the parent event has a Started status.
  - When you cancel a parent event, all linked child events are also cancelled.
  - After cancelling linked events, you cannot add new linked events if you used the Break Link function on all cancelled linked events.
1. Select the property, click **Configuration**, and then click **Event Definitions**.
  2. Double-click the event record to open it in form view.
  3. To cancel an event with or without linked events, click **Cancel Event**, and then click **Yes** at the confirmation.
  4. To cancel one linked event:
    - a. Click the **Links** tab.
    - b. Double-click the linked event record to open the Linked Event Details.



- c. Click **Cancel Event**, and then click **Yes** at the confirmation.
5. To cancel multiple linked events:
  - a. Click the **Links** tab.
  - b. Double-click the first linked event record to open the Linked Event Details.
  - c. Click **Cancel Event**, and then click **Yes** at the confirmation. The linked event Status shows Cancelled and Add Linked Event is dimmed. The parent event is not cancelled.

- [Configuring Event Privileges and Permissions](#)
- [Specifying Ad Hoc Reports](#)
- [Enabling Events](#)
- [Configuring Event Types and Sub Types](#)
- [Creating an Event](#)
- [Configuring an Event Area](#)
- [Linking Events](#)
- [Breaking Linked Events](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)

#### Related Topics

- [Event Information in Reporting and Analytics Reports](#)

## Configuring Event Information to Print on Checks and Receipts

You can configure the printing of an event name and code on guest check headers and trailers, customer receipts, and credit card vouchers.

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Format Parameters**.
2. Click the **Options** tab.
3. Select the appropriate printing options:
  - **59 - Print Event Name After Header on Guest Checks and Receipts:** Select this option to print the event short code and name after the header on guest checks and customer receipts.
  - **60 - Print Event Name After Trailer on Guest Checks and Receipts:** Select this option to print the event short code and name after the trailer on guest checks and customer receipts.
4. Click **Save**.

- [Configuring Event Privileges and Permissions](#)

- [Specifying Ad Hoc Reports](#)
- [Enabling Events](#)
- [Configuring Event Types and Sub Types](#)
- [Creating an Event](#)
- [Configuring an Event Area](#)
- [Linking Events](#)
- [Breaking Linked Events](#)
- [Cancelling an Event](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)

#### Related Topics

- [Event Information in Reporting and Analytics Reports](#)

## Creating Task Schedules

A Task Schedule is a timed task that occurs on a Check and Posting Service Host or on a workstation. These tasks perform database-related functions that increase performance of the device.

1. Select the Enterprise or property, click **Configuration**, and then click **Task Schedules**.
2. Insert a new record or double-click an existing task schedule record to open it in form view.

The database includes the following default task schedule records:

- **Purge C&P DB data older than 7 days:** Cleans the Check and Posting database for records older than seven days.
- **Purge WS DB data older than 7 days:** Cleans the workstation database for records older than seven days.
- **Update C&P DB Statistics:** Runs an Update Statistics command on the Check and Posting database.
- **Update WS DB Statistics:** Runs an Update Statistics command on the workstation database.

The purge jobs clear check and totals information, along with message requests that are stored in the local database.

3. From the General Settings section, enter information in the fields as described in the following table:

**Table 45-6 General Settings**

Field	Description
Service Type	Select the type of service to receive the task, either <b>7 - Workstation</b> or <b>8 - Check and Posting</b> .

**Table 45-6 (Cont.) General Settings**

Field	Description
Service ID	Select the service identification for which the task runs. You can only change this value at the property level.
Task Type	Select the type of task. When the task schedule is: <ul style="list-style-type: none"> <li>Database purge, the database for the selected service purges old data. The <b>Task Data</b> field should indicate the number of days to keep data in the local database.</li> <li>Update statistics, the local database performs an update statistics job at the scheduled time. The <b>Task Data</b> field should contain a semicolon-separated list of database tables on which the Update Statistics command runs.</li> <li>Run script, the <b>Task Data</b> field should contain the full path to a script to execute.</li> </ul>
Task Data	This value shows the relevant data for the <b>Task Type</b> .
Duration (seconds)	Enter the duration of the task. The duration time prevents the task from running too long. The duration time does not cause tasks to terminate immediately. For example, the Update Statistics job finishes each database table listed, and then checks the duration of the overall task.
Time Zone	Select the time zone for the task, which determines the time of day when the task runs. A common setting for this field is <b>0 - Local Time Zone</b> , causing the task to run in each property based on the local time at the property.
Schedule Type	Select the recurrence frequency for the task schedule (for example, one time, daily, weekly, or monthly).

4. From the Duration section, select **Enabled** to run the task schedule at the set time. Deselect this option if you do not want the task schedule to run.
  - a. In the **Start date** field, select the first date for the task schedule to run.
  - b. To end the task schedule on a specific date, select **End date**, and then select the date for the task schedule to end. If the task schedule has no end date, select **No end date**.
5. If you selected a recurring frequency in the **Schedule Type** field, click the **Recurrence** tab. The available fields are based on the recurring frequency you selected (daily, weekly, or monthly).
6. Select the appropriate day and time options for the frequency.
7. Click **Save**.

- [Configuring Event Privileges and Permissions](#)
- [Specifying Ad Hoc Reports](#)
- [Enabling Events](#)
- [Configuring Event Types and Sub Types](#)
- [Creating an Event](#)
- [Configuring an Event Area](#)
- [Linking Events](#)
- [Breaking Linked Events](#)
- [Cancelling an Event](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)

#### Related Topics

- [Event Information in Reporting and Analytics Reports](#)

## Configuring the Front of House Event Status Bar

To allow workstation operators to see the event and check details to which sales are posting, you need to add the event status bar to the transaction page, and configure the event information that appears in the status bar.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place the event status bar (typically the transaction page).
3. Click the **Configuration** tab.
4. Select one or both of the following placement options:
  - **Top Status Bar**
  - **Bottom Status Bar**
5. Click the **Add** button in the lower area.
6. From the Add Status Bar Element dialog, select **Operator Current Event Name** for each of the following POS state drop-down lists, and then click **OK**.
  - **Signed Out**
  - **Signed In**
  - **In Transaction**
7. Repeat Steps 5 and 6, selecting the following elements for each POS client drop-down list:
  - **Operator Current Event Shortcode**
  - **Operator Current Event Actual Start Date Time**
  - **Operator Current Event End Date Time**

- **Check Current Event Name**
  - **Check Current Event Shortcode**
  - **Check Current Event Actual Start Date Time**
  - **Check Current Event End Date Time**
8. Click **Save**.
- [Configuring Event Privileges and Permissions](#)
  - [Specifying Ad Hoc Reports](#)
  - [Enabling Events](#)
  - [Configuring Event Types and Sub Types](#)
  - [Creating an Event](#)
  - [Configuring an Event Area](#)
  - [Linking Events](#)
  - [Breaking Linked Events](#)
  - [Cancelling an Event](#)
  - [Configuring Event Information to Print on Checks and Receipts](#)
  - [Creating Task Schedules](#)
  - [Configuring the Front of House Event Buttons](#)

**Related Topics**

- [Event Information in Reporting and Analytics Reports](#)

## Configuring the Front of House Event Buttons

To allow workstation operators to manually start and end an event, you need to add buttons assigned to the Front of House touchscreen page.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place the **Start Event** and **End Event** buttons.
3. On the Edit tab, select the page area in which to define the **Start Event** button.
4. Click **Button**.
5. On the General subtab, enter the button name (for example, Start Event) in the **Legend** field.
6. Select **Function** from the **Type** drop-down list.
7. Click the black arrow directly beneath the **Type** drop-down list, select the type **Event Management**, select the results **Start Event**, and then click **OK**.
8. Position and size the button on the page. Use the Style arrow to change the color.
9. Repeat Steps 3 through 9 to create the **End Event** button, selecting **End Event** for the result.
10. Click **Save**.

- [Configuring Event Privileges and Permissions](#)
- [Specifying Ad Hoc Reports](#)
- [Enabling Events](#)
- [Configuring Event Types and Sub Types](#)
- [Creating an Event](#)
- [Configuring an Event Area](#)
- [Linking Events](#)
- [Breaking Linked Events](#)
- [Cancelling an Event](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)

**Related Topics**

- [Event Information in Reporting and Analytics Reports](#)

## Event Information in Reporting and Analytics Reports

You can view Symphony event-related reporting information in Reporting and Analytics version 8.5.1 and later. The event information includes event code, name, type, sub type, and area.

**Table 45-7 Reporting and Analytics Event Reporting**

Report	Description
Events Summary Reports	<p>These reports provide summary information for properties with events enabled, and help you identify top level areas that need improvement for subsequent events.</p> <p>The following summary reports include event information:</p> <ul style="list-style-type: none"> <li>• Events Today's Operations Report</li> <li>• Events Revenue Center Report</li> </ul> <p>Only the Events Today's Operations Report allows you to drill down to more information or investigate further by running Detail Reports.</p>

**Table 45-7 (Cont.) Reporting and Analytics Event Reporting**

Report	Description
Detail Reports	<p>These reports help you analyze the transaction details for specific events. Parent and child events are shown separately.</p> <p>The following detail reports include event information:</p> <ul style="list-style-type: none"> <li>• Events Adjustments Detail Report</li> <li>• Events Control Report</li> <li>• Events Cost of Goods Sold Summary Report</li> <li>• Events Daily Discounts Report</li> <li>• Events Sales Mix Summary Report</li> <li>• Events Service Charges Report</li> <li>• Events Taxes Report</li> <li>• Events Tender Media Report</li> </ul> <p>Most detail reports allow you to drill down to more information.</p>
Comparison Reports	<p>These reports provide information for comparing key performance indicators used in specific events. Comparison reports help you analyze productivity in different revenue centers and plan future events. Parent and child events are shown separately.</p> <p>The following comparison reports include event information:</p> <ul style="list-style-type: none"> <li>• Events Daily Operations Comparison by Revenue Center (also includes tax information)</li> <li>• Events Store and Date Comparison Report</li> </ul> <p>These reports do not allow you to drill down to more information.</p>

**Table 45-7 (Cont.) Reporting and Analytics Event Reporting**

Report	Description
Menu Engineering Reports	<p>These reports provide information to help you analyze the menu mix, prices, and cost of goods for specific events. Menu engineering reports allow you to increase event revenue by planning menus for subsequent events using menu information from past events. Parent and child events are shown separately.</p> <p>The following menu engineering reports include event information:</p> <ul style="list-style-type: none"> <li>• Events Menu Engineering Items Summary Report</li> <li>• Menu Engineering by Major and Family Group Reports</li> <li>• Events Item Groups Average Pricing Report</li> <li>• Sales Mix Summary Report</li> <li>• Top Items Summary Report</li> </ul> <p>Only the Menu Engineering by Major and Family Group and Events Item Groups Average Pricing reports allow you to drill down to more information.</p>
Employee Reports	<p>These reports provide information about employee performance for specific events. Employee reports help you to select the most productive staff for events and highlight training issues. Parent and child events are shown separately.</p> <p>The following employee reports include event information:</p> <ul style="list-style-type: none"> <li>• Employee Productivity Report</li> <li>• Events Employee Financial List Report (also includes tax information)</li> <li>• Events Employee Sales Performance Report</li> <li>• Events Tip Track Summary Report</li> <li>• Events Manager Control Report</li> <li>• Events Employee Control Report</li> </ul> <p>These reports allow you to drill down to more information.</p>
Events Daily Operations Summary Report	<p>This report provides a summary of the daily operations, including tax information, for one or more events.</p> <p>This report allows you to drill down to more information.</p>
Events Financial Report	<p>This report provides a summary of the daily financials by event. The Events Financial Report shows all tenders, service charges, discounts, taxes, and void activity per revenue center during the event.</p> <p>This report allows you to drill down to more information.</p>



**Table 45-7 (Cont.) Reporting and Analytics Event Reporting**

Report	Description
Events Consolidated Employee Financial Report by RVC	<p>This report shows a combined view of the employee financials by revenue center for each event. It also shows all tenders, service charges, discounts, taxes, and void activity per revenue center during the event.</p> <p>This report allows you to drill down to more information.</p>
Events Menu Item Report by RVC by Employee	<p>This report provides a summary of the menu item sales by revenue center and by employee for each event. The report shows the revenue center number and name, the employee, menu item, quantity sold, price, sales less item discounts, taxes, and net sales.</p> <p>This report allows you to drill down to more information.</p>
Consolidated Events Employee Meal	<p>This report shows a combined view of the employee meals for an event. The report shows the revenue center, the employee consuming the meal, the check number, the time of the transaction, the menu items, the price when the menu item was ordered, taxes associated with the transaction, net sales of the transaction, and the employee adding the sales.</p> <p>This report allows you to drill down to more information.</p>
Event Consolidated RVC Financial	<p>This report shows a combined view of the revenue center financials by event. The report shows all tenders, service charges, discounts, taxes, net sales, voids, transaction count, and percent of sales per revenue center during the event.</p> <p>This report allows you to drill down to more information.</p>
KDS Reports	<p>These reports provide information to help you analyze the sales mix and labor for specific events. Parent and child events are shown separately. KDS reports help to identify problems with preparation and service times, and improve these times for subsequent events.</p> <p>The following KDS reports include event information:</p> <ul style="list-style-type: none"> <li>• Events KDS Summary Report</li> <li>• Events Today's KDS Summary Report</li> <li>• Speed of Service Report</li> </ul> <p>These reports allow you to drill down to more information.</p>

**Related Topics**

- [Configuring Event Privileges and Permissions](#)

- [Specifying Ad Hoc Reports](#)
- [Enabling Events](#)
- [Configuring Event Types and Sub Types](#)
- [Creating an Event](#)
- [Configuring an Event Area](#)
- [Linking Events](#)
- [Breaking Linked Events](#)
- [Cancelling an Event](#)
- [Configuring Event Information to Print on Checks and Receipts](#)
- [Creating Task Schedules](#)
- [Configuring the Front of House Event Status Bar](#)
- [Configuring the Front of House Event Buttons](#)

**Related Topics**

- [Enabling Reports in Enterprise Back Office](#)

# 46

## Dining Room Tables and Seating

You can manage the dining room using Symphony with a standard table management interface, or using the enhanced Table Management System (available with Symphony version 2.6 and later).

- [Standard and Enhanced Table Management](#)
- [Configuring the Standard Table Management Interface](#)
- [Creating Standard Dining Tables](#)
- [Configuring the Standard Dining Table Status Set](#)
- [Table Management](#)
- [Reservation List](#)
- [Wait List](#)
- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)
- [Configuring Table Management Privileges](#)
- [Configuring Reservation Privileges](#)
- [Configuring Wait List Privileges](#)
- [Configuring Servers for Table Management](#)
- [Configuring Properties for Table Management](#)
- [Configuring Custom Images for Table Management](#)
- [Configuring KDS or Dining Course Colors and Images for Table Management](#)
- [Configuring Dining Course Pacing](#)
- [Configuring the Service Total Tender for Table Management](#)
- [Enhanced Dining Tables](#)
- [Setting Dining Table Classes](#)
- [Setting Enhanced Dining Table Attributes](#)
- [Configuring Enhanced Dining Tables](#)
- [Setting Table Decorator Images](#)
- [Configuring Server and Table Availability](#)
- [Setting Table Management Options](#)
- [Configuring Table Suggestion Factors](#)
- [Table Management Alerts](#)
- [Configuring Alerts](#)
- [Table Management Sections](#)
- [Configuring Sections](#)

- Creating the Front of House Reservation List
- Creating the Front of House Wait List
- Front of House Table Management Tasks
- Host Command Area
- Configuring the Host Command Area
- Dining Table Status
- Configuring the Dining Table Status
- Employee Lines
- Configuring Employee Lines
- Section Layout
- Creating a Section Layout
- Creating Enhanced Dining Tables
- Setting Table Management Functions in Check Detail
- Creating the Employee Section Assignment Report Button
- Configuring Table Cancellation Reasons
- Setting Reservation Timing Parameters
- Setting Wait List Timing Parameters
- Reservation Periods
- Configuring Effectivity
- Configuring Acceptance Limits
- Configuring Occupancy Limits
- Configuring Seating Limits
- Configuring Target Turn Times
- Table Management Configuration Levels
- Reservation Configuration Levels
- Wait List Configuration Levels

## Standard and Enhanced Table Management

Dining staff can manage tables in Symphony using one of the following methods:

- Standard table management interface
- Enhanced or integrated tables (available with the Table Management System)

The following table outlines the differences between the two table management methods:

**Table 46-1 Differences Between Standard and Enhanced Table Management**

Function	Standard Tables	Enhanced Tables
Accept reservations	No	Yes

**Table 46-1 (Cont.) Differences Between Standard and Enhanced Table Management**

Function	Standard Tables	Enhanced Tables
Manage a Reservation List	No	Yes
Manage a Wait List	No	Yes
Provide wait quotes	No	Yes
Show table status	Yes	Yes
Estimate table turn times	No	Yes
Assign tables to sections and employees	No	Yes
Join and split tables	No	Yes
Suggest tables	No	Yes
Use function keys on the workstation for bussing and transferring tables	Yes	No
Interface with Oracle Hospitality Reservations Management Cloud Service	No	Yes
Interface with Oracle Hospitality Gift and Loyalty Advanced Cloud Service	No	Yes

**Related Topics**

- [Configuring the Standard Table Management Interface](#)
- [Creating Standard Dining Tables](#)
- [Configuring the Standard Dining Table Status Set](#)

## Configuring the Standard Table Management Interface

1. Select the Enterprise level, click **Setup**, and then click **Interfaces**.
2. Insert a record for Standard Table Management, and then open it in form view.
3. From the **Interface Type** drop-down list, select **3 - Table Management**.
4. From the **Communications Type** drop-down list, select **1 - TCP**.
5. In the **Timeout** field, enter the amount of time (in seconds) that Symphony waits for a response from the standard table management interface before showing a communications failure message.
6. In the **Ping Frequency** field, enter the amount of time (in seconds) that Symphony pings the standard table management server (for example, every 5 seconds).
7. Click the **Options** tab, and then select the appropriate options as described in the following table.

**Table 46-2 Standard Table Management Interface Options**

Option	Description
2 - Enable Interface Log	Select this option to post debug information to the Interface log file.

**Table 46-2 (Cont.) Standard Table Management Interface Options**

Option	Description
5 - ON = Use 9 digits for Terminal IDs; OFF = Use 2 digits for Terminal IDs	Select this option to transmit the entire nine-digit workstation ID to the standard table management system.
8 - Enable Offline Posting	Select this option to allow offline posting to the Symphony POS client.
9 - Determine Link Status Using Ping	Select this option to allow the Symphony POS client to ping the standard table management system.
10 - ON = Use 5-digit RVC #; OFF = Use 3-digit RVC #	Select this option to allow the standard table management system posting message to support a five-digit revenue center number. (Otherwise, the posting is limited to a three-digit revenue center number.)
11 - ON = Use 8-digit Check #; OFF = Use 4-digit Check #	Select this option to allow the standard table management system posting message to support an eight-digit check number. (Otherwise, the posting is limited to a four-digit check number.)

8. In the **TCP Host Name** field, enter the name or IP address of the standard table management server for the interface.
9. In the **Port Number** field, enter 0 (zero).
10. Click the **Properties** tab, and select each property that uses the standard table management system interface.
11. Click the **Service Host** tab, and then select the service host that can run the standard table management system interface.
12. Click **Save**.
13. Select the revenue center, click **Setup**, and then click **RVC Parameters**.
14. Click the **Interfaces** tab.
15. Select the **TMS Operator** to whom a check that is opened by the standard table management system is assigned, before being picked up by a server.
16. Select the **TMS User Workstation** to which a check that is opened by the standard table management system is assigned.
17. From the **TMS Link** drop-down list, select the standard table management interface.
18. Click **Save**.

- [Creating Standard Dining Tables](#)
- [Configuring the Standard Dining Table Status Set](#)

**Related Topics**

- [Standard and Enhanced Table Management](#)

## Creating Standard Dining Tables

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
  2. Double-click the Front of House page on which to define standard dining tables.
  3. On the **Edit** tab, select the page area on which to place the standard dining tables.
  4. Select **Other...**, and then select **Dining Table**.
  5. Move and adjust the table size on the page. Leave space between tables on the page layout to ensure visibility of indicators and table state. You can increase the grid configuration on the page from 24 (default) to 48 using the **Change Grid Size** link.
  6. Repeat Steps 4 and 5 to create additional standard dining tables.
  7. Click **Save**.
- [Configuring the Standard Table Management Interface](#)
  - [Configuring the Standard Dining Table Status Set](#)

### Related Topics

- [Standard and Enhanced Table Management](#)

## Configuring the Standard Dining Table Status Set

You can configure a dining table status set to allow workstation operators to manually assign a specific table status value from the set. For example, dining tables could be used to begin new takeout orders. Workstation operators can update the status of the table based upon the readiness of the order (such as Preparing, Ready, or Called Running Late).

This feature is only available with standard dining tables (not enhanced or integrated tables).

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Dining Table Status Set**.
2. Insert a record for the Dining Table Status Set, and then open it in form view.
3. Click **Add**, and then enter or select information for the fields as described in the following table.

**Table 46-3 Standard Dining Table Status Set Fields and Options**

Field or Option	Description
Name	Enter the name of the dining table status set (for example, waiting or eating).
Override Background Color	Click the ellipsis point (...) button, select the background color, and then click <b>OK</b> .
Override Text Color	Click the ellipsis point (...) button, select the text color, and then click <b>OK</b> .

**Table 46-3 (Cont.) Standard Dining Table Status Set Fields and Options**

Field or Option	Description
Override Image	Click the ellipsis point (...) button, select the image, and then click <b>OK</b> .
Option Bits	Click the ellipsis point (...) button, select the appropriate options, and then click <b>OK</b> . <ul style="list-style-type: none"> <li>• <b>1 - Stretch image to fill area:</b> If you selected an image, this option determines the image appearance and sizing.</li> <li>• <b>2 - Show table #/cover count horizontally:</b> Select this option if you want the table number and cover count to appear horizontally on the table.</li> </ul>
Default Index	Enter the default status between 1 and 99. Enter 0 (zero) if you do not want a default table status.
Disabled Index	Do not use this field.
Styling Key	Enter the object key for the dining table status.

4. Repeat Step 3 for each dining table status you want to add.
5. Click **Save**.

- [Configuring the Standard Table Management Interface](#)
- [Creating Standard Dining Tables](#)

**Related Topics**

- [Standard and Enhanced Table Management](#)

## Table Management

You can integrate dining room management, reservation list, wait list, customer preferences and seating, and staff availability with the Symphony Table Management System, Reservation List, and Wait List.

The Symphony Table Management System (TMS) allows you to perform the following actions:

- Make reservations
- Maintain a Wait List
- Seat guests immediately at available tables
- Control the number of reservations allowed during specific time periods
- See an overview of enhanced dining tables and status
- Update the table status based on coursing
- Manage the seating layout with table, section, and server assignments
- Change table seating capacities
- Estimate wait quote times



- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)

**Related Topics**

- [Table Management Configuration Levels](#)

## Reservation List

The Reservation List contains all reservation requests for the revenue center. Hosting staff with access to the Reservation List can create, edit, and cancel reservation requests from the list.

- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)

**Related Topics**

- [Configuring Reservation Privileges](#)
- [Creating the Front of House Reservation List](#)
- [Setting Reservation Timing Parameters](#)
- [Reservation Configuration Levels](#)

## Wait List

Often a guest arrives and asks for a table. When tables are not immediately available for seating, the guest may request a wait time and add their name to a Wait List. The Wait List contains all wait requests for the revenue center. The Wait List also shows reservations prior to the scheduled arrival. Reservations appear on the Wait List a configured number of minutes prior to the schedule seating time. Hosting staff with access to the Wait List can add, change, and abandon wait requests from this list. Hosting staff can manage the Wait List on its own page or as a popup in the host view.

- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)

**Related Topics**

- [Configuring Wait List Privileges](#)
- [Creating the Front of House Wait List](#)
- [Setting Wait List Timing Parameters](#)
- [Wait List Configuration Levels](#)

## Table Management, Reservation, and Wait List Configuration Prerequisites

Before configuring reservations, you must complete the following tasks:

- Configure the Symphony Table Management System (TMS)
- Configure the Symphony Wait List to accept and seat guests with reservations

If the property is using a Wait List, but does not take reservations, you only need to configure the TMS before setting up the Wait List. (A Reservation List is not required with the Wait List.)

The Symphony TMS, Reservations, and Wait List integrate with loyalty applications such as Oracle Hospitality Gift and Loyalty, and third party loyalty applications based on the loadable loyalty modules. When you use Symphony TMS, Reservations, or Wait List with loyalty applications, workstation operators can associate the loyalty account with the reservation request or walk-in guest. After associating guest loyalty information with the table request, the information follows the guest through the life of the guest check. To use the Symphony TMS, Reservations, or Wait List with a loyalty application, you must configure the loadable loyalty module. [Loyalty Configuration Tasks](#) contains more information about configuring the loyalty module.

- [Table Management](#)

**Related Topics**

- [Table Management Configuration Levels](#)
- [Reservation List](#)

**Related Topics**

- [Configuring Reservation Privileges](#)
- [Creating the Front of House Reservation List](#)
- [Setting Reservation Timing Parameters](#)
- [Reservation Configuration Levels](#)
- [Wait List](#)

**Related Topics**

- [Configuring Wait List Privileges](#)
- [Creating the Front of House Wait List](#)
- [Setting Wait List Timing Parameters](#)
- [Wait List Configuration Levels](#)

## Configuring Table Management Privileges

1. Select the Enterprise, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **Guest Management** subtab.
3. Select the appropriate options for the privileges. The following table summarizes the privileges associated with table management functionality and the recommended roles to have the privilege set.

**Table 46-4 Table Management Privileges**

Tab Location	Option Number	Privilege Name	Allows the Employee to ...	Recommended Roles
Guest Management	32020	Edit Section Layout	Edit a section layout	Host, Manager
Guest Management	32021	Activate Section Layout	Activate a defined section layout as the Active Layout	Host, Manager

**Table 46-4 (Cont.) Table Management Privileges**

Tab Location	Option Number	Privilege Name	Allows the Employee to ...	Recommended Roles
Guest Management	32022	Delete Section Layout	Delete an existing section layout	Host, Manager
Guest Management	32031	Assign Employee to Table	Assign an employee to a table or section in TMS	Host, Manager
Guest Management	32032	Mark Table Clean or Dirty	Mark a table as clean or dirty	Host, Manager
Guest Management	32033	Change Table State	Mark tables as being Available, Closed, Reserved, or Merged	Host, Manager
Guest Management	32034	Seat Unsuggested Table	Seat a table request at a table that is different than the table that was suggested by the TMS Table Suggestion System	Host, Manager
Guest Management	32037	View Legend	View the TMS Legend and use the available functions contained within the form	Host, Manager
Guest Management	32038	Allow Seating Guest Above or Below Table Capacity	Seat a table request at a table that does not support a different seating capacity (other than the cover count on the table seating request)	Host, Manager
Guest Management	32039	Allow Seating Guest at Table that does not Meet all Required Table Preferences	Seat a table request at a table that does not meet all of the seating preferences defined on the table seating request	Host, Manager
Guest Management	32040	Edit Server Availability	Edit the server availability	Host, Manager

**Table 46-4 (Cont.) Table Management Privileges**

Tab Location	Option Number	Privilege Name	Allows the Employee to ...	Recommended Roles
Ad Hoc Reports	31044	Run Employee Section Assignment Report	Run the Employee Section Assignment Report	Host, Manager
Transactions	22	Post Payment to Checks Belonging to Another Operator	Unseat a table request	Host, Manager
Transactions	37	Authorize/ Perform Posting of Payment	Unseat a table request	Host, Manager
Transactions	38	Authorize/ Perform Closing of Checks with a Zero Balance	Unseat a table request	Host, Manager
Guest Checks	18	Authorize/ Perform Pickup of a Check Belonging to Another Operator	Unseat a table request	Host, Manager

4. Click **Save**.

## Configuring Reservation Privileges

1. Select the Enterprise, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **Guest Management** subtab.
3. Select the appropriate options for the privileges. The following table summarizes the privileges associated with reservation functionality and the recommended roles to have the privilege set:

**Table 46-5 Reservation Privileges**

Option Number	Privilege Name	Allow the Employee to ...	Recommended Roles
32006	Greet Wait List Entry	Greet a reservation request if the party arrives earlier than the time at which the reservation automatically moves to the Wait List	Host, Manager

**Table 46-5 (Cont.) Reservation Privileges**

Option Number	Privilege Name	Allow the Employee to ...	Recommended Roles
32007	Mark as No Show	Mark a reservation request as a no-show if the guest does not arrive	Host, Manager
32010	Add Reservation Entry	Create a reservation request	Host, Manager
32011	Edit Reservation Entry	Edit an existing reservation request	Host, Manager
32012	Cancel Reservation Entry	Cancel a reservation request	Host, Manager
32013	Approve Reservation Entry	Approve a reservation that is requesting a date or time outside the acceptable or allowable timeframe	Host, Manager

4. Click **Save**.

- [Creating the Front of House Reservation List](#)
- [Setting Reservation Timing Parameters](#)

**Related Topics**

- [Reservation List](#)
- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)
- [Reservation Configuration Levels](#)

## Configuring Wait List Privileges

1. Select the Enterprise, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **Guest Management** subtab.
3. Select the appropriate options for the privileges.

The following table summarizes the privileges associated with wait list functionality and the recommended roles to have the privilege set:

**Table 46-6 Wait List Privileges**

Option Number	Privilege Name	Allow the Employee to ...	Recommended Roles
32001	Add Wait List Entry	Create a new Wait List request	Host, Manager
32002	Edit Wait List Entry	Edit an existing Wait List request	Host, Manager

**Table 46-6 (Cont.) Wait List Privileges**

Option Number	Privilege Name	Allow the Employee to ...	Recommended Roles
32003	Abandon Wait List Entry	Abandon a Wait List request	Host, Manager
32004	Seat Wait List Entry	Seat a Wait List request	Host, Manager
32005	Unseat Wait List Entry	Unseat a Wait List request	Host, Manager
32006	Greet Wait List Entry	Greet a Wait List request	Host, Manager
32007	Mark as No Show	Mark a reservation request as a no-show if the guest does not arrive	Host, Manager

4. Click **Save**.

- [Creating the Front of House Wait List](#)
- [Setting Wait List Timing Parameters](#)

**Related Topics**

- [Wait List](#)
- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)
- [Wait List Configuration Levels](#)

## Configuring Servers for Table Management

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Employee Maintenance**.
2. Search for and select the employee record.
3. In the **Check Name** field, enter the server's name as you want it to appear on the workstation. If you do not enter a **Check Name**, the workstation shows a blank name.
4. Click the **Operator Records** subtab near the lower area of the screen.
5. In the **TMS Color** field, select the color to distinguish the server from other servers on the host page, and then click **OK**.

Although you can set a different color for each revenue center within a property, Oracle recommends that you use a single color for the server across the property. If you do not set a TMS Color, the workstation shows white.

6. In the **Server Efficiency** field, enter **0** (zero) if you want the Symphony TMS to ignore the server in the table suggestions.

The Table Suggestion System (within TMS) sets the **Server Efficiency** rating to determine the next table recommended for seating. This rating is a value between 0 (zero) and 100, and represents the number of covers that the server can efficiently service at one time.

7. Click **Save**.

## Configuring Properties for Table Management

1. Select the property, click **Setup**, and then click **Properties**.
2. Highlight the property record.
3. In the **Simphony Platform** field, select **2 - Extensible Clients and Architecture**.
4. Click **Save**.

## Configuring Custom Images for Table Management

You can load custom images into the Simphony application to represent table seating configuration and statuses. The TMS uses both custom images and images packaged with Simphony. All images are transparent Portable Network Graphics (PNG) files.

Table images show a graphical representation of the table and chairs. These images can be a square or round table surrounded by any number of chairs.

Table decorators show a graphical representation of the table status (for example, dirty, closed, or reserved).

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Content**.
2. Double-click the content name row to view the image set for that name.
3. Click the **Import from a file** link to import custom images.
4. Browse to the file location, select the image file, and then click **Open**.
5. Repeat Steps 2 through 4 to import each table image and table decorator.
6. Click **Save**.

## Configuring KDS or Dining Course Colors and Images for Table Management

You can set a color or image to indicate the KDS or dining course that the table is being serviced under.

1. Select the Enterprise or property, click **Descriptors**, and then click **KDS/Dining Course**.
2. Insert dining course records if they do not exist.
3. In the **Course Color** field, select a color for each dining course name.

This color appears as the dining course indicator on the table image in the workstation. For example, appetizers can be green, entrées can be yellow, and desserts can be red.

4. (Optional) From the **Course Image Name** field, select a the course decorator image to represent the dining course (in place of a course color). The image you select replaces the default Occupied image on the table. To remove a Course Image that was previously set, select **0 - None**, and then click **OK**.
5. Click **Save**.

## Configuring Dining Course Pacing

You can set the pace at which Symphony sends dining courses to the kitchen. This feature only works for menu items that have KDS prep times configured.

1. In the EMC, select the Enterprise, or property, click **Descriptors**, and then click **KDS/Dining Course**.
2. Insert a dining course record if it does not exist, and then enter the following information:

- **Initial Course Min Prep Time:** Enter the target done time for the course.

For example, if you enter 10 minutes and an item with a prep time of 6 minutes is sent to the kitchen, it will not fire to Prep Stations until 4 minutes have elapsed. If an item with a prep time of more than 10 minutes or without any prep time is sent to the kitchen, it will fire immediately. The timer for the next course does not start until this time is exceeded.

- **Min Prep Time:** Enter the minimum amount of time that the KDS Controller should wait before sending the next course to the kitchen after the current course is bumped from all Prep Stations. This option is not applicable to the first dining course.
- **Max Prep Time:** Enter the maximum amount of time that the KDS Controller should wait before sending the next course to the kitchen after the current course is bumped from all Prep Stations.

3. Click **Save**.

## Configuring the Service Total Tender for Table Management

You can configure a unique service total tender media record to process seating and unseating of guests.

