Oracle® Depot Repair

Implementation Manual

Release 11.5.9

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Oracle Depot Repair Implementation Manual, Release 11.5.9

Part No. B10940-01

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If you find any errors or have any other suggestions for improvement, please indicate the document title and part number, and the chapter, section, and page number (if available). You can send comments to us at:

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Oracle Depot Repair Documentation
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Redwood Shores, CA 94065
USA

If you would like a reply, please give your name, address, telephone number, and (optionally) electronic mail address.

If you have problems with the software, please contact your local Oracle Support Services.

Preface

Intended Audience

Welcome to Release 11*i* of the Oracle Depot Repair Implementation Manual.

This guide assumes you have a working knowledge of the following:

- The principles and customary practices of your business area.
- Oracle Depot Repair

  If you have never used Oracle Depot Repair, Oracle suggests you attend one or more of the Oracle Depot Repair training classes available through Oracle University.
- The Oracle Applications graphical user interface.

  To learn more about the Oracle Applications graphical user interface, read the *Oracle Applications User's Guide*.

See Other Information Sources for more information about Oracle Applications product information.

How To Use This Guide

This document contains the information you need to understand and use Oracle Depot Repair.

- Chapter 1, Overview of Oracle Depot Repair provides an overview of the application and its components, explanations of key concepts, features, and functions.
- Chapter 2, Overview of Setting Up presents an overview of the implementation steps that you need to perform to set up Oracle Depot Repair.

- Chapter 3, Depot Repair Specific Setup Tasks provides detailed implementation steps and instructions on how to set up Oracle Depot Repair profile options, Depot Repair users, Depot Repair Types, and Reason Codes. It also discusses the setting up of concurrent programs.
- Appendix A, Depot Repair Public APIs presents information on the public APIs in Oracle Depot Repair.
- Appendix B, Depot Repair Lookup Codes lists the Lookup Codes seeded in Oracle Depot Repair.

Documentation Accessibility

Our goal is to make Oracle products, services, and supporting documentation accessible, with good usability, to the disabled community. To that end, our documentation includes features that make information available to users of assistive technology. This documentation is available in HTML format, and contains markup to facilitate access by the disabled community. Standards will continue to evolve over time, and Oracle Corporation is actively engaged with other market-leading technology vendors to address technical obstacles so that our documentation can be accessible to all of our customers. For additional information, visit the Oracle Accessibility Program Web site at `http://www.oracle.com/accessibility/`.

Accessibility of Code Examples in Documentation JAWS, a Windows screen reader, may not always correctly read the code examples in this document. The conventions for writing code require that closing braces should appear on an otherwise empty line; however, JAWS may not always read a line of text that consists solely of a bracket or brace.

Other Information Sources

You can choose from many sources of information, including online documentation, training, and support services, to increase your knowledge and understanding of Oracle Depot Repair.

If this guide refers you to other Oracle Applications documentation, use only the Release 11*i* versions of those guides.

Online Documentation

All Oracle Applications documentation is available online (HTML or PDF). Online help patches are available on MetaLink.

Related Documentation

Oracle Depot Repair shares business and setup information with other Oracle Applications products. Therefore, you may want to refer to other product documentation when you set up and use Oracle Depot Repair.

You can read the documents online by choosing Library from the expandable menu on your HTML help window, by reading from the Oracle Applications Document Library CD included in your media pack, or by using a Web browser with a URL that your system administrator provides.

If you require printed guides, you can purchase them from the Oracle Store at http://oraclestore.oracle.com.

Documents Related to All Products

Oracle Applications User's Guide

This guide explains how to enter data, query, run reports, and navigate using the graphical user interface (GUI) available with this release of Oracle Depot Repair (and any other Oracle Applications products). This guide also includes information on setting user profiles, as well as running and reviewing reports and concurrent processes.

You can access this user's guide online by choosing "Getting Started with Oracle Applications" from any Oracle Applications help file.

Documents Related to This Product

Oracle Depot Repair User Guide

This user guide explains the key concepts of Oracle Depot Repair, and the procedures you need to follow while using Oracle Depot Repair.

Oracle CRM Foundation Concepts and Procedures Guide

This guide presents information on using the foundation modules such as Notes, Calendars, Resource Manager, and Interaction History for Oracle CRM Applications.

Installation and System Administration

Oracle Applications Concepts

This guide provides an introduction to the concepts, features, technology stack, architecture, and terminology for Oracle Applications Release 11*i*. It provides a useful first book to read before an installation of Oracle Applications. This guide also introduces the concepts behind Applications-wide features such as Business Intelligence (BIS), languages and character sets, and Self-Service Web Applications.

Installing Oracle Applications

This guide provides instructions for managing the installation of Oracle Applications products. In Release 11*i*, much of the installation process is handled using Oracle Rapid Install, which minimizes the time to install Oracle Applications, the Oracle8 technology stack, and the Oracle8*i* Server technology stack by automating many of the required steps. This guide contains instructions for using Oracle Rapid Install and lists the tasks you need to perform to finish your installation. You should use this guide in conjunction with individual product user's guides and implementation guides.

Oracle Applications Supplemental CRM Installation Steps

This guide contains specific steps needed to complete installation of a few of the CRM products. The steps should be done immediately following the tasks given in the Installing Oracle Applications guide.

Upgrading Oracle Applications

Refer to this guide if you are upgrading your Oracle Applications Release 10.7 or Release 11.0 products to Release 11*i*. This guide describes the upgrade process and lists database and product-specific upgrade tasks. You must be either at Release 10.7 (NCA, SmartClient, or character mode) or Release 11.0, to upgrade to Release 11*i*. You cannot upgrade to Release 11*i* directly from releases prior to 10.7.

Maintaining Oracle Applications

Use this guide to help you run the various AD utilities, such as AutoUpgrade, AutoPatch, AD Administration, AD Controller, AD Relink, License Manager, and others. It contains how-to steps, screenshots, and other information that you need to run the AD utilities. This guide also provides information on maintaining the Oracle applications file system and database.

Oracle Applications System Administrator's Guide

This guide provides planning and reference information for the Oracle Applications System Administrator. It contains information on how to define security, customize menus and online help, and manage concurrent processing.

Oracle Alert User's Guide

This guide explains how to define periodic and event alerts to monitor the status of your Oracle Applications data.

Oracle Applications Developer's Guide

This guide contains the coding standards followed by the Oracle Applications development staff. It describes the Oracle Application Object Library components needed to implement the Oracle Applications user interface described in the *Oracle Applications User Interface Standards for Forms-Based Products*. It also provides information to help you build your custom Oracle Forms Developer 6*i* forms so that they integrate with Oracle Applications.

Oracle Applications User Interface Standards for Forms-Based Products

This guide contains the user interface (UI) standards followed by the Oracle Applications development staff. It describes the UI for the Oracle Applications products and how to apply this UI to the design of an application built by using Oracle Forms.

Other Implementation Documentation

Multiple Reporting Currencies in Oracle Applications

If you use the Multiple Reporting Currencies feature to record transactions in more than one currency, use this manual before implementing Oracle Depot Repair. This manual details additional steps and setup considerations for implementing Oracle Depot Repair with this feature.

Multiple Organizations in Oracle Applications

This guide describes how to set up and use Oracle Depot Repair with Oracle Applications' Multiple Organization support feature, so you can define and support different organization structures when running a single installation of Oracle Depot Repair.

Oracle Workflow Guide

This guide explains how to define new workflow business processes as well as customize existing Oracle Applications-embedded workflow processes.You also use this guide to complete the setup steps necessary for any Oracle Applications product that includes workflow-enabled processes.

Oracle Applications Flexfields Guide

This guide provides flexfields planning, setup and reference information for the Oracle Depot Repair implementation team, as well as for users responsible for the ongoing maintenance of Oracle Applications product data. This manual also provides information on creating custom reports on flexfields data.

Oracle eTechnical Reference Manuals

Each eTechnical Reference Manual (eTRM) contains database diagrams and a detailed description of database tables, forms, reports, and programs for a specific Oracle Applications product. This information helps you convert data from your existing applications, integrate Oracle Applications data with non-Oracle applications, and write custom reports for Oracle Applications products. Oracle eTRM is available on Oracle*MetaLink.*

Oracle Manufacturing APIs and Open Interfaces Manual

This manual contains up-to-date information about integrating with other Oracle Manufacturing applications and with your other systems. This documentation includes APIs and open interfaces found in Oracle Manufacturing.

Oracle Order Management Suite APIs and Open Interfaces Manual

This manual contains up-to-date information about integrating with other Oracle Manufacturing applications and with your other systems. This documentation includes APIs and open interfaces found in Oracle Order Management Suite.

Oracle Applications Message Reference Manual

This manual describes Oracle Applications messages. This manual is available in HTML format on the documentation CD-ROM for Release 11i.

Oracle CRM Application Foundation Implementation Guide

Many CRM products use components from CRM Application Foundation. Use this guide to correctly implement CRM Application Foundation.

Training and Support

Training

Oracle offers training courses to help you and your staff master Oracle Depot Repair and reach full productivity quickly. You have a choice of educational environments. You can attend courses offered by Oracle University at any one of our many Education Centers, you can arrange for our trainers to teach at your facility, or you can use Oracle Learning Network (OLN), Oracle University's online education utility. In addition, Oracle training professionals can tailor standard courses or develop custom courses to meet your needs. For example, you may want to use your organization's structure, terminology, and data as examples in a customized training session delivered at your own facility.

Support

From on-site support to central support, our team of experienced professionals provides the help and information you need to keep Oracle Depot Repair working for you. This team includes your Technical Representative, Account Manager, and Oracle's large staff of consultants and support specialists with expertise in your business area, managing an Oracle8*i* server, and your hardware and software environment.

Oracle*MetaLink*

Oracle*MetaLink* is your self-service support connection with web, telephone menu, and e-mail alternatives. Oracle supplies these technologies for your convenience, available 24 hours a day, 7 days a week. With Oracle*MetaLin*k, you can obtain information and advice from technical libraries and forums, download patches, download the latest documentation, look at bug details, and create or update TARs. To use MetaLink, register at (http://metalink.oracle.com).

Alerts: You should check Oracle*MetaLink* alerts before you begin to install or upgrade any of your Oracle Applications. Navigate to the Alerts page as follows: Technical Libraries/ERP Applications/Applications Installation and Upgrade/Alerts.

Self-Service Toolkit: You may also find information by navigating to the Self-Service Toolkit page as follows: Technical Libraries/ERP Applications/Applications Installation and Upgrade.

Do Not Use Database Tools to Modify Oracle Applications Data

Oracle STRONGLY RECOMMENDS that you never use SQL*Plus, Oracle Data Browser, database triggers, or any other tool to modify Oracle Applications data unless otherwise instructed.

Oracle provides powerful tools you can use to create, store, change, retrieve, and maintain information in an Oracle database. But if you use Oracle tools such as SQL*Plus to modify Oracle Applications data, you risk destroying the integrity of your data and you lose the ability to audit changes to your data.

Because Oracle Applications tables are interrelated, any change you make using Oracle Applications can update many tables at once. But when you modify Oracle Applications data using anything other than Oracle Applications, you may change a row in one table without making corresponding changes in related tables. If your tables get out of synchronization with each other, you risk retrieving erroneous information and you risk unpredictable results throughout Oracle Applications.

