Oracle® Retail Sales Audit
Implementation Guide

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Oracle Retail Sales Audit Implementation Guide,

F95270-01

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Preface

This Implementation Guide describes the requirements and procedures to install this Oracle Retail Product release.

Audience

This Implementation Guide is for the following audiences:

- System administrators and operations personnel
- Database administrators
- System analysts and programmers
- Integrators and implementation staff personnel

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- Detailed step-by-step instructions to re-create
- Exact error message received
- Screen shots of each step you take

Review Patch Documentation

When you install the application for the first time, you install either a base release (for example, 13.1) or a later patch release (for example, 13.1.2). If you are installing the base release and additional patch releases, read the documentation for all releases that have occurred since the base release before you begin installation. Documentation for patch releases can contain critical information related to the base release, as well as information about code changes since the base release.

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This process will prevent delays in making critical corrections available to customers. For the customer, it means that before you begin installation, you must verify that you have the most recent version of the Oracle Retail documentation set. Oracle Retail documentation is available on the Oracle Technology Network at the following URL:

http://www.oracle.com/technetwork/documentation/oracle-retail-100266.html

An updated version of the applicable Oracle Retail document is indicated by Oracle part number, as well as print date (month and year). An updated version uses the same part number, with a higher-numbered suffix. For example, part number E123456-02 is an updated version of a document with part number E123456-01.

If a more recent version of a document is available, that version supersedes all previous versions.

Oracle Retail Documentation on the Oracle Help Center (docs.oracle.com)

Oracle Retail product documentation is also available on the following Web site:

https://docs.oracle.com/en/industries/retail/index.html

(Data Model documents can be obtained through My Oracle Support.)

Conventions

The following text conventions are used in this document:

Convention	Meaning
boldface	Boldface type indicates graphical user interface elements associated with an action, or terms defined in text or the glossary.
italic	Italic type indicates book titles, emphasis, or placeholder variables for which you supply particular values.
`monospace`	Monospace type indicates commands within a paragraph, URLs, code in examples, text that appears on the screen, or text that you enter.

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Getting Started

System Options

Sales Audit contains a set of system options that are either defaulted at the time of the installation, or are configured manually from the UI by a System Administrator. These system options control the various functionality in Sales Audit, starting from the import of transaction logs, to audit and finally, export to the different systems. They are configured based on the requirements/rules of the business. They tend to remain fixed unless a business practice is changed which necessitates a change.

System Constraints

Below are system constraints used by Sales Audit; most of them are mandatory to be configured, while some are optional. One of the important system option parameters is the balancing level, which impacts the way that the auditing rules are applied to a store day. Another important option is the unit of work. This determines whether transactions are exported prior to the elimination of all errors for the store day. Other parameters include defining the escheatment party and the details of the clearinghouse. Certain business rules like duplicate and missing transaction number checks are also controlled through these system options settings.

System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Balancing Level	No	No	R	Used to determine the level at which balancing of declared totals to system summarized totals is performed. Valid values are Store (S), Register Summary (R), and Cashier Summary (C). Changes to this parameter are permitted but care should be taken to ensure any open store/days are audited and closed out prior to making the parameter update. The updated parameter value will not be used by open store/days unless the Re-total/Re-audit process is manually re-executed.
Cash Management	No	No	Y	Controls whether or not the batch export to ACH will process or not. If set to Yes, then Sales Audit will export to an ACH system. If set to No, then it won't perform any export. Valid values are Yes (Y) or No (N).

System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Check for Duplicate and Missing Transactions	No	No	Y	Indicates whether the auditing process should check for missing and duplicate transactions as part of the auditing process. Sales Audit can accept duplicate transaction numbers from OMS and POS. See the Customer Ordering section for more details on this functionality. If this field is set as Yes, then Sales Audit filters duplicate transactions when the transaction is originating from the same system. If set to No, then neither duplicates nor missing transactions will be audited for. Valid values are Yes (Y) or No (N).
Execute Automated Audit After Import	No	No	Y	Indicates whether or not to execute the automated totaling and audit processes after each import of data. If this is set to Yes, the automated totaling and audit will occur after each import. If this indicator is set to No, the automated totaling and automated audit processes will not occur until Sales Audit receives a transaction verifying that all data for the store day has been transmitted. Valid values are Yes (Y) or No (N).
Locking Level	No	No	S	This indicator will indicate the level at which locking occurs within Sales Audit. Valid values are Store Day (S) or Transaction (T). Locking at the store day level will not allow more than one user to update the transactions for the store day at the same time. While, locking at the transaction level will allow this to happen.
Post Positive Debits and Credits	No	No	N	This new system option allows the retailer to specify whether the financial postings should always post only positive debits and credits. If checked (Yes), only positive values will be posted to the General Ledger. If not (No), the former behavior of posting negative amounts will continue. This parameter can be edited by the appropriate admin user. If updated, the changes will be reflected in GL posting batch runs subsequent to the change. Valid values are Yes or No.

System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Transaction Appended with Workstation ID	No	No	N	Identifies if the workstation ID will be appended to the transaction number sent from POS or OMS. It will determine how missing or duplicate transaction processing should audit transactions. If you have multiple tills per workstation, then it is recommended that you set this to Yes and send transaction numbers in the following format: workstation id || transaction no. Valid values are Yes (Y) or No (N).
Transaction Navigation	No	No	R	Determines how users will navigate in the Transaction Maintenance screen when clicking the previous and next buttons. Valid values are Next Transaction Sequence Number (P) or Register Transaction (R).
Unit of Work	No	No	T	Indicates whether your auditors will work at the Transaction level (T) or the Store Day level (S). It determines when Sales Audit will export the data to the external systems. For transaction level, an individual transaction is exported from Sales Audit as soon as it is imported and is free of errors. For store day level, the error free transactions are exported only once the entire store day is processed.
Credit Card - Masking Character	No	Yes	*	Sales audit only accepts masked credit card numbers on transaction data. This system option indicates the character that will be used by your POS or OMS to mask a credit card number.
Determine Comp Store Status By - Date	No	No	R	Comp stores are used to identify those stores which have been newly remodeled, acquired or opened. The comp stores are separated from regular stores to facilitate analysis - when looking at sales figures and trends. This system option setting will be used to determine which data should be used to determine a store's comp status. Valid values are Store Open Date (S), Remodel Date (R), or Acquire Date (A).
Determine Comp Store Status By - Elapsed Days	No	No	999	Indicates the number of days since past the Comp Store Status date defined above that must have elapsed in order for a store to be normalized and be included in sales reports.

System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Inventory Reservation - For Layaway	No	No	Y	Indicates whether or not inventory should be reserved for layaway transactions. If this is set to Yes, then an update will be sent to Merchandising to reserve the desired inventory when a layaway transaction is initiated, without processing a sale. Valid values are Yes (Y) or No (N).
Inventory Reservation - From SIM	No	No	N	Indicates whether or not inventory should be reserved for an in-store customer order sent from the store inventory system (e.g. SIM or SIOCS). If this is set to Yes, then an update will be sent to Merchandising to reserve the desired inventory when an in-store customer order is initiated, without processing a sale. Note: this is used only for customer orders not going through an Order Management solution. Valid values are Yes (Y) or No (N).
Maximum Number of Days - Post-Dated Transactions Allowed Days	No	No	999	This parameter is used to define the number of days before post-dated sale transactions are allowed in the system to be processed. Note: if the store days are closed, they will need to be reopened to process the backdated transactions.
Maximum Number of Days - Sales Audit Data Stored	No	No	1	Used to determine how many days sales audit data should remain on the database after posting to other systems.
Maximum Number of Days - To Compare Duplicates	Conditional	No	30	Maximum number of previous day's information to use when determining if a transaction is a duplicate. If the Check for Duplicate and Missing Transactions option is Yes, it is mandatory to give it a value. If not, then this field will be disabled.
Maximum Number of Days - Close Month After	Yes	No	0	Used to define the number of days for which the fiscal month would be kept open to accept late or missing postings from the Sales Audit application. If set to a value greater than zero, then that many days will be added to the end of the fiscal period to determine when the month will be closed.
Online Store- Create Store Days – Days Prior	No	No	1	Used to define the number of days prior that store days should be created for online stores by the sastdycr batch

System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Consignment Sales Review Days	No	No	0	Used to define the review window in hours/days from the point of upload of consignment sales within which an external system can review and update the consignment rate (or cost) for the items to be reviewed. These items will not be exported to Merchandising till the transaction has been reviewed or the review window has elapsed. Rate review functionality will be deemed enabled if the Review Days is set to a non-zero value.

ACH Information

Automated Clearing House (ACH) is a U.S.-based banking network used to electronically transfer funds. You can use ACH to enable them to have access to funds before the funds have been physically deposited in the bank. This is done by estimating the following day's bank deposit and sending this amount to the consolidating bank through the ACH network. In this way, the cash to be received from the stores is hedged. Sales Audit has several system options used to configure this functionality, if you choose to use it.

System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Sender ID	Yes	No		Contains the ID used by the originator to identify itself to the Originating Financial Depository Institution (ODFI). Required only if using Sales Audit automated clearing house (ACH) functionality to transfer payment information to a bank.
Company ID	Yes	No		Contains the alphanumeric code to identify the company. The first character may be the ANSI one-digit Identification Code Designators (ICD). For example, 1 IRS Employer ID Number or 9 user-assigned number. Required only if using Sales Audit automated clearing house (ACH) functionality to transfer payment information to a bank.
Name	Yes	No		Contains the name of the Originating Financial Depository Institution (OFDI). Required only if using Sales Audit automated clearing house (ACH) functionality to transfer payment information to a bank.
Routing	Yes	No		Contains the routing number of the consolidating bank. Required only if using Sales Audit automated clearing house (ACH) functionality to transfer payment information to a bank.

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System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Account	Yes	No		Contains the account number of the consolidating bank. Required only if using Sales Audit automated clearing house (ACH) functionality to transfer payment information to a bank.

Escheatment

Escheatment is the process of forwarding monies of outstanding, non-expiring vouchers to the government authorities (state or country) after a defined period of time from the date of issuance, which is required by some government authorities. When a voucher is escheated, an invoice is generated that initiates payment of the escheated voucher amount to the government authority. The government authorities then attempt to locate the consumers owed the monies.

> **✎ Note:**
>
> To accommodate escheatment, a new total should be added to Sales Audit to create escheatment totals. Sales Audit automatically totals sales transactions based on calculation definitions set up for the total.

The escheatment functionality in Sales Audit is driven by the hierarchy of store, issuer, recipient, and HQ. When performing escheatment, Sales Audit checks if there is an address for the first level of the hierarchy, the store. If so, it checks if the state or country is defined in the escheatment table (see "Escheat Options") in Sales Audit. If the state or country exists on the table it then checks to see if the store indicator for that state or country is set to yes. If so, Sales Audit escheats these monies to that state or country. If no state or country exists for the store, or one does but does not exist on the Escheatment table, or it does exist on the table but the Store indicator is set to no, then Sales Audit checks the next level, Issuer, and so on. If no matches are found after Sales Audit checks all four levels of the hierarchy, then you claim the voucher as income. This income will be claimed by using a non-merchandise type of invoice.

System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Escheat to Government Authorities	No	No		This field indicates whether or not the retailer would like to escheat vouchers back to the state after a defined time period. The value set depends on the local or state laws regarding escheating vouchers, and the current business practice followed for dealing with unused vouchers. If this is set to Yes, then an escheatment partner must also be defined.
Partner for Income Adjustments	Conditional	No		The partner type that you have chosen as the escheatment authority. This can be either Escheat-State or Escheat-Country.
Partner for Income Adjustments	Conditional	No		The ID for the state or country escheatment partner that will be used as the escheatment authority.

Vouchers

For each voucher type that is subject to escheatment, configuration must be made to setup the timing for escheating and ultimately removing the voucher from sales audit. This is also done in the system options screen in Sales Audit. One or more vouchers types can be configured as described below.