1. Select the Enterprise, click **Configuration**, and then click **Tender/Media**.
2. Create a tender media record, and then name it **TMS**.
3. Double-click the record to open it.
4. From the **Key Type** drop-down list, select **2 - Service Total**.
5. Click **Save**.

## Enhanced Dining Tables

Complete the following tasks to set up enhanced dining tables:

- Set Dining Table Classes
- Set Enhanced Dining Table Attributes
- Configure Enhanced Tables

### Related Topics

- [Setting Dining Table Classes](#)
- [Setting Enhanced Dining Table Attributes](#)



- [Configuring Enhanced Dining Tables](#)

## Setting Dining Table Classes

You can group and configure similar tables into a dining table class.

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **Dining Table Class**.
2. Insert a dining table class.
3. Select or enter information for the following fields.

**Table 46-7 Dining Table Class Fields**

Field	Description
Name	Enter the name of the dining table class. The name identifies the class (for example, 2 Tops, 4 Tops, and so on).
(Optional) Default Background Color	Select a background color to represent the table. Select a different color than the page background so as not to blend similar colors.  If you associate a transparent table image with the dining table class, the background color appears with the image. If you select <b>0 - None</b> , the application shows the table image and background color of the page.
(Optional) Default Text Color	Select the text color to represent the table number or name. Select a different color than the page background so as not to blend similar colors.  If you select <b>0 - None</b> , the application shows the default text color of black.
(Optional) Default Image	Select the image to represent the table.
Minimum Covers	Enter the lowest number of covers that the dining table class can accommodate (for example, a 2-Top can accommodate a minimum of 1 person).
Maximum Covers	Enter the largest number of covers that the dining table class can accommodate (for example, a 2-Top can accommodate a maximum of 2 people).  You can overlap covers to seat a specific cover count within one or more dining table classes (for example, 4 covers on a 4-Top or 6-Top).
Options	If you are using enhanced dining tables within the dining table class, select <b>1 - Enhanced Dining Table</b> . If you are using legacy standard tables, deselect Enhancement Dining Table.

4. Click **Save**.
- [Setting Enhanced Dining Table Attributes](#)
  - [Configuring Enhanced Dining Tables](#)

### Related Topics

- [Enhanced Dining Tables](#)

## Setting Enhanced Dining Table Attributes

You can set characteristics of the table for use in the table suggestion process.

1. Select the property, click **Setup**, and then click **TMS Table Attributes**.
2. Select or enter information for the following fields.

**Table 46-8 TMS Table Attributes Fields**

Field	Description
Name	Enter the name of the attribute, characteristic, or guest preference associated with a table (for example, Accessible, Window Seats, City View, Ocean View, or Booth).
Code	Enter the attribute code associated with a guest preference in the request (for example, ADA, WIND, CITY, OCN, or BTH).
(Optional) Is Exclusive	Select this option if the table attributes must be met before being included in table seating suggestions. For example, the Accessible attribute is exclusive.

3. Click **Save**.
- [Setting Dining Table Classes](#)
  - [Configuring Enhanced Dining Tables](#)

### Related Topics

- [Enhanced Dining Tables](#)

## Configuring Enhanced Dining Tables

Dining tables represent the physical location where a party can be seated with a Quick Seating operation or from the Wait List.

1. Select the property, click **Setup**, and then click **Tables**.
2. Select or enter information for the following fields.

**Table 46-9 Tables Fields**

Field	Description
Table Number (# symbol)	Enter a unique table number for all revenue centers within the property. The Table Number appears on the workstation and represents the internal number used to distinguish one table from another within the property.

**Table 46-9 (Cont.) Tables Fields**

Field	Description
Name	<p>Enter a unique table name for all revenue centers within the property. The table name appears on the workstation and represents the local facing name or number used to differentiate the table from others. Values in the Name field can be:</p> <ul style="list-style-type: none"> <li>• All numeric</li> <li>• All alpha</li> <li>• Alpha and then numeric</li> </ul>
Class	<p>Select the dining table class. The dining table class defines the type of table. All instances of this table number use the color, image, and cover configurations defined for the selected dining table class.</p> <p>Create only tables that are to be used for seating within a revenue center. Creating non-seatable tables (such as bar tabs) prevents the table suggestion system from properly distributing tables.</p> <p>Do not delete tables unless you no longer need them for reports. Oracle Hospitality recommends that you assign tables that are not used to a dining table class named to indicate this status. For example, create a dining table class named NOT IN USE and assign unused tables to this class. Tables assigned to the NOT IN USE class cannot be used for seating, but remain in the Symphony TMS for reporting purposes.</p>
Table Attributes	<p>Associate one or more attributes with a table. When you set attributes, the application matches guest preferences with tables. For example, when a guest prefers window seats, tables associated with a window seating attribute move up in the table suggestion process.</p>

3. Click **Save**.

- [Setting Dining Table Classes](#)
- [Setting Enhanced Dining Table Attributes](#)

**Related Topics**

- [Enhanced Dining Tables](#)

## Setting Table Decorator Images

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **TMS Parameters**.
2. (Optional) Click the link next to each Dining Table Decoration Image Name to view a list of images (set as custom images).

Dining table images are optional but useful as part of daily table management operations. [Configuring Custom Images for Table Management](#) contains more information about setting custom images.

3. Select an image to represent each of the following statuses:

**Table 46-10 Dining Table Decoration Images**

Table Status	Description
Select	The application uses this decorator when a workstation operator selects one or more tables. Table selection is only available on a page with the Host Command Area. Table selection allows the workstation operator to apply a specific action to the selected tables.
Dirty	The application uses this decorator when a table is in a status of Dirty. Workstation operators can still seat guests at dirty tables.
Seated	The application uses this decorator when a guest is newly seated at a table. This status remains until the guest places an order. After placing an order, the table status changes to Occupied.
Occupied	The application uses this decorator after a guest places an order at the table. This status remains until the guest tenders the check.  The image associated with the Occupied status is overridden when you set images for dining courses. <a href="#">Configuring KDS or Dining Course Colors and Images for Table Management</a> contains more information about setting dining course images.
Printed	The application uses this decorator when the workstation operator prints the guest check. The table is considered occupied, and the Printed status appears in addition to the Occupied status.
Paid	The application uses this decorator after a guest completes the dining experience and tenders the check. This status remains for the duration of time set in the Auto Reset Paid Status (Minutes) field. Host staff can seat new guests at tables marked as Paid. After a host seats a guest at a Paid table, the table status resets.
Parent	The application uses this decorator to identify the table as the parent table in a merged table grouping. This status appears in addition to the other status indicators.

**Table 46-10 (Cont.) Dining Table Decoration Images**

Table Status	Description
Child	The application uses this decorator to identify the table as the child table in a merged table grouping. This decorator includes a text overlay that identifies the child's parent table number and name. The application clears both Parent and Child decorators when the workstation operator removes the merged table grouping.
Closed	The application uses this decorator to indicate a status of Closed. Host staff cannot seat guests at closed tables.
Reserved	The application uses this decorator to indicate a status of Reserved. The Table Suggestion process does not consider reserved tables for seating.
User Suggested	The application uses this decorator to identify the table as the host staff recommended seating placement for the highlighted table request on the Wait List.
System Suggested	The application uses this decorator to identify the table as the system recommended seating placement for the highlighted table request on the Wait List.
Highlighted	Do not use this decorator.
Host Area	This image is not a table decorator, but an optional image placement for the Host Command Area. You can use this image to place the restaurant logo on the host page.

4. Click **Save**.

## Configuring Server and Table Availability

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **TMS Parameters**.
2. Click the **Configuration** tab, and then click the **Table Suggestion** subtab.
3. In the **Default Server Available Time (Minutes)** field, enter the default number of minutes to use when making a server unavailable in the TMS. You can set this to a duration between 1 and 480 minutes.
4. In the **Auto Reset Paid Status (Minutes)** field, enter the number of minutes that the table decorator shows as paid on the host page before returning to an available status. You can define a buffer of time between when the table service moves from tendered, cleaned, and available for a new seating. Setting a value of 0 (zero) or blank defaults the time to 1 minute.
5. Click **Save**.

## Setting Table Management Options

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **TMS Parameters**.
2. On the **Configuration** tab, select **Enable Table Management** to turn on TMS functions in Symphony.

Select this option only for properties and revenue centers that use the TMS features. This option increases workstation resources and communications bandwidth for the Enterprise.

3. If you are using a loyalty program to look up and process transactions, select the **Loyalty Module ID** from the drop-down list. If you are not using a loyalty program, select **None**.
4. Select the appropriate TMS Options in the lower area of the screen. The following table describes the options.

**Table 46-11 TMS Options**

Option	Description
Close Unassigned Tables on Section Layout Activation	Select this option to automatically close tables that are not assigned to a section when a workstation operator activates a section layout.
Allow Multiple Loyalty Accounts per Guest Check	Select this option to allow the workstation operator to associate additional loyalty accounts with the guest check by selecting seats. Deselect this option to limit one loyalty account per guest check.  This option determines whether the workstation operator can associate multiple loyalty accounts with a guest check.
Enable Guest Information Chit Printing	Select this option to print a chit when the host staff seats the table request.
Update Table On KDS Bump Event	Select this option to update the KDS or dining course on the table image after the workstation operator bumps the menu from the KDS. Deselect this option to update the KDS or dining course on the table image after the workstation operator performs a service total.  Select this option only when the property or revenue center uses a Kitchen Display System (KDS). This option determines when the dining course updates on the host page table image.
Prompt for Employee on Unassigned Table	Select this option to have the workstation operator assign a server during seating. This option determines whether the host staff can seat a table without a server assignment.

**Table 46-11 (Cont.) TMS Options**

Option	Description
Enable Seating Of Unavailable Tables	Select this option to allow the host staff to seat guests at a table defined as unavailable (including Closed, Dirty, and Reserved).
Ignore Cover Count	<p>Select this option to maintain a valid cover count for the seating record while incrementing the guest count from 0 (zero) to a number based on the menu items ordered (entrée count).</p> <p>This option determines the initial guest count set on the guest check when the host staff seats the table request. Select this option if you do not want the cover count shown on the guest check; instead the application relies on guest check configuration to determine the guest count value. Deselect this option to have the cover count set on the table request and provided to the guest check as the initial guest count.</p> <p>When you select <b>Ignore Cover Count</b>, you must also deselect the option <b>Use Number of Seats for Guest Count</b> from the RVC Parameters module.</p>
Enable Edit Seating Capacity	Select this option to allow the workstation operator to change the seating capacity of a table from its configured number of seats.
Set Seating Capacity on Table Merge	Select this option to have the workstation operator enter the new number of seats for a table when merging tables.
Enable Create and Edit buttons on Wait List and Reservation List Screens	Select this option to show the <b>Create</b> and <b>Edit</b> buttons on the POS client Wait List and Reservation List screens. The workstation operator can click the buttons in the POS client (rather than double-tap the Reservation List or Wait List).

**Table 46-11 (Cont.) TMS Options**

Option	Description
Enable Offline Reservations	<p>Select this option to allow workstation operators to create reservations when connectivity to the Table Management Service is not available. This is primarily used at properties when the host workstations are unable to access the service but want to create reservations. Setting this option does not restrict the workstation operator's ability to add records to the Wait List.</p> <p>When you enable offline reservations, the potential to overbook seating increases as the reservations are not recorded to a single destination. After the application re-establishes connectivity to the service, the application reports offline reservations to the service. If the remaining inventory becomes zero, the offline reservations being reported to the service are removed without notification. In cases where more than one source of reservations are defined (for example, multiple hosting workstations or online reservations), Oracle Hospitality discourages use of this option. Oracle Hospitality recommends that you disable offline reservations.</p>

5. Click **Save**.

## Configuring Table Suggestion Factors

The Table Suggestion process uses several optional factors to determine the next parties to seat, and the tables that the TMS suggests for seating. Although the table suggestion factors all work together, Oracle Hospitality recommends that you use only a few factors initially to become accustomed to how the listing and suggestion process works for the property.

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **TMS Parameters**.
2. Click the **Table Suggestion** tab.
3. Use the arrow buttons to move and rank the suggestion factors. The factor order alters the table suggestion calculations.

**Table 46-12 Table Suggestion Factors**

Table Suggestion Factor	Places a Greater Value On ...
Reservation Waiting	Reservations that have been waiting longer than other requests in the seating order
Waiting Past Quote	Reservation or walk-in requests where the request has been waiting longer than their scheduled seating time or quoted wait time



**Table 46-12 (Cont.) Table Suggestion Factors**

Table Suggestion Factor	Places a Greater Value On ...
Reservation Waiting Past Quote	Reservation requests where the request has been waiting longer than the scheduled seating time
Reservation Greeted	Reservation requests where the party has arrived and hosting staff greeted them
Reservation	Reservation requests versus non-reservation requests (walk-ins) in the seating order
VIP Waiting	Reservation requests where the party is designated as a VIP and have been waiting versus non-VIP reservation and walk-in requests that have been waiting in the seating order
VIP	Reservation and walk-in requests where the party is designated as a VIP in the seating order
Table Dirty	Any table marked as Dirty
Table Paid	Any table marked as Paid
Server Check Count	Any server based on their current service check count (open and closed)
Server Cover Count	Any server based on their current service cover count
Server Efficiency	Any server based on their Server Efficiency Rating
Server Last Assigned	Any table based on the table's current server assignment and the time since the server received a new table seating

4. Click **Save**.

## Table Management Alerts

You can set two optional types of table management alerts: Service Alerts and Check Alerts.

Service Alerts show the duration since the last service interaction (for example, guest ordered a menu item). If you do not set Service Alerts, the table management system does not track service intervals on the guest check.

Check Alerts show how long the guest has been seated at the table. This alert changes as the service interaction passes defined thresholds. If you do not set Check Alerts, the table management system only tracks the duration of time the guest check is open and does not change the Check Alert color.

### Related Topics

- [Configuring Alerts](#)

## Configuring Alerts

1. Select the revenue center, click **Setup**, and then click **Service Alert**.
2. Enter the name of the service alert as you want it to appear to the workstation operator (for example, Recent Service, No Touch Warning, or Service Warning).
3. Set the **Service Alert Time** to the number of minutes since the last service total elapses before triggering the service alert.  
  
To start the alert immediately upon seating of the guest, set the time to 0 (zero). The application resets the timer to 0 when the workstation operator performs a service total with a new menu item on the guest check.
4. Select the **Service Alert Color** to distinguish one alert from another in the service alert table area on the host page. Only seated tables show a service alert color.
5. Click **Save**.
6. Select the revenue center, click **Setup**, and then click **Check Alert**.
7. Enter the name of the check alert as you want it to appear to the workstation operator (for example, In Service, Turn Waiting, or Turn Alert).
8. Set the **Check Alert Time** to the number of minutes since the check was opened before triggering the next check alert.  
  
To start the alert immediately upon seating of the guest, set the time to 0 (zero). The application resets the timer to 0 when the workstation operator performs a service total with a new menu item on the guest check. The check alert remains as the last alert until the workstation operator closes the guest check.
9. Select the **Check Alert Color** to distinguish one alert from another in the check alert table area on the host page. Only seated tables show a check alert color.
10. Click **Save**.

### Related Topics

- [Table Management Alerts](#)

## Table Management Sections

You can group tables within an area or station to indicate assignment to a specific server. Optional seating section templates allow you to set predefined table layouts where the application automatically assigns tables to a specific section. You can create seating section layouts at the property level.

### Related Topics

- [Configuring Sections](#)

## Configuring Sections

1. Select the property, click **Setup**, and then click **Section**.
2. Enter the name of the section as you want it to appear to the workstation operator and in reports.

3. Select the color used to distinguish one section from another when viewing tables on the host page.  
Only tables that are assigned to a section inherit the section color.
4. Click **Save**.
5. Select the property, click **Setup**, and then click **Seating Section Templates**.
6. Enter the name of the section template as you want it to appear to the workstation operator.
7. Select **Add** to define a table as part of the template.
  - a. From the new record, click the build box to view a list of tables defined for the revenue center. Alternatively, you can enter the **Table ID**, and then press the **Tab** key.
  - b. Select the section from the available list or enter the **Section ID**.
8. Click **Save**.

#### Related Topics

- [Table Management Sections](#)

## Creating the Front of House Reservation List

The Reservation List allows hosting staff to manage all reservation requests. Oracle recommends that you create a Reservations List on a page for the reservation functions. You can use the template provided in Symphony. If a property uses future reservations or multiple dining room layouts, a Tabbed Template provides workstation operators with a smoother means to navigate between wait lists, reservation lists, and table layouts.

The Table Management System (TMS), Wait List, and Reservation functions must reside within the same content area on a page in order to interact.

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Double-click the Front of House page on which to place the Reservation List.
3. On the **Edit** tab, select the page area in which to define the reservations.
4. Click **Other...**, select **Table Management**, and then select **Reservation Area**.

The Reservation List contains buttons for creating future reservations. You can place the Reservation List alone or within the Host Command Area, where hosting staff can hide and recall it. Oracle Hospitality recommends placing the Reservation List on its own page. After placing the reservation area, the Reservation List settings appear in two sections:

- **Reservation List Columns:** The columns section allows you to set Reservation List columns and formats that appear on the POS client. You can configure the content, width, and order in which the columns appear on the Reservation List.
  - **Summary Area:** The summary section allows you to set the reservation details that appear on the POS client when a workstation operator highlights a reservation in the Reservation List.
5. Highlight the reservation area, and then select **Reservation List Columns**.

6. In the **Header** and **Detail Font Size** fields, select the size of the font used to show the reservation heading and detail.
7. For each Reservation List column, select the **Enable** option if you want the column name to appear in the POS client Reservation List, and then enter the column width for each column.

**Table 46-13 Reservation List Columns**

Column Name	Description
Cancel Date	If a reservation is cancelled or the guest does not arrive, this column shows the date and time of cancellation.
Alert Icon	The alert icon is always enabled and is the first column shown in the Reservation List. This column contains icons to indicate status or properties of the reservation record. Alert icons represent the request method, VIP status, and seating preferences.
Confirmation Number	Simphony issues a confirmation number after a workstation operator or guest creates a reservation.
Covers	This column shows the number of covers for the reservation.
Created	This column shows the date and time the reservation was created.
Greeted	This column shows the time when the host staff greeted the guest.
Time	The time is always enabled and is the second column shown in the Reservation List. This column shows the time when the reservation is scheduled to be seated.
Guest Name	This column shows the name in which the reservation was created.
Pager Number	Do not use this column.
Phone Number	This column shows the guest's phone number.
Request Method	This column shows an icon representing the source of the reservation (phone or Internet).
VIP	This column shows an icon representing the VIP flag if the guest has a VIP status.
Wait Quote	Do not use this column.

8. Click the black up and down arrows in the top portion of the Reservation List Columns section to sort and move each enabled column to the order of appearance in the POS client Reservation List.
9. Select **Summary Area**.
10. Select **Show Summary** to show reservation details in the Reservation List when a workstation operator highlights a reservation.
11. In the **Summary Height** field, enter a static height for the summary information.

When you enter 0 (zero), the height of the summary area appears dynamically, depending on the amount of content and details associated with the highlighted reservation.

12. In the **Label** and **Detail Font Size** fields, select the size of the font used to show the summary label and details.
13. For each Reservation summary field:
  - Select the **Enable** option to show summary content in the POS client Reservation List.
  - Select the **New Line** option to show summary information on a new line in the POS client Reservation List.

The information in the Summary Area is the same as the Reservation List Columns, with the addition of the content listed in the following table.

**Table 46-14 Reservation List Summary**

Summary Content	Description
Notes	This summary option contains text included in the Notes field of the reservation record. This field holds up to 255 characters of text and automatically wraps in the summary area.
Referral Notes	This summary option contains text included in the Referral Notes field of the reservation record. This field holds up to 255 characters of text and automatically wraps in the summary area.

14. Click **Save**.
  - [Configuring Reservation Privileges](#)
  - [Setting Reservation Timing Parameters](#)

#### Related Topics

- [Reservation List](#)
- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)
- [Reservation Configuration Levels](#)

## Creating the Front of House Wait List

The Wait List allows hosting staff to manage all table requests (including walk-ins and pending reservations). Oracle Hospitality recommends that you create a Wait List on a page for the table request functions. You can use the templates provided in Symphony. If the property uses future reservations or multiple dining room layouts, a Tabbed Template provides workstation operators with a smoother means to navigate between wait lists, reservation lists, and table layouts.

The Table Management System (TMS), Wait List, and Reservation functions must reside within the same content area on a page in order to interact.

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Double-click the Front of House page on which to place the Wait List.
3. On the **Edit** tab, select the page area in which to define the Wait List.
4. Click **Other....**, select **Table Management**, and then select **Wait List**.

The Wait List contains buttons for creating walk-in table requests. You can place the Wait List alone or within the Host Command Area, where hosting staff can hide and recall it. Oracle recommends creating a Wait List on the same page as the tables to simplify the seating process. After placing the wait list, the Wait List settings appear in two sections:

- **Wait List Columns:** The columns section allows you to set Wait List columns and formats that appear on the POS client. You can configure the content, width, and order in which the columns appear on the Wait List.
  - **Summary Area:** The summary section allows you to set the wait list details that appear on the POS client when a workstation operator highlights a table request in the Wait List.
5. Highlight the **Wait List**, and then select **Wait List Columns**.
  6. From the **Header** and the **Detail** fields, select the size of the font used to show the Wait List heading and detail.
  7. For each Wait List column, select the **Enable** option to have the column name appear in the workstation Wait List, and then enter the column width for each column.

**Table 46-15 Wait List Columns**

Column Name	Description
Abandon Time	Do not configure the Wait List to contain this column.
Alert Icon	The alert icon is always enabled and is the first column shown in the Wait List. This column contains icons to indicate status or properties of the table request record. Alert icons represent the quote status, request method, VIP status, and seating preferences.
Confirmation Number	The confirmation number appears only for table requests that originate from the Reservation List.
Covers	This column shows the number of covers for the table request.
Created	This column shows the date and time the table request was created.
Greeted	This column shows the time when the host staff greeted the guest.
Guest Name	This column shows the name for the table request.
Pager Number	This column shows the pager number for the table request.

**Table 46-15 (Cont.) Wait List Columns**

Column Name	Description
Phone Number	This column shows the guest's phone number.
Request Method	This column shows an icon representing the source of the table request (walk-in, phone-in, or Internet).
VIP	This column shows an icon representing the VIP flag if the guest has a VIP status.
Wait Quote	This column shows the estimated wait quote time given for the table request.

8. Click the black up and down arrows in the top portion of the Wait List Columns section to sort and move each enabled column to the order of appearance in the POS client Wait List.
9. Select **Summary Area**.
10. Select **Show Summary** to show table request details in the Wait List when a workstation operator highlights a table request.
11. In the **Summary Height** field, enter a static height for the summary information.  
When you enter 0 (zero), the height of the summary area appears dynamically, depending on the amount of content and details associated with the highlighted table request.
12. From the **Label** and **Detail** fields, select the size of the font used to show the summary label and details.
13. For each Wait List summary field:
  - Select the **Enable** option to have the summary content appear in the POS client Wait List.
  - Select the **New Line** option to have the summary information appear on a new line in the POS client Wait List.

The information in the Summary Area is the same as the Wait List Columns, with the addition of the content listed in the following table.

**Table 46-16 Wait List Summary**

Summary Content	Description
Estimated Wait Time	This summary option contains the approximate time remaining until a table will be ready for the guest. This value differs from the wait quote, which is a static amount of time that the guest was quoted. The Estimated Wait Time changes as tables are freed up and new table seating requests are made.
Notes	This summary option contains text included in the Notes field of the table request record. This field holds up to 255 characters of text and automatically wraps in the summary area.

**Table 46-16 (Cont.) Wait List Summary**

Summary Content	Description
Referral Notes	This summary option contains text included in the Referral Notes field of the table request record. This field holds up to 255 characters of text and automatically wraps in the summary area.

14. Click **Save**.

- [Configuring Wait List Privileges](#)
- [Setting Wait List Timing Parameters](#)

**Related Topics**

- [Wait List](#)
- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)
- [Wait List Configuration Levels](#)

## Front of House Table Management Tasks

Oracle Hospitality recommends that you create table management forms on a page for the enhanced dining table functions. You can use the templates provided in Symphony. If the property uses future reservations or multiple dining room layouts, a Tabbed Template provides workstation operators with a smoother means to navigate between wait lists, reservation lists, and table layouts.

The Table Management System (TMS), Wait List, and Reservation functions must reside within the same content area on a page in order to interact.

Creating table management operations for the Front of House consists of completing the following tasks:

- Setting the Host Command Area
- Setting the Dining Table Status
- Setting Employee Lines
- Creating a Section Layout
- Creating Enhanced Dining Tables
- Setting Table Management Functions in the Guest Check Detail Area
- Creating a button for the Employee Section Assignment Report

## Host Command Area

You need to place a Host Command Area on a page for hosting staff to use the Symphony TMS operations. The Host Command Area is the primary mechanism used to manage all hosting related functions in the TMS. This area determines the way hosting staff:

- Enables and disables TMS functions
- Accesses TMS features



- Administers the hosting page

#### Related Topics

- [Configuring the Host Command Area](#)

## Configuring the Host Command Area

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Double-click the Front of House page on which to define the Host Command Area.
3. On the **Edit** tab, select the page area on which to place the Host Command Area. You must place the Host Command Area in the same content area on the page as the tables in order for the host features to function.
4. Click **Other...**, select **Table Management**, and then select **Host Command Area**.

Hosting staff performs a long button press on the Host Command Area to access the TMS functions. As such, carefully consider the Host Command Area sizing and placement to ensure that hosting staff can easily see and press this area on the POS client.

The Host Command Area can optionally show an image in place of the silver portion of the area. You can set the image from the TMS Parameters module as the Dining Table Decoration Image Name. The image you select scales to the size of the Host Command Area.

5. Click **Save**.

#### Related Topics

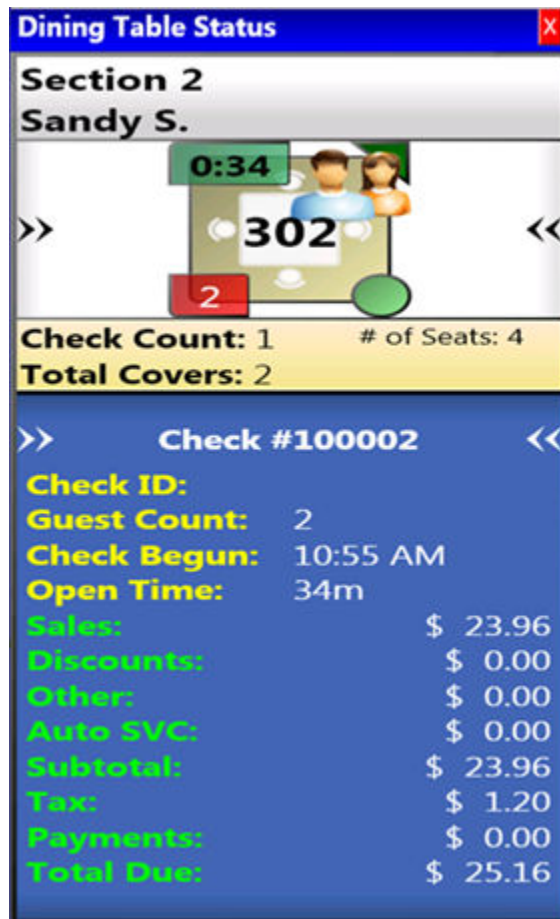
- [Host Command Area](#)

## Dining Table Status

Dining Table Status contains information about the highlighted table and associated open checks. Hosting staff can hide and recall the optional Dining Table Status from the Host Command Area, as well as move the Dining Table Status on the workstation with a click, hold, and drag motion. The sizing and placement of the Dining Table Status should not prevent hosting staff from accessing the table images. In addition, the Dining Table Status should be large enough so that text is legible to all hosting staff as the text size scales based on the screen sizing.

The following figure shows an example of the Dining Table Status.

Figure 46-1 Dining Table Status



#### Related Topics

- [Configuring the Dining Table Status](#)

## Configuring the Dining Table Status

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Double-click the Front of House page on which to define the Dining Table Status.
3. On the **Edit** tab, select the page area on which to place the Dining Table Status.  
Place the Dining Table Status in the same content area on the page as the Host Command Area and tables so that hosting staff can access the functions and view information.
4. Click **Other...**, select **Table Management**, and then select **Dining Table Status**.
5. Click **Save**.

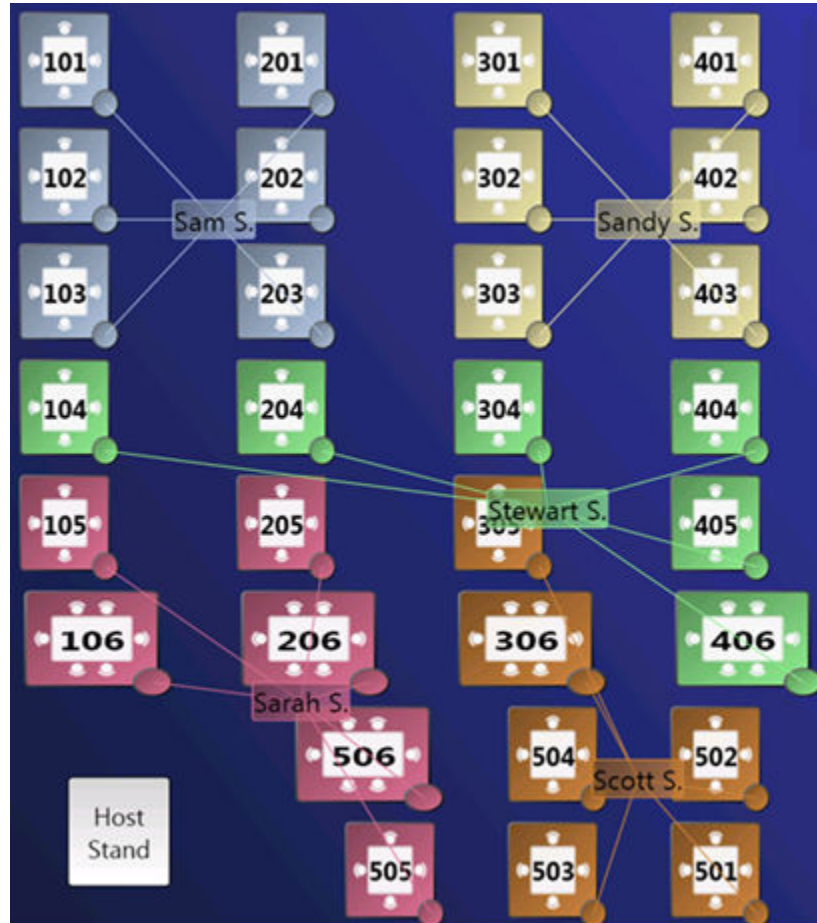
#### Related Topics

- [Dining Table Status](#)

## Employee Lines

Hosting staff can hide and recall the optional Employee Lines Area from the Host Command Area. This area shows lines from the assigned tables to a text box containing the assigned server's name. The following figure shows an example of the Employee Lines Area.

Figure 46-2 Employee Lines Area



### Related Topics

- [Configuring Employee Lines](#)

## Configuring Employee Lines

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Double-click the Front of House page on which to define the Employee Lines Area. (This is the page with enhanced table images.)
3. On the **Edit** tab, select the page area on which to place the Employee Lines Area.

Place the Employee Lines Area in the same content area on the page as the Host Command Area and tables in order for the hosting staff to access the functions and view information.

4. Click **Other...**, select **Table Management**, and then select **Employee Lines Area**.
5. Adjust the size and placement of the Employee Lines Area to ensure that it covers all enhanced tables on the page. Tables that are not covered by the Employee Lines Area do not show server assignment lines.
6. Click **Save**.

**Related Topics**

- [Employee Lines](#)

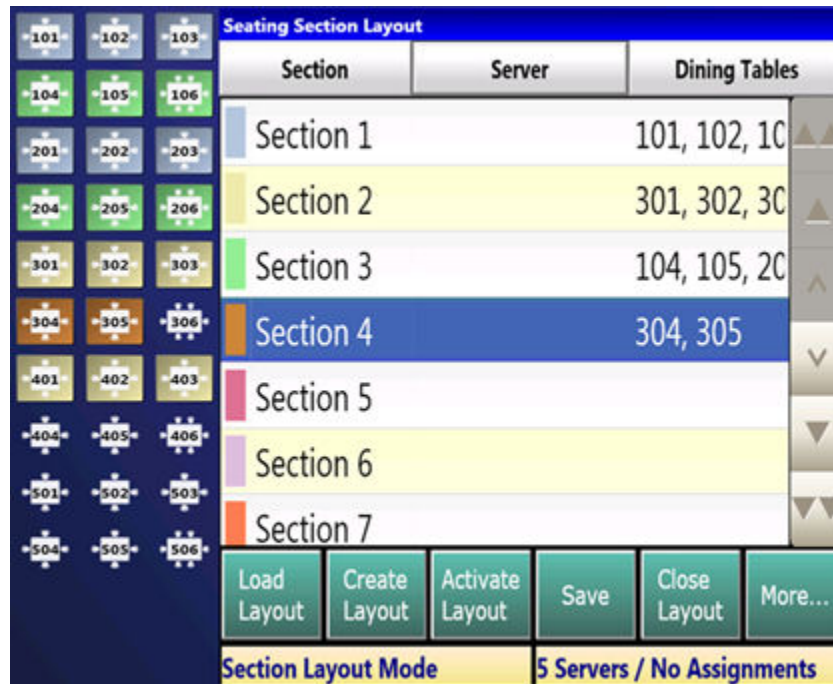
## Section Layout

The Section Layout contains controls to create and administer Seating Section Layouts for table, section, and server assignments. Hosting staff can hide and recall the optional Section Layout from the Host Command Area or from a separate page. Oracle Hospitality recommends creating a Section Layout on a separate page. Hosting staff can easily assign tables to a section when:

- Tables are present on the same page as the Section Layout.
- Tables are accessible while editing a Section Layout.

The following figure shows an example of the Section Layout.