When you use Oracle Applications to modify your data, Oracle Applications automatically checks that your changes are valid. Oracle Applications also keeps track of who changes information. If you enter information into database tables using database tools, you may store invalid information. You also lose the ability to track who has changed your information because SQL*Plus and other database tools do not keep a record of changes.

About Oracle

Oracle Corporation develops and markets an integrated line of software products for database management, applications development, decision support, and office automation, as well as Oracle Applications, an integrated suite of more than 160 software modules for financial management, supply chain management, manufacturing, project systems, human resources and customer relationship management.

Oracle products are available for mainframes, minicomputers, personal computers, network computers and personal digital assistants, allowing organizations to integrate different computers, different operating systems, different networks, and even different database management systems, into a single, unified computing and information resource.

Oracle is the world's leading supplier of software for information management, and the world's second largest software company. Oracle offers its database, tools, and applications products, along with related consulting, education, and support services, in over 145 countries around the world.

1

Introduction to Oracle Depot Repair

This chapter discusses the key concepts, features and process flows of Oracle Depot Repair. Sections in this chapter include:

What is Oracle Depot Repair?

Oracle Depot Repair is part of the Oracle eBusiness Suite and offers an enterprise-wide solution for managing depot service repair processing. It targets the repair business market from simple, quick repairs, to routine maintenance. Oracle Depot Repair integrates with other Oracle eBusiness Suite modules to provide an integrated comprehensive solution for the repair service business sector.

The depot repair process includes the return of damaged and serviceable products, their diagnoses and repair job estimates, customer approvals and repairs management, and subsequent return of products to customers. The collection of charges for materials, labor, and expenses for the repairs is used to invoice the customer.

Customers expect their repairs to be addressed quickly and seamlessly. Oracle Depot Repair provides end-to-end repair management functionality for service organizations that are committed to delivering a total service solution.

Oracle Depot Repair Key Features

Oracle Depot Repair enables service organizations to meet customer expectations, and draw maximum benefit by improving service readiness.

The major features of Oracle Depot Repair include:

- Customer Management
- Service Request Management
- Repair Type Processing
- Repair Job Management
- Repair Resolution Management

Customer Management

Oracle Depot Repair establishes a call center environment to improve customer interaction with service depots. Customers can use an access number to contact the relevant service depot where they can log service requests. Oracle Depot Repair also supports scenarios in which customers walk in at service depots for repair needs. The primary focus of the service representatives in the call center is to understand the customer's issue and resolve it on the first call, if possible, thereby avoiding escalations and/or call transfers. This allows service agency experts to focus on their areas of expertise without the constant distraction of explaining well-documented issues and solutions.

Oracle Depot Repair provides service organizations with the right tools and knowledge for responding effectively, and proactively, to the repair issues raised by customers. Key customer management features include:

Depot Repair Workbench The Repair Order window in Oracle Depot Repair provides the service agent instant access to information about the customer and enables the agent to effectively address the needs of the customer. The customer Profile button enables service agents to view the number of open repair orders, open service requests, active contracts, and other details for a selected customer. The Repair Orders Search interface permits service agents to query for repair orders, repair order statuses, or repair jobs.

Relationship Management Oracle Depot Repair allows service agents to capture the contact's relationship with others in the concerned organization, or other organizations, enabling service agents to engage knowledgeably with customers and other service agencies.

Customer Data Store Oracle Depot Repair enables service agencies to maintain a comprehensive database of all customer interactions with the agency. Oracle Depot Repair maintains detailed service history to trace the origin of a repair issue, and the follow up actions taken to solve it.

Service Request Management

Oracle Depot Repair enables service agencies to offer customers the convenience of accessing service through telephone or over the counter. Key service request management processes include:

- Entering Service Requests
- Searching the Knowledge Management Database

Service Request Builder Oracle Depot Repair provides an intuitive interface to enter new service requests and to gather appropriate data. It allows service agents to record customer information and attempt problem resolution to solve issues in the very first interaction.

Searchable Knowledge Management Database Oracle Depot Repair makes available a database of solutions, which the service agents can search with a view to solving the problem while the customer interaction is in progress. It can also be used to provide information such as guides, policies, procedures, and FAQs.

Repair Type Processing

Oracle Depot Repair provides repair types that enable service providers to be more efficient in managing the depot repair through process automation. Repair types help to classify the repair order and determine the repair management processes and logistics needed to fulfill the repair process.

Oracle Depot Repair supports the following repair types:

- Repair and Return
- Loaner, Repair and Return
- Exchange
- Advanced Exchange
- Loaner
- Replacement

- Standard
- Walk-In Repair
- Walk-In Repair with Loaner

Repair and Return This repair type is used when a customer returns the broken product to the depot for repair. After the repair is completed, the repaired product is returned to the customer. This repair type requires an RMA to receive the customer's broken product, and a sales order to ship the repaired product and invoice the customer.

Loaner, Repair and Return This repair type combines two repair types, the Repair and Return, with the Loaner. The loaner concept indicates that the loaner is sent to the customer before the receipt of the broken product.

To track the shipping and return of both the loaner and the broken item, four charge lines are created. This repair type requires two RMA orders and two sales orders.

This repair type is the one to be opted when a customer uptime is critical.

Exchange This repair type represents a scenario when the depot sends out an exchange product to the customer after receiving the customer's broken product. The exchange repair type assumes no repaired product is returned to the customer. An internal repair order may be generated for the returned item, but this repair is not necessarily associated to the original exchange.

Advanced Exchange This repair type is the same as the exchange repair type except that the product may be sent out before the customer's product is received by the service organization.

Loaner This repair type is used when a product is sent out to the customer solely for the purpose of renting. This repair type requires a sales order to ship out the loaner product to the customer and to create an invoice, and an RMA order to track the return of the loaner product. A deposit and return due date may be required. No repairs are expected from a loaner repair type.

Replacement A replacement repair type refers to a scenario when the depot sends out a product to the customer and no return is required. In this scenario, the service provider sends the customer a product to replace the customer's product. The service organization may link the replacement product to the original product in the installed base, and change the status of the replaced product to indicate that it is out of service and replaced with the new item.

Standard This repair type is selected when the service agent is uncertain about the customer's needs. This repair type is flexible however, and requires the manual creation of RMAs and sales orders.

Walk-In Repair This repair type is selected when the customer delivers a damaged product at the depot, and the product is returned to the customer after repair. This scenario is also used to process unplanned returns. Walk-In Repair behaves similar to Return and Repair with the exception that the Walk-In Repair repair type is seeded with Tasks as its Repair Mode.

Walk-In Repair with Loaner This repair type is the same as Walk-In Repair, except that a loaner product is provided to the customer to bridge the gap while the damaged product is being repaired. Walk-In Repair with Loaner is similar to Loaner, Repair and Return with the exception that the Walk-In Repair with Loaner repair type is seeded with Tasks as Repair Mode.

Repair Job Management

Either Oracle WIP (Work in Process) or Oracle Tasks is used to manage repair jobs. WIP mode is recommended for use when the repair jobs are more complex, and require a series of sequential steps and materials management. Tasks mode is recommended for use when the repairs are less complex, and require minimal steps that are not necessarily completed in sequence. Both of these repair modes are implemented and managed using separate tabs in the Oracle Depot Repair user interface. The WIP mode leverages the costing of items through Oracle Costing, while Tasks mode does not integrate with Oracle Costing.

The WIP or Task modes are associated to the repair types during implementation. Though a service organization can have different repair types associated with different repair modes, it is recommended that a service organization select only one repair mode for all repair types to enhance usability.

Repair Resolution Management

Oracle Depot Repair improves operational efficiency by providing the following key repair resolution management features:

- Repair job search functionality
- Process automation based on repair type; auto-creation of charge lines
- Estimate creation and approval
- Leveraging of the depot knowledge base throughout repair processing

- Repair job creation and release to shop floor
- Flexible options for receiving products, and shipping items
- Installed base validation of products enables checking for product warranties and contract entitlements
- Invoicing of final charges

Business Process Flows

Oracle Depot Repair supports the following business process flows:

- Logistics and Maintenance with Call Center Facility
- Logistics and Maintenance without Call Center Facility
- Internal Repairs

Either Oracle WIP or Oracle Tasks can be used to manage the repair process. Based on your choice, the repair order repair type determines which repair management process is to be used.

Logistics and Maintenance with Call Center Facility

This business flow starts with a service request, where the problem is recorded by a call center service agent. If the service agent cannot resolve the problem using information in the knowledge base, the service request is referred to a depot repair agent. The depot agent then creates a repair order and an estimate (if required), and seeks approval from the customer for further processing.

Depending on the repair type, the depot agent completes the different RMA and Sales Order lines to facilitate the completion of the repair process. The repair mode (associated to the repair type) determines whether Oracle WIP or Oracle Tasks will be used to manage the repair job. After the repairs are completed, the repaired product is shipped back to the customer. The material, labor, and expenses consumed in the repair are captured as charges and are interfaced to Oracle Order Management for invoicing.

Logistics and Maintenance without Call Center Facility

This process is similar to the Call Center, Logistics, and Maintenance business process except that a call center is not involved.

This process can be used for businesses that do not incorporate a call center facility, but require their customers to send back serviceable products to a depot.

Internal Repairs

You may need to refurbish products already owned by your organization, or repair a product that your organization took possession of, through a field service agent instead of against an RMA. Oracle Depot Repair allows you to process internal repairs in such cases. The customer is indicated as an internal party in the corresponding service request. RMAs and Sales Orders are not required to process internal repairs. This is under the assumption that items already exist in a subinventory within the organization, allowing you to create repair jobs.

Integration with Other Oracle Modules

Oracle Depot Repair integrates with the following Oracle modules:

Assignment Manager

Oracle Assignment Manager is used by the Depot Planner to schedule technicians to all open and planned repair tasks. The module permits the planner to use the Assignment Manager in an assisted or unassisted mode. See *Oracle CRM Foundation Users Guide* for additional information related to this topic.

Bills of Material

Bills of Material store lists of items that are associated with a parent item, and information about how each item is related to its parent. Oracle Depot Repair uses Oracle Bills of Material to create repair routers that will be used for a submitted WIP repair job, and to create a bill of materials for a product that is linked to a repair router.

Charges

Using the Charges module, a service organization can bill customers for services provided in response to support service requests, field service requests, and depot repairs. Charges also creates a return material authorization (RMA) to return a defective product for repair, loan, or replacement. Returns from a customer occur for a variety of reasons including damage, shipment error, and repair. With the Charges capability of processing return material, you can manage customer expectations while controlling inventory receipts and processing customer credit.

Oracle Depot Repair summons Charges APIs to auto create the charge lines once the repair type has been determined.

Contracts (Contracts Core and Service Contracts)

Depot Repair integrates with Oracle Service Contracts to manage service contracts associated with a customer's install base product. Oracle Service Contracts holds all service contracts centrally; warranties, extended warranties or complex service agreements, providing the service provider visibility to all service entitlement information. It leverages functionality provided in Oracle Contracts Core to support common contract management activities such as contract renewal, versioning, article management, and change management.

Counters

Counter events and alerts provide a valuable tool to track critical service events that may affect a customer or products in the install base. Oracle Depot Repair uses the Counters module to update product counters periodically, whenever a Depot Technician performs work on the product, and saves it in the install base record. The Oracle Counters module also permits a service provider to set up logical or derived counters that utilize formulas that incorporate calendar dates, time, and cycle counts to trigger an event, such as a warranty or service contract expiration, or to alert the service provider when a scheduled preventive maintenance must be performed on a customer's install base product. Alerts may be sent via e-mail notification system to inform service personnel about warranty or service contract expiration, or about a preventive maintenance requirement that is due.