System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Escheat Days	Yes	No		Indicates the number of days between issuance of a voucher of this type and its escheatment.
Purge Days	Yes	No		Indicates the number of days between redemption or escheatment of a voucher of this type and its deletion from the database.
Tender Type	Yes	No		Contains the ID for a tender type for which the escheat and purge options are being defined. The valid values are tender types that have been configured in Sales Audit in the Voucher group. Tender types in this group can be viewed or modified by accessing Data Loading > Download from the task list and selecting the template type Finance Administration and the template Tender Types.

Fuel Management

Sales Audit supports the audit of Fuel Merchandise. A single department can be setup in the merchandise hierarchy under which the fuel merchandise will be associated. Sales Audit has

the below system options that are needed to be configured for the import and audit of such merchandise.

System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Fuel Merchandise	No	No	No	Indicates whether or not fuel merchandise exists in your business. If so, then set this to Yes and enter a fuel department. If not, then set this to No. Fuel department is required if set to Yes. Note: this option is not in the database, it is just used to control the System Option page behavior.
Fuel Department	Yes	Yes		Contains the department number of the fuel department. This field will only contain a value if you sell fuel. Note: all fuel related items must be in a single department in Merchandising.

Report Options

Sales Audit has three dashboard reports available in the Sales Auditor's dashboard that can be used to help surface key issues that need addressing during the auditing process. These reports are based on the data for the past store days, and Sales Audit provides the option to set the number of days that the user would want to look at. The reports can be viewed for a maximum of 14 days. To provide configuration for these reports, several system parameters can be set, as described below.

For more information on the reports, see the *Oracle Retail Sales Audit Reports User Guide*.

System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Open Store Days	No	No	7	Allows configuration of the number of days that will be displayed in the Open Store Days report in the Sales Audit dashboard. Valid values are 1-14 days.
Open Transaction Days	No	No	7	Allows configuration of the number of days that will be displayed in the Open Transactions report in the Sales Audit dashboard. Valid values are 1-14 days.
Over/Short Summary Days	No	No	7	Allows configuration of the number of days that will be displayed in the Over/Short Summary report in the Sales Audit dashboard. Valid values are 1-14 days.

System Option	Optional?	Re-configuration Restricted?	Default Value	Description
Over Threshold	No	No	0	Allows configuration of the threshold for overages shown in the Over/Short Summary report in terms of primary currency. Only overages that exceeds this threshold will be displayed in the report. Positive numeric values are allowed to be specified.
Short Threshold	No	No	0	Allows configuration of the threshold for shortages shown in the Over/Short Summary report in terms of primary currency. Only shortages that exceeds this threshold will be displayed in the report. Positive numeric values are allowed to be specified.

There are also some additional system options that still exist on the table in the database but refer to older functionality that has been removed from the solution and so are no longer used. These include:

- AUTO_VALIDATE_TRAN_EMPLOYEE_ID
- CLOSE_IN_ORDER
- DEFAULT_CHAIN
- VIEW_SYS_CALC_TOTAL

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Sales Audit Codes and Descriptions

The following Merchandising codes are used to manage some of the dropdowns and options in Sales Audit. The details of how each are used below. To configure any of these options, you'll need to use the Merchandising Codes and Descriptions spreadsheet download and upload functionality. This includes updating the terminology used for these codes, marking those that you are not using, as well as updating or adding any translations. Certain codes also allow new values to be added, especially where they need to be coordinated with your selling solutions (POS and OMS). Where this applies, it has been indicated in the table below. You can find details on how to access and use the spreadsheet upload for Codes and Descriptions in the Merchandising Implementation Guide.

> **Note:**
>
> There are two codes that show up in several of the Sales Audit code types - TERM and ERR. ERR is used when an invalid value is sent in the data from the selling solution and should not be removed or hidden from any of the codes where it currently exists. Similarly, TERM is used in processing of the import by Sales Audit and should not be modified. It is not displayed to end users.

Making Changes in the Codes Tables

If you add any new codes to the code types listed below that will be used in validation during the import process, then the library programs must be recompiled. For **on premise** implementations, follow these steps:

1. Navigate to the $l directory and recompile libresa.a and install:

   ```
   make -f retek.mk resa
   make -f retek.mk install
   ```

2. Navigate to the $c directory and recompile the next libraries:

   ```
   make -f mts.mk resa-libchange
   make -f mts.mk resa
   ```

   a. Recompile the appropriate library depending upon which of the following products is being used:

      – Merchandising (resa-rms)

      – Retail Insights (resa-rdw)

      – Automated Clearning House (resa-ach)

      – Universal Account Reconciliation (resa-uar)

      – Invoice Matching (resa-im)

      ```
      make -f mts.mk (name of library)
      ```

   b. make -f mts.mk resa-install

For **cloud service** implementations, an SR must be logged to complete this process when updates are made.

Code Type	Code Type Description	Notes	Add New Allowed?
CCAS	Credit Card Authorization Source	Holds the valid values for credit card authorization sources, such as manual or electronic, that are used in validating sales and return transactions, such as manual or electronic. Default values will be initially loaded, but it is expected that these will be update for your implementation to add codes that are applicable for your business and those used by your selling solutions.	Yes
CCEM	Credit Card Entry Mode	Holds the valid values for credit card entry modes, such as magnetic strip, that are used in validating sales and return transactions. Default values will be initially loaded, but it is expected that these will be update for your implementation to add codes that are applicable for your business and those used by your selling solutions.	Yes
CCSC	Credit Card Special Condition	Holds the valid values for any special conditions related to the credit card, such as phone or mail order. These are used in validating sales and return transactions. Default values will be initially loaded, but it is expected that these will be update for your implementation to add codes that are applicable for your business and those used by your selling solutions.	Yes
CCVF	Credit Card Verification	Holds the valid values for credit card verification method, such as magnetic strip, that are used in validating sales and return transactions. Default values will be initially loaded, but it is expected that these will be update for your implementation to add codes that are applicable for your business and those used by your selling solutions.	Yes
CIDT	Sales Audit Customer ID Types	Holds the codes of the different customer identification types, such as driver's license number or zip code, that are used in validating sales and return transactions. Default values will initially be loaded, but it is expected that these will be updated for your implementation to add codes that are applicable for your business and used by your selling solutions (POS and OMS).	Yes
COMP	Comparator	Holds the options for filtering location closings by closing date in the download data screen. Valid values are Between, Equals, Not After, or Not Before. See Location Closings for more details on this function.	No

Code Type	Code Type Description	Notes	Add New Allowed?
DTTP	Sales Audit Data Types	Indicates the different data types of the Constant values supported for rules and totals. The valid values are Number, Date, and Character. Adding new values to this code is not supported and may result in errors.	No
FORM	Sales Audit Forms	Used in the management of error codes to determine where an error is displayed on a transaction. See the Error Codes section of this document for more details. The valid values are Missing Trans. (M), Non Transactional (NT), Over/Short Totals (O), Misc. Totals (T), and Transaction Detail (TR). Adding new values to this code is not supported and may result in errors.	No
IMEX	Sales Audit Import Export	Holds the decoded description for Import (I) and Export (E) terms used in the configuration of files for Sales Audit. Adding new values to this code is not supported and may result in errors.	No
ORRC	Sales Audit Override Reason Codes	Indicates the valid reason codes that are used for item price overrides. Default values will initially be loaded, but it is expected that these will be updated for your implementation to add codes that are applicable for your business and used by your selling solutions (POS and OMS).	Yes
OSGP	Sales Audit Over/Short Groups	Holds the codes for the two groups of totals that can be defined for over/short totals - Accounted For (B) and Accountable For (D). Adding new values to this code is not supported and may result in errors.	No
PRMT	Promotion Types	Indicates the types of promotions that are allowed on a sales transaction. Valid values are In Store Discount (1004), Employee Discount (1005), Non-RPM Promotion (2000), RPM Promotion (9999). The 2000 code should be used for any promotions created in a solution that is not Oracle Retail Pricing (including Oracle Retail Customer Engagement). If a transaction uses code 9999, then its promotion information will be validated against Oracle Retail Pricing promotions. Adding new values to this code is not supported and may result in errors.	No

Code Type	Code Type Description	Notes	Add New Allowed?
REAC	Sales Audit Reason Codes	Indicates the reason code that has been entered for a transaction, which may be used for certain transaction types, such as a void or return. Note that for the transaction type Paid Out with sub-transaction type of Merchandise Vendor Payout (MV) or Expense Vendor Payout (EV), the reason codes are the non-merchandise codes in Merchandising, not from this code type. Default values will initially be loaded, but it is expected that these will be updated for your implementation to add codes that are applicable for your business and used by your selling solutions (POS and OMS).	Yes
REFL	Sales Audit Reference Labels	Contains the labels displayed for reference fields on transactions to indicate the information that is contained in the reference field. See the Reference Fields section below for more information on assigning these labels to transactions, sub-transactions, and/or reason code combinations. Default values for this code type will initially be loaded, but it is expected that these will be updated for your implementation to add codes that are applicable for your business and used by your selling solutions (POS and OMS).	Yes
REFN	Sales Audit Reference Field Numbers	Displays the valid reference numbers available at various levels of a transaction so that they can be displayed in a list to select from when configuring the references for transaction, sub-transaction, and reason code combinations. See the Reference Fields section below for more information on this configuration. Adding new values to this code is not supported and may result in errors. The descriptions should also not be updated for this code type.	No
RELM	SA Realm Addition Indicator	Used in the setup of rules and totals to display to the user whether the selected realm is available to be added to a rule or total. Valid values are Available (Y) or Not Available (N). Adding new values to this code is not supported and may result in errors.	No
REOP	Relational Operators	Contains the operators that can be used in creating a total or rule. Valid values are <, <=, =, >=, and >. Adding new values to this code is not supported and may result in errors. The descriptions should also not be updated for this code type.	No

Code Type	Code Type Description	Notes	Add New Allowed?
SAAS	Sales Audit Audit Status	Indicates the statuses for a store day. Valid values are Audited (A), Errors Pending (H), Retotaling/Auditing Required (R), Totaled (T), and Unaudited (U). Adding new values to this code is not supported.	No
SABA	Sales Audit Bank Account Types	Indicates the valid bank account types used in the Store Bank configuration. Valid values are Checking (C) and Savings (S). Adding new values to this code type is not supported.	No
SABL	Sales Audit Balancing Level	Indicates the valid options available for the Balancing Level system option. Valid values are Cashier Summary (C), Register Summary (R), and Store (S). Cashier/Register Summary (CS) is a for the code type, but it no longer used by Sales Audit. Adding new values to this code type is not supported.	No
SACA	Sales Audit Customer Attribute Types	Contains the codes defining other code types that are used to determine the valid values that can be selected for customer attributes on a transaction. Initially, this code will contain the following codes referencing other code types: • SAGC - Sales Audit Gender Codes • SAIN - Sales Audit Income Codes • SARD - Sales Audit Retailer Defined Codes Other code types can also be added for attribute types that you would like to track. These code types would then be added to this code as well.	Yes
SACD	Sales Audit Comp Store Date	Indicates the store date to be used for comparison reporting. Valid values are Acquire Date (A), Remodel Date (R), and Store Open Date (S). Adding new values to this code is not supported.	No
SACI	Sales Audit Combined Total Ind	Contains the descriptions used in the user interface when creating totals to indicate if the total will be based on Raw Data (N) or if it is a Combined Total (Y). Adding new values to this code is not supported.	No
SACM	Sales Audit Comment Type	Comments for Sales Audit are held on a common table, so this code is used to indicate where the comments apply. Valid values are Balance Group (SABG), Store/Day (SASD), Total (SATL), and ReSA Transaction No (SATR). Adding new values to this code type is not supported.	No