**Figure 46-3 Section Layout**



**Related Topics**

- [Creating a Section Layout](#)

## Creating a Section Layout

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Create the Front of House page on which to define the Section Layout.
3. Click **Other...**, select **Table Management**, and then select **Section Layout**.
4. Adjust the Section Layout size to ensure that the text is visible to hosting staff. The text size scales with the Section Layout size.
5. Click **Save**.

**Related Topics**

- [Section Layout](#)

## Creating Enhanced Dining Tables

You can use all functions of the Symphony TMS using enhanced dining tables. You cannot use legacy standard tables with TMS. Enhanced dining tables show overlays on the outer edges of the table that indicate status, coursing, and alerts.

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Double-click the Front of House page on which to define enhanced dining tables.
3. On the **Edit** tab, select the page area on which to place the enhanced dining tables.
4. Click **Other...**, select **Table Management**, and then select **Dining Table (Enhanced)**.
5. Move and adjust the table size on the page. Leave space between tables on the page layout to ensure visibility of indicators and table state. You can increase the grid configuration on the page from 24 (default) to 48 using the Change Grid Size link.
6. Set the unique properties of the enhanced dining table:
  - a. Enter the table number in the **Table #** field.

This number must match the **Table Number** set in the Tables module. See [Configuring Enhanced Dining Tables](#) for more information.
  - b. From the Next Page/Panel section, click the black Panel arrow, and then select the host page from the list.
  - c. (Optional) Enter a table number in the **Legend** field.

If the Legend is blank, the table number or name shown on the host page uses the table number or name defined for the **Table #** field. To use a different name or number for the table, enter an override value in the Legend field.
7. Repeat Steps 4 through 6 to create additional enhanced dining tables.
8. Click **Save**.

## Setting Table Management Functions in Check Detail

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Double-click the Front of House page that contains the Check Detail area.
3. Select the **Check Detail** area on the page.
4. Select **Show Seat Number** to provide the workstation operator with a visual representation of the seat number associated with a menu item or guest on the check detail area.
5. Select **Enable Gestures** to allow the workstation operator to access a menu of options when long-pressing on the guest check.

The long-press options include:

- Change Item Seat
  - Change Item Course
  - View By Item Entry
  - View By Seat
  - View By Course
6. Select the view mode from the **Initial View Mode** drop-down list.  
This is the view shown when the workstation operator initially sees the guest check. Oracle recommends selecting the **View By Seat** mode for restaurants that allow multiple loyalty accounts on a single guest check.
  7. Click **Save**.

## Creating the Employee Section Assignment Report Button

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Open the Front of House page on which to place the Employee Section Assignment Report button.
3. On the **Edit** tab, select the page area in which to define the button.
4. Click **Button**.
5. Position and size the button on the page. Use the Style arrow to change the color.
6. In the **Legend** field, enter the button name.
7. Select **Ad Hoc Report** from the **Type** drop-down list.
8. Click the black arrow beneath the **Type** drop-down list, select **44 - Employee Section Assignment Report** from the report list, and then click **OK**.
9. Click **Save**.

## Configuring Table Cancellation Reasons

You can optionally create Reservation and Wait List Reasons to indicate why a guest cancels or abandons a table request.

1. Select the Enterprise, property, or revenue center, click **Descriptors**, and then click **TMS Reasons**.
2. Enter a reason in the **Text** field. You can create a maximum of 32 reasons.
3. Click **Save**.

## Setting Reservation Timing Parameters

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **TMS Parameters**.
2. On the **Configuration** tab, enter information in the following fields:

**Table 46-17 Reservation Timing Fields**

Field	Description
Reservation to Waitlist Delay	Enter the number of minutes that a reservation appears on the Wait List before the scheduled seating time. Reservation records that are visible on the Wait List impact the quote times and table suggestions.
Maximum Reservation Notice (Days)	Enter how far in advance a reservation can be made. This value includes the current business day. For example, a value of 90 indicates that guests can make reservations no more than 90 days in advance.
Minimum Reservation Notice (Minutes)	Enter the amount of advanced time when reservations can no longer be made for the same business day. For example, a value of 30 indicates that guests cannot make reservations less than 30 minutes in advance.

3. Select the appropriate options for reservation functions.

**Table 46-18 Reservation Options**

Option	Description
Require Reason Code on Abandon/Cancel	Select this option to have the POS client prompt the workstation operator to enter a cancellation reason for the reservation request.
Enable Reservation Approval	Select this option to have the workstation operator obtain approval when creating a reservation outside of a date or time available in the TMS inventory.

**Table 46-18 (Cont.) Reservation Options**

Option	Description
Enable Create and Edit Buttons	Select this option to show <b>Create</b> and <b>Edit</b> buttons following the Reservation List in the POS client. When you enable the buttons, the workstation operator can also double-tap the screen to create or edit reservations.

4. Click **Save**.

- [Configuring Reservation Privileges](#)
- [Creating the Front of House Reservation List](#)

**Related Topics**

- [Reservation List](#)
- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)
- [Reservation Configuration Levels](#)

## Setting Wait List Timing Parameters

1. Select the Enterprise, property, or revenue center, click **Setup**, and then click **TMS Parameters**.
2. On the **Configuration** tab, enter information in the following fields:

**Table 46-19 Wait List Timing Fields**

Field	Description
Reservation To Waitlist Delay	Enter the number of minutes that a reservation appears on the Wait List before the scheduled seating time. Reservation records that are visible on the Wait List impact the quote times and table suggestions.
Wait Quote Interval (Minutes)	Enter the wait quote time increments (for example, every 2 minutes or 5 minutes).
Auto Abandon Wait List Delay (Minutes)	Enter the number of minutes that a table request record remains on the Wait List before the application automatically updates it as Abandoned (for walk-ins) or No-Show (for reservations). The application removes the record from the Wait List after reaching this time threshold.
Wait Quote Alert Threshold (Minutes)	Enter the number of minutes to elapse before flagging the table request on the Wait List as Overdue for seating. Enter 0 (zero) to flag the table request as soon as the time quote elapses.

3. Select the appropriate options to enable or disable wait list functions. The following table describes the options.



**Table 46-20 Wait List Options**

Option	Description
Require Reason Code on Abandon/Cancel	Select this option to have the POS client prompt the workstation operator to enter a reason for abandoning or cancelling a table request.
Enable Wait List Chit Printing	Select this option to print a chit when the host staff creates or updates a table request. The chit contains table request information and the estimated wait time.
Enable Create and Edit Buttons	Select this option to show Create and Edit buttons following the Wait List in the POS client. When you enable the buttons, the workstation operator can also double-tap the screen to create or edit table requests.

4. Click **Save**.

- [Configuring Wait List Privileges](#)
- [Creating the Front of House Wait List](#)

**Related Topics**

- [Wait List](#)
- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)
- [Wait List Configuration Levels](#)

## Reservation Periods

Optional Reservation Period settings control reservation inventory and allow walk-in table requests. They also define projected turn times for tables based on time and cover count. If the property does not take reservations, Oracle Hospitality recommends configuring Reservation Periods so that hosting staff can use the Estimate Wait Quote feature on the Wait List.

Setting Reservation Periods consists of completing the following tasks:

- Setting the reservation period timeframe
- Setting reservations intervals and covers
- Setting occupancy
- Setting seating capacity and quantity
- Setting anticipated turn times for tables

**Related Topics**

- [Configuring Effectivity](#)
- [Configuring Acceptance Limits](#)
- [Configuring Occupancy Limits](#)
- [Configuring Seating Limits](#)
- [Configuring Target Turn Times](#)

## Configuring Effectivity

1. Select the revenue center, click **Setup**, and then click **Reservation Periods**.
2. Insert a record with a name that describes the reservation period (for example, Weekday or Weekend).
3. Double-click the record to open it.
4. On the **Effectivity** tab, select the appropriate options as described in the following table:

**Table 46-21 Effectivity**

Option	Description
Effectivity Start Date	Select the first calendar day that the reservation period is effective. Deselecting the start date causes the reservation period for the reservation and wait lists to remain in effect indefinitely.
Effectivity End Date	Select the last calendar day that the reservation period is effective. Deselecting the end date causes the reservation period for the reservation and wait lists to remain in effect indefinitely.
Recurrence Day Of Week	Select the effective days of the week within the reservation period. You must select at least one day in order to save the reservation period.
Recurrence Time Of Day	Select the time of day that is effective in the reservation period.  Deselecting the <b>Active Start Time</b> causes the reservation period for the reservation and wait lists to remain in effect starting at 00:00:00 on the applicable calendar days.  Deselecting the <b>Active End Time</b> causes the reservation period for the reservation and wait lists to remain in effect until 23:59:59 on the applicable calendar days.

5. Click **Save**.
  - [Configuring Acceptance Limits](#)
  - [Configuring Occupancy Limits](#)
  - [Configuring Seating Limits](#)
  - [Configuring Target Turn Times](#)

### Related Topics

- [Reservation Periods](#)

## Configuring Acceptance Limits

Acceptance Limits define the following reservation period items:

- The interval (in minutes) in which reservations can be made
  - The maximum new covers allowed within the interval
1. Select the revenue center, click **Setup**, and then click **Reservation Periods**.
  2. Open the reservation period record.
  3. Click the **General** tab, and then click the **Acceptance Limits** subtab.
  4. Click the **Add** link, and then enter information in the Acceptance Limits fields:

**Table 46-22 Acceptance Limits**

Field	Description
Begin Time	Enter the time when the defined Acceptance Cycle and Limit begins (for example, 17:00).
End Time	Enter the time when the defined Acceptance Cycle and Limit ends (for example, 22:00).
Cycle	Enter the interval in minutes when reservations can be accepted.  The Cycle defines the frequency with which you offer new reservations (for example, every 15 minutes or every 30 minutes) beginning with the start time.
Acceptance Limits	Enter a value to limit the potential kitchen workload. Entering 60 prevents new reservations for the defined cycle after the number of covers for all reservations in that cycle reaches or exceeds the limit.

5. Click **Save**.
- [Configuring Effectivity](#)
  - [Configuring Occupancy Limits](#)
  - [Configuring Seating Limits](#)
  - [Configuring Target Turn Times](#)

### Related Topics

- [Reservation Periods](#)

## Configuring Occupancy Limits

Occupancy Limits define the maximum number of covers allowed at any time. Occupancy Limits are typically set by building codes based on available exits.

1. Select the revenue center, click **Setup**, and then click **Reservation Periods**.
2. Open the reservation period record.
3. Click the **General** tab, and then click the **Occupancy Limits** subtab.

4. Click the **Add** link.
5. Enter information in the Occupancy Limits fields:

**Table 46-23 Occupancy Limits**

Field	Description
Begin Time	Enter the time when the defined Occupancy Limit begins.
End Time	Enter the time when the defined Occupancy Limit ends.
Occupancy Limit	Enter the revenue center occupancy. Entering 250 prevents new reservations for the defined Acceptance Limits cycle after the number of covers for all reservations within that timeframe reaches or exceeds the limit. If you do not create an Occupancy Limit, the application uses the default value of 9999 covers.

6. Click **Save**.
  - [Configuring Effectivity](#)
  - [Configuring Acceptance Limits](#)
  - [Configuring Seating Limits](#)
  - [Configuring Target Turn Times](#)

**Related Topics**

- [Reservation Periods](#)

## Configuring Seating Limits

Seating Limits define the number of available reservations allocated based on the cycle defined in the Acceptance Limits and Party Size.

1. Select the revenue center, click **Setup**, and then click **Reservation Periods**.
2. Open the reservation period record.
3. Click the **General** tab, and then click the **Seating Limits** subtab.
4. Click the **Add** link.
5. Enter information in the Seating Limits fields:

**Table 46-24 Seating Limits**

Field	Description
Begin Time	Enter the time when the defined Seating Limit begins.
End Time	Enter the time when the defined Seating Limit ends.

**Table 46-24 (Cont.) Seating Limits**

Field	Description
Capacity	<p>Enter the number of covers in the party.</p> <p>The <b>Capacity</b> value cascades to lower values if you do not set a lower value. For example, if you set a capacity of 4, the cover includes requests for a party of 1 through 4. However, setting a lower capacity of 2 applies to parties of 1 or 2, and the capacity of 4 applies to parties of 3 or 4.</p>
Quantity	<p>Enter the number of reservations available for the Cycles within the timeframe.</p> <p>The <b>Quantity</b> determines how many reservations to allocate to accommodate the capacity between the <b>Begin Time</b> and <b>End Time</b> for each Cycle that you set on the <b>Acceptance Limits</b> tab. For example, you can allocate a quantity of 2 reservations every 15 minutes between 5:00 p.m. and 10:00 p.m. that accommodate a cover count of 2 or fewer.</p> <p>This value only defines the number allotted and does not represent the current inventory.</p>

6. Click **Save**.

- [Configuring Effectivity](#)
- [Configuring Acceptance Limits](#)
- [Configuring Occupancy Limits](#)
- [Configuring Target Turn Times](#)

#### Related Topics

- [Reservation Periods](#)

## Configuring Target Turn Times

Target Turn Times define the target time from seating to request completion for a seated party. Target Turn Times also affect the following seating-related operations:

- Prevent reservation overbooking
  - Estimate wait times for walk-in table requests
  - Anticipate the tables that will be available in order to distribute the table seating appropriately
1. Select the revenue center, click **Setup**, and then click **Reservation Periods**.
  2. Open the reservation period record.
  3. Click the **General** tab, and then click the **Target Turn Times** subtab.
  4. Click the **Add** link.
  5. Enter information in the Target Turn Times fields:

**Table 46-25 Target Turn Times**

Field	Description
Begin Time	Enter the time when the defined Cover Count and Target Turn Time begins.
End Time	Enter the time when the defined Cover Count and Target Turn Time ends.
Cover Count	Enter the number of covers seated at the table.  The <b>Cover Count</b> value cascades to lower values if you do not set a lower value. For example, if you set a cover count of 4, the cover includes requests for a party of 1 through 4. However, setting a lower capacity of 2 applies to parties of 1 or 2, and the capacity of 4 applies to parties of 3 or 4.
Minutes	Enter the anticipated turn time (in minutes) for a table seating of the defined <b>Cover Count</b> during the specified timeframe. If you do not create a Target Turn Time, the application uses the default value of 60.  For example, if you enter 45, table seatings that encompass the defined cover count during the timeframe assume the seating request is 45 minutes in duration.

6. Click **Save**.

- [Configuring Effectivity](#)
- [Configuring Acceptance Limits](#)
- [Configuring Occupancy Limits](#)
- [Configuring Seating Limits](#)

**Related Topics**

- [Reservation Periods](#)

## Table Management Configuration Levels

The following table shows the hierarchy levels within the EMC that allow you to configure table management operations.

**Table 46-26 Table Management Configuration Levels**

Configuration Module	Enterprise	Property	Revenue Center	Zone
<a href="#">Content</a>	X	X	X	X
<a href="#">Dining Table Classes</a>	X	X	X	
<a href="#">Employee Maintenance</a>	X	X	X	

**Table 46-26 (Cont.) Table Management Configuration Levels**

Configuration Module	Enterprise	Property	Revenue Center	Zone
TMS Parameters	X	X	X	X
TMS Privileges	X			
Reservation Periods			X	
TMS Table Attributes	X	X	X	
KDS/Dining Course Colors	X	X		X
Loyalty Module	X	X	X	X
Page Design Properties	X	X	X	X
Seating Section Templates			X	
Sections			X	
Tables			X	

**Related Topics**

- [Table Management](#)
- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)

## Reservation Configuration Levels

The following table shows the hierarchy levels within the EMC that allow you to configure reservation operations.

**Table 46-27 Reservation Configuration Levels**

Configuration Module	Enterprise	Property	Revenue Center	Zone
TMS Parameters	X	X	X	X
TMS Reasons	X	X	X	X
Reservation Periods			X	
TMS Table Attributes	X	X	X	
Loyalty Module	X	X	X	X
Page Design	X	X	X	X

**Related Topics**

- [Reservation List](#)
- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)

- [Configuring Reservation Privileges](#)
- [Creating the Front of House Reservation List](#)
- [Setting Reservation Timing Parameters](#)

## Wait List Configuration Levels

The following table shows the hierarchy levels within the EMC that allow you to configure wait list operations.

**Table 46-28 Wait List Configuration Levels**

Configuration Module	Enterprise	Property	Revenue Center	Zone
<a href="#">TMS Parameters</a>	X	X	X	X
<a href="#">TMS Reasons</a>	X	X	X	X
<a href="#">Reservation Periods</a>			X	
<a href="#">Wait Quote Configuration</a>			X	
<a href="#">TMS Table Attributes</a>	X	X	X	
<a href="#">Loyalty Module</a>	X	X	X	X
<a href="#">Page Design</a>	X	X	X	X

### Related Topics

- [Wait List](#)
- [Table Management, Reservation, and Wait List Configuration Prerequisites](#)
- [Configuring Wait List Privileges](#)
- [Creating the Front of House Wait List](#)
- [Setting Wait List Timing Parameters](#)



# Enterprise Cash Management

You can use the Enterprise Cash Management (ECM) module to track the amount of cash located within a property. You can track the physical currency that is collected and the exact location of funds (for example, in a till, safe, bank deposit, or server bank). ECM follows currency as it progresses through the following phases:

- Enters the building (for example, cash tender, paid-in, or change order received from the bank)
- Moves through the building (for example, from tills to a safe or bank deposit)
- Leaves the building (for example, paid out to a vendor, change given to a guest, or taken to a bank for deposit)

As money flows through the operation, ECM logs all currency actions for reporting and auditing purposes.

- [Specifying Ad Hoc Reports](#)
- [Configuring ECM Privileges](#)
- [Allowing Users to View Blind Totals](#)
- [Allowing Assigned Receptacle Access](#)
- [Configuring Accounting Methods for Users](#)
- [Allowing Users to Override Employee Class Options](#)
- [Tracking Tender Transaction Items](#)
- [Tracking Service Charge Transactions](#)
- [Tracking Discount Transactions](#)
- [Creating, Editing, and Deleting Cash Management Reasons](#)
- [Cash Management Classes](#)
- [Adding Transaction Items](#)
- [Adding Counting Units](#)
- [Cash Pull Threshold Set](#)
- [Creating, Editing, and Deleting a Cash Pull Threshold Set](#)
- [Cash Count Threshold Set](#)
- [Creating, Editing, and Deleting a Cash Count Threshold Set](#)
- [PAR Level Set](#)
- [Creating, Editing, and Deleting a PAR Level Set](#)
- [Count Sheet](#)
- [Creating, Editing, and Deleting a Count Sheet](#)
- [Adding and Deleting a Page](#)
- [Adding and Deleting a Group](#)

- [Adding and Deleting a Unit](#)
- [Sorting and Modifying the Order of Pages, Groups, and Units](#)
- [Viewing the Totals Page](#)
- [Creating, Editing, and Deleting an Account](#)
- [Creating, Editing, and Deleting a Vendor](#)
- [Creating and Editing a Template](#)
- [Creating, Editing, and Deactivating Receptacles](#)
- [Setting Cash Management Parameters](#)
- [Creating Front of House Screens](#)
- [Configuring a Smart Key on a Workstation](#)
- [Configuring a Till Through Extensibility](#)
- [Configuring a Bank Deposit Reference Through Extensibility](#)
- [ECM Reporting](#)
- [ECM Enterprise Reports](#)
- [Enabling Reports in Enterprise Back Office](#)
- [ECM Property Reports](#)
- [ECM Workstation Hardware](#)
- [Enterprise Cash Management Configuration Levels](#)

## Specifying Ad Hoc Reports

You must assign privileges to the employee to run specific property reports related to active receptacle sessions at the property.

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click **Operations**, click **Ad Hoc Reports**, and then click **Report Options**.
3. Select the appropriate ECM reports.

**Table 47-1 ECM Reports**

Report	Description
Run Till Report	Provides information about the active till session on the workstation to which the workstation operator running the report is assigned. The printed report shows only values related to the workstation operator's activity.
Run Cash Pull Report	Provides a list of cash pull transactions that have been performed for the business day.
Run Till Banking Report	Provides information about all active till sessions for the location.
Run Safes Report	Provides information about all active safe sessions for the location.

**Table 47-1 (Cont.) ECM Reports**

Report	Description
Run Paid-In/Paid-Out Report	Provides information about all paid-in and paid-out transactions that were recorded for the business day.
Run Over/Short Detail Report	Provides information about over and short conditions that were recorded for the business day.
Run Bank Deposits Report	Provides information about all active bank deposit sessions for the location.
Run Server Bank Report	Provides information about the active server bank session for the user running the report.
Run Petty Cash Report	Provides information about all active petty cash sessions for the location.
Run Server Banking Report	Provides information about all active server banking sessions for the location.
Run Change Order Report	Provides information about open Change Order sessions for the property.

4. Click **Save**.

- [Enabling Reports in Enterprise Back Office](#)

**Related Topics**

- [ECM Reporting](#)
- [ECM Enterprise Reports](#)
- [ECM Property Reports](#)

## Configuring ECM Privileges

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type, click the **Operations** tab, and then click the **Cash Management** subtab.
3. Select the appropriate options for the privileges. The following table summarizes the privileges associated with ECM functionality and the recommended roles to have the privilege set.

**Table 47-2 ECM Privileges**

Section	Option Number	Privilege Name	Allow the Employee to Perform or Authorize...	Recommended Role(s)
General Operations	249	Change Count Sheet	Changing the count sheet that the receptacle session uses	Manager
General Operations	250	Pull Cash	A cash pull	Cashier, Manager

Table 47-2 (Cont.) ECM Privileges

Section	Option Number	Privilege Name	Allow the Employee to Perform or Authorize...	Recommended Role(s)
General Operations	258	Threshold Level Exception	A Cash Pull Threshold Exception (bypass the threshold notification) when prompted and permitted	Manager
General Operations	260	View Receptacle Session Status	Viewing of summary information for all active receptacle sessions	Manager
General Operations	267	Update Balance on Count	Updating the balance on a count when the amount is outside the count threshold values	Manager
Till Operations	201	Assign Till to Cash Drawer	Assignment of a till to a cash drawer on a workstation	Manager
Till Operations	202	Unassign Till from Cash Drawer	Unassignment of a till to a cash drawer on a workstation	Manager
Till Operations	203	Assign User to Till	Perform or authorize the assignment of an employee to an active till session	Manager
Till Operations	204	Unassign User from Till	Unassignment of an employee to an active till session	Manager
Till Operations	205	Count Till	Counting of a till session	Cash Handler
Till Operations	206	Adjust Till Count	Adjustment of the last count for a till session	Manager

**Table 47-2 (Cont.) ECM Privileges**

Section	Option Number	Privilege Name	Allow the Employee to Perform or Authorize...	Recommended Role(s)
Till Operations	207	Paid-In/Paid-Out	Posting of an ECM paid-in or paid-out on a till session  Workstation operators can perform standard paid-in and paid-out transactions based on Tender/Media configuration.	Manager
Till Operations	209	Transfer Funds	Transfer of items from a till session to another cash receptacle session	Cashier, Manager
Till Operations	210	Deposit Funds	Deposit of cash from a till session to a bank deposit session	Cash Handler
Till Operations	212	Close Till	Closing of a till session	Cash Handler
Till Operations	213	Reopen Till	Reopening of a till session	Manager
Till Operations	251	Quick Start Till	Opening of a till session and assignment of the current operator to a workstation cash drawer	Cash Handler
Till Operations	259	Adjust Till Starting Amount	Adjustment of the till starting amount	Manager
Server Bank Operations	241	Start Server Bank	Opening of a new server bank session	Manager
Server Bank Operations	242	Count Server Bank	Counting of a server bank session	Manager
Server Bank Operations	243	Adjust Server Bank Count	Adjustment of the last count for a server bank session	Manager

Table 47-2 (Cont.) ECM Privileges

Section	Option Number	Privilege Name	Allow the Employee to Perform or Authorize...	Recommended Role(s)
Server Bank Operations	265	Adjust Server Bank Starting Amount	Adjustment of the server bank session starting amount	Manager
Server Bank Operations	244	Paid-In/Paid-Out	Posting of an ECM paid-in or paid-out on a server bank session  Workstation operators can perform standard paid-in and paid-out transactions based on Tender/Media configuration.	Manager
Server Bank Operations	245	Transfer Funds	Transferring of funds from a server bank session to another cash receptacle session	Manager
Server Bank Operations	246	Deposit Funds	Deposit of cash from a server bank session to a bank deposit session	Manager
Server Bank Operations	247	Close Server Bank	Closing of a server bank session	Manager
Safe Operations	214	Open Safe	Opening of a new safe session	Manager
Safe Operations	215	Count Safe	Counting of a safe session	Manager
Safe Operations	216	Adjust Safe Count	Adjustment of the last count for a safe session	Manager

**Table 47-2 (Cont.) ECM Privileges**

Section	Option Number	Privilege Name	Allow the Employee to Perform or Authorize...	Recommended Role(s)
Safe Operations	217	Paid-In/Paid-Out	Posting of an ECM paid-in or paid-out on a safe session Workstation operators can perform standard paid-in and paid-out transactions based on Tender/Media configuration.	Manager
Safe Operations	218	Transfer Funds	Transferring of funds from a safe session to another cash receptacle session	Manager
Safe Operations	219	Deposit Funds	Deposit of cash from a safe session to a bank deposit session	Manager
Safe Operations	220	Close Safe	Closing of a safe session	Manager
Safe Operations	261	Add Funds to Safe	Adding new funds into ECM through a safe receptacle	Manager
Safe Operations	262	Remove Funds from Safe	Removing funds from ECM through a safe receptacle	Manager
Petty Cash Operations	222	Open Petty Cash	Opening of a new petty cash session	Manager
Petty Cash Operations	223	Count Petty Cash	Counting of a petty cash session	Manager
Petty Cash Operations	224	Adjust Petty Cash Count	Adjustment of the last petty cash session count	Manager

Table 47-2 (Cont.) ECM Privileges

Section	Option Number	Privilege Name	Allow the Employee to Perform or Authorize...	Recommended Role(s)
Petty Cash Operations	225	Paid-In/Paid-Out	Posting of an ECM paid-in or paid-out on a petty cash session Workstation operators can perform standard paid-in and paid-out transactions based on Tender/Media configuration.	Manager
Petty Cash Operations	226	Transfer Funds	Transferring of funds from a petty cash session to another cash receptacle session	Manager
Petty Cash Operations	227	Deposit Funds	Deposit of cash from a petty cash session to a bank deposit session	Manager
Petty Cash Operations	228	Close Petty Cash	Closing of a petty cash session	Manager
Bank Deposit Operations	233	Create a Bank Deposit	Opening of a new bank deposit session	Manager
Bank Deposit Operations	234	Transfer Funds	Transferring of funds from a bank deposit to another cash receptacle session	Manager
Bank Deposit Operations	237	Adjust Cash Deposit	Adjustment of a cash deposit amount in a bank deposit session	Manager
Bank Deposit Operations	239	Reconcile Bank Deposit	Reconciliation of a bank deposit session	Manager
Bank Deposit Operations	264	Adjust Bank Deposit Reference	Adjustment of a reference on a bank deposit session	Manager



**Table 47-2 (Cont.) ECM Privileges**

Section	Option Number	Privilege Name	Allow the Employee to Perform or Authorize...	Recommended Role(s)
Change Order Operations	230	Create Change Order	Creation of a new Change Order request from a safe session	Manager
Change Order Operations	252	Submit Change Order	Submission of a new Change Order request from a safe session	Manager
Change Order Operations	232	Reconcile Change Order	Reconciliation of a Change Order	Manager
Change Order Operations	268	Save / Recall Change Order	Saving or recalling a Change Order	Manager

4. Click **Save**.

- [Allowing Users to View Blind Totals](#)
- [Allowing Assigned Receptacle Access](#)
- [Configuring Accounting Methods for Users](#)
- [Allowing Users to Override Employee Class Options](#)
- [Creating, Editing, and Deleting Cash Management Reasons](#)

**Related Topics**

- [ECM Workstation Hardware](#)
- [Enterprise Cash Management Configuration Levels](#)

## Allowing Users to View Blind Totals

In some cases, you can require that workstation operators view the difference between the amount entered during a count and the amount expected by application transaction activity. Selecting **View Blind Totals** allows workstation operators within the Employee Class to view application expected values and the difference on the count sheet. When an over or short condition exists, the workstation operator can select the reason for the variance.

1. Select the property, click **Configuration**, and then click **Employee Classes**.
2. Select the role type, and then click **Operator Options**.
3. Select **25 - View Blind Totals**.
4. Click **Save**.

- [Configuring ECM Privileges](#)
- [Allowing Assigned Receptacle Access](#)

- [Configuring Accounting Methods for Users](#)
- [Allowing Users to Override Employee Class Options](#)
- [Creating, Editing, and Deleting Cash Management Reasons](#)

**Related Topics**

- [ECM Workstation Hardware](#)
- [Enterprise Cash Management Configuration Levels](#)

## Allowing Assigned Receptacle Access

ECM requires that you assign a workstation operator to a till or server bank receptacle session to perform transactions against the session. Managers need access to work within these receptacle sessions without being assigned to the sessions. You can create an Employee Class for management workstation operators with a configuration set that allows them to perform transactions against the till or server banking session without prior assignment.

1. Select the property, click **Configuration**, and then click **Employee Classes**.
2. Select the role type, and then click **Operator Options**.
3. Select **26 - Allow Assigned Receptacle Access** to allow workstation operators to view and perform transactions for till and server bank receptacles when the operator is not the owner or an assigned user.
4. Click **Save**.

- [Configuring ECM Privileges](#)
- [Allowing Users to View Blind Totals](#)
- [Configuring Accounting Methods for Users](#)
- [Allowing Users to Override Employee Class Options](#)
- [Creating, Editing, and Deleting Cash Management Reasons](#)

**Related Topics**

- [ECM Workstation Hardware](#)
- [Enterprise Cash Management Configuration Levels](#)

## Configuring Accounting Methods for Users

You can specify the type of accounting method a workstation operator uses to track cash management activities. The method you select determines the type of Front of House receptacles the workstation operator can access.

1. Select the property, click **Configuration**, and then click **Employee Classes**.
2. Select the role type.
3. On the **General** tab, select the appropriate **Cash Management Accounting Method**:
  - **None**: Select this option to prevent the workstation operator from executing till or server banking transactions.

- **Till Banking:** Select this option for workstation operators that maintain and work from a till that is assigned to a workstation (for example, bartenders and cashiers).
  - **Server Banking:** Select this option for workstation operators who maintain and work from an individual server bank on their person (for example, servers who are responsible for accepting payment on guest checks). This accounting method does not allow workstation operators to perform transaction activity on a till session when the operator is an assigned user.
4. Click **Save**.

- [Configuring ECM Privileges](#)
- [Allowing Users to View Blind Totals](#)
- [Allowing Assigned Receptacle Access](#)
- [Allowing Users to Override Employee Class Options](#)
- [Creating, Editing, and Deleting Cash Management Reasons](#)

**Related Topics**

- [ECM Workstation Hardware](#)
- [Enterprise Cash Management Configuration Levels](#)

## Allowing Users to Override Employee Class Options

You can optionally override Employee Class configuration options for individual workstation operators.

1. Select the Enterprise, zone, property, or revenue center, click **Configuration**, and then click **Employee Maintenance**.
2. Select a property and revenue center, and then click **Search**.
3. Select **Operator Records**.
4. Select **Override Class Options** for an employee.
5. Select the override options.

**Table 47-3 Override Employee Class Options**

Option	Description
Options	When you select <b>Override Class Options</b> , the application automatically selects the Operator Options for the employee's revenue center. You can override option <b>25 - View Blind Totals</b> here.
Cash Management Accounting Method	When you select a Cash Management accounting method here for an employee, you override the accounting method set in the Employee Class module.

**Table 47-3 (Cont.) Override Employee Class Options**

Option	Description
Cash Drawer	This option indicates the cash drawer that is defined for the workstation operator within the revenue center: 0 (no cash drawer assignment, user prompted), 1, or 2. The Quick Start till operation uses the defined cash drawer.

6. Click **Save**.

- [Configuring ECM Privileges](#)
- [Allowing Users to View Blind Totals](#)
- [Allowing Assigned Receptacle Access](#)
- [Configuring Accounting Methods for Users](#)
- [Creating, Editing, and Deleting Cash Management Reasons](#)

#### Related Topics

- [ECM Workstation Hardware](#)
- [Enterprise Cash Management Configuration Levels](#)

## Tracking Tender Transaction Items

You can identify tender media transaction items (for example, cash, check, and other currency based tenders) that you want ECM to track.

1. Select the Enterprise, zone, or property, click **Configuration**, and then click **Tender/Media**.
2. Double-click the tender media record.
3. Click the **Options** tab, and then click the **Ops Behavior** subtab.
4. Select the appropriate Tender options.
  - **91 - Cash Management Transaction Item:** Select this option to include the tender record in ECM tracking and reporting.
  - (Optional) **92 - Affects Cash Pull Threshold:** Select this option if you want transactions performed for this tender record to affect the Cash Pull Threshold Set balance. Select this option for tender records that would represent a loss if they are lost or stolen (for example, cash and checks). You must select option **91** to use option **92**.
5. Click **Save**.
  - [Tracking Service Charge Transactions](#)
  - [Tracking Discount Transactions](#)

## Tracking Service Charge Transactions

You can identify service charge transactions (for example, gift card sales) that you want ECM to track.

1. Select the Enterprise, zone, or property, click **Configuration**, and then click **Service Charges**.
2. Double-click the service charge.
3. Select **28 - Cash Management Transaction Item** to include the service charge record in ECM tracking and reporting.
4. Click **Save**.

- [Tracking Tender Transaction Items](#)
- [Tracking Discount Transactions](#)

## Tracking Discount Transactions

You can identify discount transactions (for example, coupons and promotional vouchers) that you want ECM to track.

1. Select the Enterprise, zone, or property, click **Configuration**, and then click **Discounts**.
2. Double-click the discount.
3. Select the appropriate discount options on the **General** tab:
  - **33 - Cash Management Transaction Item**: Select this option to include the discount record in ECM tracking and reporting.
  - (Optional) **34 - Affects Cash Pull Threshold**: Select this option to have transactions performed for this discount record increase the value in a receptacle. You must select option **33** to use option **34**.
4. Click **Save**.