Customer Care (Customer Profile)

The Customer Profile summarizes customer information and indicates if a customer is critical. It may provide information such as the number of open service requests. The profile entries are setup by a system administrator, and contain a set of predefined checks. These checks can be configured. The Customer Profile engine displays these check results. Depot Repair uses this functionality for customer management.

Field Service

When an organization sells a product to a customer, service contracts or warranties are often offered to the customer. Most companies offer on-site support for failures of the product. This is where field service is significant. After the customer reports the problem, the field service organization has to determine who should visit the customer; when, and what parts are needed to solve the problem. If a repair cannot

be completed on-site, the repair may need to be transferred to the depot for completion.

General Ledger

Oracle Depot Repair integrates with Oracle General Ledger to provide the functionality of recording and tracking all costs associated with every Depot Repair WIP repair job, and of creating general ledger accounts.

HRMS

Oracle Depot Repair uses the Oracle HRMS module to define employees and locations where you ship, deliver internally, or bill the goods and services that are ordered.

Install Base

Oracle Install Base is a repository that keeps track of all installed customer products. Install base maintains and updates each product record to reflect the most current configuration. Service organizations must rely heavily on their install base to provide accurate customer and product information. The install base permits quick access to all product records and information. Oracle Depot Repair leverages this information to expedite the repair process when repairs involve incompatibility, configuration, revision, or counter history issues. Oracle Depot Repair integrates with Oracle Install Base to facilitate accurate recording of all part and serial numbers that are moved in and out of a customer product during its life cycle. It retrieves all service contracts and warranties associated with an Install Base serialized product or component. Depending on the definition of Install Base transaction sub-types, the location and instance ownership information gets updated by the Charges APIs.

Inventory

Oracle Depot repair uses the Oracle Inventory module to manage product and spare parts inventory.

JTF Notes

A note records descriptive information that has been generated by users about business transactions so that it may be referenced. Oracle Depot Repair uses the JTF notes module to access the comment log that relates to a specific transaction. The Notes module creates and passes information to all other Oracle CRM Applications. Upon transmission and receipt of a note, an alert is automatically sent to the Depot Repair module to signal that a new note is present. Service employees can now pass

valuable information that may influence the repair process. The notes module permits users to post both public or private notes, where public notes may be published to a web site, while private notes are only accessible to employees that work inside the service organization.

Knowledge Management

Knowledge Management is an Oracle Service Core module that provides an open architecture repository to store technical information or solution sets. Service agents and technicians can retrieve this information to find a quick resolution to service issues being reported by customers, or for assistance in an inspection or product diagnosis. Knowledge Management provides a security feature that will permit only users with specific responsibility to contribute new information to the constantly enriched active database.

Oracle Depot Repair uses the Knowledge Management Search Engine to find the best possible solutions to resolve service issues. Agents can access the knowledge repository from the service request or the repair order. You can search for solutions by entering a service code or keyword string to query on statements linked to a symptom, cause, action, or fact solution set. A solution set may also include a task template or set of objects that can be used to automate or expedite the repair setup process.

Order Management

Order Management is the ERP module used by Depot Repair to create RMA and Sales Orders, validate customer accounts, and invoice customers for repairs.

Pricing

Oracle Depot Repair integrates with Oracle Pricing to provide an advanced, highly flexible pricing engine that executes pricing and promotional calculations. It allows Oracle Depot Repair to view and select a Price List while charging a repair, and while receiving or shipping a product.

Purchasing

Oracle Depot Repair's integration with the Oracle Purchasing module is supplied by Oracle WIP. Oracle WIP uses the Purchasing module to perform outside processing of a repair from the WIP Router.

Receivables

Oracle Receivables is the ERP module that Oracle Depot Repair integrates with to track and maintain customer information such as customer name, account, customer contacts, and location.

Resource Manager

Oracle Resource Manager is used by Oracle Depot Repair to manage employees. The Resource Manager permits a user to import employees and non-employees from HRMS into the resource module. Resources can be set up and managed as individual resources, or as a team or group, and assigned roles and skill sets to distinguish their qualifications. See the *Oracle CRM Foundation Users Guide* for additional information related to this topic.

Scheduler

Oracle Scheduler enables optimal scheduling of tasks and trips for field service business needs. While the Assignment Manager searches for qualified resources to complete a field service task (based upon selection criteria set within the Assignment Manager), these qualified resources are interfaced to the Oracle Scheduler to make the actual assignments based upon pre-defined constraints. The Scheduler uses the Assignment Manager user interface to schedule Field Service tasks.

Support (Service Request)

Service agents typically log a Support Service Request to record a service issue that is being reported by a customer. Oracle Depot Repair invokes Oracle Service Request APIs to auto create the service request after the repair order header is created. The Service Request APIs populate the service request number into the Repair Order Header to permanently link the two source documents with an internal form identity. Depot business flows always start with the creation of a service request.

Task Manager

Task Manager is an Oracle eBusiness Suite core module used by Oracle Depot Repair to facilitate repair management. The Tasks model leverages the core functionality provided in Oracle Depot Repair by its integration with Resource Manager, Assignment Manager, and Calendars. Tasks provide an alternate repair process that is intended to manage simple repair work that does not require extensive tracking or management processes. After a task is completed, the technician uses the Depot Repair Report to log the Material, Labor, and Expense

transactions. See *Oracle CRM Foundation Users Guide* for additional information related to this topic.

Work in Process

Oracle Work in Process (WIP) is the ERP module used by Oracle Depot Repair to facilitate the repair of broken products. The Work in Process module permits assignment of resources, material, and outside processing, and a WIP summary report that tracks the costs associated with a completed WIP repair job. A WIP job can be submitted with or without an assigned router.

Integrations and Business Function Impacts

The following table presents the business functions in a depot that the Oracle Depot Repair integrating applications impact.

Table 1–1 Integrating Applications and Business Function Impacts

Integrating Oracle Module	Business Functions				
	Customer Interaction	Repair Management		Logistics	Billing/ Invoicing
		WIP Mode	Tasks Mode		
Assignment Manager	--	--	X	--	--
Bills of Material	--	X	--	--	--
Charges	--	X	X	X	X
Contracts	X	--	--	X	X
Counters	X	X	X	--	--
Customer Care (Customer Profile)	X	--	--	--	--
Field Service	--	--	X	--	--
General Ledger	--	--	--	--	X
HRMS	--	X	X	--	--
Install Base	X	X	X	X	--
Inventory	--	X	X	X	X
JTF Notes	X	X	X	--	--
Knowledge Management	X	X	X	--	--
Order Management	--	--	--	X	X

Table 1–1 Integrating Applications and Business Function Impacts

Integrating Oracle Module	Business Functions				
	Customer Interaction	Repair Management		Logistics	Billing/ Invoicing
		WIP Mode	Tasks Mode		
Pricing	--	--	--	--	X
Purchasing	--	--	--	X	--
Receivables	--	--	--	X	X
Resource Manager	--	--	X	--	--
Scheduler	--	--	X	--	--
Support (Service Request)	X	--	--	--	--
Task Manager	--	--	X	--	--
Work in Process	--	X	--	--	--

2

Overview of Setting Up

This chapter discusses setting up Oracle Depot Repair, and includes the following topics:

Setting up Oracle Depot Repair

This section provides an overview of the setup steps required to implement Oracle Depot Repair.

Setting up Oracle Depot Repair includes setting up related Oracle applications, such as Oracle Inventory and Oracle Install Base. In setting up these applications, you might only need to make Depot Repair specific modifications to existing data, like existing items. Check with your implementation team to determine which setup requirements have already been fulfilled.

Oracle Applications Technology and the Implementation Wizard

The setup steps in this chapter explain how to implement the Oracle applications functionality specific to Oracle Depot Repair.

The Oracle Applications Implementation Wizard (AIW) guides you through the entire Oracle Applications setup, including system administration. However, if you

do not use the Implementation Wizard, you need to complete several other setup steps including:

- Performing system-wide setup tasks such as configuring concurrent managers and printers
- Managing data security, which includes setting up responsibilities to allow access to a specific set of business data and complete a specific set of transactions, and assigning individual users to one or more of these responsibilities
- Setting up Oracle Workflow

If you are implementing more than one Oracle application, it is recommended that you use the Oracle Applications Implementation Wizard to coordinate your setup activities. The Wizard guides you through the setup steps for the applications you have installed, suggesting a logical sequence that satisfies cross-product implementation dependencies and reduces redundant setup steps. The Wizard also identifies steps that can be completed independently by several teams working in parallel to help you manage your implementation process most efficiently.

You can also use the Wizard to see a graphical overview of setup steps, read online help for a setup activity, and open the appropriate setup window. You can also document your implementation, for further reference and review, by using the Wizard to record comments for each step.

See:

- *Oracle Applications Implementation Wizard User's Guide*
- *Oracle Applications System Administrator's Guide*
- *Oracle Workflow User's Guide*

Related Applications Setup

Oracle Depot Repair requires that the following Oracle modules are installed and set up:

- Oracle General Ledger
- Oracle Bills of Material
- Oracle Inventory
- Oracle HRMS
- Oracle Work In Process

- Oracle Order Management
- Oracle Purchasing
- Oracle Payables
- Oracle Receivables
- Oracle CRM Foundation
- Oracle Install Base
- Oracle Customer Support
- Oracle Customer Care
- Oracle Service
- Oracle Scheduler
- Oracle Contracts Core
- Oracle Service Contracts

This implementation guide, however, discusses only the Oracle Depot Repair-specific setup steps in detail. For set up of all related applications, please refer to the corresponding documentation as listed in the implementation checklist. Certain Oracle Depot Repair-specific setup steps that you need to perform in other Oracle applications setup windows are also explained in detail in the following chapter.

Key Implementation Decisions

The following sections detail the key decisions that are to be made before you begin implementation.

Loading Customer and Contact Information

Oracle Depot Repair requires that customer information be imported into the system from already available sources. However, Oracle Depot Repair allows you to capture customer contact data in real-time. There may be situations when contact data is already available from other systems. In such cases, you may want to import available customer information along with relationship data.

For example, a service organization already has extensive data on all the customers in its service area. In this scenario, it may serve the agency better if all such data is imported into the system.

Resource Creation

Determine the resources that have to be created in the system. All Call Center Agents, Service Administrators, Receipt Administrators, Service Technicians, Depot Managers, Field Service Agents, and other employees who will be using Oracle Depot Repair must be created as resources.

Calendar Definition

Determine the shifts, patterns, and time periods when resources are available to work.

Location Definition

Define the locations where you plan to ship, deliver internally, or bill the goods and services that you order. This is necessary if you plan to import purchase requisitions from Oracle Depot Repair to Oracle Purchasing.

Knowledge Base Management

Determine the information that will go into the Knowledge Base. It is recommended that you identify and list the information sources (for example, the technical manuals, parts catalogs, policies, procedures and FAQs) at the outset.

Service Request Builder Setup

Define the service request types, profiles, and the attributes associated with each of them. Also identify the owner for each service request type. You would also need to define the criteria based on which duplicate service requests will be identified.

Repair Types Setup

While creating repair orders, product transactions are generated based on the default transaction billing types defined in repair types. Also, the processing of product transaction lines are determined by the definition of the repair types. For example, if the repair type has Auto RMA checked, then the RMA product transaction is interfaced to order management and the sales order is also booked. You can also define your own repair types and link them to the seeded repair types.