Code Type	Code Type Description	Notes	Add New Allowed?
SACO	Sales Audit Comparison Operators	Contains the comparison operators used during the creation of totals and rules. Valid values are !=, is not NULL, not within tolerance, <, <=, =, >, >=, between, in, not between, not in, is NULL, and within tolerance. Adding new values to this code is not supported.	No
SACS	Sales Audit Count/Sum	Contains the label descriptions that are used to indicate whether or not a total represents a count or a sum. Valid values are Count (C) and Sum (S). Adding new values to this code type is not supported.	No
SADA	Sales Audit Transaction Discount Attribute Types	Contains the codes defining other code types that are used to determine the valid values for custom transaction discount attributes. Initially, no codes will be defined from this type outside the standard error code. If you want to define custom transaction discount attributes, then other code types can also be added. These code types would then be added to this code as well.	Yes
SADS	Sales Audit Data Status	Contains the status descriptions for a store day's data loading status. Valid values are Fully Loaded (F), Purged (G), Loading (L), Partially Loaded (P), and Ready for Import (R). Adding new values to this code is not supported.	No
SADT	Sales Audit Discount Types	Indicates the valid discount types for your sales transactions, such as Employee Discount or Price Match. This is used in the import batches. Default values will initially be loaded, but it is expected that these will be updated for your implementation to add codes that are applicable for your business and used by your selling solutions (POS and OMS).	Yes
SAES	Sales Audit Export Status	Contains the descriptions for a store day's export status. Valid values include Exported (E), Processed (P), and Ready for Export (R). Adding new values to this code is not supported.	No

Code Type	Code Type Description	Notes	Add New Allowed?
SAFD	Sales Audit Full Disclosure Indicator	If an auditor modifies data during the interactive audit that was previously exported to the General Ledger, Merchandising, or other solutions, Sales Audit will re-export using a process called "full disclosure" Full disclosure means that any previously exported values are fully backed out before the new value is sent. When the export sends the adjusted amounts, it will flag the reversed transaction with an N, or Negative (Reversal) Transaction/Total, and the corrected transaction with a P, or Positive Transaction/ Total. Adding new values to this code type is not supported.	No
SAGC	Sales Audit Gender Codes	Indicates the valid values for the customer attribute type for gender. Valid values loaded initially are Female (F), Male (M), and Unknown (U), but new values can be added to coordinate with the values used by your selling solutions.	Yes
SAHA	Sales Audit Transaction Header Attribute Types	Contains the codes defining other code types that are used to determine the valid values for custom transaction header attributes. Initially, no codes will be defined from this type outside the standard error code. If you want to define custom transaction header attributes, then other code types can also be added. These code types would then be added to this code as well.	Yes
SAIA	Sales Audit Transaction Item Attribute Types	Contains the codes defining other code types that are used to determine the valid values for custom transaction item attributes. Initially, no codes will be defined from this type outside the standard error code. If you want to define custom transaction item attributes, then other code types can also be added. These code types would then be added to this code as well.	Yes
SAIN	Sales Audit Income Codes	Indicates the valid values for the customer attribute type for income. Valid values loaded are initially, but new values can be added to coordinate with the values used by your selling solutions.	Yes
SAIS	Sales Audit Import Status	Contains the descriptions for a store day's import status. Valid values include Loaded into Database (L), Ready for Import (R), and Unexpected Import (U). Adding new values to this code type is not supported.	No

Code Type	Code Type Description	Notes	Add New Allowed?
SAIT	Sales Audit Item Types	Contains the descriptions for the valid item types that can be used for transactions. Valid values include Voucher Number (GCN), Item (ITEM), Non Merchandise Item (NMITEM), and Reference Item (REF). Adding new values to this code is not supported.	No
SALL	Sales Audit Locking Level	Indicates the options for which locking is employed by Sales Audit. This code is used for the system option Locking Level. Valid values are Store Day (S) and Transaction (T). Adding new values to this code is not supported.	No
SAMS	Sales Audit Missing Status	Contains the descriptions used to describe the status of missing transactions for a store day. Valid values are Added (A), Deleted (D), or Missing (M). Adding new values to this code type is not supported.	No
SAO	Sales Audit Order	Holds the sequence numbers used for the Execute Order attribute as part of creating rules in Sales Audit. Valid values are 1 through 20. Adding new values to this code is not supported.	No
SAOS	Sales Audit Overall Store Day Status	Contains the descriptions for the overall store day status. Valid values are Complete (A) or In Progress (I). Adding new values to this code is not supported.	No
SARD	Sales Audit Retailer Defined Codes	Indicates the valid values for the customer attribute type that is retailer defined. This code type is expected to be updated for your implementation to hold additional customer attributes. By default, values are loaded and it is expected that these will be updated and new codes will be added, as needed. As these would be passed in from your selling solutions, the values setup here should be set in accordance with what is used in those solutions.	Yes
SARR	Return Reason Codes	Indicates the valid reason codes for a return transaction. Default values will initially be loaded, but it is expected that these will be updated for your implementation to add codes that are applicable for your business and used by your selling solutions (POS and OMS).	Yes
SART	Sales Audit Record Types	Contains the descriptions used to describe a record type error in the RTLOG import. For example, Item Level Error (TITEM). Adding new values to this code type is not supported.	No

Code Type	Code Type Description	Notes	Add New Allowed?
SASI	Sales Audit Item Status	Contains the valid values for item status on a transaction. Valid values are Voided (V), Sale (S), Return (R), Other (O), Ord Ini (ORI), Ord Can (ORC), Ord Com (ORD), Lay Ini (LIN), Lay Can (LCA), or Lay Com (LCO). Adding new values to this code type is not supported.	No
SASS	Sales Audit Store Status	Contains the valid values for the store status for a store day. The descriptions and visibility to the overall store status is displayed in the mobile application for Sales Audit. Valid values are Worksheet (W), Closed (C), or Fuel Closed (F). Adding new values to this code type is not supported.	No
SAST	Sales Audit Status Codes	Contains the valid values for the status of a transaction - Delete (D), Present (P), or Post-Voided (V). Adding new values to this code type is not supported.	No
SASV	Sales Audit Status Values	Contains the valid values for the statuses for rules and totals - Worksheet (W), Submitted (S), Approved (A), Disabled (DI), Deleted (DE), or All (B). Adding new values to this code type is not supported.	No
SASY	Sales Audit Sales Type	Contains the valid values for sales type sent in the RTLOG for a transaction. Valid values are Regular Sales (R), In-store Customer Order (I), or External Customer Order (E). External customer order refers to an order created in an order management solution, rather than the POS in store. In-store customer orders are for any type of order for a customer taken in a store that does not go through an order management solution, even if it is fulfilled from another store. Adding new values to this code type is not supported.	No
SATA	Sales Audit Transaction Tender Attribute Types	Contains the codes defining other code types that are used to determine the valid values for custom transaction tender attributes. Initially, no codes will be defined from this type outside the standard error code. If you want to define custom transaction tender attributes, then other code types can also be added. These code types would then be added to this code as well.	Yes

Code Type	Code Type Description	Notes	Add New Allowed?
SATC	Sales Audit Totals Category	Contains the valid values for categorizing totals and impacts which realms are available when creating your total. Valid values are Sales (S), Tax (TAX), Over/Short (OS), Transaction Type (TT), Tender Type (TD), or Payment Total (PT). Adding new values to this code type is not supported.	No
SATL	Sales Audit Total Definition Labels	Contains the labels used in the in Totals Maintenance pages used for creating, editing, or viewing totals. Adding new values to this code type is not supported, but labels can be modified as needed for your business.	No
SATT	Sales Audit Tolerance Types	Contains the valid values for tolerance types used as part of rules definition - Amount (A) and Percent (P). Adding new values to this code type is not supported.	No
SATY	Sales Audit Total Types	Contains the valid values for types of totals that can be created - Over/Short (O) or Miscellaneous (M). Adding new values to this code type is not supported.	No
SAUT	Sales Audit Usage Types	Contains the list of usages that can be associated with a total. Most of the usages are related to exporting or reporting. Valid values are Flash Totals Reporting (FLR), Site Fuels Management Sales (SFMS), Site Fuels Management Drive Offs (SFMD), Site Fuels Management Pump Tests (SFMP), UAR Bank Deposits (UARBDP), UAR Money Orders (UARMON), UAR Lottery (UARLOT), UAR Credit Card (UARCRD), Automated Clearing House (ACH), RA Export (RA), General Ledger (GL), IM Export (IM). Adding new values to this code type is not supported.	No
SAVS	Sales Audit Voucher Status	Contains the valid statuses for vouchers that have been issued as part of a transaction and visible in the Voucher Activity report. Valid values are Assigned from HQ to a Store (A), Issued from a Store to a Customer (I), Redeemed by a Customer (R), Escheated to the State/Country (E), or Income Adjustment to Retailer (N). Adding new values to this code type is not supported.	No

Code Type	Code Type Description	Notes	Add New Allowed?
SAXA	Sales Audit Transaction Tax and Item Tax Attribute Types	Contains the codes defining other code types that are used to determine the valid values for custom transaction and item tax attributes. Initially, no codes will be defined from this type outside the standard error code. If you want to define custom transaction and item attributes, then other code types can also be added. These code types would then be added to this code as well.	Yes
SIGN	Positive/Negative number indicator	Contains the valid values for the Value Sign, Rounded Amount Sign, Rounded Off Sign, Quantity Sign, IGTAX Amount Sign, Tax Sign, Tender Sign, and Payment Sign fields in the RTLOG. Valid values are Positive (P) or Negative (N). Adding values to this code is not supported.	No
SRPA	Sales Audit Rule execution based on presence or absence of the rule	Contains the labels used in the Rule Maintenance page indicating whether the Presence (P) or Absence (A) of the conditions defined in the rule constitutes an error. Adding new values to this code type is not supported.	No
SRRT	Sales Audit Rule Realm Types	Contains the values used to categorize realms used in creating rules. Realms can represent a Table (T), View (V), or Total (TOTAL). The other valid value for this code type is All (A). If this value is selected then realms across all types would be displayed to the user creating a rule. Adding new values to this code type is not supported.	No
STCA	Sales Audit Store/Cashier	Indicates the valid options for the level of calculating a total when the system option for Balancing Level is set to Cashier Summary. Valid values are Store (S) or Cashier (C). Adding new values to this code type is not supported.	No
STRG	Sales Audit Store/Register	Indicates the valid options for the level of calculating a total when the system option for Balancing Level is set to Register Summary. Valid values are Store (S) or Register (R). Adding new values to this code type is not supported.	No

Code Type	Code Type Description	Notes	Add New Allowed?
SYSE	Sales Audit System Export Interfaces	Indicates the systems where audited transactions will be exported and is used in the configuration of Totals, Error Codes and Store Data. Valid values are RMS Export (RMS), RA Export (RA), GL Export (GL), SFM Export (SFM), ACH Export (ACH), UAR Export (UAR), IM Export (IM), ORIN Export (ORIN), or SIM Export (SIM). Adding new values to this code type is not supported.	No
SYSI	Sales Audit System Import Interfaces	Indicates the systems where data will be imported from and is used in the configuration of Store Data. Valid values are Sales Import (POS), SFM Import (SFM), UAR Import (UAR), Item Level Tax (IGTAX), or OMS Import (OMS). Adding new values to this code type is not supported.	No
TABS	Sales Audit Form Tabs	Used in the management of error codes to determine where an error is displayed on a transaction. See the Error Codes section of this document for more details. Valid values are Item (I), Tender (T), Exported (E), Tax (TX), Customer (C), Transaction Attributes (TA), or Paid Out Details (P). Adding new values to this code is not supported.	No
TAXC	Sales Audit Tax Codes	Holds the codes of the tax types, such as state tax or city tax, that are used in validating transactions. This is used for both item and transaction level tax. Default values will initially be loaded, but it is expected that these will be updated for your implementation to add codes that are applicable for your business and used by POS and OMS.	Yes
TENT	Sales Audit Tender Type Groups	Holds the valid tender type groups used in the RTLOG and in validation in Sales Audit. These codes must be coordinated with your selling solutions. Valid values are Cash (CASH), Personal Check (CHECK), Credit Card (CCARD), Voucher (gift cert. or credit) (VOUCH), Coupon (COUPON), Money Order (MORDER), Debit Card (DCARD), Drive Off (DRIVEO), Social Assistance (SOCASS), Fonacot (FONCOT), PayPal (PAYPAL), and Others (OTHERS). Adding new values to this code type is not supported, however you can add new tender types to these groups. See the Tender Types section for more information.	No