- [Tracking Tender Transaction Items](#)
- [Tracking Service Charge Transactions](#)

## Creating, Editing, and Deleting Cash Management Reasons

Certain ECM operations allow (and sometimes require) the workstation operator to enter a reason for performing the operation. For example, workstation operators must provide a reason for adjusting transactions.

1. Select the Enterprise, zone, property, or revenue center, click **Descriptors**, and then click **Cash Management Reasons**.
2. Highlight the Cash Management transaction, and then select **Add Reason**.
3. Enter the reason name, based on the following guidelines:
  - You can define multiple reasons for each transaction.

- You can use each reason name only once per transaction type.

When you enter a No Sale Reason, the cash drawer opens only after the workstation operator enters a reason when performing a No Sale transaction. You can set and use No Sale reason codes without activating ECM. You can also access No Sale reason codes through extensibility or a System Interface Module (SIM)-based event.

4. Click **Save**.
5. To edit a reason, highlight the reason record, change the reason name, and then click **Save**.

After you change a reason, the new reason appears when viewing historical reporting activity.

6. To delete a reason, highlight the reason record, and then select **Delete Reason**.

The application allows you to delete only reasons that are not referenced in historical reporting activity.

- [Configuring ECM Privileges](#)
- [Allowing Users to View Blind Totals](#)
- [Allowing Assigned Receptacle Access](#)
- [Configuring Accounting Methods for Users](#)
- [Allowing Users to Override Employee Class Options](#)

#### Related Topics

- [ECM Workstation Hardware](#)
- [Enterprise Cash Management Configuration Levels](#)

## Cash Management Classes

You can configure a Cash Management class for the type of records you want to track in ECM. You must define a class for the currency to be accepted, and to track non-cash items in ECM (for example, credit card vouchers, gift cards, and coupons).

Within the Cash Management class, you can specify unique counting units associated with the transaction items within the class (for example, bank notes and coins).

## Adding Transaction Items

You must map transaction items (for example, tenders) to the Cash Management class to measure their impact (increase or decrease) on the balance of all transactions. ECM tracks only transaction items that are mapped to the class.

1. Select the Enterprise, zone, property, or revenue center, click **Setup**, and then click **Cash Management Classes**.
2. Insert a Cash Management class record, and then double-click it.
3. Select **Transaction Items**.
4. Enter the name of the class to track in ECM (for example, Cash, US Dollars, Vouchers, and so on).

5. Select an available **Currency** from the list to associate with the Cash Management class.

You can only associate the currency with a single class. Select **0 - None** for non-currency tracking (for example, vouchers and stored value cards) as these items are always based on the property's local currency.

6. Select **Allow in Bank Deposit** to include transaction items mapped with this Cash Management class in bank deposits (for example, cash, personal checks, and travelers checks).
7. Select **Add Transaction Item**.
8. Select a **Transaction Item Type**.
9. Select a **Transaction Item**. The **Cash Management Transaction Item** options in the tender, service charge, or discount determine the items that appear in this Transaction Item list. You can use each transaction item only once per class.
10. Click **Save**.

- [Adding Counting Units](#)

## Adding Counting Units

After you add a denomination unit to a Cash Management class, ECM includes the unit when building Count Sheets and PAR Level Sets. The following figure shows an example of the units mapping setup.

**Figure 47-1 Counting Units**

The screenshot shows the Oracle Cash Management Classes interface. The main window is titled 'Cash Management Classes 1 - Property 1'. On the left, there is a table with two rows: '1 Cash' and '2 Credit Vouchers'. The right side of the interface has a 'Counting Units' tab. Under this tab, there is a 'Current Record' section with a 'Number' field containing '1' and a 'Name' field containing 'Cash'. Below this is a 'Units Mapping' section with a table. The table has columns for 'Name', 'Denominated', 'Numerator', 'Denominator', and 'Value'. The rows are: Ones (Denominated: checked, Numerator: 1, Denominator: 1, Value: 1.00), Fives (Denominated: checked, Numerator: 5, Denominator: 1, Value: 5.00), Tens (Denominated: checked, Numerator: 10, Denominator: 1, Value: 10.00), Twenties (Denominated: checked, Numerator: 20, Denominator: 1, Value: 20.00), Hundreds (Denominated: checked, Numerator: 100, Denominator: 1, Value: 100.00), Pennies (Denominated: checked, Numerator: 1, Denominator: 100, Value: 0.01), Nickels (Denominated: checked, Numerator: 1, Denominator: 20, Value: 0.05), Dimes (Denominated: checked, Numerator: 1, Denominator: 10, Value: 0.10), and Quarters (Denominated: checked, Numerator: 1, Denominator: 4, Value: 0.25). There are 'Add Unit' and 'Delete Unit' links above the table.

1. Select **Counting Units**.
2. Select **Add Unit**.
3. Enter the name of the unit (for example, Pennies, Fives, Twenties, Travelers Checks, and so on).
4. If the unit has a consistent cash value (for example, notes and coins), select **Denominated**. Do not select this option for transaction items that have

inconsistent cash values (for example, personal checks, credit cards, and gift cards).

5. If the unit is denominated, enter the units value relative to the base currency unit in the **Numerator** field. For example, when the base currency is US dollars, the base currency unit is 1 (\$1.00).
6. If the unit is denominated, enter the number of units relative to the base currency unit in the **Denominator** field. For example, when the base currency is US dollars, the base currency unit is 1 (\$1.00).
7. After you enter the numerator and denominator, the **Value** field shows the calculated value per unit.
8. Click **Save**.

- [Adding Transaction Items](#)

## Cash Pull Threshold Set

The Cash Pull Threshold Set optionally provides a group of balance-based levels to compare against a till or server banking session during a transaction. The threshold set indicates when notifications should take place for cash pulls to minimize the risk by limiting the amount of cash circulating in the front of house. You can add one or more threshold levels to a Cash Pull Threshold Set.

### Related Topics

- [Creating, Editing, and Deleting a Cash Pull Threshold Set](#)

## Creating, Editing, and Deleting a Cash Pull Threshold Set

1. Select the Enterprise, zone, property, or revenue center, click **Setup**, and then click **Cash Pull Threshold Sets**.
2. Insert a record, enter the name of the Cash Pull Threshold Set, and then click **OK**.
3. Double-click the record to open it.
4. Enter the **Chit Quantity**.

This is the number of chits that print when a workstation operator performs a cash pull. A cash pull chit represents the funds that are removed from the till or server bank.

5. Select **Add**, and then enter the name of the threshold set.

The name is part of the notification that appears in the application.

6. Enter the **Amount**.

This is the amount-based threshold that elevates the cash pull notification to the threshold level. If you configure more than one threshold level, subsequent amounts cannot be equal to or lower than the previous cash pull amount in the same set.

7. Select **Approval** to allow a workstation operator with the Threshold Level Exception privilege to authorize the operator to ignore the exception and to process transactions against the receptacle without performing a cash pull.
8. Click **Save**.



9. To edit a cash pull threshold set, highlight the record, change the values, and then click **Save**.

You cannot edit the last defined level. This requires the workstation operator to perform a cash pull first in order to execute additional activities against the till or server bank later.

10. To delete a cash pull threshold set, highlight the record, and then select **Delete**.

You cannot delete a Cash Pull Threshold Set associated with one or more templates.

#### Related Topics

- [Cash Pull Threshold Set](#)

## Cash Count Threshold Set

The Cash Count Threshold Set optionally provides an allowable variance threshold for countable receptacles. The threshold is the difference between counted totals and expected totals. The threshold indicates the overage and shortage amounts allowed to complete a receptacle count. You can add one or more cash count threshold sets to a count sheet.

#### Related Topics

- [Creating, Editing, and Deleting a Cash Count Threshold Set](#)

## Creating, Editing, and Deleting a Cash Count Threshold Set

1. Select the Enterprise, zone, property, or revenue center, click **Setup**, and then click **Cash Count Threshold Sets**.
2. Add a Cash Count Threshold Set, enter the name, and then click **OK**.
3. Enter the **Short** amount.

This value is the minimum variance amount allowed to complete the receptacle count.

4. Enter the **Over** amount.

This value is the maximum variance amount allowed to complete the receptacle count.

5. Enter the number of **Max Count Attempts**.

This value limits the number of times a workstation operator can attempt to submit a count when the count is over or short beyond the defined threshold.

6. Click **Save**.
7. To edit a cash count threshold set, highlight the record, change the values, and then click **Save**.
8. To delete a cash count threshold set, highlight the record, and then select **Delete**.  
You cannot delete a Cash Count Threshold Set associated with one or more templates.

#### Related Topics

- [Cash Count Threshold Set](#)

## PAR Level Set

Periodic Automatic Replenishment (PAR) Level Sets specify the suggested quantity to maintain of each currency denomination kept in a safe (for example, rolls of coins or quantity of a denominated note). PAR Level Sets are comprised of count units drawn from the list of denominated items in a Cash Management class. The PAR determines the values required when issuing a Change Order request to return the receptacle back to the PAR based on the last known count of the receptacle. The use of a PAR Level Set is optional.

### Related Topics

- [Creating, Editing, and Deleting a PAR Level Set](#)

## Creating, Editing, and Deleting a PAR Level Set

1. Select the Enterprise, zone, property, or revenue center, click **Setup**, and then click **PAR Level Sets**.
2. Insert a record, and enter the **PAR Level Set** name.
3. Double-click the record to open it.
4. Select the **CM Class**.

The **CM Class** list includes all Cash Management classes that you created. These Cash Management classes contain the units that are allowed within the PAR Level Set.

5. Add a Counting Unit using one of the following methods:
  - Select **Add All Units** to have ECM add all defined units for the Cash Management class to the PAR Level.
  - Select **Add Unit** to manually add specific units.
6. For each of the defined units, enter the quantity of units to maintain as part of the PAR Level Set for each day of the week.
7. Click **Save**.
8. To edit a PAR Level Set, highlight the record, change the values, and then click **Save**.
9. To delete a PAR Level Set, highlight the record, and then select **Delete**.

You cannot delete a PAR Level Set associated with one or more templates.

### Related Topics

- [PAR Level Set](#)

## Count Sheet

A workstation operator uses a Count Sheet during the physical counting of a receptacle session. Create unique Count Sheets to determine the items and order in which a count is performed, as well as the format for the printed Count Sheet results. Creating a Count Sheet is similar to building a report.

### Related Topics

- [Creating, Editing, and Deleting a Count Sheet](#)
- [Adding and Deleting a Page](#)
- [Adding and Deleting a Group](#)
- [Adding and Deleting a Unit](#)
- [Sorting and Modifying the Order of Pages, Groups, and Units](#)
- [Viewing the Totals Page](#)

## Creating, Editing, and Deleting a Count Sheet

1. Select the Enterprise, zone, property, or revenue center, click **Setup**, and then click **Count Sheets**.
2. Insert a record, enter a unique name for the Count Sheet, and then click **OK**.
3. Click **Save**.
4. To edit a count sheet, highlight the count sheet record, change the values, and then click **Save**.

When you change a count sheet, the application removes all units associated with the group.

5. To delete a count sheet, highlight the record, and then select **Delete**.

You cannot delete a Count Sheet associated with one or more templates.

- [Adding and Deleting a Page](#)
- [Adding and Deleting a Group](#)
- [Adding and Deleting a Unit](#)
- [Sorting and Modifying the Order of Pages, Groups, and Units](#)
- [Viewing the Totals Page](#)

### Related Topics

- [Count Sheet](#)

## Adding and Deleting a Page

A Count Sheet Page is similar to a chapter in a report. Pages allows you to see totals for all values counted within the page.

1. From the Pages section, click the **Add** link.
2. Enter a name for each page in the **Name** column (for example, Cash and Vouchers).
3. To delete a page, highlight the page name record, and then click the **Delete** link. The application deletes all units associated with a group for the selected page, along with the page.
4. Click **Save**.

- [Creating, Editing, and Deleting a Count Sheet](#)

- [Adding and Deleting a Group](#)
- [Adding and Deleting a Unit](#)
- [Sorting and Modifying the Order of Pages, Groups, and Units](#)
- [Viewing the Totals Page](#)

**Related Topics**

- [Count Sheet](#)

## Adding and Deleting a Group

Transaction Items are reported in Count Sheet Groups. Groups also allow you to see totals for all values counted within the group.

1. From the Pages section, highlight a page.
2. From the Groups section, click the **Add** link.
3. Enter a name for each group in the **Name** column. As an example, you can have a Cash page with the groups Notes (paper currency) and Coins.
4. Select the Cash Management Class for each group from the **Class** drop-down list.

When you select a **Class**, the **Name** column shows the name of the class if it was not previously entered. Change the **Name** value to show its representation on the count sheet screen view and print copy.

5. Select the appropriate Options for each group.

**Table 47-4 Count Sheet Options for Groups**

Option	Description
1 - Allow Multiple Entries (optional)	Select this option to allow unique entry of certain items (for example, gift cards and checks). The Group provides a multiple entry list when performing a count.  This type of count is used to include non-denominated transaction items, such as personal checks or gift cards as part of a count, where the amount of each individual item must be tracked (for example, check and gift card amounts).
2 - Reference Required (optional)	Select this option to have the POS client prompt the workstation operator to enter a reference on the count sheet (for example, gift card number, personal check number, credit card, or voucher number) for each amount entered.

6. (Optional) Repeat Steps 2 through 5 to add other groups to track as part of this page.
7. To delete a group, highlight the group record, and then click the **Delete** link. The application deletes all units associated with a group along with the group.
8. Click **Save**.

- [Creating, Editing, and Deleting a Count Sheet](#)
- [Adding and Deleting a Page](#)
- [Adding and Deleting a Unit](#)
- [Sorting and Modifying the Order of Pages, Groups, and Units](#)
- [Viewing the Totals Page](#)

#### Related Topics

- [Count Sheet](#)

## Adding and Deleting a Unit

A unit is optional but recommended for groups that report based on counting units. If you do not add a unit, a Total entry appears for the group.

1. From the Groups section, highlight a group.
2. From the Units section, click the **Add** link to add all units to count as part of this group.
3. From the **Units** drop-down list, select the **Units** for each group.

Only the Unit Types associated with the Cash Management Class for the group are available in the **Units** drop-down list. When you select a **Units** value, the **Name** column shows the name of the unit selected. Change the **Name** value to show its representation on the count sheet screen view and print copy. You can use each Unit Type only once on a page.

4. To delete a unit, highlight a unit record, and then click the **Delete** link.
5. Click **Save**.

- [Creating, Editing, and Deleting a Count Sheet](#)
- [Adding and Deleting a Page](#)
- [Adding and Deleting a Group](#)
- [Sorting and Modifying the Order of Pages, Groups, and Units](#)
- [Viewing the Totals Page](#)

#### Related Topics

- [Count Sheet](#)

## Sorting and Modifying the Order of Pages, Groups, and Units

Use the up and down arrows to sort and alter the order in which pages, groups on a page, and units within a group appear on the screen view and printed Count Sheet.

All units that are part of the selected group remain with the group as it moves. Units that are part of groups for the selected page remain with the page as it moves. Groups that are part of the selected page remain with the page as it moves.

- [Creating, Editing, and Deleting a Count Sheet](#)

- [Adding and Deleting a Page](#)
- [Adding and Deleting a Group](#)
- [Adding and Deleting a Unit](#)
- [Viewing the Totals Page](#)

#### Related Topics

- [Count Sheet](#)

## Viewing the Totals Page

At the end of the Count Sheet, a Totals page represents the values entered for all classes. The overall balance of the Count Sheet is based on the configured Balancing Class.

- [Creating, Editing, and Deleting a Count Sheet](#)
- [Adding and Deleting a Page](#)
- [Adding and Deleting a Group](#)
- [Adding and Deleting a Unit](#)
- [Sorting and Modifying the Order of Pages, Groups, and Units](#)

#### Related Topics

- [Count Sheet](#)

## Creating, Editing, and Deleting an Account

You can use accounts to report general ledger accounting information for ECM paid-in and paid-out transactions (for example, produce, meat, bakery, or flower shop).

1. Select the Enterprise, zone, property, or revenue center, click **Setup**, and then click **Accounts**.
2. Insert a record, enter a unique name for the account, and then click **OK**.
3. Click the ellipsis point (...) button from the Options column.
  - a. Select **1 - Deactivate Account** to deactivate or suspend an account that is no longer being used. A newly created account is active by default.
  - b. Select **2 - Exclude on Paid In** to exclude the account and associated vendors from being used when a workstation operator performs a paid-in transaction.
  - c. Select **3 - Exclude on Paid Out** to exclude the account and associated vendors from being used when a workstation operator performs a paid-out transaction.
4. To edit an account, highlight the record, change the values, and then click **Save**.
5. To delete an account, highlight the record, and then click **Delete** on the toolbar.

The application only allows you to delete accounts that are not referenced in historical reporting activity. When an account is assigned to a vendor, you cannot delete it. You can unassign the account from the vendor.

6. Click **Save**.

- [Creating, Editing, and Deleting a Vendor](#)

## Creating, Editing, and Deleting a Vendor

You can use a vendor to associate companies with ECM paid-in and paid-out transactions for reporting purposes.

1. Select the Enterprise, zone, property, or revenue center, click **Setup**, and then click **Vendors**.
2. Insert a record, enter a unique name for the vendor, and then click **OK**.
3. (Optional) Select an account from the **Account** drop-down list to associate with the vendor.

The vendor always uses the selected account for ECM paid-in and paid-out transactions.

4. Click the ellipsis point (...) button from the Options column and select the appropriate vendor options.

**Table 47-5 Vendor Options**

Option	Description
1 - Deactivate Vendor	Select this option to prevent further selection of the vendor when performing transactions. For example, you can use this option to place a credit hold. A newly created vendor is active by default.
(Optional) 2 - Invoice Data Required	Select this option to require the workstation operator to enter invoice information (for example, Date, Invoice Number, and Description) when performing a transaction for the vendor that can collect invoice data (for example, paid-out).
3 - Require Reference on Use	Select this option to require the workstation operator to enter a reference when performing a transaction that requires a vendor.

5. To edit a vendor, highlight the record, change the values, and then click **Save**.
6. To delete a vendor, highlight the record, and then click **Delete** on the toolbar.

The application only allows you to delete vendors that are not referenced in historical reporting activity.

7. Click **Save**.

- [Creating, Editing, and Deleting an Account](#)

## Creating and Editing a Template

You need to use a template to set the initial configuration and operating values for all new receptacle tracking sessions. This includes setting the amount, assigning a count sheet, and specifying how the application handles the opening balance after the workstation operator closes the receptacle.

1. Select the Enterprise, zone, property, or revenue center, click **Setup**, and then click **Templates**.

2. Insert a template record with a unique name, and then click **OK**.
3. Double-click the template record to open it.
4. Enter or select information in the following fields:
  - (Optional) **Description**: A description provides further understanding of the template that might not be distinguishable by looking at the template name. The Description is not shown as part of the receptacle when the workstation operator opens the receptacle from a template
  - **Receptacle Type**: Depending on the type of receptacle you select, additional fields become active. The following table describes the fields and receptacle types.

**Table 47-6 Template Receptacle Types and Fields**

Field or Option	Template Receptacle Type				
	Safe	Till	Server Bank	Bank Deposit	Petty Cash
Starting Amount		Optional	Optional		
Starting Amount Source		Required	Optional		
Prompt for Starting Amount		Optional	Optional		
Cash Pull Threshold		Optional	Optional		
Cash Pull Destination		Optional	Optional		
Count Sheet	Required	Required	Required		Required
PAR Level	Optional				
Maximum				Required	Required
Minimum					Required
Cash Deposit Routing		Optional	Optional		

- **Start Amount**: The starting amount determines the initial currency value of the session upon opening.
- **Starting Amount Source**: The starting amount source determines where the starting amount for the session originates. If you select **None**, the starting amount is considered to be part of the receptacle and funds are not transferred from a source receptacle session. For example, a server who self funds a bank does not receive a funds transfer from the safe when opening the bank. Selecting a defined safe transfers the starting amount from the safe session to the receptacle session upon opening.
- **Prompt for Starting Amount**: Select this option to prompt the workstation operator to enter the starting amount for the receptacle session upon opening. When you select this option, the application ignores the value in the starting



amount field. This option is typically used for server banks where the server self-funds the bank.

- **Cash Pull Threshold:** This field defines the Cash Pull Threshold Set that a receptacle session uses. If you set cash pull values, select a threshold set from the drop-down list to be used for the template.
  - **Cash Pull Destination:** Select a destination receptacle into which funds from cash pull operations will transfer; if you select **None**, funds do not transfer and ownership remains with the receptacle session.
  - **Count Sheet:** The Count Sheet value in a template determines the Count Sheet that is used to count the receptacle.
  - **Cash Count Threshold:** This field defines the Cash Count Threshold Set that a receptacle session uses. If you set cash count values, select a **Threshold Set** from the drop-down list to be used for the template.
  - **Close on Count Completion:** Select this option to have the application attempt to automatically reconcile the receptacle session upon completion of the count. This process transfers funds from the receptacle session to the sessions designated under Starting Amount Source and Cash Deposit Routing to bring the session to zero. When you deselect this option, the session remains open after the count completes. The workstation operator must manually reconcile all funds and close the receptacle.
  - **PAR Level:** The PAR Level defines the PAR Level Set to use for the safe session.
  - **Minimum:** The Minimum balance determines the lowest amount of funds permitted as part of a receptacle session. The application prevents workstation operators from processing most activity that takes the session balance below this amount. If you do not set a minimum balance, the application defaults to 0 (no minimum).
  - **Maximum:** The Maximum balance determines the largest amount of funds permitted as part of a receptacle session. The application prevents workstation operators from processing most activity that takes the session balance beyond this amount. If you do not set a maximum balance, it defaults to 0 (no maximum).
  - **Cash Deposit Routing:** Select the destination receptacle (safe or bank deposit) session to receive funds that transfer from a receptacle session as part of a cash deposit operation. When you select **None**, the application prompts the workstation operator to select a location to deposit cash.
5. To edit a template, highlight the template record, change the values, and then click **Save**.

## Creating, Editing, and Deactivating Receptacles

A receptacle represents a physical or virtual location used to store funds and draw transactions.

1. Select the Enterprise, zone, property, or revenue center, click **Setup**, and then click **Receptacles**.
2. Insert a record, enter a unique name for the receptacle, and then click **OK**.
3. Double-click the receptacle record to open it.

4. Enter or select information in the receptacle fields.

**Table 47-7 Receptacle Fields**

Field	Description
Receptacle Type	Select the type of receptacle: <ul style="list-style-type: none"> <li>• <b>0 - None</b></li> <li>• <b>1 - Safe</b></li> <li>• <b>2 - Till</b></li> <li>• <b>3 - Server Bank</b></li> <li>• <b>4 - Bank Deposit</b></li> <li>• <b>5 - Petty Cash</b></li> </ul>
Template Name	Select the template to use for this receptacle.
Location	Select the location where the receptacle is defined. The location allows you to specify a receptacle name and configuration to be used in multiple locations. When you select <b>2 - Property</b> , a receptacle is defined for each property based on the values entered. When you select <b>3 - Revenue Center</b> , a receptacle is defined within each revenue center.  For example, each property might have one safe to maintain all cash transactions for the entire property. Create a safe receptacle from the Enterprise level or zone, and then specify the property in the Location field. The safe receptacle is defined at all properties under the selected level. The Location field allows you to define a receptacle type that is commonly used across an Enterprise or region without uniquely defining it at each property or revenue center.
Options	Select <b>Deactivate Receptacle</b> to prevent workstation operators from performing further activity against the receptacle.

5. To edit a receptacle, highlight the record, change the values, and then click **Save**.
6. To deactivate a receptacle, highlight the record, and then select **Deactivate Receptacle**.  
Deleting a receptacle is not permitted.
7. Click **Save**.

## Setting Cash Management Parameters

1. Select the Enterprise, zone, property, or revenue center, click **Setup**, and then click **Cash Management Parameters**.
2. Click the **Configuration** tab.
3. Enter or select the appropriate information.

**Table 47-8 Cash Management Parameters Configuration Fields**

Field	Description
Cash Pull Notification Frequency	<p>Specify when the application notifies workstation operators of the cash pull threshold levels being reached or exceeded.</p> <ul style="list-style-type: none"> <li>• <b>0 - None:</b> Select this option to disable cash pull notifications (default). Workstation operators can use the manual process for cash pulls.</li> <li>• <b>1 - On Threshold Level Only:</b> Select this option to notify the workstation operator once upon reaching or exceeding a defined threshold level in the Threshold Level Set.</li> <li>• <b>2 - On Each Transaction:</b> Select this option to notify the workstation operator with each new check access attempt upon reaching or exceeding a defined threshold level in the Threshold Level Set.</li> </ul>
Receptacle Balancing Class	<p>Select the class that is based on the currency in which the property operates. All transaction items included in the Cash Management Class selection determine the appearance of the receptacle balance on views and reports.</p>
Change Order Report Count	<p>Enter the number of reports to print when a workstation operator creates a new Change Order request.</p>
Counting Method	<p>Select the method in which the workstation operator must enter counting units when performing a count or change order.</p> <ul style="list-style-type: none"> <li>• <b>1 - Quantity:</b> Select this option to require the workstation operator to enter the quantity of the counting units. The application calculates the value based on the quantity entered for the associated counting unit.</li> <li>• <b>2 - Value:</b> Select this option to require the workstation operator to enter the value of the counting units. The application calculates the quantity based on the value entered for the associated counting unit.</li> </ul>
Paid-In/Paid-Out Chit Count	<p>Enter the number of chits to print when the workstation operator performs an ECM paid-in or paid-out transaction.</p>
Server Banking Template	<p>Select the default template to use when a workstation operator opens a new server banking session. You can override this setting from the Employee Classes module.</p>

4. Click the **Options** tab.
5. Select the appropriate Cash Management Parameter options.

**Table 47-9 Cash Management Parameter Options**

Option	Description
1 - Enable Cash Management	<p>Select this option to activate all ECM features and functions in the application. Selecting <b>Enable Cash Management</b> increases both required workstation resources and bandwidth for communications with the Enterprise.</p> <p>You can define all ECM configurations without selecting this option. This allows you to configure ECM beforehand and activate ECM with a single option.</p>
11 - Require Reason on Adjust Starting Amount	<p>Select this option to require the workstation operator to select a reason code when adjusting a starting amount.</p>
12 - Require Reason on Adjust Count	<p>Select this option to require the workstation operator to select a reason code when adjusting a previously entered count.</p>
13 - Require Reason on Adjust Cash Deposit	<p>Select this option to require the workstation operator to select a reason code when adjusting a cash deposit transaction.</p>
14 - Require Reason on Paid-In	<p>Select this option to require the workstation operator to select a reason code when performing a paid-in transaction.</p>
15 - Require Reason on Paid-Out	<p>Select this option to require the workstation operator to select a reason code when performing a paid-out transaction.</p>
16 - Require Reason on Transfer	<p>Select this option to require the workstation operator to select a reason code when transferring funds from one receptacle to another.</p>
17 - Require Reason on Adjust Bank Deposit Reference	<p>Select this option to require the workstation operator to select a reason code when adjusting a bank deposit reference.</p>
20 - Require Deposit Reference	<p>Select this option to require the workstation operator to select a reason code when creating a new bank deposit.</p>
21 - Require Reference for Receptacle Counts	<p>Select this option to require the workstation operator to enter a reference when counting a receptacle.</p>
24 - Require Reference for Cash Pull	<p>Select this option to require the workstation operator to enter a reference when performing a cash pull.</p>
25 - Require Reason on Over/Short	<p>Select this option to require the workstation operator to enter a reason code when posting an operation that finds a variance in values.</p>

**Table 47-9 (Cont.) Cash Management Parameter Options**

Option	Description
26 - Allow Count of Assigned Till	<p>Select this option to allow the workstation operator to count a till that is assigned to a workstation. When you deselect it, you unassign the till from the workstations to count.</p> <p>After upgrading to Symphony version 2.7 MR2, existing customers who want to continue to count assigned tills need to set this option.</p>
27 - Require Check Closed Before Receptacle Close	<p>Select this option to allow the workstation operator to close a till or server banking session only after all checks with assigned users as the check owner are closed. The workstation operator must close all open checks before closing the till or server banking session.</p> <p>Setting this option ensures that a receptacle is available to settle cash tenders to open checks for workstation operators assigned to the receptacle.</p>
28 - Restrict a Single User per Till	<p>Select this option to restrict a till session to only allow one user. When the workstation operator has option <b>26 - Allow Assigned Receptacle Access</b> set from the Employee Class, the Allow All button is available on the POS client during the assignment operation.</p>
29 - Save Count Progress	<p>Select this option to allow the workstation operator to save an incomplete count sheet when counting a receptacle session.</p>
30 - Enable Change Order Tracking	<p>Select this option to track change order transactions, save, and recall change order requests.</p>
31 - Require Reference for Change Order	<p>Select this option to require the workstation operator to enter a reference when submitting a change order request.</p>

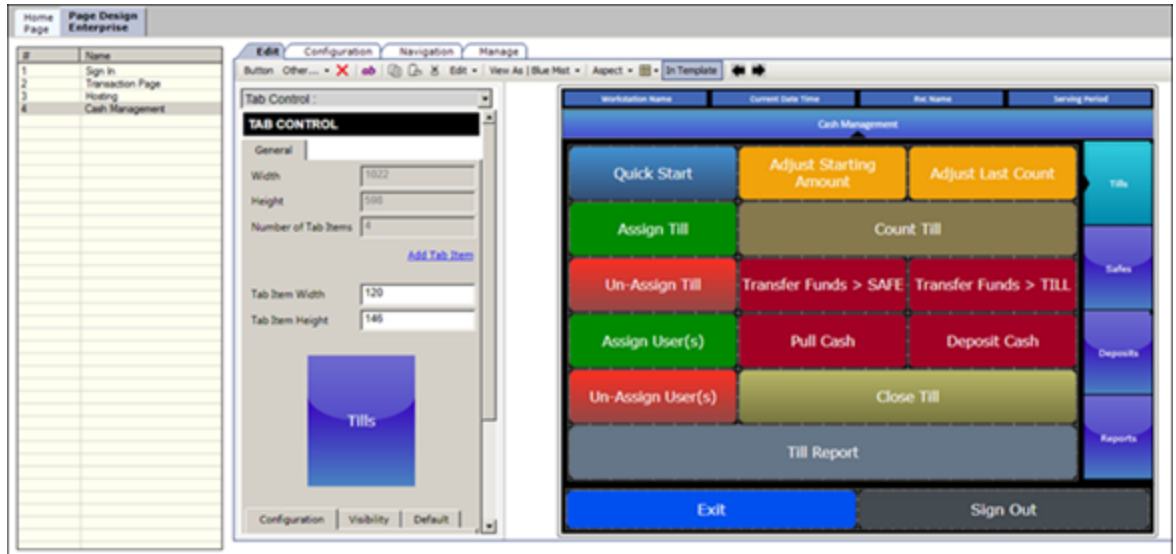
6. Click **Save**.
7. Select the Enterprise, zone, property, or revenue center, click **Setup**, and then click **Control Parameters**.
8. Click the **Options** tab.
9. Select **68 - Require Reason on No Sale** to require the workstation operator to select a reason code when performing a No Sale operation.
10. Click **Save**.

## Creating Front of House Screens

Oracle Hospitality recommends that you create a page with tabs on which to place the ECM functions. Create and configure tabs to show operations by receptacle type.

Create buttons on the page for the required ECM functions listed. The following figure shows an example of a page with ECM functions created in the Page Design module.

**Figure 47-2 Front of House Screen in Page Design**



1. Create tabs for Safe, Bank Deposit, Till, Server Bank, Petty Cash, and General.
2. On each tab, create buttons for each of the functions listed in the following table.

**Table 47-10 ECM Front of House Tabs and Buttons**

Tab	Button Name	Function
Safe	Add Funds	Add money to the safe.
	Adjust Count	Correct values from the previous count.
	Change Count Sheet	Adjust the count sheet that workstations operators use to perform a count.
	Close Receptacle	Close the safe's tracking session.
	Count Receptacle	Count the money in the safe.
	Deposit Cash	Deposit cash into the safe.
	Open New Change Order Request	Open a Change Order when a safe is low on a particular denomination or to stock up for an event.
	Open New Receptacle	Open a new safe tracking session.
	Paid-In	Accept funds for the safe outside of a guest check.

**Table 47-10 (Cont.) ECM Front of House Tabs and Buttons**

<b>Tab</b>	<b>Button Name</b>	<b>Function</b>
Bank Deposit	Paid-Out	Distribute funds from the safe outside of a guest check.
	Remove Funds	Remove money from a safe session and from tracking.
	Transfer Funds	Transfer money from the safe to another receptacle.
	Adjust Bank Deposit Reference	Change the reference of a bank deposit session.
	Adjust Cash Deposit	Change the amount of a cash deposit that was placed into the bank deposit session.
	Open New Receptacle	Open a new bank deposit tracking session.
	Reconcile Bank Deposit	Close the bank deposit.
Till	Transfer Funds	Transfer money from the bank deposit to another receptacle.
	Adjust Count	Correct values from the previous count.
	Adjust Till Starting Amount	Change the starting amount of a till session after opening it.
	Assign Till to Cash Drawer	Assign a till to a cash drawer.
	Assign User(s) to Till	Assign one or more operators to the till session on the workstation.
	Change Count Sheet	Adjust the count sheet that workstations operators use to perform a count.
	Close Receptacle	Close the till's tracking session.
	Count Receptacle	Count the money in the till.
	Deposit Cash	Deposit cash into the till.
	Paid-In	Accept funds for the till outside of a guest check.
	Paid-Out	Distribute funds from the till outside of a guest check.
	Pull Cash	Remove cash from the till session.
	Quick Start Till	Quickly assign a workstation operator and till to a cash drawer on the workstation.
Transfer Funds	Transfer money from the till to another receptacle.	