The following are the seeded repair types for Oracle Depot Repair:

- Advanced Exchange
- Exchange
- Loaner

- Loaner, Repair and Return
- Repair and Return
- Replacement
- Standard
- Walk In Repair
- Walk In Repair with Loaner

These repair types determine the proper processing and management of repair orders by the application and the depot organization.

Tasks Versus WIP

Determine the complexity of the repair management processes required by your organization. Either Oracle WIP or Oracle tasks can be used to manage the repair process. Using Oracle WIP is recommended for more complicated repair management processes, while Oracle Tasks is recommended for simpler repair management processes. To the user, both of these processes are managed via separate tabs in the user interface.

The Oracle Depot Repair application supports the use of both WIP and Tasks for repair management. However, it is advisable to use any one mode to enhance the user experience.

Implementation Starting Point

Before starting the implementation, identify all your implementation team members and the access privileges they require. Oracle Depot Repair provides Oracle Depot Repair Super User as the seeded implementation responsibility. In addition to this, implementation team members may have to use other responsibilities. You may have to create additional implementation responsibilities if you want to restrict access.

Create Oracle Applications users with appropriate responsibilities for performing implementation procedures. The user name you assign can be used to log on to Oracle Depot Repair. To create the user, use the System Administrator responsibility.

Defining an Oracle Applications User

Use the System Administrator responsibility to create the required Oracle Applications user(s). Implementation team members would need access to one or more of the following responsibilities:

- System Administrator
- Depot Repair Super User
- Foundation Administrator
- Support Administrator
- Knowledge Management Administrator

Use the Users window to define Oracle Applications users. Oracle Application user will need to be uniquely identified by an application user name. For detailed instructions on creating application users, please refer to *Oracle Applications System Administrator's Guide*.

Implementation Checklist

This checklist summarizes each of the steps you must follow to implement Oracle Depot Repair. It includes setup steps for data that may be shared with other Oracle applications, but is required by Oracle Depot Repair. If you have already defined this information when setting up other Oracle Applications, you can skip these steps.

Since some implementation steps build upon information you define in other steps, you must perform the setup in the order listed.

Table 2–1 Oracle Depot Repair Setup Steps

Step No.	Setup Step	Reference
1	Define key flexfields	*Oracle Applications Flexfields Guide, Oracle General Ledger User Guide, Implementing Oracle HRMS*
2	Set up Calendars, Currencies, and Set of Books	*Oracle General Ledger User Guide, Oracle Bills of Material User's Guide*
3	Set up Payables	*Oracle Payables User Guide*
4	Set up Receivables	*Oracle Receivables User Guide*
5	Set up Organizations	*Implementing Oracle HRMS*
6	Define Locations	*Implementing Oracle HRMS*

Table 2–1 Oracle Depot Repair Setup Steps

Step No.	Setup Step	Reference
7	Set up Employees	*Implementing Oracle HRMS*
8	Set up Inventory	*Oracle Inventory User's Guide, Oracle Purchasing User's Guide*
9	Set up Bills of Material	*Oracle Bills of Material User's Guide*
10	Set up Work in Process	*Oracle Work in Process User's Guide*
11	Set up Purchasing	*Oracle Purchasing User's Guide*
12	Set up Order Management	*Oracle Order Management User's Guide, Oracle Shipping Execution User's Guide*
13	Set up Service Request	*Oracle Customer Support Implementation Guide*
14	Set up Customer Profile	*Oracle Customer Care Implementation Guide*
15	Set up Charges	*Oracle Service Implementation Guide*
16	Set up Knowledge Management	*Oracle Service Implementation Guide*
17	Set up Counters and Counter Templates	*Oracle Service Implementation Guide*
18	Set up JTF Notes	*Oracle CRM Foundation Implementation Guide*
19	Set up (JTF) Resource Manager	*Oracle CRM Foundation Implementation Guide*
20	Set up Tasks	*Oracle CRM Foundation Implementation Guide*
21	Set up Assignment Manager	*Oracle CRM Foundation Implementation Guide*
22	Set up Scheduler	*Oracle Scheduler Implementation Guide*
23	Set up Install Base	*Oracle Install Base Implementation Guide*
24	Set up Contracts Core	*Oracle Contracts Core Concepts and Procedures Guide*
25	Set up Service Contracts	*Oracle Service Contracts Concepts and Procedures Guide*
26	Define Depot Repair Lookup Codes	Chapter 3, *Oracle Depot Repair Implementation Manual*
27	Define Depot Repair Profile Options	Chapter 3, *Oracle Depot Repair Implementation Manual*
28	Define Depot Repair Users	Chapter 3, *Oracle Depot Repair Implementation Manual*

Table 2–1 Oracle Depot Repair Setup Steps

Step No.	Setup Step	Reference
29	Set up Repair Types Setup Table	Chapter 3, *Oracle Depot Repair Implementation Manual*
30	Define Depot Repair Reason Codes	Chapter 3, *Oracle Depot Repair Implementation Manual*
31	Set up Depot Repair Update Programs	Chapter 3, *Oracle Depot Repair Implementation Manual*

Set up steps specific to Oracle Depot Repair are discussed in detail in the following chapter. For detailed instructions on other setup tasks, please refer to the corresponding guides.

Note: Oracle Depot Repair uses Work in Process (WIP) to process repairs where costing is relevant. Tasks mode is used to process simpler repairs.

To process repairs in Tasks mode, you must set up Tasks, Assignment Manager, and Scheduler. If you are processing repairs only in Tasks mode, you do not have to set up WIP. Similarly, if you are processing repairs only in WIP mode, you need to set up WIP; but do not have to set up Tasks, Assignment Manager, and Scheduler. See Repair Job Management for more information.

Also, to use WIP for repair job management, you have to set up Resources within BOM (refer *Oracle Bills of Material User's Guide*), and to use Tasks, you must set up Resources within JTF Resource Manager (refer *Oracle CRM Foundation Implementation Guide*).

Considerations for Related Applications Setup

The implementation team must take note of the following while setting up the respective related application or module.

- Inventory
- Locations
- Employees
- Bills of Material

- Work In Process
- Purchasing
- Order Management
- Service Request
- Charges
- Tasks

Setting up Inventory

While setting up items in Master Items window, under the Service tab, ensure that you have populated the Billing Type. For example, set Material as the Billing Type if the item is a material. This field must not be null.

Please refer to *Oracle Inventory User's Guide* and/or *Oracle Purchasing User's Guide* for more information.

Setting up Locations

Define locations for where you ship, deliver internally, or bill the goods and services that you order. This is a necessary step if you plan on importing purchase requisitions from the Planner workbench into Oracle Purchasing.

Please refer to *Implementing Oracle CRM Foundation*.

Defining Employees

If you do not install Oracle Human Resource Management Systems (HRMS) with Depot Repair, then use the Enter Employee form to define and maintain employees in Oracle Purchasing. If Oracle HRMS is installed, forms in this application are used to enter and maintain employees.

A resource can be an employee defined in HRMS, and imported into CRM Foundation Resources.

Please refer to *Implementing Oracle HRMS* and *Implementing Oracle CRM Foundation*.

Setting up Bills of Material

When reviewing the Bills of material setup for Depot Repair, remember to review with the client whether the manufacturing Bills of Material should be primary. The

client can then create alternate Bills of Material to support the repair and upgrade activities of the depot.

Please refer to *Oracle Bills of Material User's Guide*.

Setting up Work in Process

To use Work in Process for repair job management, you will need to set up Resources within Bills of Material (BOM).

When reviewing the Work in Process setup for Depot Repair, remember that repair jobs use the non-standard Work in Process functionality. Also confirm with the accounting team to ensure that the appropriate General Ledger accounts have been created to record activity for Rework, Repair, or however the client desires to capture the accounting information.

Please refer to *Oracle Work in Process User's Guide*.

Setting up Purchasing

The three Receipt Routing Options in Oracle Purchasing include Direct Delivery, Inspection Required, and Standard Receipt. The Depot Repair Update Receiving program picks up only the receiving lines that are delivered to a subinventory. Use the Define Receiving Options form in Oracle Purchasing to choose the default Receipt Routing.

Please refer to *Oracle Purchasing User's Guide* for more information.

Setting up Order Management

Work in Process decrements inventory when a component is used in repair, but Order Management will decrement inventory again when the repaired product is shipped to the customer. To prevent this, ensure that a "Bill Only" Line Type is set up for the Order Management Line Type mapped to the Service Transaction Type for repairs performed in WIP mode. This, however, applies only to component parts, and not to the whole repaired product.

Please refer to *Oracle Order Management User's Guide* and *Oracle Shipping Execution User's Guide*.

Setting up Service Request

When setting up the Customer Party addresses using the Contact Center form, only if both the site and the site use is set up as active, will the addresses be displayed in

the Bill-To and Ship-To addresses List of Values in the Repair Header Information block of the Repair Orders form.

Please refer to *Oracle Support Implementation Guide* for more information.

Setting up Charges

Setting up Charges includes certain Depot Repair specific steps. These set up steps are detailed in the following chapter.

> **Note:** If you are upgrading from a previous release of Oracle Depot Repair, you will find that in Charges user interface, Transaction Type has been renamed to Service Activity and Transaction Billing Type to Service Activity Billing Type.

1. Oracle Order Management and Oracle Charges need to be set up correctly to ensure that products can be used in the Depot Repair process. This includes setting up all applicable Oracle Inventory flags for items to be returned (OM Returnable, Customer Ordered, Customer Order Enabled, Shippable, Transactable, and Invoicable) and shipped (Customer Ordered, Customer Order Enabled, Shippable, Transactable, and Invoicable).
2. All Repair, Material, Labor, and Expense items need to have a valid Billing Type associated as part of the Item definition setup in Inventory. This Billing Type along with the Repair Type and Service Activity and Billing Type setup determine what Service Activity Billing Type is to be used for the Product Transaction lines and Estimate lines being created.
3. Also, use the Service Request Multi Org Set Up window to set the defaulting rules for the charges operating unit. If the Oracle Applications installation is a multi-org installation, then Oracle Depot Repair derives the appropriate operating unit for the order interfaced to Order Management based on the sequence associated with these rules. If not, the operating unit is derived from the profile option MO: Operating Unit.
4. Use the Time & Material Labor Schedule window to set up a schedule for the business process being used for depot repair. This is needed to perform any labor transaction in the Debrief form accessed from the Repair Tasks tab in the Repair Orders form.

Please refer to *Oracle Service Implementation Guide* for more information.

Setting up Knowledge Management

Oracle recommends that you link Service Codes to statements of type Fact rather than seeding your own statement type for the purpose of searching the Knowledge Base. Note that you will not be able to perform the search based on Service Codes. A statement must be created with the Service Code Number or Name in order to allow search.

Please refer to *Oracle Knowledge Management Implementation Guide* for more information.

Setting up Tasks

To use Tasks for repair job management, you will need to set up Resources within (JTF) Resource Manager.

It is recommended that you set up task status transition rules. To define status transition rules for task status and map it to the Oracle Depot Repair responsibility being used, use the Task Status form.

Please refer to *Oracle CRM Foundation Implementation Guide* for more information.

3

Oracle Depot Repair-Specific Setup Steps

This chapter discusses implementation tasks that are specific to Oracle Depot Repair. Make sure that all the implementation steps prior to Depot Repair specific tasks as listed in the Implementation Checklist are completed and reviewed before proceeding with the tasks detailed here.