Code Type	Code Type Description	Notes	Add New Allowed?
TERM	Sales Audit Record Termination Marker	Used in the management of the import process and mostly not visible to end users. It is not intended to be a valid value selected in the audit resolution process. Adding new values to this code is not supported.	No
TOOP	Sales Audit Totals Operation	Contains the valid values for combining totals, used in the totals definition process. Valid values are + or -. Adding new values for this code type is not supported.	No
TOSC	Sales Audit Totals Sources	Indicates how the total will be created - either from Transaction Details (TRN) or from another total using Total Details (TOT). Adding new values for this code type is not supported.	No
TRAS	Sales Audit Sub-transaction Types	Contains the valid sub transaction types that can be used in the RTLOG. Valid values can be found in the Integrating with Selling Solutions section below. Adding new values for this code type is not supported.	No
TRAT	Sales Audit Transaction Types	Contains the valid transaction types that can be used in the RTLOG. Valid values can be found in the Integrating with Selling Solutions section below. Adding new values for this code type is not supported.	No
TRFL	Totals Reference Labels	Indicates the valid options for reference number labels that can be assigned for the roll up values when defining the parameters for a total. By default, the valid values are Ref. No. 1, Ref. No. 2, Ref. No. 3, Dept., and Pump, but these can be configured to work for your business.	Yes
UOWK	Sales Audit Unit of Work	Contains the labels used for the valid values for the Unit of Work system option - Transaction (T) or Store Day (S). Adding new values for this code type is not supported.	No
VOUT	Voucher Types	Contains the labels for the valid types of vouchers - Gift Certificate (GIC) or Voucher (VOU) and used in the Voucher Activity report. Adding new values to this code type is not supported.	No
WEAT	Sales Audit Weather Conditions	Indicates the valid values that can be sent in the RTLOG to indicate the weather conditions for a store day. Used for reporting purposes only. A list will be initially loaded into this code type, but can be configured to work for your business and the data that may be sent from your stores.	Yes

3

Configure Foundation Data

Sales Audit requires a certain amount of foundation data in order to configure totals, rules, and to start auditing transactions. This includes data that it uses from Merchandising and Pricing, as well as foundation data that needs to be configured and maintained in Sales Audit.

Merchandising Dependencies

Sales Audit relies on Merchandising for the following data elements:

- Organizational Hierarchy, including stores and warehouses
- Location Traits
- Banners and Channels
- Suppliers - for the Paid Out - Merchandise Vendor Payment transaction type
- Partners - for expense vendors and banks
- Items - sellable, approved transaction level and reference items
- VAT Codes
- Non-Merchandise Codes - used for Paid Out transactions for merchandise or expense vendors
- Currency Codes

See the "Configure Stores in Merchandising" section for more on configuring stores to use Sales Audit.

Pricing Dependencies

Sales Audit also has a dependency on the Oracle Retail Pricing in order to audit promotions that are included on sales and returns transactions. Only those promotions that are flagged with a discount type of 9999 will be audited against the Pricing data. If you are not using the Pricing or choose to not have Sales Audit validate promotions you can use the discount type 2000 instead of 9999.

Administration Data

Constants

Constants are values that can be used as part of the rules and totals definitions. These optional attributes can be added, updated or deleted as needed through spreadsheet download and upload processes. These processes are accessed through the main Sales Audit task list under **Foundation Data > Data Loading**. To download the sheet, click on Download and select Administration in the Template Type, and Constants in the Template option, then click the Download button and when prompted, choose to either open the .ods

file that is generated or save the file and open it separately in the spreadsheet application of your choice.

Once opened, there will be two sheets that can be modified - Constants and Constant Translations. The Constants tab will show all the existing constants in the system currently. The Constant Translations tab will show existing constants with their translations in other languages, as applicable for your implementation. Both the tabs allow for the addition, deletion and update to existing records.

Create a Constant

To create a new constant, select Create as the action, and then enter a Constant ID of up to 30 characters and a Constant Name of up to 250 characters entered in the primary language. You must also specify the Constant Value and Value Data Type for the constant you defined and whether or not it can be deleted. Select Yes if the constant can be deleted in the future, otherwise select No.

Adding translations for your constant can be done in a similar manner from the Constant Translations tab. This facilitates the ability to translate the constant description in multiple languages. Add one row for each language where a translation is required, using the Constant ID added in the Constants tab.

Update a Constant

If you would like to update any details for a previously defined constant, a similar process will be followed as that described above for creating new constant. First, download the Constants spreadsheet, and then navigate to the record where you would like to make your updates.

The following columns can be updated in each tab:

• Constants - Constant Name, Constant Value, Value Data Type, and Delete
• Constant Translations - Constant Name

In the row where you are going to make your updates, select the action type of Update, and then correct the value in the spreadsheet.

Delete a Constant

If you wish to remove a constant, select the Delete action on the row of the constant you which to delete on the Constants tab. Removing a constant translation can be done in a similar manner on the Constant Translations tab. Note that removing a constant is not allowed if it is in use or if the Delete flag is Yes.

Uploading the Changes

For all actions defined above, once all the updates have been made to the data in the spreadsheet, save the file and close it. Then, return to the Sales Audit screens and select **Foundation Data > Data Loading > Upload** from the main task list. In this screen, select the template type as Administration and the template as Constants. This will generate a process description automatically, but this can be updated if desired. Lastly, select the Browse button and navigate to the directory where you saved the updated spreadsheet.

The status of the changes made can be reviewed under **Data Loading > Review Status**, with the Process Name provided during the upload process.

Error Codes

Error codes provide information to the auditor about the type of error and the remedial action needed to solve the error, thus increasing the effectiveness of the audit process. When setting up audit rules for automated audit process, an error code is associated to the rule. The error code contains an explanation of why the rule failed, as well as a recommended solution. The error code also contains security settings to determine if the error can be overridden.

There are a large number of pre-defined error codes that are automatically created during system set-up. Further retailer-specific error codes can also be defined during implementation if extra codes are required, such as for custom rules. These updates can be made through spreadsheet download and upload processes. This functionality is accessed through the main Sales Audit task list under **Foundation Data > Data Loading**.

To download the sheet, click on Download and select Administration in the Template Type, and Error Messages in the Template option, then click the Download button and when prompted, choose to either open the .ods file that is generated or save the file and open it separately in the spreadsheet application of your choice. Once opened, there will be three sheets that can be modified - Error Codes, Error Codes TL, and Error Impact. The Error Codes tab will show all the existing error codes in the system currently. The Error Translations tab will show existing error codes with their translations in other languages, as applicable for your implementation. The Error Impact sheet will show the impact of the errors on the systems to which Sales Audit exports data to. All the tabs allow for the addition and update to existing records. Deletion of an Error code is not allowed. The 'Used' field can be modified as per the requirement to stop the usage of an error message.

Create an Error Code

To create a new error code, navigate to a blank row in the spreadsheet and select Create as the Action. Then, enter a code in the Error column of up to 25 characters, a Description for the error of up to 255 characters and a Short Description of up to 40 characters, both in your primary language. Indicate the area the error is related to in the Form column and, if you've chosen Transaction Detail as the Form, you can also specify the Tab, which will determine which section of the transaction detail the error will be used. Next, enter the Recommended Solution that should be performed in order to resolve the error. This should also be entered in the primary language and can be up to 255 characters. All custom added error codes should be added as System Required No, but you can choose whether or not they can be overridden in the HQ Override column. Select the Used as Yes to indicate that the error code is valid for your implementation (selecting No will hide the error).

If you wish to add translations for the error code in languages other than the primary language, this can be done in the Error Codes TL tab. Navigate to a blank row and select the action type of Create and the language in which the translated description will be entered. Then, enter the error code for which the translation applies. Finally, enter the translated description, short description, and recommended solution. The translated description can also be up to 255 characters long for the description and recommended solution, and up to 40 characters for the short description. This is an optional step.

Lastly, in the Error Impact tab, navigate to a blank row, and then select Create as the Action and enter the Error code you created. Next, select the System where data will be exported from the list of suggested values and System Required as Yes or No depending on whether the presence of the error would restrict the export of the data to the corresponding system. Select the Used as Yes to indicate that the error code is valid for your implementation.

Update an Error Code

If you would like to update any details for existing error codes, a similar process will be followed as that described above for creating new error codes. First, download the spreadsheet, and then navigate to the record where you would like to make your updates. To update/modify an existing record, the corresponding record needs to be updated with the required change.

The following columns can be updated in each tab:

- Error Codes - Description, Short Description, Form, Tab, Recommended Solution, System Required, HQ Override, and Used
- Error Codes TL - Description, Recommended Description, Short Description
- Error Impact - System Required, Used

In the tab where you are going to make your updates, select the action type of Update, and then correct the value in the spreadsheet.

Uploading the Changes

For all actions defined above, once all the updates have been made to the data in the spreadsheet, save the file and close it. Then, return to the Sales Audit screens and select **Foundation Data > Data Loading > Upload** from the main task list. In this screen, select the template type as Administration and the template as Error Messages. This will generate a process description automatically, but this can be updated if desired. Lastly, select the Browse button and navigate to the directory where you saved the updated spreadsheet.

The status of the changes made can be reviewed under **Data Loading > Review Status**, with the Process Name provided during the upload process.

Reference Fields

Transactions in Sales Audit include a number of specific attributes of a transaction at the header and detail levels. In addition to these, there are a number of reference fields that can be used, where additional details can be captured for the transactions, as required for your business. Reference fields are available for the header, item, discount, item tax, transaction tax, and tender levels.

Table 3-1

Transaction Level	Reference Numbers
Header	1-4, 25-31
Item	5-8
Tender	9-12
Discount	13-16
Transaction Tax	17-20
Item Tax	21-24

They can be configured by transaction, transaction/sub-transaction, or transaction/sub-transaction/reason code. Configuration of reference fields is done through a spreadsheet download and upload processes, which is accessed through the main

Sales Audit task list under **Foundation Data > Data Loading > Download** and **Foundation Data > Data Loading > Upload**.

To modify reference field configurations, select the template type of Administration from the Download Data screen and then the template Reference Fields. Click the Download button and when prompted, choose to either open the .ods file that is generated or save the file and open it separately in the spreadsheet application of your choice.

Once opened, there will be one sheet that can be modified - Reference Field. This will show all the existing references number configurations by transaction type and sub-transaction type. This tab allows for the deletion of existing reference configurations or the addition of new configurations.

Create a Reference Field

To add a new reference configuration, start in a blank line in the template and select an action of Create. Then, select or enter the transaction type, sub-transaction type and reason code that you wish to configure, as appropriate. Then, select which reference number you want to configure and the label for the reference. The valid label descriptions are found in code type REFL. See "Sales Audit Codes and Descriptions" for more details on configuring the label descriptions. Once all new reference configurations have been defined, save and close the spreadsheet.

Update a Reference Field

If you would like to update an existing reference configuration, a similar process will be followed as that described above for creating new configurations. The following columns can be updated:

*   Reference Number
*   Reference Label

Select the action type of Update, and then correct the value in the spreadsheet. Once your updates are complete, save and close the spreadsheet.

Delete a Reference Field

If you wish to delete a reference configuration because it is not used by your business, select Delete as the action, and leave the other fields unchanged. Save and close the sheet.

Uploading the Changes

For all actions defined above, once all the updates have been made to the data in the spreadsheet, save the file and close it. Then, return to the Sales Audit screens and select Foundation **Data > Data Loading > Upload** from the main task list. In this screen, select the template type as Administration and the template as Reference Fields. This will generate a process description automatically, but this can be updated if desired. Lastly, select the Browse button and navigate to the directory where you saved the updated spreadsheet.