**Table 47-10 (Cont.) ECM Front of House Tabs and Buttons**

<b>Tab</b>	<b>Button Name</b>	<b>Function</b>
Server Bank	Unassign Till from Cash Drawer	Restrict the till to a limited number of operations. This function does not close the till.
	Unassign User(s) from Till	Prevent the workstation operator from performing transactions on the till. This function does not close the till.
	Adjust Count	Correct values from the previous count.
	Adjust Server Bank Starting Amount	Change the starting amount of a till session after opening it.
	Close Receptacle	Close the server bank's tracking session.
	Count Receptacle	Count the money in the server bank.
	Deposit Cash	Deposit cash into the server bank.
	Paid-In	Accept funds for the server bank outside of a guest check.
	Paid-Out	Distribute funds from the server bank outside of a guest check.
	Transfer Funds	Transfer money from the server bank to another receptacle.
Petty Cash	Adjust Count	Correct values from the previous count.
	Close Receptacle	Close the petty cash tracking session.
	Count Receptacle	Count the money in petty cash.
	Deposit Cash	Deposit cash into the petty cash.
	Open New Receptacle	Open a new petty cash tracking session.
	Paid-In	Accept funds for petty cash outside of a guest check.
	Paid-Out	Distribute funds from petty cash outside of a guest check.
Transfer Funds	Transfer money from petty cash to another receptacle.	



**Table 47-10 (Cont.) ECM Front of House Tabs and Buttons**

Tab	Button Name	Function
General	View Receptacle Status	Look at summary information for all receptacle sessions.
	Till Assignment Status (Smart Key)	Determine whether a till is assigned to a cash drawer on the workstation.

## Configuring a Smart Key on a Workstation

A smart key prevents the use of a workstation until you assign a till session to a cash drawer on the workstation. After assignment, the key permits the workstation operator to sign on to the workstation. Follow these steps to implement the optional smart key.

1. Select the Enterprise, zone, property, or revenue center, click **Configuration**, and then click **Page Design**.
2. Select the **Sign In** page.
3. On the **Edit** tab, click **Button**.
4. Enter information in the Page Design fields.

**Table 47-11 Page Design Edit Fields**

Field	Entry
Legend	Enter the name of the button (for example, Till Status).
Type	Select <b>Function</b> from the drop-down list.
Sub Type	Click the black arrow, and then select <b>Smart Key</b> .
Auto Active	Select this option to make the button automatically active.

5. Click the **Edit Smart Keys** button.
6. Click **Add**.
7. Enter information in the fields as described in the following table for Smart Key entry number 1.

**Table 47-12 Smart Key 1 Fields**

Field	Entry
Condition	Select <b>Till Assigned</b> from the drop-down list.
Value	Enter <b>1</b> .
Legend	Enter the name of the button (for example, Sign In).
Type	Select <b>Function</b> from the drop-down list.

**Table 47-12 (Cont.) Smart Key 1 Fields**

Field	Entry
Sub Type	Click the black arrow, and then select <b>Sign-In</b> .

8. Click **Add**.
9. Enter information in the fields as described in the following table for Smart Key entry number 2.

**Table 47-13 Smart Key 2 Fields**

Field	Entry
Condition	Select <b>Default</b> from the drop-down list.
Value	Enter <b>2</b> .
Legend	Enter the name of the button (for example, Assign Till).
Type	Select <b>Function</b> from the drop-down list.
Sub Type	Click the black arrow, and then select <b>Assign Till To Cash Drawer</b> .

10. Click **Close**.
11. Click **Save**.

## Configuring a Till Through Extensibility

ECM provides the **Designate till number during assignment** capability through extensibility. When you set the InitiatingCommand.Arguments to a valid receptacle object number, the application attempts to use that till when assigning a till to a workstation. If the till is not found or is assigned to another workstation, the application prompts the workstation operator for the till to assign.

- [Configuring a Bank Deposit Reference Through Extensibility](#)

## Configuring a Bank Deposit Reference Through Extensibility

ECM allows you to define a bank deposit reference through extensibility using the GetReference entry. Transaction and location information is exposed to extensibility to set values that you can use (if required) in the bank deposit reference. The bank deposit reference entry is based on the following transaction and location information:

- Property Number and Name
- Revenue Center (RVC) Number and Name
- Business Date
- Workstation Number

The extensibility application automatically generates the bank deposit reference. When you set the bank deposit reference value through extensibility, the workstation operator cannot enter or edit the reference value.

- [Configuring a Till Through Extensibility](#)

## ECM Reporting

ECM reporting for receptacles and activity is available at the Enterprise and property hierarchy levels.

- [ECM Enterprise Reports](#)
- [ECM Property Reports](#)

### Related Topics

- [Enabling Reports in Enterprise Back Office](#)
- [Specifying Ad Hoc Reports](#)

## ECM Enterprise Reports

Enterprise reports provide information about active and completed receptacle sessions for the Enterprise in Oracle Hospitality Reporting and Analytics, including the reports listed in the following table. These reports contain drill-down options to allow simple auditing for all receptacle tracking sessions related to the report.

**Table 47-14 ECM Enterprise Reports**

Report	Contains Information About
Safe Report	All safe sessions (regardless of their state) for the selected location and business date
Petty Cash Report	All petty cash sessions (regardless of their state) for the selected location and business date
Till Report	All till sessions (regardless of their state) for the selected location and business date
Bank Deposit Report	All bank deposit sessions (regardless of their state) for the selected location and business date
Server Bank Report	All server bank sessions (regardless of their state) for the selected location and business date
Count Adjustment Report	Count adjustments that were performed for all receptacle tracking sessions for the selected properties
Starting Amount Adjustment Report	Adjustments to starting amounts that were defined for all receptacle sessions for the selected location and business date
Over/Short Detail Report	Over and short conditions that were reported for all receptacle sessions for the selected location and business date
Paid-In/Paid-Out Report	Paid-in and paid-out transactions that were reported for all receptacle tracking sessions for the selected properties

**Table 47-14 (Cont.) ECM Enterprise Reports**

Report	Contains Information About
Activity Report	<p>All transactions and operations that were performed for receptacle sessions. Transactions and operations are listed chronologically, allowing an auditor to view an exact account of all activities performed from open to close for the receptacle session.</p> <p>This report is available through a drill-down from another report and shows only the filter selected from the parent report. For example, the Activity Report shows only the date and time range selected in the parent report.</p>
Change Order Report	<p>All change orders submitted (open) and reconciled (closed) for the selected business date. Saved change orders are not shown.</p>
Count Entry Details Report	<p>Details entered by the workstation operator during a receptacle count, including all denominated, non-denominated, and reference entries</p> <p>This report is available through a drill-down from the Activity Report for a receptacle count. This report shows only the filter selected from the parent report. For example, the Count Entry Details Report shows only the date and time range selected in the parent report.</p>

- [ECM Reporting](#)
- [ECM Property Reports](#)

**Related Topics**

- [Enabling Reports in Enterprise Back Office](#)
- [Specifying Ad Hoc Reports](#)

## Enabling Reports in Enterprise Back Office

Enterprise reports must be assigned to an employee role in Oracle Hospitality Reporting and Analytics before authorized employees can run them. An administrator typically assigns the reports to a role.

1. In Reporting and Analytics, click **Admin**, click **Warehouse**, click **Reports**, and then click **Report Roles**.
2. Highlight a role, and then click **Select**.
3. On the Role Reports screen, click **Add**.
4. Select the report names from the list, and then click **Save**.
5. Create a report category:
  - a. Click **Admin**, click **Warehouse**, click **Reports**, and then click **Report Categories**.
  - b. Click **Add**.
  - c. On the Report Categories screen, enter the **Name** of the new report category, a **Description**, and specify a **Sort Order**.

d. Click **Save**.

- [Specifying Ad Hoc Reports](#)

#### Related Topics

- [ECM Reporting](#)
- [ECM Enterprise Reports](#)
- [ECM Property Reports](#)

#### Related Topics

- [Event Information in Reporting and Analytics Reports](#)

## ECM Property Reports

Property reporting at the workstation provides reports on active and completed receptacle sessions.

You can create front of house buttons for each property report listed in the following table. [Workstation Touchscreen Pages](#) contains more information about configuring front of house buttons.

**Table 47-15 ECM Property Reports**

Report	Contains Information About
Bank Deposit Report	Active bank deposit sessions for the location
Cash Pull Report	Cash pull transactions posted for the current business date
Change Order Report	Open Change Order sessions and transactions for the location
Over/Short Detail Report	Over and short conditions recorded for the current business date
Paid-In/Paid-Out Report	Paid-in and paid-out transactions recorded for the current business date
Petty Cash Report	Active petty cash sessions for the location
Safes Report	Active safe sessions for the location
Server Bank Report	The active server bank session for the operator logged in to the workstation
Server Banking Report	Active server banking sessions for the location
Till Banking Report	Active till sessions for the location
Till Report	Active till sessions assigned on the workstation

- [ECM Reporting](#)
- [ECM Enterprise Reports](#)

#### Related Topics

- [Enabling Reports in Enterprise Back Office](#)
- [Specifying Ad Hoc Reports](#)

## ECM Workstation Hardware

The following table lists the workstation hardware models and operating systems supported for ECM receptacle operations and functions. Some functionality related to the operation of tills is limited with tablets, handhelds, and other mobile devices. These devices are indicated in the table with an asterisk (\*).

The receptacle's tracking session includes ECM tracked transactions that are processed as part of normal guest check operations, regardless of the hardware model or supported operating system from which they originated.

**Table 47-16 Workstation Hardware**

Model	Operating System	ECM Features Supported?
Oracle MICROS Workstation 6 Series	Microsoft Windows 8.1	Yes
Oracle MICROS Tablet E-Series (8-inch and 11-inch)	Microsoft Windows 8.1	Yes*
Oracle MICROS Workstation 5a	Microsoft Win32	Yes
Oracle MICROS PC Workstation 2015	Microsoft Win32	Yes
Oracle MICROS PC Workstation 2010	Microsoft Win32	Yes
DT Research 362	Microsoft POSReady 7	Yes*
DT Research 365	Microsoft Windows 7	Yes*
Zebra MC40 (formerly the Motorola MC40)	Android 4.1	Yes*
Apple iPad (all models)	Apple iOS 8	No
Certified Consumer Devices (Android)	Android 4.4	Yes*

### Related Topics

- [Configuring ECM Privileges](#)
- [Allowing Users to View Blind Totals](#)
- [Allowing Assigned Receptacle Access](#)
- [Configuring Accounting Methods for Users](#)
- [Allowing Users to Override Employee Class Options](#)
- [Creating, Editing, and Deleting Cash Management Reasons](#)

## Enterprise Cash Management Configuration Levels

The following table lists the hierarchy levels within the EMC that allow configuration of ECM operations.

**Table 47-17 EMC Configuration Levels**

EMC Configuration Name	Enterprise	Property	RVC	Zone
Accounts	X	X	X	X
Cash Count Threshold Sets	X	X	X	X
Cash Management Classes	X	X	X	X
Cash Management Parameters	X	X	X	X
Cash Management Reasons	X	X	X	X
Cash Pull Threshold Sets	X	X	X	X
Count Sheets	X	X	X	X
Employee Classes		X		
Employee Maintenance	X	X		X
Page Design	X	X	X	X
PAR Level Sets	X	X	X	X
Vendors	X	X	X	X
Templates	X	X	X	X
Receptacles	X	X	X	X
Roles	X			

**Related Topics**

- [Configuring ECM Privileges](#)
- [Allowing Users to View Blind Totals](#)
- [Allowing Assigned Receptacle Access](#)
- [Configuring Accounting Methods for Users](#)
- [Allowing Users to Override Employee Class Options](#)
- [Creating, Editing, and Deleting Cash Management Reasons](#)

# Engagement Cloud Service

The Engagement Cloud Service is Symphony's interactive user interface for the Oracle MICROS Tablet E-Series and Workstation 6 Series. The Engagement Cloud Service is a web-based interface featuring an ultra-modern look and feel with interactive live tiles. The Engagement Cloud Service is visually stimulating and provides advanced capabilities that redefine the hospitality and retail experience.

The Engagement experience lets you:

- Create customized pages online
- Assign and tag pages to properties, employees or workstations, or both
- Run POS operations and execute Manager Procedures

There are two types of pages:

- **Welcome Pages:** Initial page that appears on the MICROS Tablet E-Series device. You can assign different Welcome pages to workstations.
- **Hub Pages:** Pages that appear on the tablet after workstation operators sign on and press the **Hub** button. You can assign different Hub pages to each employee.

Pages can contain widgets that allow you to enhance workstation functionality. For example, you can have daily specials, image slideshows, a Twitter feed, and Oracle Hospitality Reporting and Analytics reports appear on the tablet's touchscreen.

- [System Requirements and Supported Devices](#)
- [Firewall and Communication](#)
- [Security Precautions](#)
- [Setting File Management Permissions](#)
- [Registering and Logging In](#)
- [Retrieving Your Engagement Organization ID](#)
- [Language Translation Tasks](#)
- [Adding a New Language to Hub and Welcome Pages](#)
- [Adding a Language to the EMCWeb File](#)
- [Adding a Language File to the Engagement Configuration Application Server](#)
- [Setting Multiple Languages](#)
- [Understanding Engagement Manager Procedures](#)
- [Adding Engagement Manager Procedure Tiles to the Hub Page](#)
- [Editing the Check Header and Trailer](#)
- [Editing Bulk Menu Item Prices](#)
- [Adding an Employee From a Template](#)
- [Deactivating an Employee](#)



- [Adding a New Menu Item Using an Existing Menu Item as a Template](#)
- [Adding Images to Menu Items](#)
- [Adding or Changing an Employee's Profile Image](#)
- [Creating Pages for Engagement Users](#)
- [Modifying Pages for Engagement Users](#)
- [Publishing, Unpublishing, and Republishing Pages](#)
- [Assigning Logos and Colors to Pages](#)
- [Understanding Tagging](#)
- [Adding Tags and Creating Relationships between Pages, Employees, and Tablets](#)
- [Deleting Tags](#)
- [Understanding Widgets](#)
- [The IP Camera Widget](#)
- [Adding and Moving Widgets](#)
- [Creating Tiles \(Adding Widgets to a Page\)](#)
- [Adding Command Buttons](#)
- [Understanding Widget Timing Values](#)
- [Configuring Widget Timing Values](#)
- [List of Widgets](#)
- [Viewing the Maximum Data Limit for Hosted Engagement Server](#)

## System Requirements and Supported Devices

The Engagement module included in Oracle Hospitality Symphony version 2.10 works with Oracle Hospitality Enterprise Back Office version 8.5.0 (or later).

The Engagement service is supported on workstations running the Microsoft Windows 8.1 and 10 operating system.

You can use Engagement on the following devices:

- Oracle MICROS Tablet E-Series 8-inch and 11-inch models
- Oracle MICROS Tablet 700 series
- Oracle MICROS Workstation 6 Series
- Oracle MICROS Compact Workstation 310
  
- [Firewall and Communication](#)
- [Security Precautions](#)

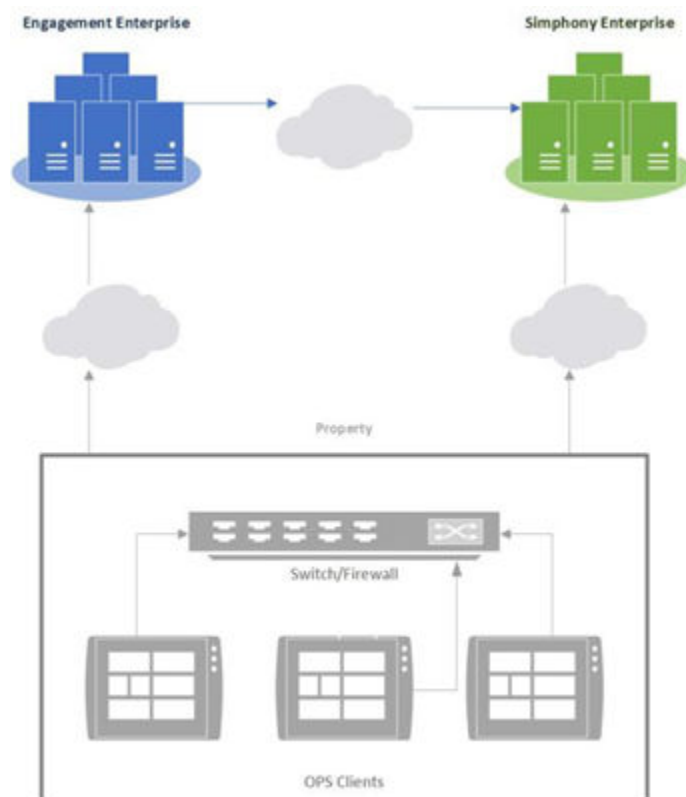
### Related Topics

- [Setting File Management Permissions](#)
- [Registering and Logging In](#)
- [Retrieving Your Engagement Organization ID](#)

## Firewall and Communication

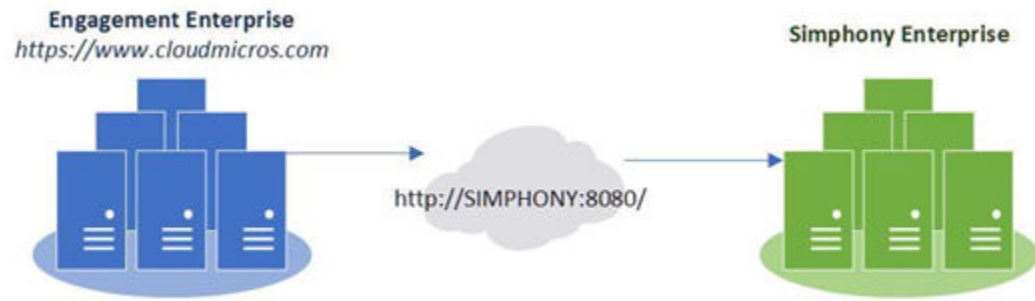
Ensure that a firewall is in place that restricts inbound and outbound traffic per PCI\_DSS\_V3 requirement 1.3—Prohibit direct public access between the Internet and any system component in the cardholder data environment. The following diagram illustrates the firewall communication for Engagement Enterprise with the Symphony Enterprise.

**Figure 48-1 Engagement and Symphony Firewall Communication**



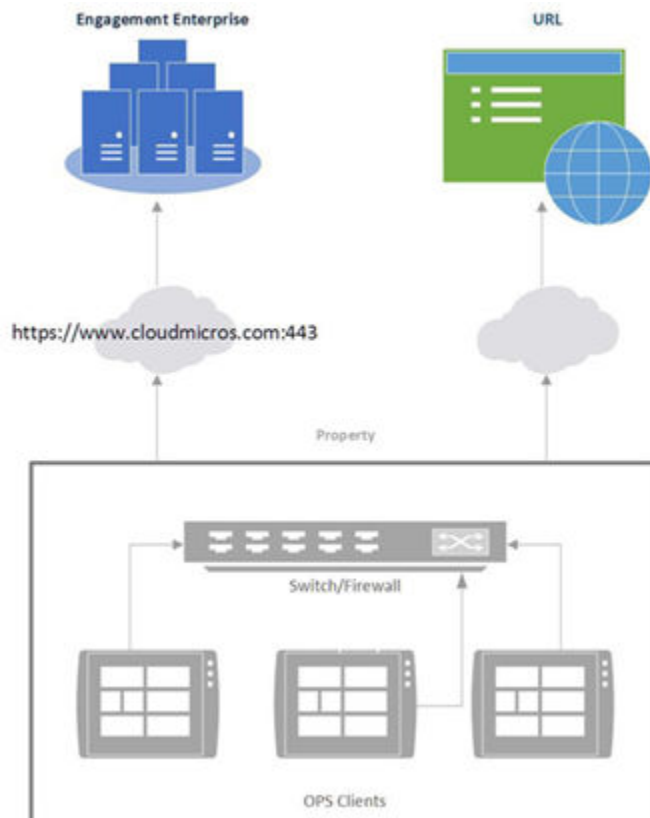
The Engagement Enterprise sends requests to the Symphony Enterprise through the Symphony2 site to register and perform synchronization. The Symphony Enterprise allows inbound requests from the URL <https://www.cloudmicros.com/> on port 443. The following diagram illustrates the communication between the Engagement Enterprise and the Symphony Enterprise.

**Figure 48-2 Engagement Enterprise and Symphony Enterprise Communication**



Workstations make outbound requests for pages, authentication, and content to the URL `https://www.cloudmicros.com/` on port 443. The following diagram illustrates the communication between the Engagement Enterprise and the Symphony property.

**Figure 48-3 Engagement Enterprise and Symphony Property Communication**



In addition to the Engagement Enterprise, firewall rules need to ensure that any URL used within Engagement is allowed through an outbound request. This includes the URL Widget, PDF Widget, IP Camera, and all other external content being used within Engagement.

- [System Requirements and Supported Devices](#)

- [Security Precautions](#)

#### Related Topics

- [Setting File Management Permissions](#)
- [Registering and Logging In](#)
- [Retrieving Your Engagement Organization ID](#)

## Security Precautions

The Engagement feature allows you to configure live tiles and content that appear on a POS client device. Ensure that any external data sources or URLs provided through Engagement are secure and derive from a trusted source.

The URL widget, which shows web content from the configured location, contains built-in security precautions. By default, the URL widget locks the workstation operator into the domain of the link provided. That is, all links on a page that are outside of the domain are disabled to prevent workstation operators from navigating to these links. For example, if you configure a URL widget for <http://www.oracle.com>, all links outside of \*.oracle.com are automatically disabled for the workstation operator.

Consider the following best practices when configuring the URL widget and POS client device on which it runs.

#### Internet Security Settings

The browser security settings within the Engagement feature are defined by the settings of Microsoft Internet Explorer. When you change Microsoft Internet Explorer options, (for example, Do not allow cookies) you also change the settings for the Engagement browser.

Do not move security levels below **Medium-high** with **Enable Protected Mode** on for Internet and **Medium-low** with **Enable Protected Mode** off for Local intranet. These are the minimum Engagement security settings. You may increase the security levels if desired.

#### Trusted Source

Only enter URLs for the widget from a secure and trusted source. Creating links to unverified sources and untrusted websites increases the security risk for your POS client device.

- [System Requirements and Supported Devices](#)
- [Firewall and Communication](#)

#### Related Topics

- [Setting File Management Permissions](#)
- [Registering and Logging In](#)
- [Retrieving Your Engagement Organization ID](#)

## Setting File Management Permissions

In some installations, the internal Microsoft Windows user that runs the Engagement web services on a Symphony application server does not have sufficient permission to

create and manage files (such as logs) within the folder where the software is installed. A batch file is available to run after installation, which enables the appropriate permissions. Contact Oracle Support for the EngagementFolderPerm.bat batch file.

As an alternative to running the script through the batch file, you can manually set the permissions by following these steps:

1. Use Windows Explorer to browse to the web root folder of the EGateway application (for example, [Drive Letter]:\MICROS\Symphony2).
2. Locate the Engagement sub folder within the EGateway web root folder (for example, [Drive Letter]:\MICROS\Symphony2\Engagement).
3. Right-click the Engagement folder, select **Properties**, and then click the **Security** tab.
4. Click **Edit**.
5. Click **Add**.
6. From the Select Users or Groups dialog, enter **IIS APPPOOL\WCCPool**, and then click **OK**.
7. From the Permissions for Engagement dialog, select **WCCPool**, allow the following permissions for the user, and then click **OK**.
  - **Modify**
  - **Read & execute**
  - **List folder contents**
  - **Read**
  - **Write**
8. Open a Command prompt window and enter **iisreset**. Microsoft Internet Information Services should successfully reset within a few minutes.

- [Registering and Logging In](#)
- [Retrieving Your Engagement Organization ID](#)

#### Related Topics

- [System Requirements and Supported Devices](#)
- [Firewall and Communication](#)
- [Security Precautions](#)

## Registering and Logging In

1. Open a web browser and enter the Engagement website: <https://www.cloudmicos.com>.
2. If you are a new user, click **Register**. If you are an existing user, continue to the next step.
3. Enter the same connection settings (Symphony Server's Internet Protocol (IP) address) and logon credentials you use to access the Symphony EMC.
4. Select the default organization language, and then click **Next**.

5. Enter the same connection settings and login credentials you use to log in to Oracle Hospitality Reporting and Analytics.
6. Enter the email address where you want to receive registration confirmation information.

- [Setting File Management Permissions](#)
- [Retrieving Your Engagement Organization ID](#)

#### Related Topics

- [System Requirements and Supported Devices](#)
- [Firewall and Communication](#)
- [Security Precautions](#)

## Retrieving Your Engagement Organization ID

Perform the following steps from the Login screen if you forget your Engagement Organization ID.

1. Click **Forgot my ID**.
2. Enter your site's gateway URL (for example, `http://<ServerName>:8080` or `http://<Server IPAddress>:8080`).
3. Enter your Symphony EMC user name and password.
4. Click **Recover Org Id**. The Engagement Organization ID appears.
5. Click **Back to Login** to enter your Login credentials.

- [Setting File Management Permissions](#)
- [Registering and Logging In](#)

#### Related Topics

- [System Requirements and Supported Devices](#)
- [Firewall and Communication](#)
- [Security Precautions](#)

## Language Translation Tasks

Configuring language translation for Engagement consists of completing the following tasks:

- Adding a language to Hub and Welcome pages
- Adding a language to the EMCWeb file
- Adding a language file to the Engagement Configuration application server
- Enabling multi-languages

#### Related Topics

- [Adding a New Language to Hub and Welcome Pages](#)
- [Adding a Language to the EMCWeb File](#)

- [Adding a Language File to the Engagement Configuration Application Server](#)
- [Setting Multiple Languages](#)

## Adding a New Language to Hub and Welcome Pages

1. Browse to the Engagement Language File directory on the Symphony application server.

The default installation path is [Drive Letter]:\Micros\Simphony\WebServer\Engagement\LanguageFile\Resources.xml.

2. Copy the Resources.xml file.
3. Rename the file to Resource.CULTURE-CODE.xml, where CULTURE-CODE is the code of the new language you are adding (for example, Resources.fr-FR.xml for French or Resources.es-ES.xml for Spanish).
4. Change the values of the <string> elements of each language entry to the target language.

Do not change the values of other elements or attributes.

You can move the number parameters ({0} or {1}) in the language string (left or right of the string text), but do not delete them.

5. Save the changes.

- [Adding a Language to the EMCWeb File](#)
- [Adding a Language File to the Engagement Configuration Application Server](#)
- [Setting Multiple Languages](#)

### Related Topics

- [Language Translation Tasks](#)
- [Setting Multiple Languages](#)

## Adding a Language to the EMCWeb File

1. Browse to the Engagement Language File directory on the Symphony application server.

The default installation path is [Drive Letter]:\Micros\Simphony2\EGatewayService\CAL\Win32\Package\ServiceHost2.0\WebServer45\Engagement\LanguageFiles.

2. Copy the EMCWebLanguageStringsEN-US.xml file.
3. Rename the file to EMCWebLanguageStrings.CULTURE-CODE.xml, where CULTURE-CODE is the code of the new language you are adding.

The file name must include the correct CULTURE-CODE naming convention (for example, EMCWebLanguageStrings.fr-FR.xml for French or EMCWebLanguageStrings.es-ES.xml for Spanish).

4. Change the values of the Text language attribute for each language entry to the target language.

Do not change the values of the key or screen attributes.

You can move the number parameters ({0} or {1}) in the language string (left or right of the string text), but do not delete them.

5. Save the changes.
  - [Adding a New Language to Hub and Welcome Pages](#)
  - [Adding a Language File to the Engagement Configuration Application Server](#)
  - [Setting Multiple Languages](#)

#### Related Topics

- [Language Translation Tasks](#)

## Adding a Language File to the Engagement Configuration Application Server

1. Browse to the Engagement Language File folder on the Engagement Configuration (Config) application server.  
The default installation path is [Drive Letter]:Web Root\Languages.
2. Copy the en-US.xml file.
3. Rename the file to CULTURE-CODE.xml, where CULTURE-CODE is the code of the new language you are adding (for example, fr-FR.xml for French or es-ES.xml for Spanish).

4. Change the values of the Text language attribute for each language entry to the target language.

Do not change the value of the record key attribute.

You can move the number parameters ({0} or {1}) in the language string (left or right of the string text), but do not delete them.

5. Change the values of the name and code attributes on the second line to the Culture code of the target language (<Language version="32" name="English (US)" code="en-US">).
6. Save the changes.

- [Adding a New Language to Hub and Welcome Pages](#)
- [Adding a Language to the EMCWeb File](#)
- [Setting Multiple Languages](#)

#### Related Topics

- [Language Translation Tasks](#)

## Setting Multiple Languages

1. Select the Enterprise level, click **Setup**, and then click **Languages**.
2. Double-click a language record.
3. In the **Language Culture** field, enter the abbreviated language code. For example, the code for English - United States is en-US.



See [http://msdn.microsoft.com/en-us/library/ee825488\(v=cs.20\)](http://msdn.microsoft.com/en-us/library/ee825488(v=cs.20)) for a list of language codes.

4. Repeat Steps 2 and 3 for each language record.
  5. Click **Save**.
- [Adding a New Language to Hub and Welcome Pages](#)
  - [Adding a Language to the EMCWeb File](#)
  - [Adding a Language File to the Engagement Configuration Application Server](#)

**Related Topics**

- [Language Translation Tasks](#)

## Understanding Engagement Manager Procedures

The Web EMC or Web Configuration Console (WCC) widget enables you to assign one of the following manager procedures to a tile:

**Table 48-1 WCC Widget Manager Procedures**

Manager Procedure	Allows You To...
Edit Header/Trailer	Edit check headers and trailers for a property or revenue center. If a logo image is available at the Enterprise level from the EMC, you can also add that image to the check header.
Bulk Edit MI Prices	Filter and edit menu item prices by revenue center, major group, family group, screen look up (SLU), menu item class, and a keyword entry.
Copy Menu Item	Add images to menu items. Add new menu items using existing menu item records as a template.
Copy Employee	Add new employees using existing employee records as a template. Add or change an image in an existing employee's profile.

**Related Topics**

- [Adding Engagement Manager Procedure Tiles to the Hub Page](#)
- [Editing the Check Header and Trailer](#)
- [Editing Bulk Menu Item Prices](#)
- [Adding an Employee From a Template](#)
- [Deactivating an Employee](#)
- [Adding a New Menu Item Using an Existing Menu Item as a Template](#)
- [Adding Images to Menu Items](#)
- [Adding or Changing an Employee's Profile Image](#)

## Adding Engagement Manager Procedure Tiles to the Hub Page

1. Log in to the Engagement dashboard, go to the Hub Pages section, and then add a new WCC widget.
  2. From the EMC - Properties dialog, select **Copy Employee** as the **Command Type**.
  3. (Optional) Enter the **Primary Text** and **Secondary Text** to appear on the widget.
  4. (Optional) Select the widget **Size**, and then add a **Tile Image** for the widget.
  5. Click **Save**.
  6. Repeat Steps 1 through 5 to add tiles to the Hub page for the Edit Header/Trailer, Bulk Edit MI Prices, and Copy Menu Item manager procedures.
- [Editing the Check Header and Trailer](#)
  - [Editing Bulk Menu Item Prices](#)
  - [Adding an Employee From a Template](#)
  - [Deactivating an Employee](#)
  - [Adding a New Menu Item Using an Existing Menu Item as a Template](#)
  - [Adding Images to Menu Items](#)
  - [Adding or Changing an Employee's Profile Image](#)

### Related Topics

- [Understanding Engagement Manager Procedures](#)

## Editing the Check Header and Trailer

1. Sign on to the POS client device, and then tap the **Hub** function.
  2. Tap the tile configured for the **Edit Header/Trailer** manager procedure.
  3. Select a property or revenue center.
  4. To edit the header and trailer for guest checks, tap **Guest Check**.
  5. To edit the header for a customer receipt, tap **Customer Receipt**.
  6. Enter the details to print on the header in the **Header** text fields, and then enter the details to print on the trailer in the **Trailer** text fields.
  7. To insert a logo for the header:
    - a. Select a Header text field, and then tap **Insert Image**.
    - b. Select a logo from the preview.
  8. Click **Save**.
- [Adding Engagement Manager Procedure Tiles to the Hub Page](#)
  - [Editing Bulk Menu Item Prices](#)

- [Adding an Employee From a Template](#)
- [Deactivating an Employee](#)
- [Adding a New Menu Item Using an Existing Menu Item as a Template](#)
- [Adding Images to Menu Items](#)
- [Adding or Changing an Employee's Profile Image](#)

**Related Topics**

- [Understanding Engagement Manager Procedures](#)

## Editing Bulk Menu Item Prices

1. Sign on to the POS client device, and then tap the **Hub** function.
2. Tap the tile configured for the **Bulk Edit MI Prices** manager procedure.
3. To edit the price of one menu item:
  - a. Enter the menu item's name in the search field, and then tap **Search**.
  - b. Tap the **Price** field of the menu item, enter the new menu item price, and then tap **Enter**.
4. To edit the prices of several menu items:
  - a. Tap **Filter Menu Item**, and then select one or more of the following filter criteria:
    - **Major Group**
    - **RVC**
    - **Family Group**
    - **SLU**
    - **Menu Item Class**
  - b. Tap the **Price** field of the first menu item on the search results, enter the new menu item price, and then tap **Enter**. The focus moves to the price of the next menu item.
5. Tap **Save**, and then tap **OK** to confirm the changes.