Topics discussed in this chapter include:

- Setting up Charges for Oracle Depot Repair
- Setting up Repair Types
- Setting up Depot Repair Service Request Type
- Setting up Depot Repair Reason Codes
- Setting up Customer Profile
- Defining Oracle Depot Repair Lookup Codes
- Setting up Oracle Depot Repair Profile Options
- Setting up Message Action Codes
- Managing Users
- Oracle Depot Repair Update Programs
- Charges and Repair Types Setup Example

Setting up Charges for Oracle Depot Repair

> **Note:** Every item to be processed using Charges must be set up in Inventory as an MLE (Material, Labor, Expense) item. This means every product in Oracle Applications that may need repair must be set up as a Charges MLE item.

Setting up Oracle Charges for Depot Repair processing includes the following setup steps:

- Defining Billing Type Codes
- Defining Billing Type Attributes
- Defining Service Activities and Billing Types
- Defining Service Business Processes
- Defining Install Base Transaction Sub Types
- Setting up Time and Material Labor Schedules

Billing Categories classify billing types into Material, Labor, and Expense. Each serviceable item in inventory is classified using Billing Type Codes associated to a Billing Category. A Service Activity Code is a type of action to be performed (example, replace, return, install, drain, fill). The combination of Billing Type and Service Activity defines the order type for a given operating unit. It also provides the basis upon which discounts for a service contract can be applied.

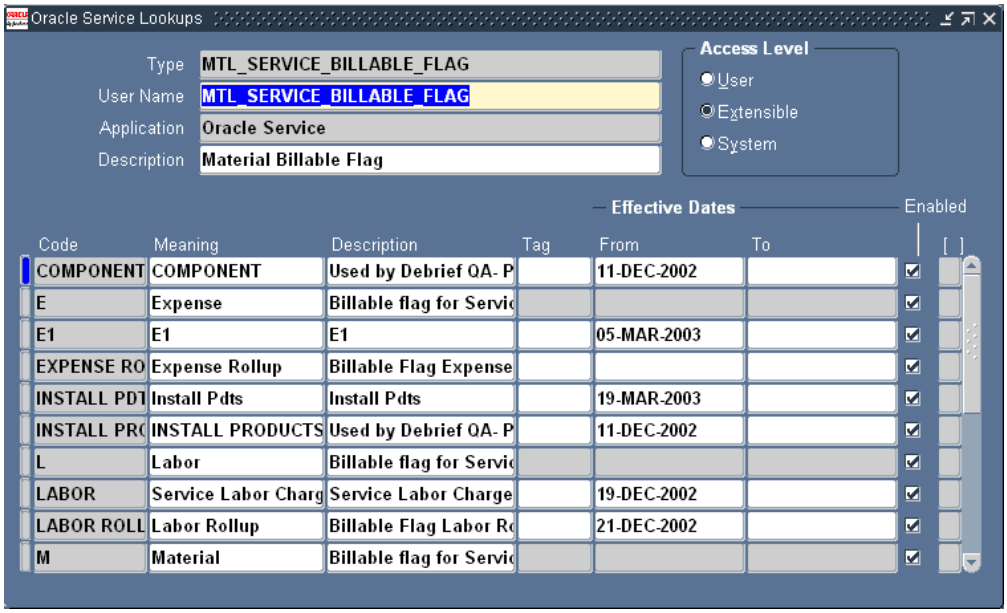
Defining Billing Type Codes

To define the Billing Type Codes, use the Oracle Service Lookups window.

To define Transaction Billing Type Codes:

1. From the Navigator, use the following path to open the Oracle Service Lookups window:

   Service Request > Setup > Customer Support Lookups.



2. Query up the Lookup Type MTL_SERVICE_BILLABLE_FLAG.
3. Add the new required Billing Type Codes. You can use the online help for more information.

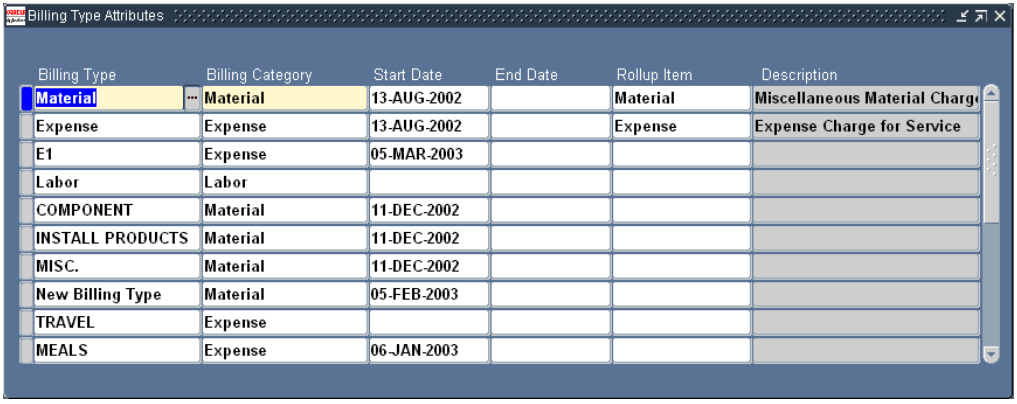
   The seeded Billing Type Codes are Material, Labor, and Expense.

Defining Billing Type Attributes

To associate billing type codes to billing categories, use the Billing Type Attributes window. The seeded billing categories include Material, Labor, and Expense.

Use the following path to navigate to the Billing Type Attributes window:

Service Request > Setup > Charges > Billing Type Attributes.



Only the Billing Types associated with a Billing Category in this window will appear in the Billing Type Name List of Values in the Service Activities and Billing Types form. Similarly only the Billing Type Names associated here will appear in the List of Values for Billing Type: Material, Labor, and Expense in the Repair Types form.

Defining Service Activities and Billing Types

Order Management Order and Line Types are associated with service activities that are assigned to repair types in Oracle Depot Repair. When a user chooses a repair type, these Order and Line Types determine the processing of charge lines (RMA, Ship, Estimate) for a repair order. Please refer to *Oracle Service User's Guide* and *Oracle Order Management User's Guide* for more details.

Oracle Order Management provides seeded Workflow process definitions for both orders and lines. It enables you to define both order header and order line service activities. The seeded service activities that Order Management provides are, however, not mapped by default. The Service Activity Code assigned to a Service Activity can be either Order or Line. If the Service Activity Code is Order, then the Order Category can have three values: Order, Return, or Mixed. If the service is of type Line, then the Order Category can have only two values: Order or Return.

A service activity may have a one to many relationship with Service Activity Billing Types. A Service Activity Billing Type, for example, Advanced Exchange: Material, is an intersection between Service Activity Advanced Exchange and Billing Type Material. A Service Activity Billing Type has a one to many relationship with Order Type and Line Type defined in Oracle Order Management.

A service activity is operating unit-specific. Line Category Code is set at transaction level to prevent the use of a single service activity as an order in one operating unit and a return in another.

Use the Service Activities and Billing Types window to confirm or define service activities and associated billing types, Order Management header types, and line types as detailed below.

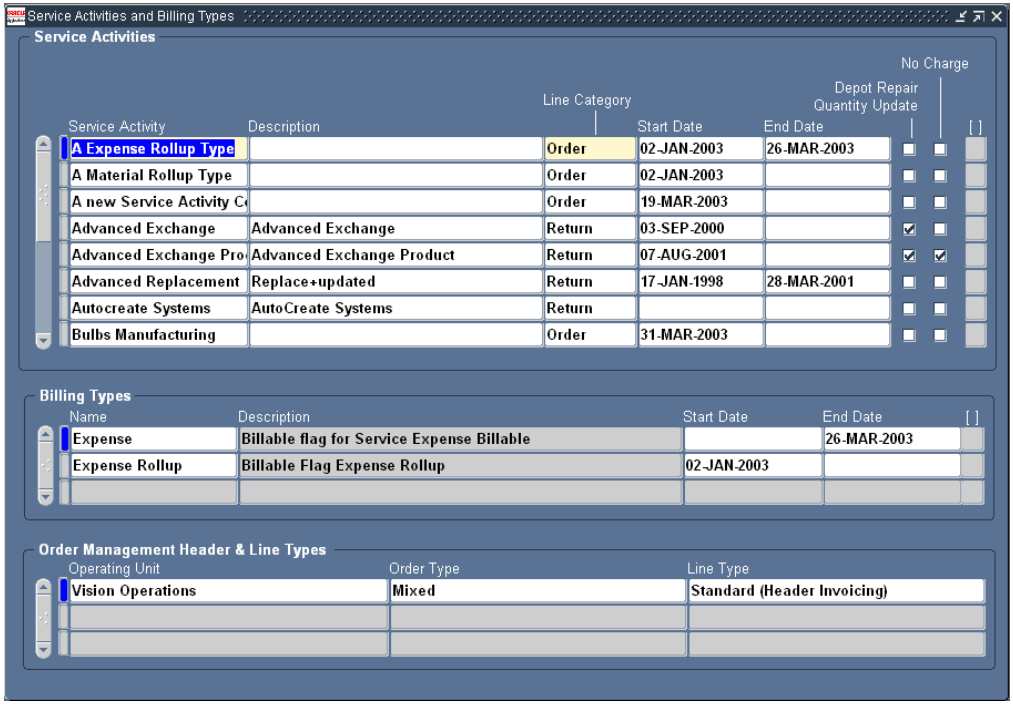
The Order Management Header & Line Types region is used to specify the organization, header type, and line type to be used when a charge line is submitted to Order Management. These values are used to retrieve an Order Management header type and line type from the setup while submitting the order.

Note: You can associate multiple billing types to a service activity.

To define Service Activities and Billing Types:

1. Open the Service Activities and Billing Types window using the following navigation path:

   Service Request > Setup > Charges > Service Activities and Billing Types.



2. Select the New toolbar icon to create an empty row for your service activity billing type.
3. Enter the appropriate values in the Service Activity and Line Category Code fields.
4. In the Related Billing Types region, select the appropriate billing type to be associated with the service activity you are creating.
5. Select the Depot Repair Quantity Update checkbox to update the depot inventory.

   Note: Only Service Activities with Depot Repair Quantity Update checkbox selected will be displayed in the Service Activity Code List of Values for RMA, Ship, Material, Labor, and Expense fields in the Repair Types window. The same is true for the Service Activity Code field on the Receive/Ship tab in the Repair Orders form.
6. Select the No Charge flag checkbox if you do not want to charge the customer for this service activity.

Note: When you select the Product Coverage tab in the Repair Orders form, all the applicable Service Contracts based on the Repair Order Item, Install base instance, Customer, Customer Account and Installed Site are displayed. You can select a contract from among those displayed as the default contract to be applied on an estimate line. After this is done, when you create an estimate line in the Repair Estimate tab, the default contract selected will be applied on the estimate line being created.

Please note that an estimate line is discounted based on the associated contract only if the Service Activity Billing Type of the estimate line is also set up for the contract. The Service Activity Billing Type of the estimate line is determined based on the Repair Type for the repair order, and the Billing Type for the estimate line item.

Also, if you select a contract that does not specify a price list, the system will default the price list set using the default price list profile option. This is possible only if the price list and the repair order are of the same currency. If the price list currency is not the same as the repair order currency, or if the profile option is not set, then you can select any price list from the List of Values.