The status of the changes made can be reviewed under **Data Loading > Review Status**, with the Process Name provided during the upload process.

Finance Administration

G/L Cross Reference

An important function of Sales Audit is the integration of totals to the General Ledger. To support this function, a mapping must be done in order to configure which accounts the totals should be mapped to in the General Ledger. From a Sales Audit perspective, the source data has the following data elements that identify what the information is from a retail perspective: store, total ID, set of books, and roll-up levels. Each combination of those data elements will need to be mapped to a set of GL accounts segments for both a debit and a credit. How many segments need values and what those values are will depend on how the GL has been setup.

While a record should exist for every combination of retail data elements where you expect transactions to exist, the mapping can be done at a higher level. If for example, all stores for a total will have the same mappings, then rather than set up a record for each store, a single record for the total can be entered with "-1" for the store. Using -1 can be done for store, total, and each of the three rollup levels.

This mapping is done through a spreadsheet download and upload processes, which is accessed through the main Sales Audit task list under Foundation Data > Data Loading. To download the sheet, click on the Download option and then select Finance Administration as the Template Type and GL Cross Reference as the Template. Optionally you can choose to filter your results based on store or total. Then, click the Download button and, when prompted, choose to either open the .ods file that is generated or save the file and open it separately in the spreadsheet application of your choice. Once opened, there will be one sheet in the document. The SA GL Cross Reference tab will show all the existing mappings.

Create a GL Cross Reference

To add a new GL cross reference record, navigate to a blank row in the worksheet and select the action type of Create. Next, enter the Store, Total ID, Roll-up Level 1-3, and Set of Books for the mapping. Values will also need to be added in the Debit Account and Credit Account fields, and depending on the number of GL segments being used, values will also need to be entered into the Debit Segment and Credit Segment fields.

Update a GL Cross Reference

If you would like to update an existing reference configuration, a similar process will be followed as that described above for creating new configurations. The following columns can be updated:

- Debit and credit accounts
- Debit and credit sequences

Select the action type of Update, and then correct the value in the spreadsheet. Once your updates are complete, save and close the spreadsheet.

Delete a GL Cross Reference

If you wish to delete a mapping because it is not used by your business, select Delete as the action, and leave the other fields unchanged. Save and close the sheet.

Uploading Changes

For all actions defined above, once all the updates have been made to the data in the spreadsheet, save the file and close it. Then, return to the Sales Audit screens and

select **Foundation Data > Data Loading > Upload** from the main task list. In this screen, select the template type as Finance Administration and the template as GL Cross Reference. This will generate a process description automatically, but this can be updated if desired. Lastly, select the Browse button and navigate to the directory where you saved the updated spreadsheet.

The status of the changes made can be reviewed under **Data Loading > Review Status**, with the Process Name provided during the upload process.

Tender Types

Sales Audit provides a set of tender types as part of the initial installation, but it is expected that you will configure them as appropriate for your business. Tenders are used for validation during the import process, and also during the manual creation/update of transactions from the UI. It is important to coordinate the tenders configured in Sales Audit with those used in your selling solutions, such as POS and OMS.

Sales Audit allows new tender types to be created, and existing records to be updated through spreadsheet download and upload processes accessed through the main Sales Audit task list under **Foundation Data > Data Loading**. To download the sheet, click on Download and select Finance Administration in the Template Type, and Tender Types in the Template option. Then, click the Download button and when prompted, choose to either open the .ods file that is generated or save the file and open it separately in the spreadsheet application of your choice. Once opened, there will be two sheets that can be modified - Tender Type and Tender Type Translations. The Tender Type will show all the existing tenders in the system currently. This tab does not allow for the deletion of existing tender types. The Tender Type Translations tab will show existing tenders with their translations in other languages, as applicable for your implementation.

Create a Tender Type

To add a new tender type, navigate to a blank row in the Tender Type tab and select the action type of Create. Next, enter an ID for your tender type of up to 6 characters and a description in the primary language of up to 120 characters. Then, select which tender group the new tender belongs to. Tender groups are managed on the Merchandising codes table under code type TENT, and adding new tender groups is not supported, but the valid groups can be configured to display only those appropriate for your business. See the "Sales Audit Codes and Descriptions" chapter for information on configuring this list. Next enter an effective date in the DD-MON-YYYY format for the tender type and indicate whether or not you want it to be used. The effective date must be today or later. For a new tender type the Used column will usually be Y, otherwise set to N.

If you wish to add translations in a language other than the primary language for this tender type, then in the Tender Type Translations tab, navigate to a blank row and select the action type of Create. Next, select the language for the translation, enter the ID for your tender type, and then the translated description.

Update a Tender Type

If you would like to update a tender type, a similar process will be followed as that described above for creating new tender types. The following columns can be updated in each tab:

- Tender Type - Tender Type Description, Tender Type Group, Effective Date, Used
- Tender Type Translations - Tender Type Description

Select the action type of Update, and then correct the value in the spreadsheet. Once your updates are complete, save and close the spreadsheet.

> **Note:**
>
> The tender types cannot be deleted through this process. The Effective Date or Used flag can be modified to stop the usage of a tender type.

Uploading the Changes

For all actions defined above, once all the updates have been made to the data in the spreadsheet, save the file and close it. Then, return to the Sales Audit screens and select **Foundation Data > Data Loading > Upload** from the main task list. In this screen, select the template type as Finance Administration and the template as Tender Types. This will generate a process description automatically, but this can be updated if desired. Lastly, select the Browse button and navigate to the directory where you saved the updated spreadsheet.

The status of the changes made can be reviewed under **Data Loading > Review Status**, with the Process Name provided during the upload process.

Other Foundation Data

Employees

Auditors in Sales Audit need to be associated to locations based on location traits defined in Merchandising. This association drives the accessibility of the auditors to the locations while managing the audit process on the different screens of the application. Sales Audit provides a screen to perform this setup which can be navigated under **Foundation Data > Application Administration > Employees**. Through this screen an administrator can add/modify the association of employees to locations. For more information on configuring employees, see Manage Employees in the *Oracle Retail Sales Audit Foundation Data User Guide*.

Escheat Options

Escheatment is the optional process of forwarding monies of outstanding, non-expiring vouchers to the proper government authorities (state or country) after a defined period of time from the date of issuance. Some government authorities require that unredeemed vouchers be escheated after a specific period of time has passed. When a voucher is escheated, an invoice is generated that initiates payment of the escheated voucher amount to the government authority. The government authorities then attempt to locate the consumers owed the monies. To accommodate Escheatment, a new total should be added to Sales Audit to create escheatment totals. Sales Audit automatically totals sales transactions based on calculation definitions set up for the total.

Sales Audit provides a table to define the individual state or country's escheat rules. For every country or state the funds escheat to, associated partners can be setup with the below indicators:

- **Store:** Indicates whether or not the partner escheats monies to the state for the store where the voucher was issued during escheatment. Valid values are Y or N.

- **Customer:** Indicates whether or not the partner escheats monies to the state for the customer the document was issued to during escheatment. Valid values are Y or N.

- **Recipient:** Indicates whether or not the partner escheats monies to the state for the recipient of the voucher during escheatment. Valid values are Y or N.

- **Headquarters:** Indicates whether or not the partner escheats monies to the state for your headquarters where the voucher was issued during escheatment. Valid values are Y or N.

> **Note:**
>
> There is not currently a screen for managing this information in Sales Audit. If you wish to utilize this functionality, an SR will need to be logged to load or modify the data.

4

Configure Stores

For Sales Audit to import transactions from selling solutions, such as POS or OMS, stores need to be configured such that Sales Audit knows what data to expect, when to expect it, and where to export it after the audit is complete.

Configure Stores in Merchandising

Within Merchandising, there are two attributes of the store setup that are used by Sales Audit processing.

Integrated Sales

This store attribute determines whether an RTLOG file is expected for a store. This should be used for both your physical stores where POS would send the files, as well as the stores that represent your e-commerce sites where files will be sent from OMS. If so, then the Integrated Sales checkbox should be checked for the store. If not, it should be left unchecked.

Unique Transaction Number

This attribute determines whether transaction numbers will be unique by store or by register for the store. Valid values are Store or Register.

Online Store Indicator

This attribute indicates whether the Store is an Online store. It is used in conjunction with the Create Store Days Prior system option to create store days in advance for an online store. It is also referenced by the saimptlogfin batch to automatically close open store days for online stores that correspond to a day prior to the current vdate.

Store Data Configuration

Every store from which you expect transaction logs or for whom Sales Audit will export data will need to be configured as part of the foundational setup. The configuration allows you to specify which types of data will be imported and what systems should have exports created by store. This configuration needs to be made before executing the import and export batches.

The transactions imported into Sales Audit have respective transaction numbers assigned from POS or OMS. During the import process, the transactions are identified with the associated transaction numbers. The range of transaction numbers that are expected to be generated from POS or OMS can be configured in Sales Audit, so that during the import process, the transactions that are not in the range will not be imported into Sales Audit.

The above- mentioned configurations can be made through spreadsheet download and upload processes. These processes are accessed through the main Sales Audit task list under Foundation Data > Data Loading. To download the sheet, click on Download and select Administration in the Template Type, and Store Data in the Template option. Then, click the Download button and when prompted, choose to either open the .ods file that is generated or save the file and open it separately in the spreadsheet application of your choice.

Once opened, there will be two sheets in the document - Store Data and Store POS. The Store Data tab will show all the existing stores that have been configured with the systems they export the data to or what data is imported. The tab allows the addition of new records and deletion of existing records. Update of an existing setup is not allowed. In addition to Data that is being imported and exported, Store Data also serves as a reference for key store configuration details such as:

- Whether the store reports taxes at the Item Level
- Whether the store imports data via REST service or via RTLOG upload
- Whether Currency rounding should be applied during sales import

The Store POS tab will show the range of transaction numbers setup for stores by POS type. This tab allows the addition of new records, as well as the update and deletion of existing records.

Create a Record

To create a new Store Data record, navigate to a blank row in the Store Data tab of the spreadsheet and then select Create as the Action. Enter the store number that you want to create import and export configurations for and then select the appropriate System from the dropdown. Finally, indicate if it is an Import or Export. Continue adding rows until all the imports and exports have been defined for the store.

To create a new Store POS record, navigate to a blank row in the Store POS tab of the spreadsheet and then select Create as the Action. Enter the store number that you want to create transaction number configurations for and enter the POS type. Then, enter the range of transaction numbers that are expected to be imported for the store for that POS type.

Delete a Record

To delete an existing record, navigate to the row in the respective sheet, which needs to be deleted and select Delete as the Action. Repeat for all rows and sheets, as required.

Uploading the Changes

For all actions defined above, once all the updates have been made to the data in the spreadsheets, save the file and close it. Then, return to the Sales Audit screens and select **Foundation Data > Data Loading > Upload** from the main task list. In this screen, select the template type as Administration and the template as Store Data. This will generate a process description automatically, but this can be updated if desired. Lastly, select the Browse button and navigate to the directory where you saved the updated spreadsheet.

The status of the changes made can be reviewed under **Data Loading > Review Status**, with the Process Name provided during the upload process.

Location Closings

Location Closings provides for a way to indicate if specific stores and warehouses will be closed for sales, shipping, and/or receiving on a defined date. For example, if a location close date is defined for December 25th for sales it would not be expected that any sales are processed on this date. Sales Audit uses the close dates to determine whether or not to create a store/day for a given store and date.

All of these updates are done through a spreadsheet download and upload processes, which are accessed through the main Sales Audit task list under Foundation Data > Data Loading > Download and Foundation Data > Data Loading > Upload.

To modify location closing dates, select the Template Type as Administration on the screen and then the Template as Location Closings. Select the required dates and the store for which the sheet needs to be downloaded for new record creation or changes. Click the Download button and when prompted, choose to either open the .ods file that is generated or save the file and open it separately in the spreadsheet application of your choice.