- [Adding Engagement Manager Procedure Tiles to the Hub Page](#)
- [Editing the Check Header and Trailer](#)
- [Adding an Employee From a Template](#)
- [Deactivating an Employee](#)
- [Adding a New Menu Item Using an Existing Menu Item as a Template](#)
- [Adding Images to Menu Items](#)
- [Adding or Changing an Employee's Profile Image](#)

**Related Topics**

- [Understanding Engagement Manager Procedures](#)

## Adding an Employee From a Template

1. Sign on to the POS client device, and then tap the **Hub** function.
2. Tap the tile configured for the **Copy Employee** manager procedure.
3. Tap **Filter Employees**, select the revenue center, the employee role, and the employee class to assign to the new employee.
4. Select an employee from the search results, and then tap **Copy Employee**.
5. Configure the following information for the new employee:

**Table 48-2 Configuration Fields for Adding New Employees From a Template**

Field or Option Name	Description
First Name	Enter the employee's first name.
Last Name	Enter the employee's last name.
DOB	Select the employee's date of birth.
Hire Date	Enter the date the employee was hired.
(Optional) MagCard ID	Enter the magnetic card number assigned to the employee or swipe the card to enter the card number into the application.
(Optional) Finger Print	If a fingerprint scanner is connected, you can scan the employee's fingerprints into the application.
RVCs	Select the employee's revenue center. You cannot change the primary revenue center of the employee.
Enable Reporting	Select this option to grant the employee access to Oracle Hospitality Reporting and Analytics.
Is Salaried	Select this option if the employee is paid a flat amount.
Pay Rate	Enter the employee's pay rate.
Logon Name	Enter the username to use to sign on to the workstation. If you selected <b>Enable Reporting</b> , the employee can use the same username to sign on to Reporting and Analytics.
Password	Enter the password to use to sign on to the workstation. If you selected <b>Enable Reporting</b> , the employee can use the same username to sign on to Reporting and Analytics.
Confirm Password	Re-enter the password.

6. To add an image to the employee's profile:
  - a. Tap **Change Picture**, and then tap **Browse Image**.
  - b. Select the employee's image, and then tap **Open**.

7. Tap **Add Employee**, and then tap **Yes** to confirm the insertion.

- [Adding Engagement Manager Procedure Tiles to the Hub Page](#)
- [Editing the Check Header and Trailer](#)
- [Editing Bulk Menu Item Prices](#)
- [Deactivating an Employee](#)
- [Adding a New Menu Item Using an Existing Menu Item as a Template](#)
- [Adding Images to Menu Items](#)
- [Adding or Changing an Employee's Profile Image](#)

**Related Topics**

- [Understanding Engagement Manager Procedures](#)

## Deactivating an Employee

Deactivating an employee removes the employee's access to Symphony and the Enterprise Back Office Suite. When an employee is deactivated:

- The employee is clocked out immediately when outside of a transaction.
- The employee can no longer sign on to the Symphony POS client, EMC, Reporting and Analytics, or the Engagement configuration website.

Labor Management shows the deactivated employee's status as Terminated. Use the Labor Management portal to re-hire a deactivated employee.

1. Sign on to the POS client device, and then tap the **Hub** function.
2. Tap the tile configured for the **Copy Employee** manager procedure.
3. Search for and select the employee you want to deactivate.
4. Tap **Deactivate Employee**, and then tap **OK** to confirm.

The Symphony EMC shows the deactivated employee's status as Is Deleted. The **Is Deleted** option from the Employee Maintenance module is automatically set for the deactivated employee.

- [Adding Engagement Manager Procedure Tiles to the Hub Page](#)
- [Editing the Check Header and Trailer](#)
- [Editing Bulk Menu Item Prices](#)
- [Adding an Employee From a Template](#)
- [Adding a New Menu Item Using an Existing Menu Item as a Template](#)
- [Adding Images to Menu Items](#)
- [Adding or Changing an Employee's Profile Image](#)

**Related Topics**

- [Understanding Engagement Manager Procedures](#)

## Adding a New Menu Item Using an Existing Menu Item as a Template

1. Sign on to the POS client device, and then tap the **Hub** function.
2. Tap the tile configured for the **Copy Menu Item** manager function.
3. Select a menu item that belongs to the same menu item class and print class that you want to assign to the new menu item, and then tap **Copy Image**.
4. Configure the following details for the new menu item:

**Table 48-3 Configuration Fields for Adding New Menu Items From a Template**

Field or Option Name	Description
Menu Item Master Name	Enter the new menu item name.
Definition	Select the appropriate menu item definition. If the menu item that you are using as the template has several definitions, all definitions appear in the list.
Menu Item Definition Name	Enter the name for the new menu item definition.
Price	Enter the menu item price.

5. To change the image for the menu item:
  - a. Tap **Change Picture**, and then tap **Browse Image**.
  - b. Select the new image, and then tap **Open**.
6. Click **Add Menu**, and then tap **OK** to confirm the insertion.

- [Adding Engagement Manager Procedure Tiles to the Hub Page](#)
- [Editing the Check Header and Trailer](#)
- [Editing Bulk Menu Item Prices](#)
- [Adding an Employee From a Template](#)
- [Deactivating an Employee](#)
- [Adding Images to Menu Items](#)
- [Adding or Changing an Employee's Profile Image](#)

**Related Topics**

- [Understanding Engagement Manager Procedures](#)

## Adding Images to Menu Items

1. Sign on to the POS client device, and then tap the **Hub** function.
2. Tap the tile configured for the **Copy Menu Item** manager function.

3. Select the menu item to use as the template for the new menu item, and then tap **Upload Image**.
4. Select the menu item image, and then tap **Open**.

- [Adding Engagement Manager Procedure Tiles to the Hub Page](#)
- [Editing the Check Header and Trailer](#)
- [Editing Bulk Menu Item Prices](#)
- [Adding an Employee From a Template](#)
- [Deactivating an Employee](#)
- [Adding a New Menu Item Using an Existing Menu Item as a Template](#)
- [Adding or Changing an Employee's Profile Image](#)

**Related Topics**

- [Understanding Engagement Manager Procedures](#)

## Adding or Changing an Employee's Profile Image

1. Copy images to the POS client device using a flash drive or download the images through the Internet.
2. Sign on to the POS client device, and then tap the **Hub** function.
3. Tap the tile configured for the **Copy Employee** manager procedure.
4. Select an employee, and then tap **Preview**.
5. Tap **Change Picture**, and then tap **Browse Image**.
6. Browse to and select the employee's image, and then tap **Open**.

Image files cannot exceed 50 KB in size. The following image file type formats are supported:

- .bmp
  - .jpeg
  - .png
  - .gif
7. Close the Employee Summary dialog.
- [Adding Engagement Manager Procedure Tiles to the Hub Page](#)
  - [Editing the Check Header and Trailer](#)
  - [Editing Bulk Menu Item Prices](#)
  - [Adding an Employee From a Template](#)
  - [Deactivating an Employee](#)
  - [Adding a New Menu Item Using an Existing Menu Item as a Template](#)
  - [Adding Images to Menu Items](#)

**Related Topics**

- [Understanding Engagement Manager Procedures](#)

## Creating Pages for Engagement Users

1. From the dashboard, go to the Pages section, and then tap **View All**.
  2. To add a new page from either the Welcome Pages or Hub Pages section, tap **+** **Create New Page** in the appropriate section.
  3. Type the name of the page in the text box, and then tap **OK**.
- [Modifying Pages for Engagement Users](#)
  - [Publishing, Unpublishing, and Republishing Pages](#)
  - [Assigning Logos and Colors to Pages](#)

## Modifying Pages for Engagement Users

You can modify pages using the controls that appear when you select a page.

1. Select a page, and then tap **Edit** to make changes to the page.
2. Select a page, and then tap **Clone** to duplicate a page.
3. Select a page, and then tap **Default** to set the page as the default.

Default pages have a star shaped icon. Workstation operators see the default page upon signing on to the POS client device if no tags are assigned. You can assign default Welcome pages to POS client workstations and assign default Hub pages to employees.

4. Select a page, and then tap **Tag** to assign or add a tag to a page.
- [Creating Pages for Engagement Users](#)
  - [Publishing, Unpublishing, and Republishing Pages](#)
  - [Assigning Logos and Colors to Pages](#)

## Publishing, Unpublishing, and Republishing Pages

Publish pages to allow workstation operators to view and access non-default pages. Published pages appear in color, while non-published pages are gray.

1. Tap **Publish** to save and load the page on the POS clients.  
You can only publish one page if no pages are tagged. When you publish an untagged page, the application unpublishes the previous default page and the newly published page becomes the default page.
2. Tap **Unpublish** to deactivate currently published pages.
3. Tap **Republish** to publish pages that were previously published. Clicking **Republish** automatically loads the page for the POS clients.

- [Creating Pages for Engagement Users](#)
- [Modifying Pages for Engagement Users](#)
- [Assigning Logos and Colors to Pages](#)



## Assigning Logos and Colors to Pages

You can define a logo and color palette on Welcome pages. You can add only a logo to Hub pages because the color palette can be inherited from the Enterprise, property, or revenue center level based on the Theme Assignment module configuration.

Image files cannot exceed 1 MB in size. The following image file type formats are supported:

- .bmp
- .jpeg
- .png
- .gif

Copy logo images to the POS client device using a flash drive or download the images through the Internet.

1. Open the page, and then tap anywhere within the grid.
  2. Select the color from the **Palette** drop-down list.
  3. To add a company logo to the page:
    - a. Tap **Open**.
    - b. Browse to the logo image file and select it. The directory path appears in the **Logo** field.
  4. Tap **Save**.
- [Creating Pages for Engagement Users](#)
  - [Modifying Pages for Engagement Users](#)
  - [Publishing, Unpublishing, and Republishing Pages](#)



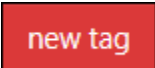
## Understanding Tagging

You can assign pages to employees and workstations. This is known as tagging. Tagging organizes pages by identifying which property, employee, and tablet are assigned to specific pages. For example, if My Bar assigns a BAR tag to all of the pages, you can search for all pages tagged as BAR.

You can assign multiple tags to a single page, but you can only assign one tag to a workstation and one tag to an employee. You cannot tag pages that are set as the default page. The application assigns new employees to the default Hub page, and a new POS client shows the default Welcome page without tagging.

The color of the tag indicates the tag state. The following table describes the tag colors and states.

**Table 48-4 Engagement Tags**

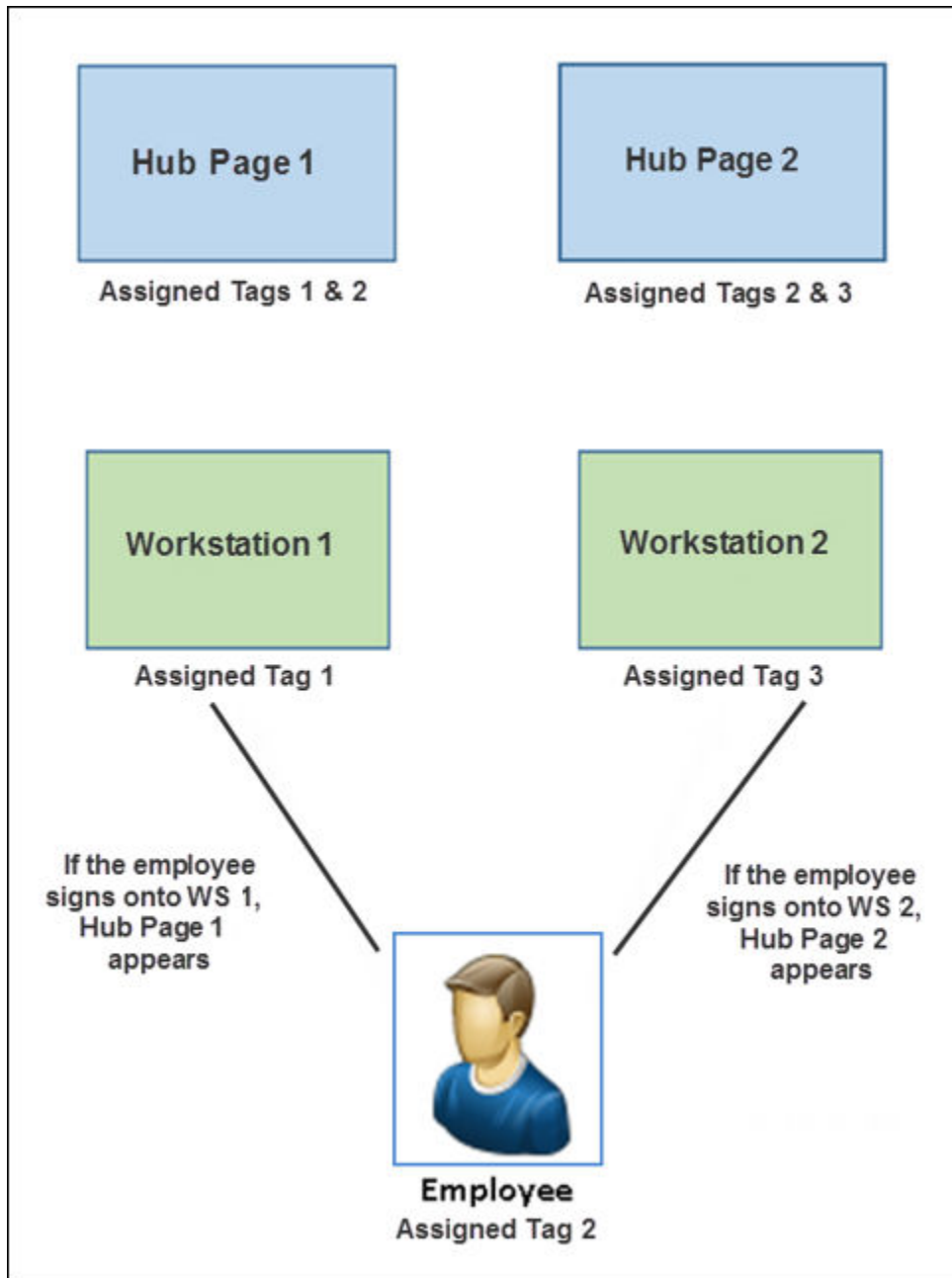
Tag Color	Tag State
Amber	Tag created and assigned
	
Brown	Tag created, but not assigned
	
Red	Tag deleted
	

Depending on the POS client workstation an employee signs onto, the application checks the employee tag number and workstation tag number, and shows the appropriate Hub page that meets the tagging criteria.

For example, in the following figure, if the employee signs onto Workstation 1, Hub Page 1 appears. This is because the Employee has tag 2, Workstation 1 has tag 1, and the Hub Page 1 has tag numbers 1 and 2. The application shows the page that most closely matches the tagging criteria.

If the employee signs onto Workstation 2, Hub Page 2 appears. This is because the Employee has tag 2, Workstation 2 has tag 3, and Hub Page 2 has tags 2 and 3.

**Figure 48-4 Application Logic for Showing Hub Page Based on Tag Assignment**



**Related Topics**

- [Adding Tags and Creating Relationships between Pages, Employees, and Tablets](#)
- [Deleting Tags](#)

## Adding Tags and Creating Relationships between Pages, Employees, and Tablets

1. From the dashboard, tap one or more pages, and then tap **Tags**.
2. Tap **Add**, enter a name for the tag, and then tap **Done**.
3. Select an employee and a POS client workstation, and then tap **Tags**.
4. Select the tag you created in Step 2, and then tap **Done**.

- [Deleting Tags](#)

### Related Topics

- [Understanding Tagging](#)

## Deleting Tags

1. Tap **Tags**, and then tap **Delete Tags**.
2. Tap the tag to delete, tap **Delete**, and then confirm the deletion.

- [Adding Tags and Creating Relationships between Pages, Employees, and Tablets](#)

### Related Topics

- [Understanding Tagging](#)

## Understanding Widgets

Widgets are tiles that you create to show on Symphony Engagement Cloud Service POS client screens. Widgets allow workstation operators to perform optional tasks and procedures based on the assigned privilege level.

- [The IP Camera Widget](#)
- [Viewing the Maximum Data Limit for Hosted Engagement Server](#)

### Related Topics

- [Adding and Moving Widgets](#)
- [Creating Tiles \(Adding Widgets to a Page\)](#)
- [Adding Command Buttons](#)
- [List of Widgets](#)

## The IP Camera Widget

The Engagement Internet Protocol (IP) Camera widget is used to display a camera feed on the user interface (UI) screen as a widget. It allows users to view live video from an IP camera configured using the Engagement Widget designer. The IP Camera widget uses the Motion-JPEG (MJPEG) video compression format. MJPEG is a video format in which each frame of video is sent as a separate and compressed JPEG

image. The viewer displays the JPEG images as quickly as they are received and that creates the video.

The IP Camera widget is implemented using an image control to render the camera feeds received as images on the UI screen. A separate media player is not used. The IP Camera widget uses an open source library named MJPEG Decoder available in CodePlex.

The widget initializes the MJPEG decoder by passing an IP camera feed URL, which is configured using the Engagement widget designer. The widget receives the appropriate events whenever a new image is available and draws it on the container image control. The widget works with all resolutions supported by the IP Camera. The image is resized to fit within the widget's dimensions, while it preserves its native aspect ratio in the detail view, regardless of the resolution of the images received. The widget does not save or store images.

The MJPEG Decoder library initiates an asynchronous request to the MJPEG URL provided by the viewer. It then streams the multi-part response data received into separate images as they are received. The library passes each JPEG image to the viewer using an event whenever they are available.

The IP Camera widget supports all network and IP cameras capable of sending a direct MJPEG stream. This does not include cameras that are embedded within a web page. The camera must provide a direct stream of only the MJPEG for the IP Camera widget to successfully display the feed.

The IP Camera widget does not require additional security measures when displaying the IP Camera feed. Administrators should implement security restrictions on the network to explicitly allow workstations to connect to the camera feed. Additionally, the IP camera feed should be configured in a secure manner to ensure that the username and password are included in the URL, if possible.

- [Understanding Widgets](#)
- [Viewing the Maximum Data Limit for Hosted Engagement Server](#)

#### Related Topics

- [Adding and Moving Widgets](#)
- [Creating Tiles \(Adding Widgets to a Page\)](#)
- [Adding Command Buttons](#)
- [List of Widgets](#)

## Adding and Moving Widgets

1. From the Widget list, tap the widget to add.
2. To move the widget to a new grid location:
  - a. Tap the widget. A move icon appears.
  - b. Tap the move icon, and then tap the new grid location.

Widgets move based on tapping the left corner (upper left corner on large widgets) and automatically resize when moved to a smaller section of the grid.

- [Creating Tiles \(Adding Widgets to a Page\)](#)

- [Adding Command Buttons](#)

#### Related Topics

- [Understanding Widgets](#)
- [The IP Camera Widget](#)
- [Viewing the Maximum Data Limit for Hosted Engagement Server](#)
- [List of Widgets](#)

## Creating Tiles (Adding Widgets to a Page)

1. From the dashboard, tap a page, and then add a widget.
2. (Optional) Enter the **Primary Text**, **Secondary Text**, or both to appear on the widget.  
The secondary text appears beneath the primary text in a smaller font.
3. Select the size for the tile:
  - **Small**: One tile (small square)
  - **Wide**: Two tiles (rectangle)
  - **Large**: Four tiles (square)
  - **Extra Large**: Nine tiles (large square)
4. (Optional) To add a background image to the tile:
  - a. Tap **Open**.
  - b. Tap **Upload images(s)**, browse to the location of the image file or type the image URL, and then tap **OK**.
  - c. If images were previously uploaded, tap **View Album Contents**, and then select the image.
  - d. Tap **Select** to save an existing image or **Crop** to modify the image, and then tap **Done**.
5. To add a URL widget:
  - a. Enter the URL for the website.
  - b. To show the keyboard icon on the tile's top toolbar, tap **Show Keyboard**. This allows workstation operators to tap the keyboard icon to see the tablet keyboard on the tile.
6. To add an Image widget that appears when the workstation operator selects the tile (not the same as Tile Image), tap **Open**.  
If you do not add an image here, the assigned tile image appears by default.
7. To add an IP Camera Feed widget, enter the web address (URL) of the IP camera's video stream in the **Video URL** field.  
Include the end query that defines the user and password of the camera (for example, `http://CAMERAIPADDRESS/videostream.cgi?user=USERNAME&pwd=PASSWORD&resolution=32&rate=0`).
8. To add a PDF Viewer widget, enter the directory path to access the PDF document in the **URL** field.

9. To add a Twitter widget, add a hashtag or account in the **Query text** field (for example, #oracle or @oracle).
10. To add an InMotion Chart widget, select the **Report** and the data to appear by default from the **Chart** drop-down list.
11. To add an image that appears during the slideshow:
  - a. Tap **Slideshow Item**, and then tap **Open**.
  - b. Enter the primary and secondary text that appears on the image during the slideshow.
  - c. To add images to the slideshow, tap **Add More**.
  - d. To remove an image from the slideshow, tap **Delete Item**.
12. To add a Today's Special widget:
  - a. Enter the name of the tile in the **Header Text** field, and then select a **Template**.
    - Template1 shows each menu item individually during image rotation.
    - Template2 shows each menu item and a preview pane of other menu items during image rotation.
  - b. Tap **Menu Item** to add an image, enter the menu item name in the **Title** field, and then enter a **Description** of the menu item.
    - The Oracle MICROS Tablet E-Series 8-inch supports up to 823 characters, including spaces.
    - The Oracle MICROS Tablet E-Series 11-inch supports up to 627 characters, including spaces.
  - c. Enter the **Price** and additional text or pricing information in the **Extra** field.
  - d. To assign a time range to show specials for different meal periods:
    - i. Tap **Add Group**, expand the **Group** panel, and then tap **Recurrence**.
    - ii. Enter a time range in 24-hour format during which the group of menu items appear, and then select either **Daily** or the days of the week when the group of menu items appear.
  - e. Add as many menu items and groups as needed, and then tap **OK**.
13. To add a Command widget, assign one of the available commands to the tile.

The Command widget does not support adding a tile image.
14. To add a Weather widget for weather updates:
  - a. To use the default service provider, select **wunderground** from the **Provider** drop-down list.
  - b. To use a different service provider, enter the **API URL**, and then enter the **API Key** to authorize running the weather application programming interface (API).
  - c. Enter a city name or postal code in the **Location/Zip Code** field for specific forecasts, and then select the desired temperature scale from the **Scale** drop-down list.
15. To add an EMC widget, select the EMC task from the **Command** drop-down list.
16. Tap **Save**.
17. Tap **Publish** for new pages or **Republish** for existing pages.

- [Adding and Moving Widgets](#)
- [Adding Command Buttons](#)

#### Related Topics

- [Understanding Widgets](#)
- [The IP Camera Widget](#)
- [Viewing the Maximum Data Limit for Hosted Engagement Server](#)
- [List of Widgets](#)

## Adding Command Buttons

You can add command buttons that provide additional ways to perform common POS functions such as clocking in or out, editing menu items, or updating the workstation database. These buttons remain hidden and appear only when a workstation operator swipes the upper or lower area of the tablet touchscreen.

1. Tap either the upper or lower directional arrow, depending on where you want to add the buttons.

The upper or lower command bars work independently of each other.

2. Tap the plus sign (+) in the upper corner.
3. Enter **Primary Text**, select the **Command** to assign the button, and then tap **Save**.

- [Adding and Moving Widgets](#)
- [Creating Tiles \(Adding Widgets to a Page\)](#)

#### Related Topics

- [Understanding Widgets](#)
- [The IP Camera Widget](#)
- [Viewing the Maximum Data Limit for Hosted Engagement Server](#)
- [List of Widgets](#)

## Understanding Widget Timing Values

You can assign timing values to three widgets. Timing values affect the duration of time that widgets appear on an idle Engagement POS client device screen. You can assign custom timing values to the following widgets:

- URL Launcher
- Image Slideshow
- Today's Special

Engagement widget timing settings are overridden by **Log Off User When Idle** settings that are configured in the Symphony application, with the exception of the Web Configuration Console (WCC) widget. The WCC widget ignores the Symphony idle client timeout settings. The default timing value setting for the Engagement widgets is twenty seconds.



### Related Topics

- [Configuring Widget Timing Values](#)

## Configuring Widget Timing Values

1. Sign on to the POS client device, and then select a page from the dashboard.
2. Select the widget, and then tap **Edit**.
3. Enter a value in the **Allowed Idle Time** field.
4. Tap **Save**.

### Related Topics

- [Understanding Widget Timing Values](#)

## List of Widgets

You can add the following widgets to a Welcome page. Welcome pages do not support Hub page widgets.

**Table 48-5 Welcome and Home Page Widgets**

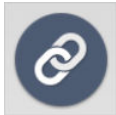
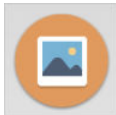
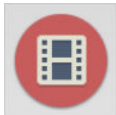





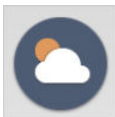
Widgets for Welcome and Home Pages	Description
URL Launcher 	Allows you assign an image and a web address or URL to a tile. Tapping this tile takes you to the website.
Image 	Allows you to assign an image or picture to a tile. Tapping this tile causes the image to appear larger and to show more detail.
IP Camera Feed 	Allows you to directly assign an IP camera feed to a tile. Tapping this tile causes the camera feed screen to increase in size. You do not need to assign an image to the tile. You can connect a maximum of three cameras. See <a href="#">Creating Tiles (Adding Widgets to a Page)</a> for more information about the IP Camera Feed widget.
PDF Viewer 	Allows you to assign a PDF to a tile. Tapping this tile causes the PDF document to open. You must install a PDF reader application on the POS client device to use this widget.

Table 48-5 (Cont.) Welcome and Home Page Widgets

Widgets for Welcome and Home Pages	Description
Twitter 	Allows you to assign a Twitter feed to a tile. Tapping this tile causes the Twitter feed view to increase in size.
Image Slideshow 	Allows you to assign multiple images that rotate for viewing at five-second intervals.
Today's Special 	Allows you to assign one or more menu items, graphics, descriptions, and prices to a tile. When more than one menu item is configured, the items rotate for viewing at five-second intervals. You can assign a time range to this widget so that different specials cycle based on the times they are being served.
Command Widget 	Allows you to assign procedures, functions, and POS client commands to a tile. The available commands are: <ul style="list-style-type: none"><li>• Clock In</li><li>• Clock Out</li><li>• Update Database</li><li>• Close Application</li><li>• Employee Training</li><li>• Redirect Order Device</li><li>• Edit Menu Item</li><li>• Menu Item Availability</li><li>• Minimize Application</li><li>• Sign In RVC Prompt</li></ul>
Weather 	Allows you to assign a weather forecast provider and location to a tile. In order to use this widget, you must purchase an application program interface (API) key.

**Table 48-6 Hub Page Widgets**





Widgets for Hub Pages	Description
<p data-bbox="370 338 483 363">ECM Alert</p>  	<p data-bbox="881 338 1369 401">Allows you to view ECM alerts based on cash pull thresholds for all receptacle types. The ECM alert widget shows:</p> <ul data-bbox="881 426 1369 575" style="list-style-type: none"> <li>• Receptacle Name</li> <li>• Alert Type</li> <li>• Alert Level (if applicable)</li> <li>• Variance (threshold value – actual receptacle session amount)</li> </ul> <p data-bbox="881 590 1369 642">The ECM alert widget also indicates when there are no active alerts.</p>
<p data-bbox="370 827 521 852">ECM Summary</p> 	<p data-bbox="881 827 1369 890">Allows you to view summary information for all ECM active receptacles. The ECM summary widget shows:</p> <ul data-bbox="881 915 1369 1031" style="list-style-type: none"> <li>• Receptacle Name</li> <li>• Number of Open Receptacle Sessions for each Receptacle Type</li> <li>• Current Total</li> </ul> <p data-bbox="881 1045 1369 1066">The ECM summary widget also indicates:</p> <ul data-bbox="881 1071 1369 1213" style="list-style-type: none"> <li>• When there is an active alert for a session (triangle with exclamation point)</li> <li>• When an open receptacle session is offline (two semi-circle arrows with a slash)</li> </ul>
<p data-bbox="370 1230 521 1255">inMotion Charts</p> 	<p data-bbox="881 1230 1369 1398">Allows you to assign Oracle Hospitality Enterprise Back Office reports to a tile. When you select this tile, the assigned report generates first, but all other reports are also accessible. Select each report to view more information. The available reports are:</p> <ul data-bbox="881 1402 1369 1619" style="list-style-type: none"> <li>• Sales</li> <li>• Labor Cost</li> <li>• Discount</li> <li>• Sales Per Labor Hour</li> <li>• Check Count</li> <li>• Guest Count</li> <li>• Average Ticket Time</li> </ul>
<p data-bbox="370 1640 521 1665">inMotion Stores</p> 	<p data-bbox="881 1640 1369 1755">Allows you to view cumulative Sales Report information from all available outlets, or you can select an individual store from a list that appears when selecting this tile.</p>

Table 48-6 (Cont.) Hub Page Widgets

Widgets for Hub Pages	Description
Labor Cost 	Allows you to view potential employee overtime labor costs. When you select this tile, alerts inform the supervisor about employees approaching overtime for a particular pay cycle.
WCC (Web Configuration Console) 	Allows you to assign one of the following available manager procedures to a tile: <ul style="list-style-type: none"> <li>• Edit Header/Trailer</li> <li>• Bulk Edit MI Prices</li> <li>• Copy Menu Item</li> </ul>

**Related Topics**

- [Understanding Widgets](#)
- [The IP Camera Widget](#)
- [Viewing the Maximum Data Limit for Hosted Engagement Server](#)
- [Adding and Moving Widgets](#)
- [Creating Tiles \(Adding Widgets to a Page\)](#)
- [Adding Command Buttons](#)

## Viewing the Maximum Data Limit for Hosted Engagement Server

You can view the maximum allowable amount and remaining space for uploading widget images to your hosted Engagement server. When adding images for widgets, the data limit (2 GB total) appears on the image upload screen, along with the remaining amount of available space for adding more image content.

- [Understanding Widgets](#)
- [The IP Camera Widget](#)

**Related Topics**

- [Adding and Moving Widgets](#)
- [Creating Tiles \(Adding Widgets to a Page\)](#)
- [Adding Command Buttons](#)
- [List of Widgets](#)

# Transaction Services

Transaction Services is a web service that allows Symphony to interface with third-party applications (for example, hotel self-service kiosks or room service devices, menu boards, and Enterprise online ordering). Transaction Services is commonly installed in stadiums that use self-ordering devices. Guests can place orders using a third-party application that interfaces with a Transaction Services client. The client then sends the guest checks to Symphony.

- [Configuring the Transaction Services Workstation Client](#)
- [Configuring the Transaction Services Default Employee](#)
- [Understanding the Order Information Service](#)
- [Activating the Extension Application for Order Information Service](#)
- [Configuring Front of House Order Information Service Buttons](#)
- [Order Information Service Functions and Extensibility Arguments](#)

## Configuring the Transaction Services Workstation Client

You can configure Transaction Services to run on the same hardware device as a Symphony client. Kiosks are usually configured as Transaction Services clients. Obtain the following information before you begin the configuration:

- Transaction Services workstation name
  - Number of revenue centers using Transaction Services
1. Select the property, click **Setup**, and then click **Workstations**.
  2. Insert a record, enter the workstation name, and then click **OK**.
  3. Double-click the workstation record.
  4. From the **Type** drop-down list, select **3 - POSAPI Client**.
  5. Select the **Service Host ID** where the workstation runs.  
To host Transaction Services on a separate workstation, select the default **Service Host ID**.
  6. In the **Address / Host Name** field, enter the machine where Transaction Services is installed.
  7. Enter the **Subnet Mask** and the **Default Gateway** of the workstation to configure.
  8. Click the **Service Host** tab.
  9. To host Transaction Services and the POS client on a single workstation, select the corresponding Service Host name from the **Service Host** drop-down list.
  10. Click the **Transactions** tab.
  11. Enter the **Minimum Check Number** and the **Maximum Check Number** to use.

12. From the **Default Order Type** drop-down list, select the order type that the Transaction Services client uses.
  13. Ensure that the **Cash Drawer Settings** show **0** (zero).
  14. Click the **Order Devices** tab.
  15. Select all order devices that use the Transaction Services client for the revenue center shown in the list. If multiple revenue centers use Transaction Services, select the appropriate order devices for each revenue center.
  16. Click the **Printers** tab.
  17. For each printer, click the **Select** link, and then select the printer to use for each print job.
  18. Click the **Revenue Centers** tab.
  19. Select the revenue centers in which this instance of Transaction Services operates.
  20. Click the **Devices** tab, and then ensure that no peripheral devices appear.
  21. Click **Save**.
  22. Repeat Steps 1 through 21 for each Transaction Services workstation client.
- [Configuring the Transaction Services Default Employee](#)

## Configuring the Transaction Services Default Employee

Transactions that are created and altered by the Transaction Services client must be associated with a default transaction employee in Symphony. You need to create an employee record that is not associated with a member of the staff, and is solely used for the Transaction Services client to post records to Symphony.

1. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Employee Maintenance**.
  2. Click the **Insert Record** button to add an employee.
  3. From the Add Employee dialog box, select **Add Employee From Template**.
  4. If you created employees previously, click **Employee to Copy**, and then select an existing employee to copy.
  5. Enter the first name and the last name of the employee.
  6. Assign the employee with an operator record in the revenue center in which Transaction Services operates. Take note of the employee record number.
  7. Select the **Property** and the **Revenue Center**, and then click **OK**.
  8. Click **Save**.
  9. Go to the POS client workstation, and run the CAL, selecting the workstation you configured through [Configuring the Transaction Services Workstation Client](#).
  10. After the CAL installation is complete, navigate to the EGatewayService directory from the workstation, open the web.config file, and then verify that the file contains the correct Api\_WorkstationID value.
- [Configuring the Transaction Services Workstation Client](#)

## Understanding the Order Information Service

The Order Information Service allows third-party solutions to offer mobile ordering for delivery and pickup (for example, in seat ordering at a stadium) with status updates to the guest. The Order Information Service includes the latest view of the order content, such as order ID, items purchased, payment, employee delivering the order, and so on.

Third-party integrators can obtain order detail and status from Symphony in environments where orders enter the Symphony system through the Transaction Services application program interface (API). Third-party applications can query check status (for example, open, assigned, or closed), and the Order Information Service returns all checks that meet the request criteria. The *Oracle Hospitality Symphony Transaction Services API Document* contains information for software engineers developing applications that interface with Symphony using Transaction Services.

### Related Topics

- [Activating the Extension Application for Order Information Service](#)
- [Configuring Front of House Order Information Service Buttons](#)
- [Order Information Service Functions and Extensibility Arguments](#)

## Activating the Extension Application for Order Information Service

You need to enable the Order Information Service as an extensibility application. No interface is needed.