7. Save the service activity and exit the Service Activities and Billing Types window.

Defining Service Business Processes

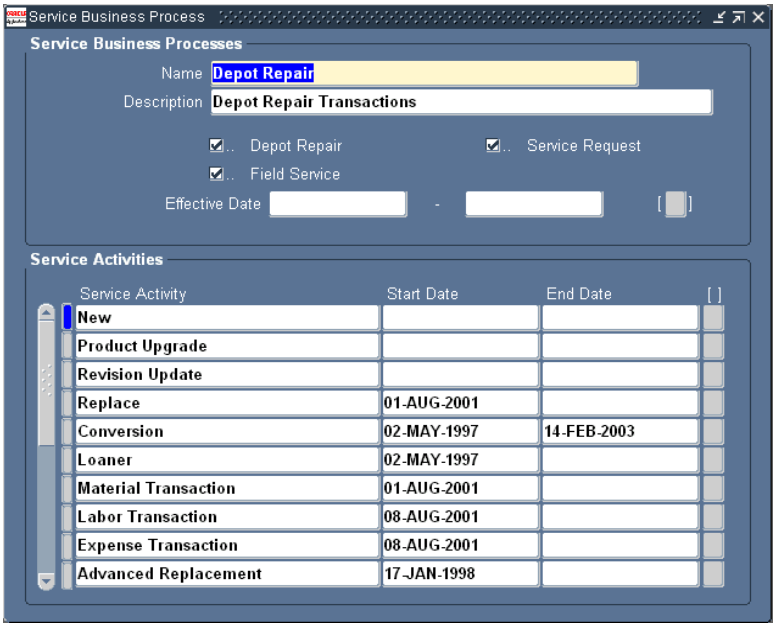
A business process is a group of service activities created with a view to restricting service activity availability. A business process supports the charge lines that the line of business in your organization can utilize, such as, Depot Repair.

Use the Service Business Process window to define your business process and associate service activities with it. Ensure that the Depot Repair checkbox is selected when setting up the business process. For a particular business process, the selected flag checkboxes indicate the modules (Service Request, Field Service, Depot Repair) in which this business process can be used.

To define Service Business Processes:

1. Open the Service Business Process window using the following navigation path:

   Service Request > Setup > Charges > Service Business Process.



2. Enter the appropriate value in the Name and Description fields.
3. Enter the Effective Dates for the business process if you want the business process to be used only for a limited time.
4. In the Service Activities region, select the service activity you want to associate with the business process.
5. Save your work, and exit the Service Business Process window.

Defining Install Base Transaction Sub Types

Service Activities and Sub Types are used to specify the kinds of transactions that interface programs can use.

Use the Transaction Sub Types window to specify the type of update that can be performed in an Install Base instance by transactions originating from Depot Repair that are interfaced with Install Base.

For products enabled for Install Base tracking, the service activities associated with the repair type chosen should have transaction sub types defined. For products not enabled for Install Base tracking, the service activities associated with the repair type chosen should not have transaction sub types defined. Hence you need to have

separate repair types and service activities defined for Install Base products and Non-Install Base products.

The Name field in the Transaction Sub Types region is used to name the transaction sub type being set up. For Depot Repair, this identifies the service activity for which the transaction sub type is being created. The list of available values for the Name field depends on the selection of the Service Type checkbox.

For Depot Repair, the Service Type checkbox should be selected. When the Service Type checkbox is selected, the Name field List of Values displays service activities.

A transaction sub type is linked to a service activity by the name of the transaction sub type. In other words, for a service activity that needs a corresponding transaction sub type defined, we define a transaction sub type and choose the service activity as the name of the transaction sub type. For example, for Return for Repair service activity, we define the corresponding transaction sub type by choosing Return for Repair as the name of the transaction sub type.

You can define the transactions and the kind of actions they can perform on the Source, Non Source, and Parent instances.

- Source Info region: Specify details of the instance being transacted, such as in a sales order, as a shipped item or a returned item.

  Note: Transaction sub types defined for OM_SHIPMENT source transaction type should not have Reference Reqd checked in the Source Info region. This is because Shipping does not understand and does not need Install Base reference numbers.

  Also, for non-serialized Install Base trackable products, when the product is shipped back to the customer, a new instance with a new Install Base reference number is created in Install Base for the shipped instance. For a serialized Install Base trackable product, the shipped product instance is identified in Install Base by the shipped product and the serial number.

- Non Source Info region: Specify information on a related instance, such as one that is being replaced by the source instance.

  Note: For Replacement repair type, the transaction sub type associated with the service activity for this repair type should have Reference Reqd checked in the Non Source Info region. The damaged product status is changed to EXPIRED by setting this in the Non Source Info region.

- Parent Info region: This region is currently not in use.

In the Source Transaction Types region, Source Transaction Type needs to be defined only for Oracle Order Management. For Depot Repair, only Oracle Order

Management needs to be set up as source application. Please make sure that the Update IB checkbox is selected here.

The Change Owner checkbox and Change Owner To field in the Transaction Sub Types window determine whether the instance ownership has to be changed. In the case of Repair Type Return and Repair, for example, the Transaction Sub Types for Return and Ship do not have either the Change Owner checkbox selected or the Change Owner To field populated. But in the case of Repair Type Exchange, the product is changed, and hence the Source Info region for the Transaction Sub Types for Return and Ship have the Change Owner checkbox and Change Owner To field selected.

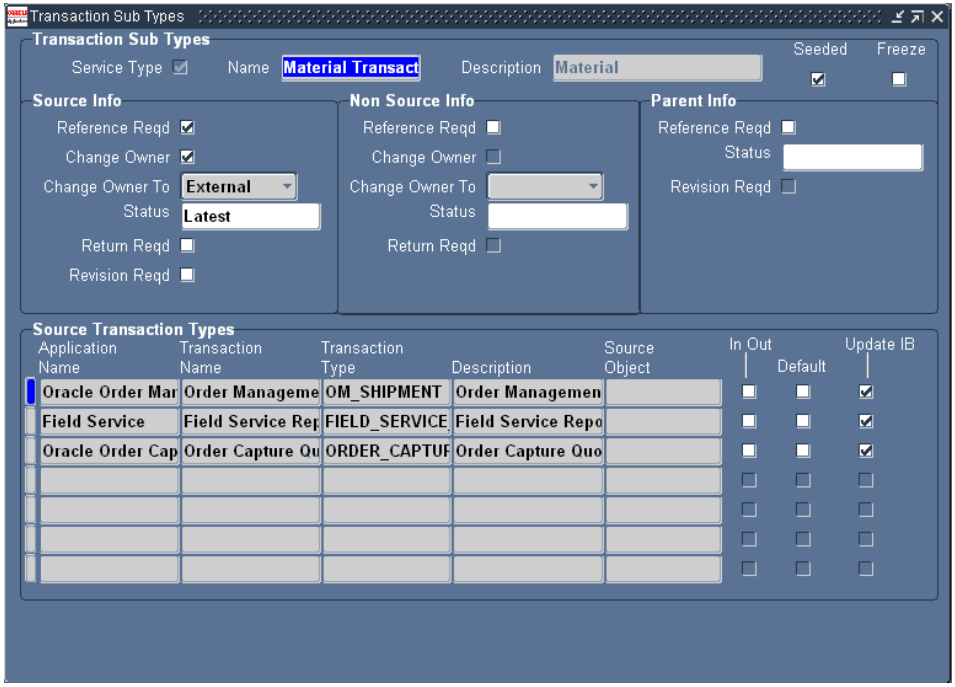
To transfer the warranty, for Ship Transaction Sub Type, the Non Source Info region should have Reference Reqd checkbox selected. This ensures that at the time of shipping the new product, the warranty information is transferred. This is true for Repair Type Exchange, Advance Exchange, and Replacement.

Detailed information on Install Base Transaction Sub Types is available in the *Oracle Install Base Implementation Guide*.

To define Install Base Transaction Sub Types:

1. Open the Transaction Sub Types window using the following navigation path:

   Service Request > Setup > Charges > Install Base Transaction Types



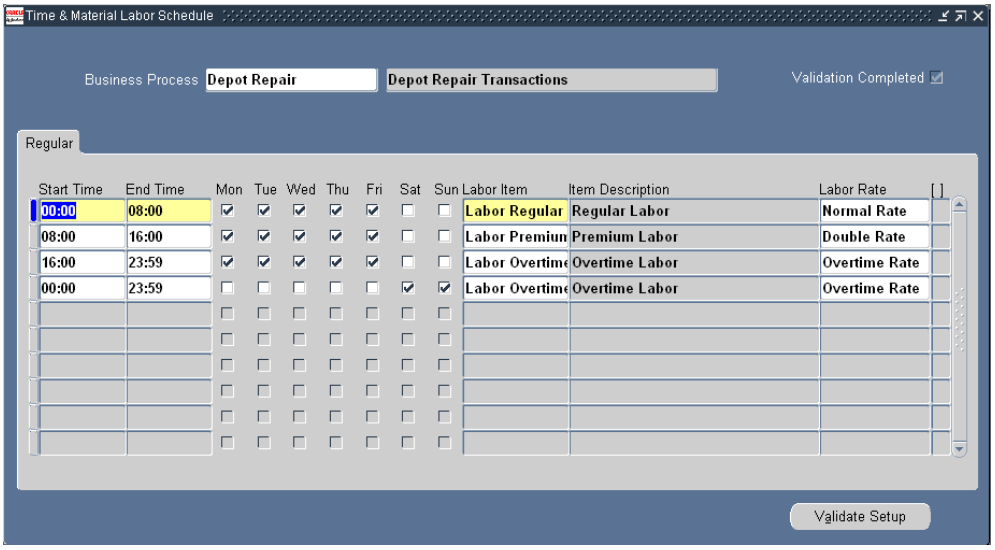
2. Enter the appropriate values in the fields as explained above.
3. Save your work, and exit the Transaction Sub Types window.

Setting Up Time and Material Labor Schedules

Use the Time & Material Labor Schedule window to set up schedules for the Depot Repair business process. This is required to process any labor transaction in the Debrief form accessed from the Repair Tasks tab in the Repair Orders form.

From the Navigator, use the following path to access the Time & Material Labor Schedule window:

Service Request > Setup > Charges > T&M Labor Schedule.



For more information, please refer to the online help.

Setting up Repair Types

Oracle Depot Repair supports the following Repair Types:

Advanced Exchange The depot sends a replacement product to the customer before receiving the damaged product for core credit.

Exchange The depot sends a replacement product to the customer after a broken product is received from the customer for core credit.

Loaner The depot sends a loaner product to the customer.

Loaner, Repair and Return Same as Repair and Return with a product loaned to the customer before receiving the broken product, so as to bridge the gap while the damaged product is being repaired.

Repair and Return A broken product is repaired by the depot, and then returned to the customer.

Replacement The depot sends a new replacement product to the customer without having to receive a damaged product from the customer.

Standard The depot agent is uncertain about a customer need, and is unable to take a decision before further inspection of the damaged product. RMAs and Sales Orders are created manually. The depot agent has the option to carry out all functions in a manual mode.

Walk-In Repair The customer delivers a damaged product at the depot. The product is returned to the customer after repair. This scenario is also used to process unplanned returns. Walk-In Repair behaves similar to Return and Repair with the exception that the Walk-In Repair repair type is seeded with Tasks as its Repair Mode.

Walk-In Repair with Loaner Same as Walk-In Repair, except that a loaner product is provided to the customer to bridge the gap while the damaged product is being repaired. Walk-In Repair with Loaner is similar to Loaner, Repair and Return with the exception of its being seeded with Tasks as Repair Mode.