Once opened, there will be two sheets that can be modified - Location Closings and Location Closings Translations. The Location Closings will show all the existing closing dates in the system currently, by location and with a reason in the primary language. This tab also allows for the deletion of existing closing dates or the addition of new closing dates. The Location Closings Translations tab will show existing closing dates with their translated reasons in other languages, as applicable for your implementation. This tab allows for the addition of new rows, removal of existing rows, and update to existing.

Adding a Location Close Date

To add a new close date, start in the Location Closings tab and in a blank line in the template, select the action type of Create and enter the date, in the DD-MON-YYYY format, for the new close date you wish to add, select a location type as Store or Warehouse, enter a location ID, and provide a reason for the close date (e.g. Christmas Day). The reason should be entered in the primary language as configured in the Merchandising system options and can be up to 120 characters. Additionally, select Yes or No in the Sales, Shipping, and Receiving columns to indicate if the location is closed for that particular business activity. A value of Yes indicates it is closed.

To define alternate translated reasons for this date, navigate to the Location Closings Translations tab. Select a language and enter the same location and date used on the Location Closings tab in the Location and Close Date columns respectively of this tab and then enter the reason in the Reason column. It is not required that translated reasons be defined.

Updating a Location Close Date

If you would like to update any details a similar process will be followed as that described above for creating new location closing dates. First, download the Location Closings spreadsheet, and then navigate to the tab where you would like to make your updates. The following columns can be updated in each tab:

- Location Closings - Reason, Sales, Shipping, Receiving
- Location Closing Translations - Reason

In the tab where you are going to make your updates, select the action type of Update, and then correct the value in the spreadsheet. Once your updates are complete, save and close the spreadsheet.

Deleting a Location Close Date

If you wish to delete a location close date because it is no longer applicable, update the action column to select Delete in each of the tabs where it occurs. This applies to all tabs and, if deleting a location close date, all of the corresponding translation rows must also be marked for delete.

Uploading the Changes

For all actions defined above, once all the updates have been made to the data in the spreadsheet, save the file and close it. Then, return to the Sales Audit screens and select **Foundation Data > Data Loading > Upload** from the main task list. In this screen, select the template type as Administration and the template as Store Data. This will generate a process description automatically, but this can be updated if desired. Lastly, select the Browse button and navigate to the directory where you saved the updated spreadsheet.

The status of the changes made can be reviewed under **Data Loading > Review Status**, with the Process Name provided during the upload process.

Bank Stores

Bank/store relationships and bank attributes can be maintained in Sales Audit in order to support exports to automated clearing houses (ACH) and universal account reconciliation (UAR) systems. This is an optional configuration that is only required if you are exporting to either of these systems.

For more on configuring bank/store relationships, see the *Oracle Retail Sales Audit Foundation Data User Guide*.

5

Configuring Totals and Audit Rules

Totals and audit rules are two functions in Sales Audit that allow you to configure the auditing process specifically for your business. Totals are the summation or count of two or more entities based on activities that occur in your selling solutions, whereas rules can be based on totals or raw data and provide a way for you to add additional validations to be used when auditing transactions or a store day over and above what is part of the base Sales Audit processes.

Totals

Totals can come from the selling solutions themselves, under the transaction type POS declared totals, or can be based on Sales Audit data. Within Sales Audit, totals are used for evaluating and consolidating data, performing store balancing, over/short analysis, and can be used as part of audit rule definitions. Totals are also used to create data for external systems, such as the General Ledger. The systems that a total is exported to is configured as part of the total definition, where appropriate.

Totals can be calculated based on raw transaction data or can be based on another total. For example, you may have totals for each tender type in the tender group Credit Card and then another total that combines each of those totals for total credit card transactions in a store day.

Totals are grouped into categories that determine the details that can be included in the calculation and how it is displayed for a store day in Sales Audit. Below are the different categories for totals and a common example for each type.

Sales

Generally, totals in this category are used to total sales by register or cashier to be used in either reporting or an audit rule's definition. Sales totals are not typically interfaced to external systems, like the General Ledger, from Sales Audit, as Merchandising is responsible for that communication in order to incorporate cost of sales, along with the retail value.

Tax

Tax category totals are used to summarize the item or transaction level tax information for a store day to be used in communicating to the General Ledger or to a government reporting agency.

Transaction Type

This type of total is usually created for use in audit rules. An example of a total for this category might be a count of No Sale transactions for a store day. Then the audit rule could look for cases where the count of No Sale transactions for a store day exceeded a certain threshold and raise an error, if that situation is found.

Tender Type

Tender type category totals are generally used to create the components used in an the Over/ Short type totals. For example, it could be used to create a total for a specific tender type

(Personal Check) that is either sourced from the selling solution or Sales Audit. These totals are also commonly used to integrate the tender information to the General Ledger.

Payment Total

This type of total is generally related to payment for customer orders where a liability is incurred due to taking money from the customer prior to shipping their order. An example would be totaling payment for transactions with an item status of Order Initiate (ORI) in order to map that liability to the General Ledger.

Over/Short

This type of total is usually used for summarizing tender type totals across tender types so that they can be compared to declared totals from the store. Totals in this category are not typically integrated to the General Ledger, but are used for store day processing in Sales Audit.

Although no totals are initially loaded into Sales Audit, there are two totals that are expected to be created in this category - Store-level Over/Short (OVRSHT_S) and Balance-level Over/Short (OVRSHT_B). The latter should be based on either register or cashier level - depending on how you have the Balancing Level system option set. Although the description for the total can be anything, the total ID needs to be the two noted above. These totals are used in two ways - in the Over/Short Summary dashboard report, as well as to display the Register (Cashier) Over/Short amount on the Register (Cashier) Summary page and the store level over/short total on the Store Day Summary page.

These two mandatory totals are generally created based on other totals. For example, for the Over/Short Store total, you could start by creating two store-level totals for each tender type - one for the store declared totals of that tender type and one for the Sales Audit calculated total for the tender type. Then, use each of those individual totals to create the over/short total for the store by adding all the store declared values and subtracting the Sales Audit calculated values.

Frequently Asked Questions

What is the difference between a Total and an Audit Rule?

Totals can either come from the POS or other external systems through the RTLOG. Sales Audit can also calculate the total itself based on raw transaction data or existing totals. Totals are used in performing store balancing (over/short), analysis within Sales Audit, and exporting.

Audit Rules are a set of rules defined to detect any error or exception in the data imported from external systems. Based on the given conditions if a rule fails, Sales Audit generates an exception. As part of the audit rule definition, you will define if the error can be overridden, as well as what systems the error impacts. This system impact prevents a bottleneck in the export process by only prohibiting the export of transactions and totals to the systems defined in the system impact. Even if the transaction or total is in error, Sales Audit still exports the data to systems not defined in the system impact for the given error.

When defining a total, how is the answer to the "Is this total a component of the Over/ Short or Miscellaneous total?" question used?

This is only used to define the tab that displays the total for a store day, Over/Short or Miscellaneous Totals. Usually those defined as Over/Short Totals are used to perform tender balancing for stores.

When defining a total how is the answer to the "Does this total correspond to a value in RTLOG?" question used?

If this is set to Yes, it indicates the total is expected from your selling solutions, such as a declared tender total. These totals will appear in the RTLOG Reported column in the Accountable For or Accounted for tables for a store day. If this is set to No, it indicates that it is a Sales Audit calculated value based on either raw data or existing totals. These will be displayed in the System Reported column.

How is the Display Group used as part of the total definition?

The Display Group defines in what order the total is displayed within the selected Total Category. Clicking on the Details button displays all other totals that are defined for the total category along with their selected display order. This will provide visibility to where the new total you are defining will be shown amongst previously defined totals for the same category. All totals are displayed in the Store Day Summary screen on either the Over/Short tab or the Miscellaneous Totals tab, based on the total definitions.

What is the difference between Accounted For and Accountable For?

Accounted For totals represent what is physically counted in the till, for example total cash on hand, total checks, and so on. Accountable For totals represent what should be in the till based on the day's activity. These totals can either come from the RTLOG or Sales Audit calculations. This is applicable only for Over/Short type totals. The difference between the summed Accounted For and the summed Accountable For totals represent the trial over/short value for a store/day.

What is the impact on store days when a total is edited?

If you make any changes and re-approve the total, then all the store days that fall in the total date range will get re-audited. Only totals in Approved status are used during the store day audit process.

Audit Rules

Audit rules are a way for you to configure additional validation by store day or at any level of the transaction that is specific for your business. For example, you could create a rule that flags an excessive number of return transactions for a particular cashier by store day - with the number that is considered excessive specific for your business or a subset of your stores.

Audit rules run on transaction data and totals during the automated and interactive audit processes. When a rule is broken, an exception error is thrown that must be corrected or overwritten by the auditor. Only after resolving the errors, can the store day be audited, which can be a prerequisite for the transactional data to be exported to dependent systems like Merchandising or the General Ledger.

Creating your own audit rules is an optional step and should be added only where needed for your business requirements. They can be defined to be evaluated at the store or register/ cashier level (depending on the Balancing Level defined in system options), and can be

applied to any level of the transaction or at the store day level. As part of the audit rule definition process, you are essentially building a query to do the validation. This query can look at the key Sales Audit tables and views, as well as some tables in Merchandising. As previously mentioned, it can also be based on a total. A rule can be applied to all stores or a subset through the use of location traits.

Each rule can be assigned one or more error codes to help guide the auditor through the resolution process when the error occurs. If you want to define your own error codes to use for a rule, you would do this using the spreadsheet upload process described in the Error Codes section.

For more information on creating totals and audit rules, see the *Oracle Retail Sales Audit Foundation Data User Guide*.

6

Customer Ordering

This section contains details related to the processing of customer orders through Sales Audit. For additional information on customer ordering in Merchandising and Sales Audit, see the Customer Order Journeys white paper (Doc ID 1585843.1) and the Merchandising and SIM Integration with OMS and OB white paper (Doc ID 2088235.1).

Order Management Sales and Returns

Customer Order sales and returns processed through an Order Management System (OMS) will look and behave much like regular sales in a store, but with some key differences pointed out below. It should be noted that for some of the RTLOG attributes, this could be either the POS or OMS sending these details, depending on whether the order is captured in the store or online, and whether the fulfillment of the order is based on store pickup or shipment from a store or other location.

Transactions related to customer will be processed through the RTLOG as transactions with the transaction type of Sale. Additional transaction item-level codes are used to indicate the specific actions that should be applied to the transaction when it is process by Merchandising, as noted below:

Item Status Codes

This status is used for customer orders related transactions. For customer orders, there are several different statuses used:

- **Order Initiate** (code ORI) - used to indicate that an order for the item was taken and that tender was collected for the ordered item, thereby representing a financial liability since the item has not yet been fulfilled (delivered or picked up). If tender is not collected there is no need to communicate the order initiation to Sales Audit since the purpose of it is to communicate the financial liability through to the General Ledger.

- **Order Cancel** (code ORC) - used to reverse the financial liability created through the order initiation in the case where an order resulting in a financial liability is canceled. If the Order Initiate code is not used cancellations do not need to be communicated to Sales Audit.

- **Order Complete** (code ORD) - used to communicate that the order/line item fulfillment has been completed - delivered or picked up. The result is a completed sale which will also offset the financial liability created by the Order Initiate code, if used.

- **Adjustment/Appeasement** (code ADJ) - used to communicate a price adjustment for the order/line item. When using this status type, it should be used for a transaction type of SALE, but at the item level the details in the file are a bit different from the other statuses above.

Table 6-1

TITEM	
Sales Type	E

Table 6-1   (Cont.)