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Extension Application**.
2. Highlight the record for the **Order Information Service Client**, click the ellipsis point (...) button in the **Options** column, and then verify that **1 - Disable Application** is deselected.
3. Ensure that the **Interface** column value shows **0 - None**.
4. Click **Save**.

- [Configuring Front of House Order Information Service Buttons](#)

### Related Topics

- [Understanding the Order Information Service](#)
- [Order Information Service Functions and Extensibility Arguments](#)

## Configuring Front of House Order Information Service Buttons

You can create buttons on a page for the Order Information Service functions. You can create multiple buttons with slightly different functions (for example, Delivered All,

Delivered Nothing, Delivered Without Alcohol, Delivered Without Food, Delivered Without Retail, and so on).

1. Select the Enterprise, property, or revenue center, click **Configuration** and **Page Design**.
2. Open the Front of House page on which to place Order Information Service buttons.
3. From the Edit tab, select the page area in which to define the Order Information Service functions.
4. Click **Button**.
5. From the General subtab, in the **Legend** field, enter the button name (for example, **Assign Multiple Checks**).
6. Select **Function** from the **Type** drop-down list.
7. Click the arrow beneath the **Type** drop-down list.
8. Select **Run Extensibility App**, and then click **OK**.
9. Click the arrow next to the **Arguments** field. The Edit Extensibility Arguments dialog appears.
10. Enter the appropriate extensibility arguments:
  - a. Select **dll** from the **Type** drop-down.
  - b. In the **appname** field, enter the name of the extension application you created for the Order Information Service (for example, **OISClient**).
  - c. In the **filename** field, enter **OISClient.dll**.
  - d. In the **function** field, enter one of the following:
    - **Assign**
    - **Close**
    - **CloseAllChecks**
  - e. Enter the argument value in the **arg** field, and then click **OK**.  
[Order Information Service Functions and Extensibility Arguments](#) contains detailed information about the Assign, Close, and CloseAllChecks functions and the arguments required for each function.
11. Position and size the button on the page. Use the Style arrow to change the color.
12. Click **Save**.
13. Repeat Steps 4 through 12 to create each button. The following table lists the recommended Order Information Service buttons.

**Table 49-1 Order Information Service Buttons and Functions**

Button Name	Function	Description
Assign Check	Assign	Assign a single check to a delivery agent.
Assign Multiple Checks	Assign	Assign more than one check to a delivery agent.
Delivered	Close	Close a check after all items are delivered successfully.



**Table 49-1 (Cont.) Order Information Service Buttons and Functions**

Button Name	Function	Description
Delivery Failed	Close	Close a check, voiding all items and returning them to inventory. Use this button when the delivery agent cannot find the guest to deliver the prepared items.
Delivered Without Alcohol	Close	Close a check, voiding the alcohol items and returning them to inventory.
Cancelled	Close	Void all items and close the check to a zero dollar amount. Use this button when the order is canceled prior to being prepared and delivered.
Close All Open Checks	CloseAllChecks	Void all items on every open check and close the checks to a zero dollar amount.
Close All Open Checks by Order Type	CloseAllChecks	Void all items on every open check created for a specific Order Type and close the checks to a zero dollar amount.
Close All Open Checks by Employee	CloseAllChecks	Void all items on every open check created by a specific employee and close the checks to a zero dollar amount.

- [Activating the Extension Application for Order Information Service](#)

#### Related Topics

- [Understanding the Order Information Service](#)
- [Order Information Service Functions and Extensibility Arguments](#)

## Order Information Service Functions and Extensibility Arguments

The Order Information Service supports three functions:

- Assign
- Close
- CloseAllChecks

Each function must contain a set of arguments. The following tables describe the extensibility arguments that you must include for each function. Each argument is required unless otherwise indicated.

**Table 49-2 Assign Function Arguments**

Argument	Description	Example
ID=	Enter anything here (for example, Assigned, AssignedToRunner, TransferredToRunner). This text is visible when Transaction Services queries the check.	ID=Assigned
(Optional) MultipleChecks=	To include this argument, set the value to <b>true</b> , and the function refers to Assign Multiple Checks.  To exclude this argument, set the value to <b>false</b> , and the function refers to Assign Single Check.	MultipleChecks=true
ServiceTotalNumber=	Enter the object number of the Tender/Media record used when performing the operation (such as the tender used for Service Total).	ServiceTotalNumber=51

An example of the **arg** value for the Assign function is  
ID=Assigned, MultipleChecks=true, ServiceTotalNumber=51

**Table 49-3 Close Function Arguments**

Argument	Description	Example
Reason=	Enter anything here. This text is visible when Transaction Services queries the check.	Reason=Delivered
PaymentNumber=	Enter the object number of the Tender/Media record used when performing the operation.	PaymentNumber=3
(Optional) VoidParams=	Use this argument to indicate which items to remove from the check before closing it. For example, to delete all items in family groups 1, 2 and 5, set the value to FG:1:2:5. FG indicates Family Group. (This is the only recognized value type.) Use FG=* to void all items.  If you exclude this argument, the function does not allow voids.	VoidParams=FG: 10:11:15:16:30:31:32

**Table 49-3 (Cont.) Close Function Arguments**

Argument	Description	Example
(Optional) OrderTypeFilter=	Use this filter to close checks for the tender set in the payment argument and by a specific order type.  If you exclude this argument, the function includes all order types that can use the payment tender.	OrderTypeFilter=2

An example of the **arg** value for the Close function is

```
Reason=Delivered,PaymentNumber=3,VoidParams=FG:
10:11:15:16:30:31:32,OrderTypeFilter=2
```

**Table 49-4 CloseAllChecks Function Arguments**

Argument	Description	Example
Reason=	Enter anything here. This text is visible when Transaction Services queries the check.	Reason=Delivered
PaymentNumber=	Enter the object number of the Tender/Media record used when performing the operation.	PaymentNumber=3
(Optional) OrderTypeFilter=	Use this filter to close checks for the tender set in the payment argument and by a specific order type.  If you exclude this argument, the function includes all order types that can use the payment tender.	OrderTypeFilter=2
(Optional) EmployeeFilter=	Use this filter to close checks for the tender set in the payment argument and by a specific employee. For example, a Transaction Services user creates the checks, so including this employee in the argument closes only the Transaction Services checks.  If you exclude this argument, the function closes all employees' checks.	EmployeeFilter=2

An example of the **arg** value for the CloseAllChecks function is

```
Reason=Delivered,PaymentNumber=3,EmployeeFilter=2
```

#### Related Topics

- [Understanding the Order Information Service](#)

- [Activating the Extension Application for Order Information Service](#)
- [Configuring Front of House Order Information Service Buttons](#)

# Cruise Ship Time Zone Settings

A cruise ship is a constantly moving property. As a ship moves around the world, the time zone settings for the shipboard systems need to change daily to align with the time zone in which the ship is sailing.

There are two methods of changing the time zone:

- A ship's master clock communicates the current time zone settings. When someone changes the master clock's time zone, all shipboard systems (for example, property management system (PMS) and Point-of-Sale (POS)) automatically update their settings to ensure consistent date and time stamp posting across all applications.
- A system administrator manually sets the ship's time zone within the PMS and POS applications.

Oracle recommends that you perform the following tasks:

- Close all checks before changing the time zone.
- Change the time zone once per day during a slow period of operations (for example, between 2:00 a.m. and 5:00 a.m.).
- [Changing the Time Zone](#)
- [Understanding Start of Business Day](#)
- [Configuring Start of Day](#)
- [Understanding Workstation Control Privileges](#)
- [Configuring Workstation Control Privileges](#)

## Changing the Time Zone

1. Close all checks in the Front of House POS client workstations.
2. From the EMC, select the Enterprise level, click **Setup**, and then click **Properties**.
3. Select the new time zone for the ship from the **Time Zone** drop-down list.
4. Click **Save**. The CAL client deploys the new time zone to the property and automatically updates the time zones of the workstations connected to the property.

Time zones do not update on workstation tablet devices running generic Android operating systems when the property time zone changes.

## Understanding Start of Business Day

In food service and hotel environments, a business day refers to the beginning and end times of a day of business. A business day can have any begin time, but typically a business day starts in the early morning hours during a slow or closed period of

operations (for example, 3:00 a.m. or 4:00 a.m.). In contrast, a calendar day always begins at 12:00 a.m.

In a cruise ship environment the PMS controls the business date. POS transactions (for example, dinner or drinks) post to rooms in the PMS. The POS and PMS must be in sync to communicate and balance these transactions. When initializing the Start of Day (SOD) on a ship, change the PMS date before changing the POS date.

On cruise ships, Symphony allows a manual SOD to run twice in one calendar day. The rooms empty at approximately the same time on a cruise ship and the financial information resets. The ship's PMS and POS are closed out after the last guest leaves the ship, which is typically between 12:00 p.m. and 1:00 p.m. The SOD changes in the PMS and POS at that time, and the next cruise begins. Both the PMS and POS change the SOD again at about 3:00 a.m. the following day when the cruise is under way.

### Related Topics

- [Configuring Start of Day](#)

## Configuring Start of Day

A system administrator on a ship must take the workstations offline and then manually set the daily start and end times.

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the appropriate role type (such as manager), click the **Operations** tab, and then click the **PMC Procedures** subtab.
3. Select the appropriate privileges as described in the following table:

**Table 50-1 Start of Day Role Privileges**

Privilege Option	Description
30058 - Run Start of Day from OPS	Select this option to allow all employees with the role to increment the business date from the property's Check and Posting Service (CAPS) workstation.
30059 - Prevent Running SOD from OPS with Open Checks	Select this option so that Start of Day cannot run when open checks exist.

4. Click **Save**.
5. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
6. Select the page on which to place the Start of Day button.
7. Add a Start of Day button:
  - a. In the **Legend** field, enter **Run Start of Day**.
  - b. From the **Type** drop-down list, select **Function**.
  - c. Click the arrow beneath the **Type** drop-down list, and then select **Start of Day**.
  - d. Position and size the new button on the page.
8. Click **Save**.

9. Select the property, click **Setup**, and then click **Property Parameters**.
10. Click the **Options** tab, and then select **48 - Run Start of Day from OPS**.
11. Click the **Calendar** tab, and then select **Run Manually** for each day of the week.
12. In the **Manual SOD Safety catch time** field, set the time when the application automatically increments the business date if someone forgets to manually run SOD.

The application checks to see whether SOD occurred within a 24-hour period for the selected property. This time is based on the time zone of the property.

13. Click **Save**.
14. Select the Enterprise level, click **Configuration**, and then click **PC Autosequences**.
15. Insert a PC Autosequence record, name it **Increment Business Day**, and then click **OK**.
16. Open the record and select the **Allowed Properties** to view the autosequence.
17. (Optional) From the Parameters section, click the **Add** link to add parameters. For example, you can enter a property number and exclude a revenue center number.
  - a. From the Select Autosequence Parameter dialog, select the **Parameter** from the drop-down list.
  - b. Enter a **Value**, and then click **OK**.
18. Click the **Steps** tab.
19. Click the **Add** link to add a step.
20. From the **Step Type** drop-down list, select **3 - Increment Business Date**.
21. Click **Save**.

#### Related Topics

- [Understanding Start of Business Day](#)

## Understanding Workstation Control Privileges

You can configure the control of workstation operations during critical events, such as:

- Running Start of Day
- Locking and unlocking workstations
- Locking and unlocking revenue centers
- Updating workstations
- Reloading workstations

You can set the workstation control privileges for each employee role type (for example, manager, server, and host).

#### Related Topics

- [Configuring Workstation Control Privileges](#)

## Configuring Workstation Control Privileges

To set the control of workstation operations during critical events:

1. Select the Enterprise level, click **Configuration**, and then click **Roles**.
2. Select the role type (such as manager), click the **Operations** tab, and then click the **Miscellaneous** subtab.
3. Select the appropriate privileges:
  - **10019 - Unlock UWS or Revenue Center**: Select this option to allow employees in the role to unlock a workstation or revenue center from the locked dialog.
  - **10020 - Use Workstation Control**: Select this option to allow employees in the role to use the Workstation Control key to access various workstation functions (for example, locking and unlocking workstations and revenue centers, and updating the database). Selecting this option also allows employees to unlock a workstation or revenue center from the locked dialog.
4. Click **Save**.
5. Select the Enterprise, property, or revenue center, click **Configuration**, and then click **Page Design**.
6. Select the page on which to place the Workstation Control button.
7. Add a Workstation Control button:
  - a. In the **Legend** field, enter **Workstation Control**.
  - b. From the **Type** drop-down list, select **Function**.
  - c. Click the arrow beneath the **Type** drop-down list, and then select **Workstation Control**.
  - d. Position and size the new button on the page.
8. Click **Save**.

### Related Topics

- [Understanding Workstation Control Privileges](#)



# 51

## Interfaces with Symphony

Symphony includes the ability to interface with third-party software, such as Property Management Systems (PMS).

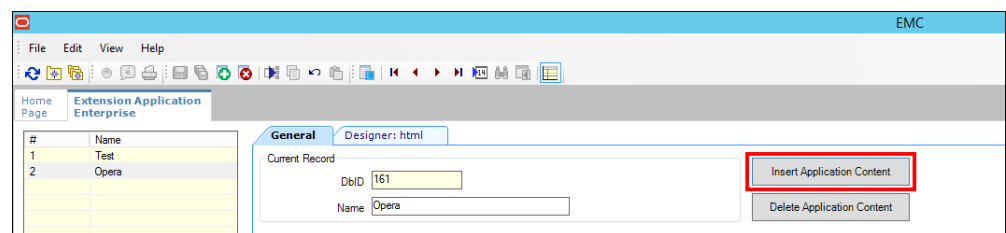
- [Configuring the OPERA PMS Enhanced Interface](#)
- [Inserting the Extension Application Files for OPERA](#)
- [Configuring OPERA Content Information](#)
- [Content Text Settings for the OPERA PMS](#)
- [Configuring the OPERA PMS Interface](#)
- [Enabling the OPERA PMS Interface for a Revenue Center](#)
- [Adding the Tender/Media Data Extension for OPERA](#)
- [Configuring the Room Charge Buttons for the OPERA PMS](#)
- [Updating the SIM OPERA Interface to a Newer Version](#)

### Configuring the OPERA PMS Enhanced Interface

Follow these steps to configure and install the SIM OPERA Interface.

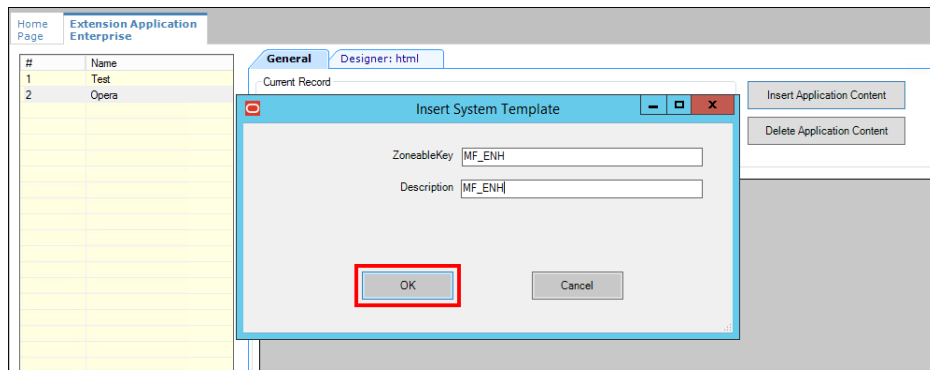
1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Extension Application**.
2. Click the **Insert** icon to add a record (using a record number of your choice).
3. Enter a record name in the **Name** field (for example, OPERA), and then click **OK**.
4. Double-click the record to open it in form view.
5. Click the **Insert Application Content** button. You must insert four application content records.

**Figure 51-1** Extension Application Inserting Content



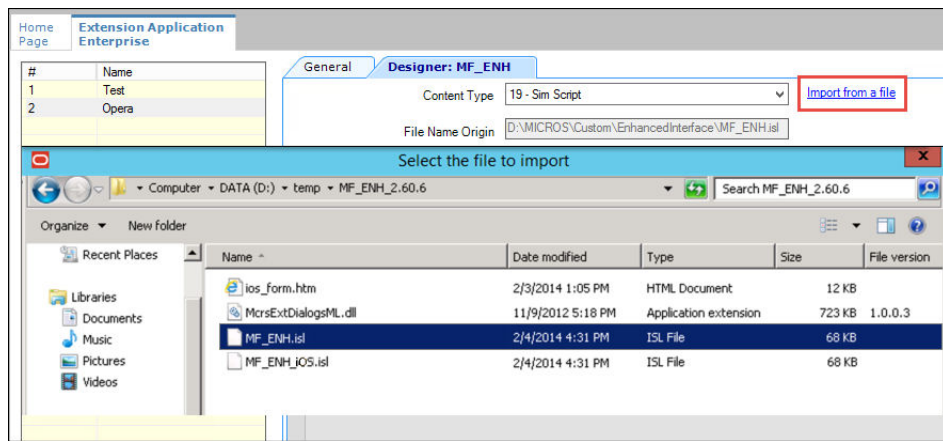
6. Enter the text reflecting the file names within the **ZoneableKey** and **Description** fields, and then click **OK**.

**Figure 51-2 Extension Application Configuring Content**



7. Select **19 - SimScript** as the **Content Type**, and then click the **Import from a file** link.

**Figure 51-3 Extension Application Importing Content**



8. Select the SIM file **MF\_ENH.isl** (\*.isl), and then click **Open**.
9. Set the target to **WIN32**.
10. Insert new application content for the second SIM file named **MF\_ENH\_Android.isl**.
  - a. In the **Content Type** drop-down list, select **19 - SIM Script**.
  - b. Enter **MF\_ENH\_ANDROID** in the **ZoneableKey** and **Description** fields, and then click **OK**.
  - c. Set the target to the **Android** platforms.
11. Insert a new application content for the DLL file named **McrsExtDialogsML.dll**.
  - a. In the **Content Type** drop-down list, select **3 - DLL**.
  - b. Enter **McrsExtDialogsML** in the **ZoneableKey** and **Description** fields, and then click **OK**.
12. Insert new application content for the Android form file named **android.htm**.
  - a. In the **Content Type** drop-down list, select **23 - Text**.

- b. Enter **html** in the **ZoneableKey** and **Description** fields, and then click **OK**.
- 13. For the SIM file records **MF\_ENH.isl** and **MF\_ENH\_ANDROID.isl**, click the ellipsis (...) button under the **Options Bits** column, select **2 - Main SIM Content**, and then click **OK**.
- 14. For each file, enter the entire file name under the **Disk File Name** column, and then click **Save**.
  - **Disk File Name** entries must exactly match the name of their associated SIM scripts and DLL file names. These entries are case-sensitive.
  - The **ZoneableKey** entry for the **Android.htm** file must match **html**, and it is case-sensitive.
  - The **Version** column is not required.

**Figure 51-4 Extension Application Content Record Details**

Extension Application Contents								
#	Zoneable Key	Inheritance Type	Description	Option Bits	Disk File Name	Target	Version	
1	MF_ENH	Defined Here, No Override	MF_ENH	4000000000000000 ***	MF_ENH.isl	FFFFFFFF ***	(any) - (any)	
2	MF_ENH_ANDROID	Defined Here, No Override	MF_ENH_ANDROID	4000000000000000 ***	MF_ENH_ANDROID.isl	7FFFFFFF ***	(any) - (any)	
3	McrsExtDialogsML	Defined Here, No Override	McrsExtDialogsML	0000000000000000 ***	McrsExtDialogsML.dll	FFFFFFFF ***	(any) - (any)	
4	html	Defined Here, No Override	html	0000000000000000 ***		FFFFFFFF ***	(any) - (any)	

- 15. Set the related target for each file:
  - **MF\_ENH.isl** target: WIN32
  - **MF\_ENH\_ANDROID.isl** target: Android
  - **McrsExtDialogsML.dll** target: WIN32
  - **Android.htm** target: Android

For multi-tenant environments using releases earlier than Symphony release 2.9, you are required to configure the content information (outlined in the following section under **Content Information**) as Extension Application content, as in these environments the content feature cannot be used.

- Create new Application Content for the enhanced interface, selecting the **Insert Application Content** button. The **ZoneableKey** and **Description** fields must be set to **EnhIFC\_Config**. These entries are case-sensitive.
- Select the **Content Type 23 - Text**, and insert the content information as outlined in the following section under **Content Information**. Apply the configuration settings as required.

**Content Information**

Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Content**. Insert a record for the Property Management System (PMS) configuration. The name of the new entry must be **EnhIFC\_Config** (which is case-sensitive), and enter **STRING**. Enter the strings as shown in the following figure (the content text file is delivered with the other files), and change the options as needed.

**Figure 51-5 Content Text File**

```

#-----
# Posting related settings
#-----
#Magnetic Card required for Posting (0 or 1)
MAGCARDONLY=0
#if above enabled, excl. RVC Numbers (separated by comma)
MAGCARDOWRVRT=
#Suppress Guest-Messages during Postings
SUPPRESSGSTMMSG=1
#Suppress References of non-Roomcharge Tenders
SUPPRESSNFOREF=0
# Do not display Guest Confirmation during Postings
NO_CONFIRM_GST=0
#Send negative Guest Count if payment is negative
REVERSEGST=1
#Full Discount and Service Charge breakdown
FULL_DSVC=1
#Use 64 Taxes for posting (0 or 1) or just 8 Taxes
POST_64TAXES=1
#Determines which information to be posted, 0 = Serving Period, 1 = Trans.Cashier,
# 2 = Order-Type, 3 = Custom for Philippines ONLY. Default = Serving Period
POSTING_ADD_INFO=0
# Send all CheckDetails on non-Roomcharge Tenders
SendAllDtls=0
#-----
# Locator related settings
#-----
#Use RVC Name as Locator Line #1
RVCNAMELOC=1
#Default Locator Validity in Minutes
LOCVALIDMIN=30
#-----
# Guest Message related settings
#-----
#Populate first line of Message using Date/Time, RVC# and Trans.Employee#
EMPLINFO_IN_MSG=1
#-----
# Restricted Posting for Kiosk Environment
#-----
RESTRICTED_POSTING=1
#Must match the ISL Employee Option in Employee Class
RESTR_POSTING_EMPL=8

```

**Posting Related Configuration Settings**

**Table 51-1 Posting Related Configurations**

Configuration String	Configuration Value
MAGCARDONLY	Set to 1 (one) if you want to limit the entries in the Room-Charge event to magnetic cards, or set to 0 (zero) to allow both magnetic cards and keyboard as input.
MAGCARDOWRVRT	When MAGCARDONLY is enabled, the setting can be overwritten for certain RVC's by entering a list of RVC numbers (separated by a comma).
SUPPRESSGSTMMSG	When set to 1 (one), this suppresses the message indicator during the posting. For high-volume sites this should be enabled.
SUPPRESSNFOREF	For Non-Room-Charge tenders, this shows the Department Code they were posted to. When set to 1 (one), this suppresses this reference.

**Table 51-1 (Cont.) Posting Related Configurations**

Configuration String	Configuration Value
REVERSEGST	Set to 1 (one) if the guest count should be negative in case the payment is negative (i.e., the payment is voided). Note that this feature requires specific setup on the Front-Office interface to work correctly.
FULL_DSVC	If set to 1 (one), a full breakdown of discounts are sent. This requires a specific version of the Front-Office interface. An additional full breakdown of service charges requires this to be set to 2 (two), this setting also includes a full breakdown of discounts.
NO_CONFIRM_GST	Set to 1 (one) if the guest name should not be confirmed when posting. Unless magnetic cards are used to identify the guest, this option should be disabled and set to 0 (zero).
POST_64TAXES	If set to 1 (one), up to 63 Tax Itemizers are sent to the Front-Office interface. Note that this requires IFC8 V.8.7.1.2 or higher, as well as a certain version of the Front-Office itself. If set to 0 (zero), only 8 (eight) Tax Itemizers are sent to the Front-Office interface.
POSTING_ADD_INFO	This setting determines which information value is to be used for any posting. Currently, the following values are supported: <ul style="list-style-type: none"> <li>• 0 = Serving Period Number (Default)</li> <li>• 1 = Transaction Cashier</li> <li>• 2 = Order-Type Number</li> <li>• 3 = Custom value for Philippines ONLY</li> </ul>
SendAllDtIs	When set to 0 (zero), only check details of Room-Charges are sent to the Front-Office interface. If set to 1 (one), the check details of non-Room-Charges are also sent.

**Table 51-1 (Cont.) Posting Related Configurations**

Configuration String	Configuration Value
RESTRICTED_POSTING	<p>Select if you want to restrict responses returned from the Front-Office Interface in the Room-Charge event. Note that this only works in combination with, and if the RESTR_POSTING_EMPL option is configured correctly. Currently there are two supported values :</p> <ul style="list-style-type: none"> <li>Setting this to 1 (one): Both the Room# and at least 3 (three) characters of the Surname (last-name field) need to be provided in order to post the Room-charge. If less than 3 characters are provided, an error is shown. If the response from the PMS contains more than one record, an error is shown and the operator needs to enter additional characters to provide a unique identifier.</li> <li>Setting this to 3 (three): This assumes that an external device provides the input as keyboard data. There is no touchscreen keyboard shown when this option is used, so the operator (or guest) only has the option to abort the input. If the response from the PMS contains more than one record, an error is shown and the posting is aborted. There is no confirmation of the guest-name shown, irrelevant of the setting in NO_CONFIRM_GST. Note that this does not work if input is restricted to magnetic cards, so either the restriction must be disabled, or the RVC in question must be added to the excluded RVC's.</li> </ul>
RESTR_POSTING_EMPL	<p>Specify the ISL Option that should be used with the above option (see EMC, Employee Maintenance, Employee Class, ISL Options). As such, the valid value for this configuration is between 1 (one) and 8 (eight).</p>

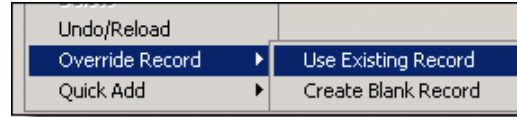
**Guest-Locator and Guest-Message Related Configurations**

**Table 51-2 Guest-Locator and Guest-Message Configurations**

Configuration String	Configuration Value
RVCNAMELOC	<p>If set to 1 (one), the first line of the locator contains the RVC name, otherwise it is blank. The operator can overwrite this value when entering the locator information.</p>
LOCVALIDMIN	<p>Each new locator is only valid for a certain amount of time. Enter the default time in minutes here. The server can overwrite this value when entering the locator information.</p>

The Content can be overridden by property, zone, or revenue center. If overridden, ensure that you select the **Use Existing Record** option.

**Figure 51-6 Override Record Controls**

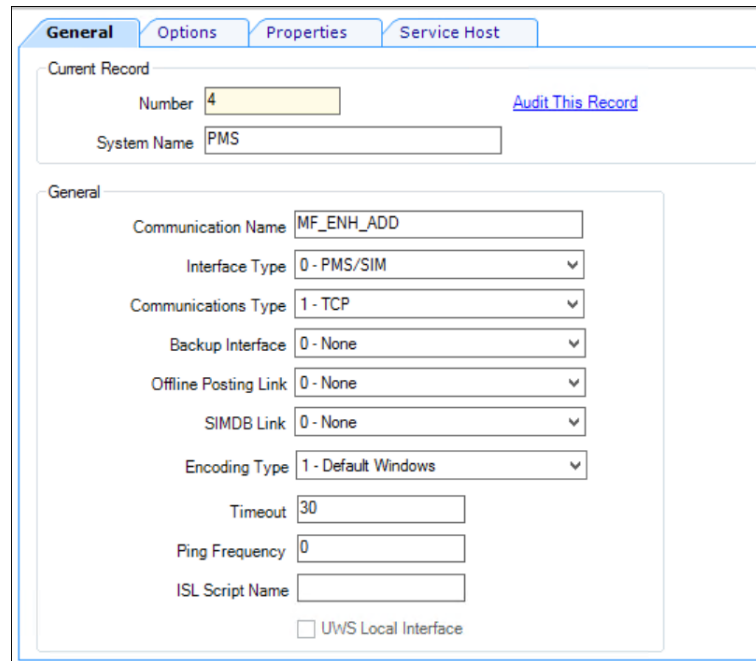


### Configuring Interfaces

Select the Enterprise level, click **Setup**, and then click **Interfaces**, and then insert a record for the OPERA PMS interface.

**Figure 51-7 Interface Module**

The following is an example. Use a System Name that reflects the property using the interface.



To avoid double posting, the PING Frequency setting must be 0 (zero), and is required to create an interface for each property. Click the **Options** tab and enable the desired options. Enter the Opera PMS application server's connection information within the **TCP Communications** section and **Save** all changes.

**Figure 51-8 Interface Module's Options Tab**

General **Options** Properties Service Host

Current Record  
Number  [Audit This Record](#)  
Name

Options

- 1 - Use 19 Digit Reference Entry for PMS Inquiries
- 2 - Enable Interface Log
- 3 - Allow Inquiry without Sign-In
- 4 - Use 5 Digits for Number of Guests
- 5 - ON = Use 9 digits for Terminal IDs; OFF = Use 2 digits for Terminal IDs
- 7 - Download to Mobile MICROS
- 8 - Enable Offline Posting
- 9 - Determine Link Status Using Ping
- 10 - ON = Use 5-digit RVC #; OFF = Use 3-digit RVC #
- 11 - ON = Use 8-digit Check #; OFF = Use 4-digit Check #

Search within Context Sensitive Help

TCP Communications  
TCP Host Name   
Port Number

**Note:**

Only options 1, 2, 3, and 5 must be enabled. Do NOT enable option 8, as that causes double posting.

Click the **Properties** tab and enable the Opera PMS interface for each desired property and **Save** all changes.

Click the **Service Host** tab and select the desired Service Host for the Opera PMS interface. Click **OK** and **Save** all changes.

**Figure 51-9 Interface Module's Properties Tab**

#	Name
1	PMS
2	SVC
3	CA/EDC

Home Page **Interfaces Enterprise**

General Options **Properties** Service Host

Current Record  
Number  [Audit This Record](#)  
Name

Properties

- 1 - Restaurant
- 2 - Hotel
- 3 - Bar
- 4 - Casino
- 5 - Stadium

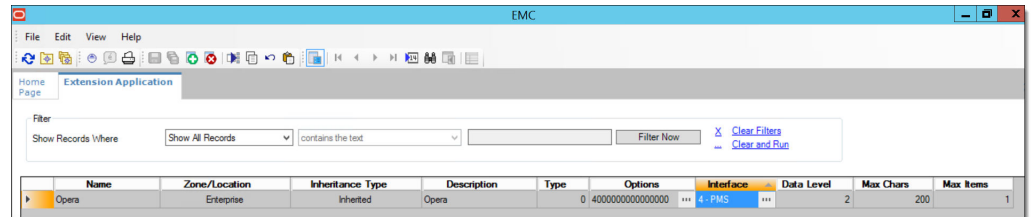
**Extension Application Interface Configuration**



Navigate to the EMC, Enterprise level, Setup tab, Custom Content, and then click **Extension Application**. Select the **PMS** interface in the **Interface** column to link it to the Opera Extension Application record and **Save**.

This configuration normally occurs at the Property level (PMS Interface is on-premise).

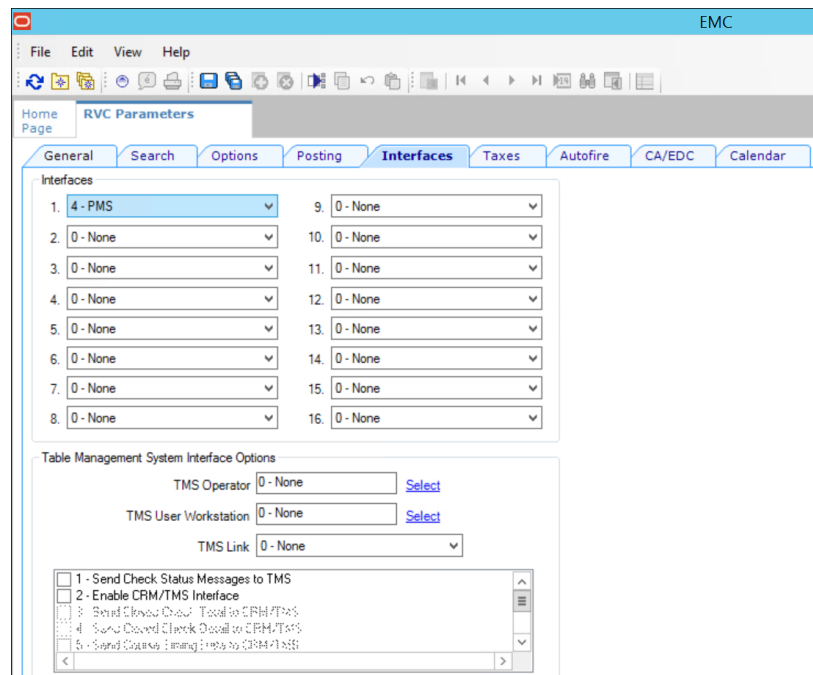
**Figure 51-10 Extension Application PMS Interface Assignment**



### Revenue Center Configuration

Navigate to the EMC, Revenue Center level, Setup tab, Parameters, RVC Parameters, and then click the **Interfaces** tab. Select the **PMS** interface to enable the interface for the RVC(s). Navigate to and perform this step for every desired RVC (using the same PMS link for each RVC) and **Save** all changes throughout the process.

**Figure 51-11 Revenue Center Parameters Interfaces Tab**



### Data Extensions – Add the Tender Media Extra Column

Navigate to the EMC, Configuration tab, and then click the **Data Extensions** module. Select the **Insert** icon and add a record.

Enter the following information:

- **Table: 71 – Tender Media**
- **Extra Column name: RoomCharge**
- **Type: 4 – Boolean**
- Data Constraints: N/A
- Sort Priority: N/A
- **Display Width: 150**
- **Translatable Name: Enh.IFC – Room Charge** (translatable)
- **Translatable Help: Enable this for Room-Charge Payments** (translatable)

**Figure 51-12 Data Extensions Module**

The screenshot shows the Data Extensions Module interface. At the top, there is a filter section with a dropdown menu set to 'Show All Records' and a search box containing 'contains the text'. Below this is a table with the following data:

#	Table	Extra Column Name	Type	Data Constraints	Sort Priority	Display Width	Translatable Name
6	71 - Tender/Media	RoomCharge	4 - Boolean		0	150	Enh.IFC - Room Charge

- Enable all three access check-boxes.