The Repair Types Setup Screen

Repair Types setup determines the proper processing and management of repair orders by the application and service organization. The Repair Types Setup screen determines which, and how each of the seeded repair types are used in the service organization, whether Oracle Tasks or Oracle WIP is used in repairs management, and how charge lines are identified as they are passed to Order Management.

A service organization can also make a copy of the selected repair type, and customize as necessary. Though the Repair Type Reference drives application process automation, this capability enables service organizations to better distinguish their repair types if necessary.

Use the Repair Types Setup window to perform the following tasks:

- Customize the Repair Types
- Select Repair Modes for Repair Types. A repair order is created with the repair mode defined in repair type.
- Select Repair Type Reference for custom Repair Types
- Select Business Process for Repair Types
- Select default Service Activity Codes for RMA and Sales Order lines for Repair Type. The default product transactions are created with the order and line types

associated with the Service Activity Billing Type for the repair type and repair item. This classifies the created sales order and RMA order lines for respective repair types.

- Select Billing Types and enter Service Activity Code for material, labor, and expense charge lines. You can enter more than one Billing Type and Service Activity Code for material and expense charge lines. This classifies the material, labor, and expense charge lines for Order Management processing. This is needed only if using Repair Estimates functionality.
- Select preferences to process Product Transaction lines for Repair Types by selecting Automatically Enter and Book RMA and Automate Order Processing Steps through: Enter Order, Book Order, Pick Release, Ship Confirm.

Note: Only the Service Activities associated with the selected Business Process for the repair type will be displayed in the Service Activity Code List of Values in the Repair Types window. The same is true for the Service Activity Code List of Values in the Receive/Ship tab in the Repair Orders window.

Table 3–1 Repair Types Setup Fields

Control	Description	Editable	Seeded Values
General			
Repair Type	A short description of the repair type. This description appears in the application during repair type selection	Yes	Same name as Repair Type Reference, but editable.
Description	A more detailed explanation of the repair type	Yes	--
Start Date	The effective start date of the repair type	Yes	--
End Date	The effective end date of the repair type	Yes	--
Repair Mode	Determines whether Oracle Tasks or oracle WIP is used for repair job management	No	■ Tasks ■ WIP

Table 3–1 Repair Types Setup Fields

Control	Description	Editable	Seeded Values
Repair Type Ref	Identifies the business process that the application logic should follow when the repair type is selected	No	▪ Advanced Exchange ▪ Exchange ▪ Loaner ▪ Loaner, Repair and Return ▪ Repair and Return ▪ Replacement ▪ Standard
Business Process	The combination of Repair Type Ref and Business Process identifies the applicable Transaction Billing Types	Yes	Depot Repair
Service Activity Codes			
Post-Repair Ship	Classifies the created sales order line for respective repair type reference. If repair type reference does not require this sales order line, this entry is disregarded.	Yes	--
Pre-Repair RMA	Classifies the created RMA order line for respective repair type reference. If repair type reference does not require this RMA line, this entry is disregarded.	Yes	--
Pre-Repair Ship	Classifies the created sales order line for respective repair type reference. If repair type does not require this sales order line, this entry is disregarded.	Yes	--
Post-Repair RMA	Classifies the created RMA order line for respective repair type reference. If repair type reference does not require this RMA line, this entry is disregarded.	Yes	--
Repair Type Details: Billing Type			
Material	Enables the classification of material charge lines for Order Management processing	Yes	Material
Labor	Enables the classification of labor charge lines for Order Management processing	Yes	Labor
Expense	Enables the classification of expense charge lines for Order Management processing	Yes	Expense

Table 3–1 Repair Types Setup Fields

Control	Description	Editable	Seeded Values
Checkboxes			
Automatically Enter and Book RMA	Decides whether to default Auto RMA checkbox as checked or unchecked for repair orders. Auto RMA means entering and booking RMA. When a repair order is created with this checkbox selected, an RMA line is entered and booked automatically. You can still manually override default for individual repair orders.	Yes	--
Automate Order Processing Steps through: ■ Enter Order ■ Book Order ■ Pick Release ■ Ship Confirm	This decides whether to default Automate Order Processing Steps through selected options for repair order shipping lines. If this checkbox is selected, selecting a radio button option decides the default option for the repair order shipping line. Note that the shipping line is always only entered regardless of what is selected here. The selection here defaults the checkbox and radio button option for the repair order shipping line. The user can still manually override the default selection for individual repair orders.	Yes	--

For details on seeded repair types setup, see Charges and Repair Types Setup Example.

The following table presents the user level Repair Types setup options.

Table 3–2 User Level Depot Repair Types Setup Options

Name	Values	Description
Repair Mode	Seeded Values: ■ ALL ■ NONE ■ TASK ■ WIP	Select a Repair Mode for the Repair Type
Repair Type Ref	Seeded Values: ■ Advanced Exchange ■ Loaner ■ Loaner, Repair and Return ■ Exchange ■ Replacement ■ Repair and Return ■ Standard Repair ■ Walk-In Repair ■ Walk-In Repair with Loaner	Select a repair type that determines business process to be followed
Business Process	Select from List of Values	Select a business process
Default Service Activity Codes		
Post-Repair Ship	Select from List of Values	Service Activity Code needed to ship repaired product
Pre-Repair RMA	Select from List of Values	Service Activity Code needed for an RMA presents the Credit
Pre-Repair Ship	Select from List of Values	Service Activity Code needed to ship a Loaner product
Post-Repair RMA	Select from List of Values	Service Activity Code needed for an RMA "Credit"
Repair Type Details: Billing Types		

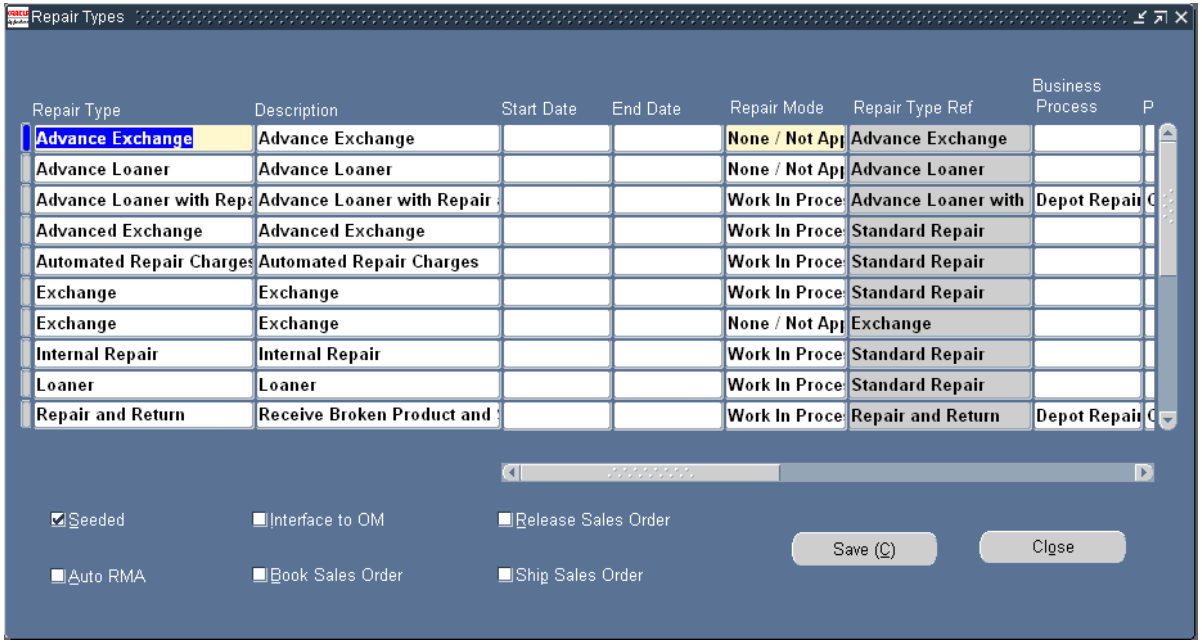
Table 3–2 User Level Depot Repair Types Setup Options

Name	Values	Description
Material	Select from List of Values	Billing Type and Service Activity Code needed for material transactions during the repair
Labor	Select from List of Values	Billing Type and Service Activity Code needed for charging labor involved during the repair
Expense	Select from List of Values	Billing Type and Service Activity Code needed for charging expenses incurred during repair

To set up Repair Types:

1. From the Depot Repair Navigator, use the following path to open the Repair Types window:

   Depot Repair > Setup > Repair Types



2. Define the necessary Repair Types.
3. Enter the fields in the Repair Types window making necessary selections for defining your repair types as explained above.

4. Save your work. After a Repair Type is set up, it should have default values for the following fields:
   - Repair Mode
   - Repair Type Ref
   - Business Process
   - Default Service Activity Codes (Pre-Repair RMA, Pre-Repair Ship, Post-Repair RMA, Post-Repair Ship). Default values are required only for the applicable transaction for the repair type.
- Billing Types and associated Service Activity Codes (Material, Labor, Expense). Default values are needed only if Repair Estimates functionality is used.

Table 3–3 Depot Repair Type Processing Flags

Name	Values	Default	Description
Automatically Enter and Book RMA	Checked/Unchecked	Checked	Decides whether to default Auto RMA checkbox as checked or unchecked for repair orders. Auto RMA means entering and booking RMA. When a repair order is created with this checkbox selected, an RMA line is entered and booked automatically. You can still manually override default for individual repair orders.
Automate Order Processing Steps through: ■ Enter Order ■ Book Order ■ Pick Release ■ Ship Confirm	Checked/Unchecked	Checked with Ship Confirm radio button selected by default	This decides whether to default Automate Order Processing Steps through selected options for repair order shipping lines. If this checkbox is selected, selecting a radio button option decides the default option for the repair order shipping line. Note that the shipping line is always only entered regardless of what is selected here. The selection here defaults the checkbox and radio button option for the repair order shipping line. The user can still manually override the default selection for individual repair orders.

Setting up Depot Repair Service Request Type

Service request types help categorize your service requests. For each service request type, you can set up service request statuses. These statuses will then be inherited by all the service requests belonging to the service request type you are defining. Note that the service request status must be defined before you can assign it to a service request type. The service request type is mapped to the service request statuses using status group, which groups statuses.

Each service request type can be linked to an existing Oracle Workflow process. The workflow can be automatically launched when the service request is created (not when it is updated) or manually launched depending on the settings you enter while defining service request types. The new service request type *Depot Repair* and related statuses register as entries in the lists of values for their fields in the Repair Order window. See *Oracle Customer Support Implementation Guide* for more information.