Quantity Sign	This should always be N for this type of transaction; appeasements cannot increase the original unit retail.
Quantity	Quantity of the item being adjusted
Unit Retail	The absolute value of the adjustment amount without tax.
Original Retail	Price the customer originally paid for a single unit. For example, if the selling price of the item is $250 and the customer received a $10 discount on the original sale, then this should be $240 (250-10).
Override Reason	Reason code from OMS (for OROMS it will always be "OMS")
Total IGTAX Amount	Absolute value of the total taxes for all IGTAX rows for this item.
IGTAX	
IGTAX Code	This is always hardcoded to TOTAX in OMS integration
IGTAX Rate	This is always left blank in OMS integration
IGTAX Amount Sign	Should only be N for this type of transaction
IGTAX Amount	Absolute value of the tax on the extended adjustment retail (qty * unit retail).
TTEND	
Tender Type Group	Value used to reimburse the customer
Tender Type ID	Value used to reimburse the customer
Tender Sign	Should only be N for this type of transaction
Tender Amount	Absolute value of the amount for which the customer was reimbursed.

When Sales Audit processes this transaction, it will audit it for the details above. Balancing for this new equation should be similar to other transactions and should be (quantity * unit retail) + tax = tender.

When exporting the details to Merchandising and Retail Insights for sales processing, it will do the following:

1. Create a negative sale transaction to reverse the original transaction processed. This sales transaction should be based on the original retail value.

2. Create a sale transaction based on the new retail price, which will be calculated as original retail - unit retail.

When Merchandising processes these transactions, it should process the first as a full reversal of the sale (not a return) - similar to when a sales audit sends a negative sale based on a revision. This means posting of sales, tax, markdown, and any other relevant transactions in tran data as negative values. Also, if the Account for the Sale setting for Merchandising is set to Order Location instead of Fulfillment Location, then the book transfer created originally will also be reversed by writing negative tran code 31/33 records. The second transaction should be posted as a normal sale.

Other notes:

–   TTAX, if included, should be a summary of the IGTAX lines on the transaction, including the ADJ line items. If IGTAX is not sent or used (as with a non-OROMS integration) then the ADJ line would still be expected to contribute a negative tax value to the overall tax calculation.

- IDISC, TPYMT should never be included for this type of transaction.

To communicate the liability or the alleviation of the liability to the General Ledger, totals can be built using these status codes. For more on creating totals, see the Configuring Totals and Audit Rules section of this document.

Order Numbers

In addition to the above codes the Customer Order and Fulfillment Orders numbers are communicated to Sales Audit at the transaction/item level of the RTLOG. The Customer Order number represents the master order identifier that ties back to the order the customer created while the Fulfillment Order number represents each unique fulfillment order as defined by the fulfillment location and method. Sales Audit does not validate these numbers so they are only included for traceability and cross reference.

Fulfillment Location Type and Location

Sales and returns processed through an OMS and communicated to Sales Audit via the RTLOG will usually be fulfilled from multiple different stores and warehouses in a particular day. The fulfillment location type and location are used to communicate the location where the customer order was fulfilled, while the store in the file header will be the virtual store representing your ecommerce site. The fulfillment location type will be either store (ST), warehouse (WH), or supplier (SU) and the fulfillment location will contain the store, warehouse, or supplier ID where the fulfillment of the order occurred. If the fulfillment type is not present in the RTLOG, such as in the case of POS processed customer orders, the store in the header of the RTLOG file will be used as the fulfillment location for sales processing.

Sales Type

The RTLOG file contains an attribute for specifying the sales type of the item on the transaction. For orders processed through an order management system the sales type should be External Customer Order (code E). The In-Store Customer Order (code I) is used for orders taken and fulfilled within the store that do not involve an order management system for fulfillment, such as an order taken at the POS and picked up at the same store at a later date. Regular POS transactions will utilize the Regular Sales sales type (code R).

Warehouse Returns

Returns of customer orders processed at a warehouse are communicated to the OMS and then in turn, communicated to Sales Audit. Like customer order sales fulfilled from the warehouse, returns are processed through a virtual store location and communicated to Sales Audit in the RTLOG. The following RTLOG attributes are used to support this process:

- **Returns Warehouse** - should contain the warehouse where the return occurred; this could be a physical or virtual warehouse.

- **Return Disposition** - indicates whether the returned item can be returned to sellable stock or whether it should be set aside as non-sellable stock; this is optional.

- **No Inventory Return** - indicates if there is no physical product returned, as would be the case if the customer was instructed to just dispose of the item instead of shipping it back to the warehouse. If a return is flagged as a no inventory the return will be processed into the warehouse and then subsequently be adjusted out of inventory.

> **Note:**
>
> Return disposition and no inventory returns are supported only for warehouse returns. Store returns sent from POS would always be returned into available inventory with any subsequent move to unavailable or write off occurring in the store inventory management solution, like Oracle Retail Store Inventory and Operations Cloud Service (SIOCS).

Transaction Filtering

Sales Audit has the ability to filter certain transactions to avoid double processing transactions in cases where the same transaction is communicated from both the OMS and POS systems. The transaction filter logic uses the following attributes in the RTLOG to determine which transaction to process and which to ignore:

- **RTLOG Originating System** - valid values are OMS and POS. This is defined at the RTLOG file level as it represents the system from where the particular file originated.

- **Transaction Processing System** - valid values are OMS and POS. This is defined at the RTLOG transaction header level so the value can be varied by transaction.

An example of how this filter could be used is for a customer order that is fulfilled through store pickup using POS. When the pickup occurs, POS will communicate the pickup transaction to Sales Audit, but you may not want to recognize this as a sale until this order is processed by the OMS, for example if OMS has the payment information related to the transaction. In this example the RTLOG Originating System for the pickup transaction from the POS will be "POS" and the Transaction Processing System on the transaction should be sent as "OMS". The transaction sent by the OMS should have the value "OMS" for both attributes. Sales Audit will filter the POS transaction because the originating system and processing system do not match and it will process the OMS transaction because they do.

Managing Customer Information

A system option controls whether Sales Audit is the system of record for customer information associated with customer orders or other POS transactions. If Sales Audit is the system of record, any information that the customer provided at the time the order was created or at the time the transaction occurred will be stored in the respective Sales Audit tables. If not, then Sales Audit will only store customer identifiers on the tables, and any required fields on the tables will contain generic default values (for example, XXXX). These customer identifiers may be used to request the customer information from a third-party order management system or customer system that holds the complete customer information.

Balancing Customer Order Transactions

When balancing transactions that contain line items using the item statuses Order Initiate (ORI), Order Complete (ORD), or Order Cancel (ORC), there are some differences from regular sales transactions, as the extended item retail value for items of this status will always be 0. The balancing equation used is as follows:

Balance = Tender - (Payment + Item Total + Tax Total)

The below images show an example of what this might look like in a transaction.

Layaway

Sales Audit's layaway functionality gives customers the option to pay for an item that is currently in stock at a store in installments, and then pick it up at a later date. When these types of transactions are processed in Sales Audit, there are two key things that occur - an inventory reservation transaction is sent to Merchandising to reserve the item (the item is moved to a Customer Order Reserved inventory bucket) if the system option for Inventory Reservation - For Layaway is Y. The payment information is also recorded for tracking the liability. When the item is eventually picked up, the reservation is released and the sale is

processed. This functionality leverages item level statuses to indicate the updates that should be made. The statuses used are:

- Layaway Initiate (LIN) - using this status indicates a new layaway is being initiated and triggers a reservation in Merchandising.

- Layaway Complete (LCO) - using this status indicates the customer has completed the payment schedule for their item and has picked it up. This will process the sale for the item and release the reservation in Merchandising.

- Layaway Cancel (LCA) - this indicates that the customer has changed their mind about the layaway item and that the reservation should be cancelled and their payments have been reimbursed.

The below example illustrates how these statuses are used, as well as how interim payments between initiation and pickup would be handled.

1. The customer goes to the store and ask for a layaway of Item A that costs $500 and pays a deposit of $200.

    - Transaction Type = SALE

    - Sub-Transaction Type = Initiate Layaway (LAYINT)

    - Payment = $200

    - Item Status = Layaway Initiate (LIN)

    - Customer order reserved is updated in Merchandising for the item/store.

2. One week later the customer goes to the store and pays another $150 for the Item A.

    - Transaction Type = SALE

    - Sub-Transaction Type = Layaway Payment (LAYPAY)

    - Payment = $150

    - No item details on transaction

3. The customer pays the remaining $150 for the Item A and the sale is complete.

    - Transaction Type = SALE

    - Sub-Transaction Type = Complete Layaway (LAYCMP)

    - Payment = $150

    - Item Status = Layaway Complete (LCO)

    - Customer order reserved is decremented in Merchandising for the item/store and the sale for the item is processed.

7

Globalization

Translation

Sales Audit supports operating the user interface in 19 languages, including English. As part of the install options for Merchandising, you'll designate one language as "primary". This primary language is used by Sales Audit as well and determines how labels and data are displayed by default to users, what is held in the base tables for data entities, and what is used in integration to other systems. The primary language is also what is loaded as a default for all screen labels, error messages, and seeded data at the time of installation. By default, only the primary language is loaded in Sales Audit, but if you wish to have more languages loaded, then you can request to have the language strings loaded for these languages as well.

In addition to English, the languages that can be supported in the user interface include:

- Arabic
- Chinese (simplified)
- Chinese (traditional)
- Croatian
- Dutch
- French
- German
- Greek
- Hungarian
- Italian
- Japanese
- Korean
- Polish
- Portuguese
- Russian
- Spanish
- Swedish
- Turkish

This means that all screen labels, error messages, and menu options are supported out of the box in these languages and users are able to select from these languages as their preferred language. Data translation is also supported to allow data that you create as part of your implementation, such as tender types, can be seen in the preferred languages of your users as well.

Translate Retailer Data

When creating data in Sales Audit, such as a new rule, total, tender type or error code, it is assumed that data is always entered initially in the primary language for the main entity. But, you can also enter translations for the data, as needed, by selecting the translation iconic button ( ). See the *Oracle Retail Sales Audit Do the Basics User Guide* section on translation for details on how to add translations for your data via the user interface. Additionally, for entities that are uploaded via spreadsheet, translations can be provided via the upload.

Translate Labels and Seeded Data

If you would like to modify the translations for labels, error messages, codes and descriptions, or other seeded data, or to add translations for other languages[1] that are not included in the list above, there are several methods provided. The method used will depend on the data that needs to be updated/added. Translatable text is held in two different ways for Sales Audit, resource bundles and database tables.

Resource Bundles

Screen labels and other UI related data that may require updates/additions for Sales Audit are managed in resource bundles. For details on how to make updates to resource bundles see the "Resource Bundles" section in the *Oracle Retail Merchandising Customization and Extension Guide*.

Database Tables

Many other labels and drop-downs that are not managed in resource bundles are managed in the Sales Audit Codes and Descriptions spreadsheet download/upload process in Merchandising for the code types describe in this document. You can use the method described for managing codes in the Merchandising Implementation Guide to update or add your translations in the designated tab in the spreadsheet.

Error messages and other foundational data entities are also managed via spreadsheet download and upload. For each of these entities, where applicable, translations can also be added in the spreadsheet in a separate tab, using the entity ID as a cross reference. The details on the translation for these entities is found with the information on managing these entities in either the user guides or in this document.

For the base strings in English for these tables, see My Oracle Support ID 1608569.1 and select the Sales Audit document (`resa_translation_pairs.xls`). These can be used as a basis for adding your own translations.

Configure User Language

Users can choose their preferred language to have the user interface displayed as part of setting up their user preferences, as described in the *Sales Audit Do the Basics User Guide*. As noted above, the values loaded in the base table of an entity are always maintained in the primary language. And as such all users, irrespective of their configured language, will see the primary language in the screens where an entity is created and maintained, and translations (including their preferred language) are

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[1] Additional support is also available for the following languages by adding your own translations using the tools described in this section for adding your own translations: Czech, Danish, Finnish, Hebrew, Norwegian, Thai, Albanian, Latin Bosnian, Bulgarian, Estonian, Latvian, Cyrillic Serbian, Lithuanian, Romanian, Slovakian, and Slovenian.

shown in separate translation screens. However, if that same screen is accessed in view mode the description will be shown in their preferred language. Similarly, if viewing the entity in another UI - for example, viewing the error codes in the Transaction Maintenance screen - the description will be shown in their preferred language.