**Figure 51-13 Data Extensions Translatable Settings**

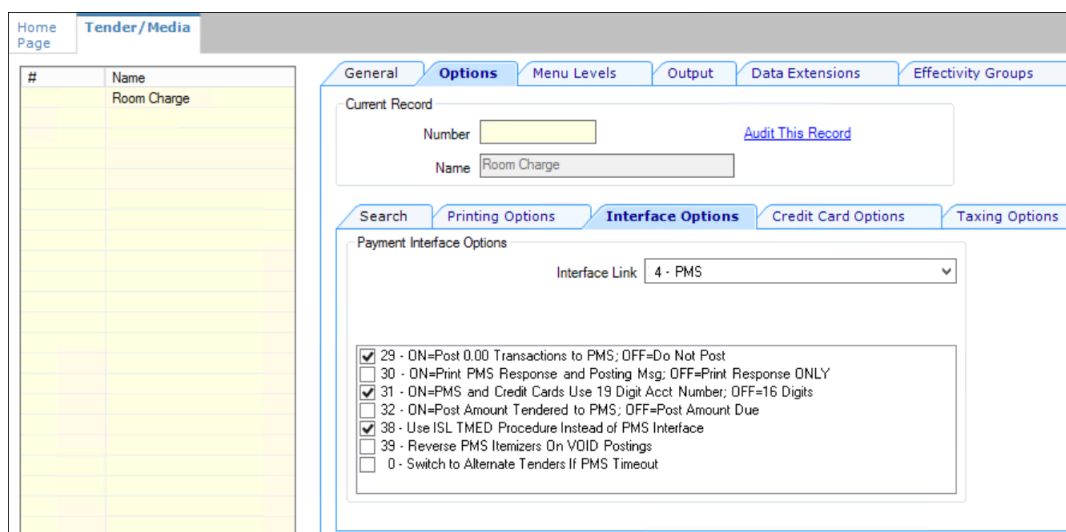
Sort Priority	Display Width	Translatable Name	Translatable Help	Is Editable	Is Viewable	Is Downloadable
0	150	Enh.IFC - RoomCharge	Enable this for Room-Charge Payments	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>

### Tender Media Setup

Navigate to the Property level, Configuration tab, Sales, and then click **Tender/Media**. Create a **Room Charge** tender media record. Configure the generic options as required.



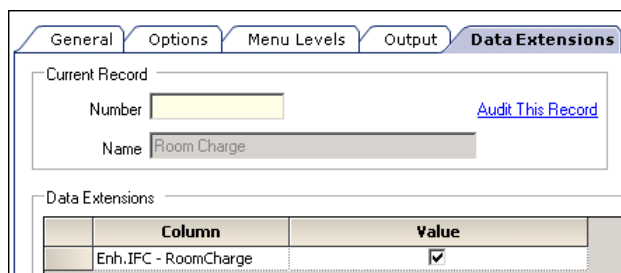
**Figure 51-15 Tender/Media Room Charge Options**



**Enable the Room Charge Data Extensions Option**

Click on the **Data Extensions** tab and select the check box under the **Value** column for the **Enh.IFC – Room Charge**.

**Figure 51-16 Tender/Media Room Charge Data Extensions Tab**



The **Value** check-box must be selected for the room charge tender media(s) (see above). Deselect the check-box for all of the other tender medias, but it should NOT be greyed out, as shown in the example screen capture below.

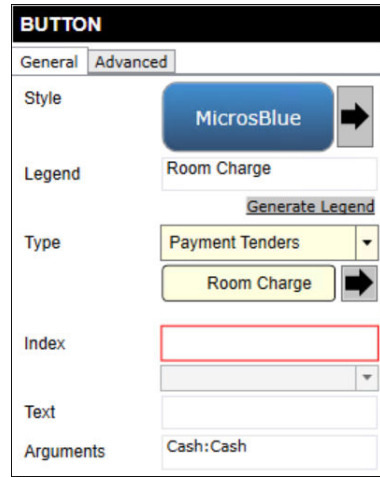
**Figure 51-17 Undesired Tender/Media Data Extensions Example**

Column	Value
Enh.IFC - RoomCharge	<input checked="checked" type="checkbox"/>

**Page Design**

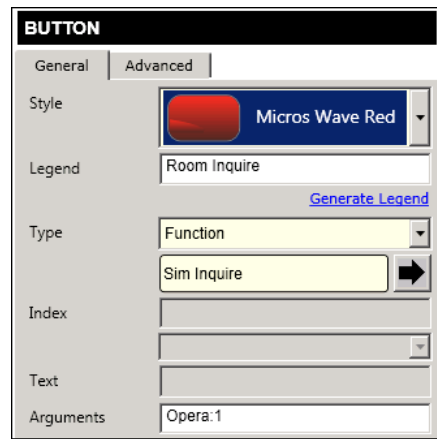
Navigate to the EMC, Configuration tab, under the User Interface section, click **Page Design**. Ensure that the previously reviewed Room Charge tender media is configured correctly on the payment tab/page (see sample below).

**Figure 51-18 Page Design Module - Room Charge Payment Button**



Add the inquire buttons on any required page/tab. Normally, the inquire buttons are created on the payment and/or function page/tab.

**Figure 51-19 Page Design Module - Room Charge Inquire Button**



### Inquiry Button Definitions

Configure potential room inquire buttons utilizing the definitions listed here:

- **Type: Function**
- **Sim Inquire**
- **Argument: <EXTENSION APPLICATION NAME>:<INQUIRY NUMBER>**

**Once the button configurations are completed, perform a full reload of all of the workstations and restart the service hosts!**

**Table 51-3 Inquire Names and Numbers for Room Inquire Buttons**

Inquire	Inquire Number
Room Inquire	1
Info Room Inquire	2
Short Inquire	5
Info Line Inquire	6
View Reservation Inquire	7
Extended Inquire	8
PMS Interface Information Inquire	911

**Features and Revisions since the Release of Symphony version 2.70 and Higher**

Itemizer		
1	Service-Charge based on SVC Itemizer 1	See remark (1) below
2	Service-Charge based on SVC Itemizer 2	See remark (1) below
3	Service-Charge based on SVC Itemizer 3	See remark (1) below
4	Service-Charge based on SVC Itemizer 4	See remark (1) below
5	Service-Charge based on SVC Itemizer 5	See remark (1) below
6	Service-Charge based on SVC Itemizer 6	See remark (1) below
7	Service-Charge based on SVC Itemizer 7	See remark (1) below
8	Service-Charge based on SVC Itemizer 8	See remark (1) below
9	OPEN Amount Service-Charge with no SVC Itemizer enabled	See remark (2) below
10	PRESET Amount Service-Charge with no SVC Itemizer enabled	See remark (2) below
11	Stored Value Transaction Service Charge	Enable SVC Option 14 to ON
12	Non-Revenue Service Charge	Enable SVC Option 7 to ON
13	Charged Tip	
14	Auto Service-Charge	

**Remark 1:** Amount of any PERCENTAGE based Service-Charges based on the SVC Itemizer (1-8) and the Menu-Items present on the check. For AMOUNT based Service-Charge based on the FIRST active SVC Itemizer found (if any).

**Remark 2:** Only used with AMOUNT based Service-Charges with no SVC Itemizer enabled.

 **Note:**

Enabling a more detailed breakdown of Service-Charges requires related changes on the PMS/IFC8 side. As such, coordinate any changes with the PMS team.

## Inserting the Extension Application Files for OPERA

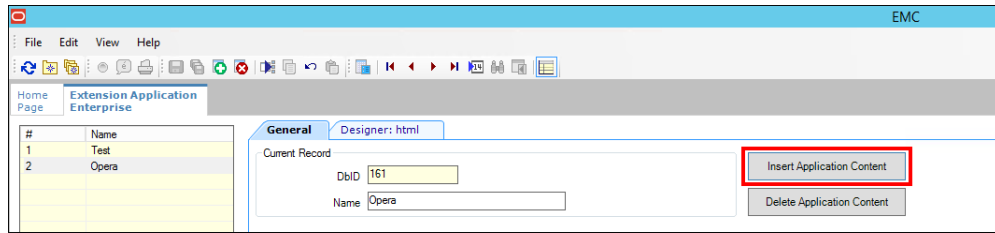
This procedure explains how to install and configure the SIM OPERA Property Maintenance System (PMS) interface. The configuration requires:

- Symphony release 2.8 or later
  - OPERA Interface release 8.7.3.7 or later
1. Run the **SIMPH2\_ENH\_IFC[version number].exe** setup application on the Symphony application server.

This application verifies the Symphony installation and copies the following files to the [Drive letter]:\MICROS\Custom\EnhancedInterface folder:

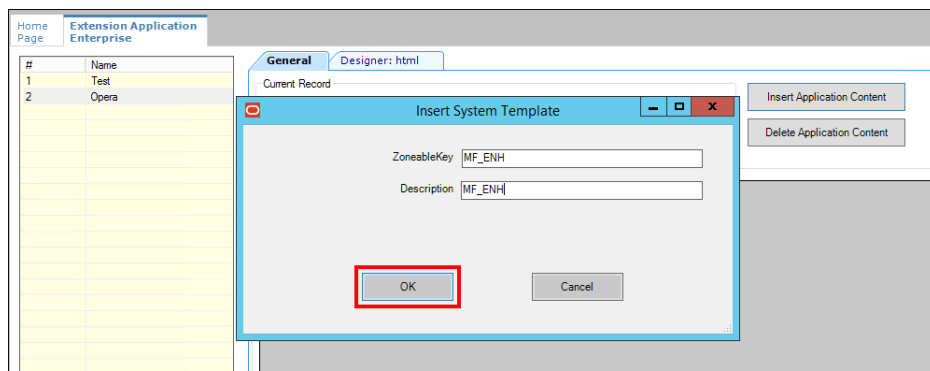
- CONTENT\_EnhIFC\_Config.txt
  - McrsExtDialogsML.dll
  - MF\_ENH.isl
  - MF\_ENH\_Android.isl
  - android.htm
2. If you cannot start the setup application on the Symphony application server because of access or user right limitations, but have access to EMC from your local PC, use the /LOCAL parameter to star the application.  
  
This method only works for version 270. That is, SIMPH2\_ENH\_IFC270.exe. Running the application through this methods does not verify the Symphony installation, and it is your responsibility to ensure that the Symphony requirements are met. This method copies the required files into the sub-folder `Custom\EnhancedInterface` beneath the folder you selected in the setup application.
  3. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Extension Application**.
  4. Click the **Insert** icon to add a record.
  5. Enter the record name in the **Name** field (for example, OPERA), and then click **OK**.
  6. Double-click the record to open it in form view.
  7. On the **General** tab, click the **Insert Application Content** button.

**Figure 51-20 Extension Application Insert Application Content Button**



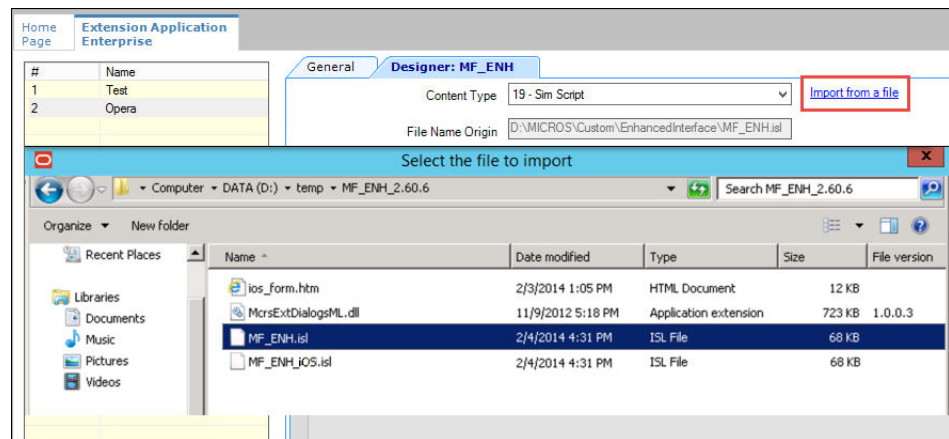
8. Enter MF\_ENH for both the **ZonableKey** and **Description** fields, and then click **OK**.

**Figure 51-21 Inserting Application Content Records**



- a. On the **Designer** tab, select **19 - Sim Script** as the **Content Type**.
- b. Click the **Import from a file** link.

**Figure 51-22 Importing Content From File**



- c. Browse to and select the MF\_ENH.isl file, and then click **Open**.
- d. On the **General** tab, enter MF\_ENH.isl in the **Disk File Name** column.



- Disk File Name** entries must exactly match the name of their associated SIM scripts and DLL file names. These entries are case-sensitive.
- e. In the **Option Bits** column, click the ellipsis point (...) button, and then select **2 - Main SIM Content**.
  - f. In the **Target** column, click the ellipsis point (...) button, and then select **1 - Win32**.
9. Repeat Steps 7 through 9 to insert a new application content and import the MF\_ENH\_Android.isl file with the following settings:
    - **ZonenableKey:** Enter MF\_ENH\_ANDROID.
    - **Description:** Enter MF\_ENH\_ANDROID.
    - **Content Type:** Select **19 - Sim Script**.
    - **Option Bits:** Select **2 - Main SIM Content**
    - **Disk File Name:** Enter MF\_ENH\_ANDROID.isl.
    - **Target:** Select **10 - Android**.
  10. Repeat Steps 7 through 9 to insert a new application content and import the McrsExtDialogsML.dll file with the following settings:
    - **ZonenableKey:** Enter McrsExtDialogsML.
    - **Description:** Enter McrsExtDialogsML.
    - **Content Type:** Select **3 - DLL**.
    - **Disk File Name:** Enter McrsExtDialogsML.dll
    - **Target:** Select **1 - Win32**.
  11. Repeat Steps 7 through 9 to insert a new application content and import the android.htm file with the following settings:
    - **ZonenableKey:** Enter html. The **ZoneableKey** entry for the android.htm file must match html, and it is case-sensitive.
    - **Description:** Enter html.
    - **Content Type:** Select **23 - Text**.
    - **Target:** Select **10 - Android**.
  12. Click **Save**.
  13. For multi-tenant environments, you must configure the content information as Extension Application content. In these environments the content feature cannot be used.
    - a. Insert a new application content for the enhanced interface by clicking the **Insert Application Content** button.
    - b. Configure the following fields:
      - **ZonenableKey:** Enter EnhIFC\_Config (case sensitive).
      - **Description:** Enter EnhIFC\_Config (case sensitive).
      - **Content Type:** Select **23 - Text**.
      - **Target:** Select **10 - Android**.
    - c. Click **Save**.

- d. Insert the content information as outlined in [Configuring OPERA Content Information](#).

## Configuring OPERA Content Information

For multi-tenant environments using releases earlier than Symphony release 2.9, you are required to configure the content information as Extension Application content. The content feature cannot be used in these environments.

1. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Content**.
2. Insert a record for the PMS content, named **PMS**.
3. Double-click the new record to open it.
4. Select **4 - String** as the **Content Type**.
5. Enter the following string in the Content tab and make the necessary modifications, as shown in the following figure (the content text file is delivered with the other files).

See [Content Text Settings for the OPERA PMS](#) for more information on the configuration strings.

**Figure 51-23 Content Text File**

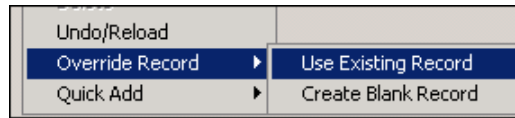
```

#-----
# Posting related settings
#-----
#Magnetic Card required for Posting (0 or 1)
MAGCARDONLY=0
#if above enabled, excl. RVC Numbers (separated by comma)
MAGCARDOWRVRT=
#Suppress Guest-Messages during Postings
SUPPRESSGSTMMSG=1
#Suppress References of non-Roomcharge Tenders
SUPPRESSNFOREF=0
# Do not display Guest Confirmation during Postings
NO_CONFIRM_GST=0
#Send negative Guest Count if payment is negative
REVERSEGST=1
#Full Discount and Service Charge breakdown
FULL_DSVC=1
#Use 64 Taxes for posting (0 or 1) or just 8 Taxes
POST_64TAXES=1
#Determines which information to be posted, 0 = Serving Period, 1 = Trans.Cashier,
# 2 = Order-Type, 3 = Custom for Philippines ONLY. Default = Serving Period
POSTING_ADD_INFO=0
# Send all CheckDetails on non-Roomcharge Tenders
SendAllDtIs=0
#-----
# Locator related settings
#-----
#Use RVC Name as Locator Line #1
RVCNAMELOC=1
#Default Locator Validity in Minutes
LOCVALIDMIN=30
#-----
# Guest Message related settings
#-----
#Populate first line of Message using Date/Time, RVC# and Trans.Employee#
EMPLINFO_IN_MSG=1
#-----
# Restricted Posting for Kiosk Environment
#-----
RESTRICTED_POSTING=1
#Must match the ISL Employee Option in Employee Class
RESTR_POSTING_EMPL=8

```

6. (Optional) For debugging purposes, add the line "DEBUG\_ON=10".  
This increases the verbosity, adding additional messages in the Egateway.log file.
7. To override the Content, select the **Use Existing Record** option.  
The Content can be overridden by property, zone, or revenue center.

**Figure 51-24 Override Record Controls**



8. Click **Save**.
9. Restart the Service Hosts.

## Content Text Settings for the OPERA PMS

The following tables list the string names and values to be used in the Content module for the OPERA content text file.

### Posting Related Settings

**Table 51-4 Posting Related Settings**

Configuration String	Configuration Value
MAGCARDONLY	Set to 0 to allow both magnetic cards and keyboard inputs. Set to 1 to limit the entries in the Room Charge event to magnetic cards.
MAGCARDOVRWRT	When <b>MAGCARDONLY</b> is enabled, you can overwrite the setting for certain revenue centers by entering a list of revenue center numbers (separated by comma).
SUPPRESSGSTMSG	Set to 1 to suppress the message indicator during posting. Enable this setting for high-volume sites.
SUPPRESSNFOREF	Non-Room Charge tenders show the Department Code for which they were posted. Set to 1 to suppress this reference.
REVERSEGST	Set to 1 to make the guest count negative when the payment is negative (that is, the payment is voided). This feature requires specific configuration on the Front-Office interface to work correctly.

**Table 51-4 (Cont.) Posting Related Settings**

Configuration String	Configuration Value
FULL_DSVC	<p>Set to 1 to send the full breakdown of the discounts. This requires a specific version of the Front-Office interface.</p> <p>Set to 2 for an additional full breakdown of the service charges. This includes the full breakdown of discounts.</p>
NO_CONFIRM_GST	<p>Set to 0 if magnetic cards are used to identify guests.</p> <p>Set to 1 to prevent confirmation of the guest name when posting.</p>
POST_64TAXES	<p>Set to 1 to send up to 63 Tax Itemizers to the Front-Office interface. This feature requires IFC8 V.8.7.1.2 or later as well as a certain version of the Front-Office itself.</p> <p>Set to 0 to send only 8 Tax Itemizers to the Front-Office interface.</p>
SendAllDtls	<p>Set to 0 to send only the check details of Room Charges the Front-Office interface.</p> <p>Set to 1 to send also the check details of non-Room Charges.</p>
RESTRICTED_POSTING	<p>Select to restrict the response returned from the Front-Office Interface in the Room Charge event. Note that this only works in combination with the option <code>RESTR_POSTING_EMPL</code> is configured correctly. There are two values supported:</p> <ul style="list-style-type: none"> <li>• Set to 1 to require both the room number and at least three characters of the surname (last name) to post the room charge. If less than three characters are provided an error appears. If the response from the PMS contains more than one record, an error appears and the workstation operator must enter additional characters to provide a unique identifier.</li> <li>• Set to 3 to assume that an external device will provide the input as keyboard data. There is no touchscreen keyboard shown when this option is used. The workstation operator (or guest) has only the option to abort the input. If the response from the PMS contains more than one record an error appears and the posting is aborted. There is no confirmation of the guest-name shown, irrelevant of the setting in <code>NO_CONFIRM_GST</code>.</li> </ul> <p>Note that this feature does not work if the input is restricted to magnetic cards. Therefore, you must either disable the restriction or add the relevant revenue center to the excluded list of revenue centers.</p>

**Table 51-4 (Cont.) Posting Related Settings**

Configuration String	Configuration Value
RESTR_POSTING_EMPL	Specify the ISL Option to use with the above option (see ISL Options in the Employee Maintenance module). The valid value for this configuration is between 1 and 8.

**Locator and Message Settings****Table 51-5 Guest-Locator and Guest-Message Settings**

Configuration String	Configuration Value
RVCNAMELOC	Set to 1 to have the first line of the locator contain the revenue center name, otherwise the locator name is blank. Workstations operator can overwrite this value when entering the locator information.
LOCVALIDMIN	Each new locator is only valid for a certain time. Enter the default time in minutes for which the locator is valid. Workstation operators can overwrite this value when entering the locator information.

## Configuring the OPERA PMS Interface

1. Select the Enterprise level, click **Setup**, and then click **Interfaces**
2. Insert a record for the OPERA PMS interface. Enter a **System Name** that reflects the property using the interface.
3. Double-click the new interface record to open it.
4. On the **General** tab, configure the settings as follows:
  - **Communication Name:** Enter the name to use when communicating with the interface.
  - **Interface Type:** Select **0 - PMS/SIM**.
  - **Communication Type:** Select the communication type that the interface uses.
  - **Timeout:** Enter 30.
  - **Ping Frequency:** Set to 0 (zero) to avoid double posting.

**Figure 51-25 Interface Module**

The screenshot shows the 'General' tab of the Interface Module configuration window. At the top, there are four tabs: 'General', 'Options', 'Properties', and 'Service Host'. Below the tabs, the 'Current Record' section contains a 'Number' field with the value '4' and a 'System Name' field with the value 'PMS'. A blue link 'Audit This Record' is positioned to the right of the 'Number' field. The 'General' section contains several fields and dropdown menus: 'Communication Name' (MF\_ENH\_ADD), 'Interface Type' (0 - PMS/SIM), 'Communications Type' (1 - TCP), 'Backup Interface' (0 - None), 'Offline Posting Link' (0 - None), 'SIMDB Link' (0 - None), 'Encoding Type' (1 - Default Windows), 'Timeout' (30), 'Ping Frequency' (0), and 'ISL Script Name'. At the bottom of this section is a checkbox labeled 'UWS Local Interface'.

5. Click the **Options** tab, and then select the options **1 - Use 19 Digit Reference Entry for PMS Inquiries**, **2 - Enable Interface Log**, **3 - Allow Inquiry without Sign-In**, and **5 - ON = Use 9 digits for Terminal IDs; OFF= Use 2 digits for Terminal IDs**.

Do not enable option 8, as it causes double posting.

**Figure 51-26 Interface Module's Options Tab**

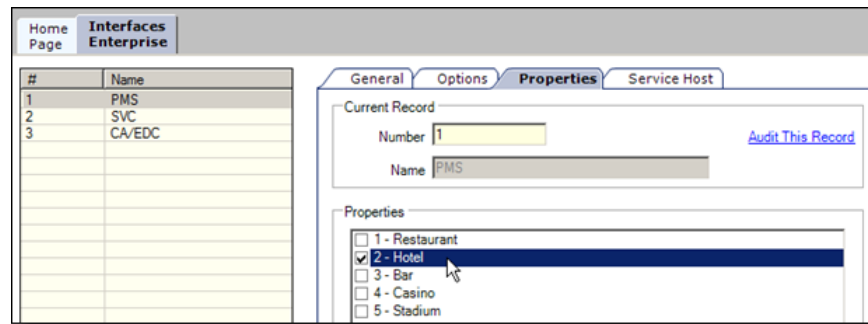
The screenshot shows the 'Options' tab of the Interface Module configuration window. The 'Current Record' section at the top has a 'Number' field with '4' and a 'Name' field with 'PMS'. Below this is the 'Options' section, which contains a list of 11 options with checkboxes:
 

- 1 - Use 19 Digit Reference Entry for PMS Inquiries
- 2 - Enable Interface Log
- 3 - Allow Inquiry without Sign-In
- 4 - Use 5 Digits for Number of Guests
- 5 - ON = Use 9 digits for Terminal IDs; OFF = Use 2 digits for Terminal IDs
- 7 - Download to Mobile MICROS
- 8 - Enable Offline Posting
- 9 - Determine Link Status Using Ping
- 10 - ON = Use 5-digit RVC #; OFF = Use 3-digit RVC #
- 11 - ON = Use 8-digit Check #; OFF = Use 4-digit Check #

 Below the list is a search box and a checkbox labeled 'Search within Context Sensitive Help'. The 'TCP Communications' section at the bottom contains a 'TCP Host Name' field with '192.0.2.1' and a 'Port Number' field with '5010'.

6. In the TCP Communications section, enter the following details:
  - **TCP Host Name:** Enter the OPERA PMS application server's IP address or server name (if DNS is enabled).
  - **Port Number:** Enter the port number for the OPERA PMS server.
7. Click the **Properties** tab, and then select the properties that can use this interface.

**Figure 51-27 Interface Module's Properties Tab**



8. Click the **Service Host** tab, click **Select** adjacent to the **Service Host** field, select the service host to run the OPERA PMS interface, and then click **OK**.

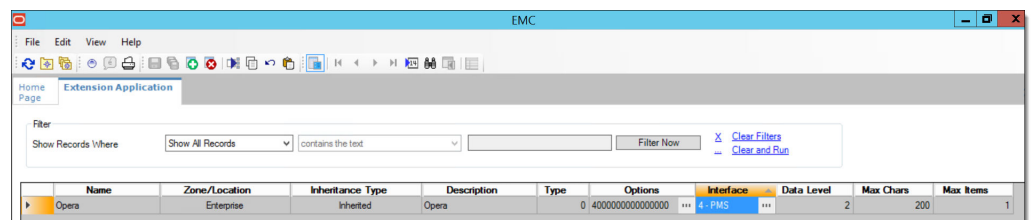
You can assign any workstation that has enough power to handle the incoming queries as the service host.

9. Click **Save**.
10. Select the Enterprise, property, revenue center, or zone, click **Setup**, and then click **Extension Application**.

This configuration typically occurs at the property level when the PMS interface is on-premises.

11. In the Interface column corresponding to the OPERA extension application record, click the ellipsis point (...) button, and then select the **PMS** interface to associate it with the OPERA Extension Application record.

**Figure 51-28 Extension Application PMS Interface Assignment**



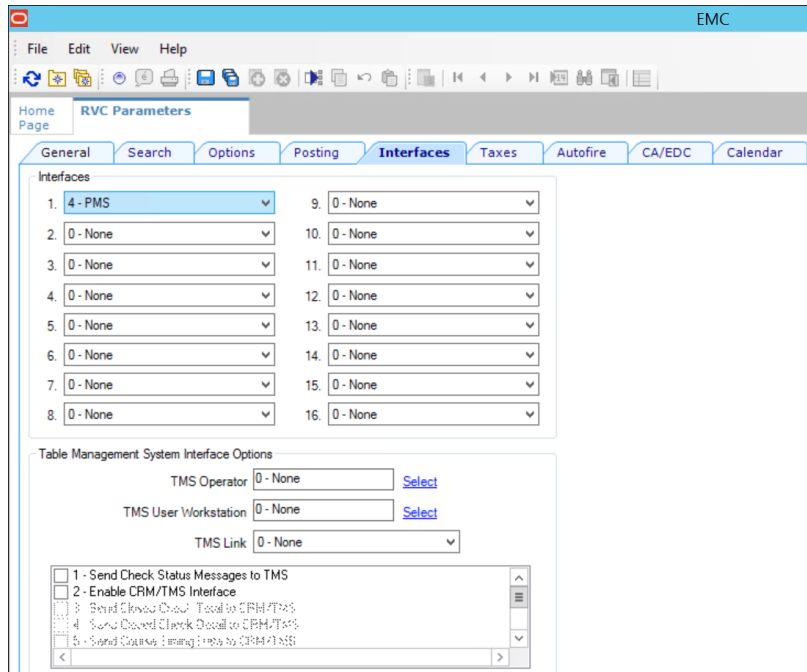
12. Click **Save**.

## Enabling the OPERA PMS Interface for a Revenue Center

You must enable the OPERA PMS interface for each revenue center that uses OPERA.

1. Select the revenue center, click **Setup**, and then click **RVC Parameters**
2. Click the **Interfaces** tab.
3. Select the **PMS** interface to enable the OPERA PMS interface for the revenue center.

**Figure 51-29 Revenue Center Parameters Interfaces Tab**



4. Click **Save**.
5. Repeat Steps 1 through 4 for each revenue center that uses the OPERA PMS interface.

## Adding the Tender/Media Data Extension for OPERA

1. Select the Enterprise level, click **Configuration**, and then click **Data Extensions**.
2. Click the **Insert** icon on the toolbar to add a record, and then click **OK**.
3. Enter information in the following fields:

**Table 51-6 Data Extension Fields**

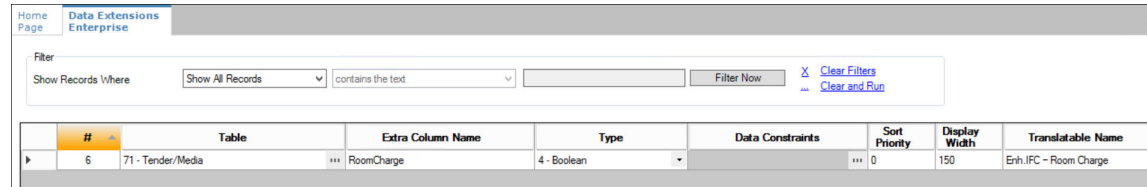
Field	Description
Table	Select <b>71 - Tender Media</b> .
Extra Column Name	Enter <b>Room Charge</b> .
Type	Select <b>4 - Boolean</b> .
Data Constraints	Not applicable
Sort Priority	Not applicable
Display Width	Enter <b>150</b> .



**Table 51-6 (Cont.) Data Extension Fields**

Field	Description
Translatable Name	Enter <b>Enh.IFC – Room Charge</b> (translatable).
Translatable Help	Enter <b>Enable this for Room-Charge Payments</b> (translatable).

**Figure 51-30 Data Extensions Module**



4. Select the following options:
  - **Is Editable**
  - **Is Viewable**
  - **Is Downloadable**
5. Click **Save**.

## Configuring the Room Charge Buttons for the OPERA PMS

Oracle recommends that you create payment card buttons on a page for the PMS room charge function.

1. Select the Enterprise, property, revenue center, or zone, click **Configuration**, and then click **Page Design**.
2. Open the page on which to place the room charge button.
3. On the **Edit** tab, select the page area in which to define the room charge function (typically the payment area).
4. Click **Button**.
5. On the **General** subtab, enter the button name in the **Legend** field.
6. Select **Payment Tenders** from the **Type** drop-down list.
7. In the Select Tender/Media Payment dialog, select the OPERA PMS room charge payment tender, and then click **OK**.
8. In the Select Payment Type area, select **Other1:LoadablePms** from the **Payment Type** drop-down list.
9. Click the **Edit...** link in the Command column.
10. In the Payment Configuration dialog, select the **Opera** payment method from the **Functions** drop-down list.
11. Position and size the button on the page. Use the Style arrow to change the color.

**Figure 51-31 Room Charge Payment Button**

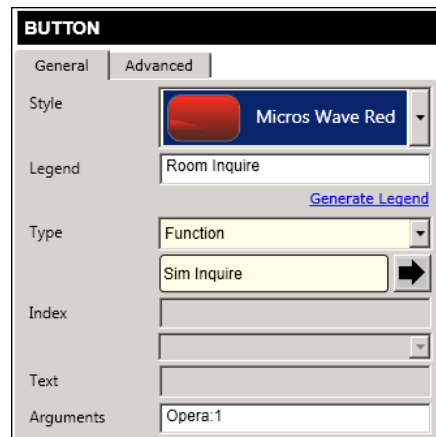
12. Click **Save**.
13. Add the room inquiry buttons on any required page. Typically, the room inquiry buttons are created on the payment or function page.
  - a. Open the page on which to place the Room Charge Inquiry buttons, and then on the **Edit** tab, select the page area in which to define the buttons.
  - b. Click **Button**, and then on the **General** subtab, select **Function** from the **Type** drop-down list.
  - c. Click the black arrow directly beneath the **Type** drop-down list, and then select **Extensibility** from the **Type** pane.
  - d. Select **SIM Inquire**, and then click **OK**.
  - e. In the **Argument** field, enter <EXTENSION APPLICATION NAME> : <INQUIRY NUMBER>.

Enter the inquiry number corresponding to the PMS SIM inquiry. For example, enter OPERA:1 to configure a Room Inquiry button.

**Table 51-7 Inquire Names and Numbers for Room Inquiry Buttons**

Inquire	Inquire Number
Room Inquire	1
Info Room Inquire	2
Short Inquire	5
Info Line Inquire	6
View Reservation Inquire	7
Extended Inquire	8
PMS Interface Information Inquire	911

**Figure 51-32 Room Charge Inquiry Button**



- f. Enter a **Legend**.
  - g. Repeat Steps 13b through 13f to configure buttons for the remaining PMS SIM inquire buttons listed in Step 13e.
  - a. Click **Save**.
14. After the room charge button configurations are complete, perform a full reload of all workstations and restart the service hosts.

## Updating the SIM OPERA Interface to a Newer Version

To update an available installation:

1. Run the **SIMPH2\_ENH\_IFC[version number].exe** setup application on the Symphony application server to update the [Drive letter]:\MICROS\Custom folder.
2. Re-import the ISL and DLL files into the Extension Application.  
See [Inserting the Extension Application Content for OPERA](#) for more information.
3. Create any additional Data Extensions, if required.
4. Perform a database reload on the workstations and restart the service hosts.