Not Translated

The following information is available in English only:

- Documentation, including online help, release notes, and product guides
- Batch programs and messages
- Log files
- Configuration tools
- Demonstration data
- Training materials

Currencies

Currencies and exchanges rates are managed in Merchandising, but used by Sales Audit. Not only is it used to validate currency information on transactions, but it also is used to determine the retail precision for the currency. This precision is used by Sales Audit when evaluating the data sent from the selling solutions and posting to the General Ledger. It is expected that the selling solution will always send retail values in terms of the precision defined for the currency, whether that is zero decimal places or more. If the precision is greater than what is expected for the currency, it will be flagged as an error in Sales Audit.

In some currencies, like the Australian Dollar where they have eliminated the use of pennies, there may be situations where a customer paying cash has their total rounded (e.g. 10.50 AUD), but if the customer was paying by credit card, they would pay the full precision amount (e.g. 10.53 AUD). To make up for this discrepancy between the actual value of the sale and what the customer pays, a special tender type, called Rounding Tender, part of the Cash tender group, is used.

Currency Rounding Rules

Although there are spreadsheet upload and download capabilities for this defining rounding rules in Sales Audit, this is related to older functionality that is no longer used in the solution.

Tax

Sales Audit supports both sales tax (e.g. the US tax model) and Value Added Tax (VAT), used by most other countries. In addition, Sales Audit supports managing taxes at the transaction level or the item level. This is usually determined by how your selling solutions will be sending you tax information. Sales Audit uses the tax type that is configured in Merchandising system options, either Sales or VAT to determine what type of tax information to expect in the RTLOG files.

Tax Levels

Taxes within Sales Audit can be supported at the transaction level or the item level. The level at which taxes are communicated from the selling systems and managed within Sales Audit is configurable by store. Taxes for a given store must be managed at either the transaction level or the item level, which is configured via the Store Data setup. The presence of an Item

Level Tax import record for the store indicates that a store is using item level taxes, not transaction level. If this record is not present for a store, Sales Audit will expect transaction level taxes. This allows you to handle taxes in different ways for different store, which may be necessary if you have different POS solutions running in some stores or if POS and OMS differ in how they handle taxes. Refer to the "Store Data Configuration" section for more details on this setup.

Transaction Level Taxes

When a store is configured to managed taxes at the transaction level the total tax paid by the customer per tax code on a transaction will be managed at the transaction level and the selling solutions will communicate taxes via the RTLOG in the TTAX record type. For GL posting, the transaction level tax is prorated to the items on the transaction by Sales Audit.

Item Level Taxes

When more granular level management of taxes is required, taxes can be communicated and managed at the item level and the selling solutions will communicate taxes via the RTLOG in the IGTAX record type.

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Integrating with Selling Solutions

This section discusses some of the key areas for consideration as it relates to Sales Audit integration with selling solutions - usually the point of service (POS) and order management (OMS). It is assumed one or both of these solutions would be sending transaction logs to Sales Audit. There are several key considerations for mapping and areas that will need to be coordinated between Sales Audit and the selling solutions. One of these are Tender Types, described earlier in this document.

> **✎ Note:**
>
> The details of the file format used by Sales Audit for imports (that is, the RTLOG) can be found in the *Sales Audit Operations Guide*.

Transaction Types

Sales Audit supports a number of different transaction types in the RTLOG from the selling solutions and each undergoes different auditing and has different requirements of information from the selling solutions. The table below lists the valid transaction types in Sales Audit and what details are included in each type:

Transaction Type	Includes item records?	Includes tender records?	Includes tax records?	Includes customer records?
Open (OPEN)	No	No	No	No
Close (CLOSE)	No	No	No	No
Re-open Store Day (REOPEN)	No	No	No	No
Daily Store Conditions (COND)	No	No	No	No
Even Exchange (EEXCH)	Yes	No	Optional	Optional
Error (ERR)	Used when the transaction type is invalid.			
Loan (LOAN)	No	Yes	No	No
Meter Reading for Fuel (METER)	Yes	No	No	No
No Sale (NOSALE)	No	Optional	No	No
Other (OTHER)	Used in integration with Oracle Retail Xstore POS for any inventory transactions not related to sales, returns, or customer orders.			
Paid In (PAIDIN)	No	Yes	No	No
Paid Out (PAIDOU)	No	Yes	No	No
Pull (PULL)	No	Yes	No	No

Transaction Type	Includes item records?	Includes tender records?	Includes tax records?	Includes customer records?
Pump Test for Fuel (PUMPT)	Yes	No	No	No
Post Void (PVOID)	No	No	No	No
Refund of Customer's Original Check (REFUND)	This transaction is not sent through the RTLOG. It is entered at the HQ level. The TITEM and TCUST records are optional. The TTEND record is required. Either IGTAX or TTAX can be used but not both.			
Return (RETURN)	Yes	Yes	Optional	Optional
Sale (SALE)	Optional	Yes	Optional	Optional
Special Order (SPLORD)	Yes	No	No	No
Tank Dip (TANKDP)	Yes	No	No	No
Termination Record (TERM)	TERM records are created by the import process and do not come from the RTLOG file. The TITEM and TCUST records are optional. The TTEND record is required. Either IGTAX or TTAX can be used but not both.			
Declared Totals (TOTAL)	No	No	No	No
Void (VOID)	Optional	Optional	Optional	Optional
Day Close (DCLOSE)	No	No	No	No

> **Note:**
>
> The DCLOSE transaction additionally carries the number of files / transactions expected for any given store day. For a store expecting transactions via RTLOG import, the ref_no_1 field of the DCLOSE transaction will carry the number of files expected to be uploaded. Similarly for a store configured for REST service-based import, the ref_no_1 field on DCLOSE is expected to carry the number of transactions sent via the service. The day closure processing validates this data against the files/transactions received to mark a store day fully loaded and closed.

Other transaction type notes:

Record Type	Requirements
IDISC	IDISC records must immediately follow their associated TITEM record.
IGTAX	IGTAX will follow TITEM immediately, if IDISC is not present. Otherwise it should follow IDISC.
TTAX	Either this record or IGTAX should appear in the transaction. IGTAX and TTAX cannot be both used at the same time. For more information see the section on Tax.
TPYMT	This record should be right before TTEND record. It contains the Deposit amount for pickup, delivery, or layaway orders.
CATT	CATT records must immediately follow their associated TCUST record.

Sub-Transaction Types

Sub-Transaction Type	Description	Sub-Transaction Types	Description
ERR	Error	HOUSE	House Payment
EMP	Employee	LAYINT	Initiate Layaway
DRIVEO	Fuel Drive Off	LAYCMP	Layaway Complete
MV	Merchandise Vendor Payout	LAYPAY	Layaway Payment
EV	Expense Vendor	LAYDEL	Layaway Delete
EXCH	Exchange in Item Safe/ Return Trans	ORDINT	Initiate Order
CACCOM	Credit Accommodation	ORDCMP	Order Complete
CSTGEN	General Accommodation	ORDCAN	Order Cancel
CSTTAX	Tax Accommodation	ORDPAR	Order Partial
DRET	Disposed Return	BANK	Bank Deposit Store
DEXCHI	Disposed Exchange	INSCRE	Instant Credit Enrollment
SALE	Sale	REDEEM	Redeem
RETURN	Return	ETRAIN	Enter Training Mode
VOID	Void	XTRAIN	Exit Training Mode
NOSALE	No Sale	SEND	Send
OSTORE	Open Store	PAYOUT	Payroll Payout
CSTORE	Close Store	NTRENT	Enter Transaction Reentry
DSTORE	Close Store	XTRENT	Exit Transaction Reentry
OREG	Open Register	CANCEL	Canceled Transaction
CREG	Close Register	TRAIN	Training Mode Transaction
CRGRC	Close Register	SUSPND	Suspend Transaction
OTILL	Open Till	SSPNDR	Resume Suspended Transaction
CTILL	Close Till	SSPNDC	Cancelled Suspended Transaction
CTILLT	Close Till (Total)	BILLPY	Telephone - Mobile Bill Payment
LOTILL	Loan Till	STCHG	Transaction Status Change
PUTILL	Pickup Till	AUDIT	Till Audit
STILL	Suspend Till	GRGRC	Workstation Close
RTILL	Resume Till	OTHER	Miscellaneous
PITILL	Payin Till	STRBNK	Currency Deposit Into Store Bank

Sub-Transaction Type	Description	Sub-Transaction Types	Description
POTILL	Payout Till	OTILLT	Open Till (Total)

RTLOG Code Types

As noted above in the Codes and Descriptions section, there are many codes that need to be configured in Sales Audit to line up with what is used by your selling solutions. Some of these, like transaction type and sub transaction type cannot be changed in Sales Audit. But others can be set to your chosen value to align with your selling solution configuration. Below is a summary of the codes that are critical to coordinate with your selling solutions:

Record Name	Field Name	Code Type
Transaction Header	Transaction Type	TRAT
	Sub-transaction Type	TRAS
	Reason Code	REAC or Non-Merchandise Codes
	Value Sign	SIGN
	Transaction Processing System	TSYS
Transaction Item	Item Type	SAIT
	Item Status	SASI
	Item Number Type	UPCT
	Quantity Sign	SIGN
	Taxable Indicator	YSNO
	Price Override Reason Code	ORRC
	Item Swiped Indicator	YSNO
	Sales Type	SASY
	No Inventory Return	YSNO
	Return Reason Code	SARR
	Fulfillment Loc Type	FLTP
Item Discount	RMS Promotion Type	PRMT
	Discount Type	SADT
	Quantity Sign	SIGN
Item Tax	Tax code	From the VAT_CODES table[1]
	Tax sign	SIGN
Transaction Customer	Customer ID Type	CIDT
Customer Attribute	Attribute Type	SACA
	Attribute Value	Code types from codes in SACA
Transaction Tax	Tax code	From the VAT_CODES table[1]
	Tax sign	SIGN
Transaction Payment	Payment (Deposit Amount) Sign	SIGN

Record Name	Field Name	Code Type
Transaction Tender	Tender Type Group	TENT
	Tender Sign	SIGN
	CC Authorization Source	CCAS
	CC Cardholder Verification	CCVF
	CC Entry Mode	CCEM
	CC Special Condition	CCSC

1   If you are configured to run with US Sales Tax as your default tax type in Merchandising, instead of Simple VAT, then the valid values for this are configured on the codes table using code type TAXC.

For more details on the RTLOG format and assumptions, see the *Oracle Retail Merchandising Operations Guide, Volume 1*.

Additionally, if integrating with Xstore as your POS, see the *Xstore/Merchandising Implementation Guide* for other key assumptions and design considerations related to Sales Audit, Merchandising, and Pricing integration.

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Data Access Schema Configuration

The Data Access Schema (DAS) is a way for certain tables in the Merchandising production database, including Sales Audit, to be replicated to an on-premise or hosted environment to provide you with more direct access to your production data in order to build extensions, integration, custom reporting, and so on. The DAS uses Oracle GoldenGate, which is a comprehensive software package for real-time data integration and replication in heterogeneous IT environments. If you purchased the subscriber license for using GoldenGate as part of your subscription, then once you have installed and configured your target environment, you can configure which of the tables available for replication you want replicated to your target database. All tables in DAS are accessed via database views. Views are used to ensure that, even if a column it dropped from a base table or no longer used, the view continues to include all columns, so that any integrations or other extensions built using the data will not fail. Although they may need to be altered to remain functionally correct.

The list of tables that are available to be replicated are found in the DAS data model, which can be downloaded from My Oracle Support by accessing note 2200398.1. For details on configuring your target environment and adding tables to DAS, see the My Oracle Support note 2283998.1.