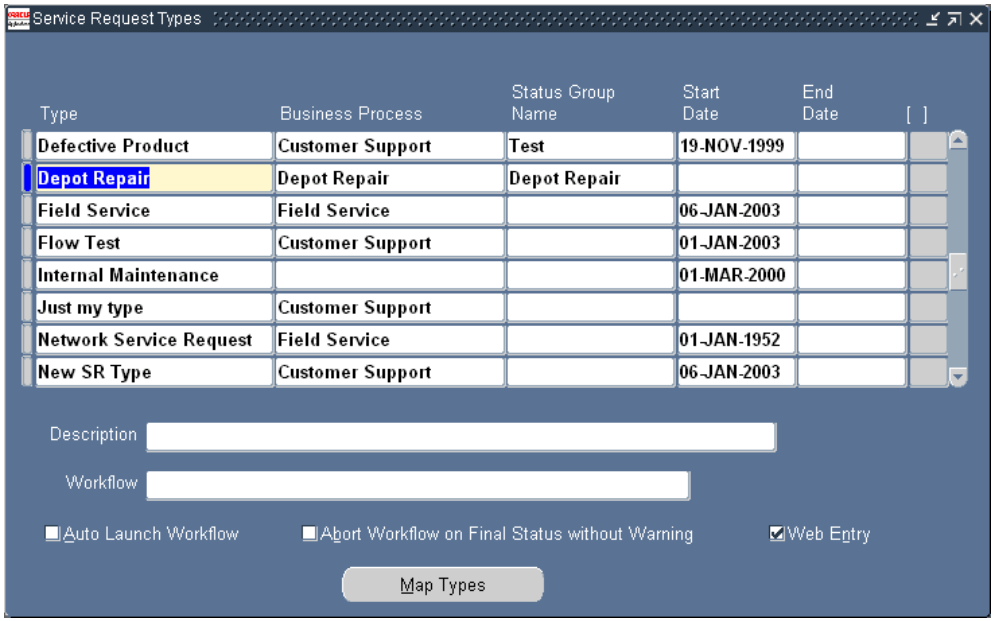
The Service Request Type window is used to link a Service Request Type to a Business Process. The Service Request Type *Depot Repair* needs to be associated with the applicable business process for your organization.

To setup service request types:

1. Navigate to Service Request Types window using the following path:

   Service Request > Setup > Service Requests > Request Types

   The window lists all the existing service request types.



2. Click the New toolbar button to create a blank row for defining your service request type.
3. In the Type field, enter the name Depot Repair for the service request type.
4. In the Business Process field, select the business process for which this service request type is being created. In this case, the business process is Depot Repair.
5. Enter the Status Group Name, which in this case is Depot Repair.
6. Enter the effective dates for the service request type in the Start Date and End Date fields.
7. Enter a brief description of the request type in the Description field.
8. In the Workflow field, select the Generic workflow. Do not select the Auto Launch Workflow check box, if this workflow is selected.
9. Optionally, select from the available checkboxes. Refer to the following table for details of the actions initiated when the checkboxes are selected.

Checkbox	Action
Auto Launch Workflow	Launches workflow automatically when the service request is saved. Not to be used with Oracle Depot Repair Generic Workflow.
Abort Workflow on Close	Aborts workflow when service request status is set to closed
Web Entry	Makes this service request type accessible to web entry through *i*Support. Currently not used with Oracle Depot Repair.

10. Save your work.

Setting up Depot Repair Reason Codes

Reason Codes are values defined for the different reasons that affect the return of a product for repair. Reason Codes relate to the depot's repair acceptance, and customer approval of the repair estimate.

Oracle Depot Repair provides the following seeded Reason Codes:

Table 3–4 Repair Type Reason Codes

Code	Description
ADV_EXCH	Advanced Exchange
APPRV	Customer approves the RMA
EST	Estimate approved
HOLD	Repair on hold
LOANER	Loaner
PRCD RPAIR	Proceed with Repair
REJECT_1	Product not repairable
REJECT_2	Declined repair
REV_EST	Revised estimate approved
WAIT_1	Customer contacted
WAIT_2	Awaiting approval

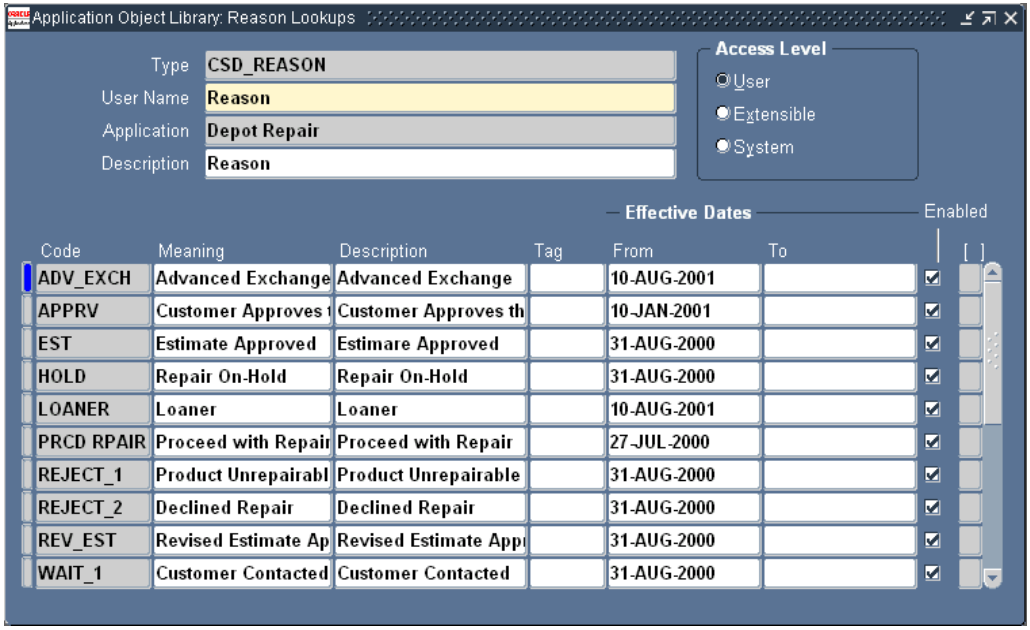
You can set up the reason codes for use in your organization using the Application Object Library: Reason Lookups window.

> **Note:** You can define additional reason Lookup Codes using the Lookups window. For detailed instructions, see Defining Oracle Depot Repair Lookup Codes.

To set up Depot Repair Reason Codes:

1. From the Depot Repair Navigator, use the following path to navigate to the Application Object Library: Reason Lookups window:

   Depot Repair > Setup > Reason



   The Reason Lookups window consists of the following fields:

   - Type: refers to the Lookup Type and is seeded value that the user cannot modify
   - User Name: refers to a user definable value for this Lookup Type

- Application: refers to the application that owns the reason types being defined
- Description: refers to the description of the Lookup Type
- Code: is the unique code assigned to a reason type
- Meaning: represents the meaning of the Code
- Description: refers to the description for the Code
- Tag: refers to an optional additional category hard code, and is not used by Depot Repair
- Effective Date From: represents the first date that the Reason Code was available and valid
- Effective Date To: represents the last date the Reason Code was available and valid
- Enable checkbox: when selected, enables the use of the Reason Code while using Oracle Depot Repair

2. Enter, or modify the values in the fields as required for use in your depot.
3. Click the Save icon on the toolbar to save your setup.

Setting up Customer Profile

Customer Profile displays summarized information about the customer that is appropriate for the service representative to know. It may contain information such as the number of open service requests. These profile checks are flagged by appropriate ratings and colors that provide instant visual clues to the service representative to assist in appropriate engagement with the customer. Customer Profiles also furnish the ability to drill down from a profile check to a detailed list, and then to the original transaction.

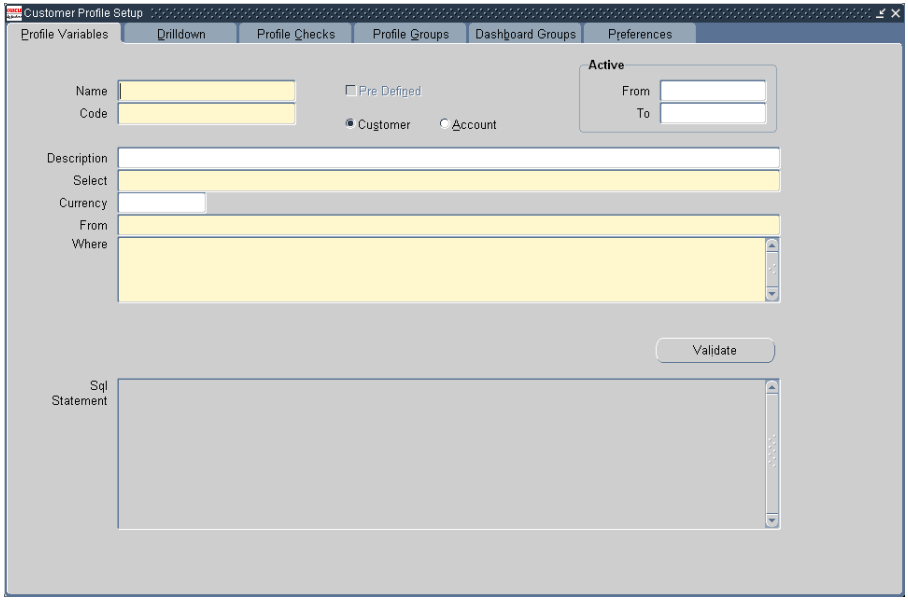
You can define profile checks, and combine multiple checks with complex criteria. It is also possible to define critical customer criteria by using profile checks.

The profile engine (a concurrent program) runs periodically to check and store changes to profile checks.

Use the Customer Profile Setup window to define the profiles based on critical customer information that needs to be readily accessible by the service representative. You may already have set up Customer Profile if other Oracle Service application modules are in use at your organization.

To navigate to the Customer Profile Setup window, use the following path:

Service Requests > Setup > Customer Management > Customer Profiles



Follow these steps to setup Customer Profiles:

- Define Profile Rating Lookup Codes
- Define Profile Variables
- Define Drilldowns
- Define Profile Checks
- Define Profile Groups
- Define Dashboard Groups
- Associate Profiles with Modules
- Define Preferences
- Define Rating Labels
- Define Categories
- Run the Customer Profile Engine

For detailed instructions, refer to the *Oracle Customer Care Implementation Guide*.

Defining Oracle Depot Repair Lookup Codes

You can maintain existing Lookups as well as define additional Lookups for your shared Lookup Types. You can define up to 250 Lookups for each Lookup Type. Each Lookup has a Code and a meaning. If you make changes to a Lookup, you must log out and then log back on before your changes take effect.

The following Lookup Types are pre-seeded in Oracle Depot Repair. For more information, refer to Appendix B.

Table 3–5 Oracle Depot Repair Lookup Types

Lookup Type	Description
CSD_APPROVAL_STATUS	Repair Approval Status (Approved, Rejected)
CSD_ESTIMATE_STATUS	Estimate Status (Accepted, Bid, Closed, Draft, Hold, Rejected)
CSD_EST_BILLING_TYPE	Estimate Billing Type (Expense, Labor, Material)
CSD_EVENT	Repair Event (Customer Approved, Charges Recorded, Repair Diagnosed, Repair Job Completed)
CSD_PRODUCT_ACTION_CODE	Product Transaction Action Code for Repair Orders (Customer, Product, Exchange)
CSD_PROD_ACTION_TYPE	Depot Repair Order Product Transaction Action Types (Return Product, Ship Product, Walk-In Issue)
CSD_PRODUCT_TXN_STATUS	Product Transaction Status (Booked, Entered, Received etc.)
CSD_REASON	Reason for current status of repair process (Customer Approves the Estimate, Estimate Approved, Repair On Hold)
CSD_REJECT_REASON	Estimate Reject Reasons (Customer Reject, Machine Unavailable, Resource shortage)
CSD_REPAIR_MODE	Repair Mode for the depot repair processes (WIP, Tasks, None, All)
CSD_REPAIR_STATUS	Repair Status (Closed, Open, On Hold)

Table 3–5 Oracle Depot Repair Lookup Types

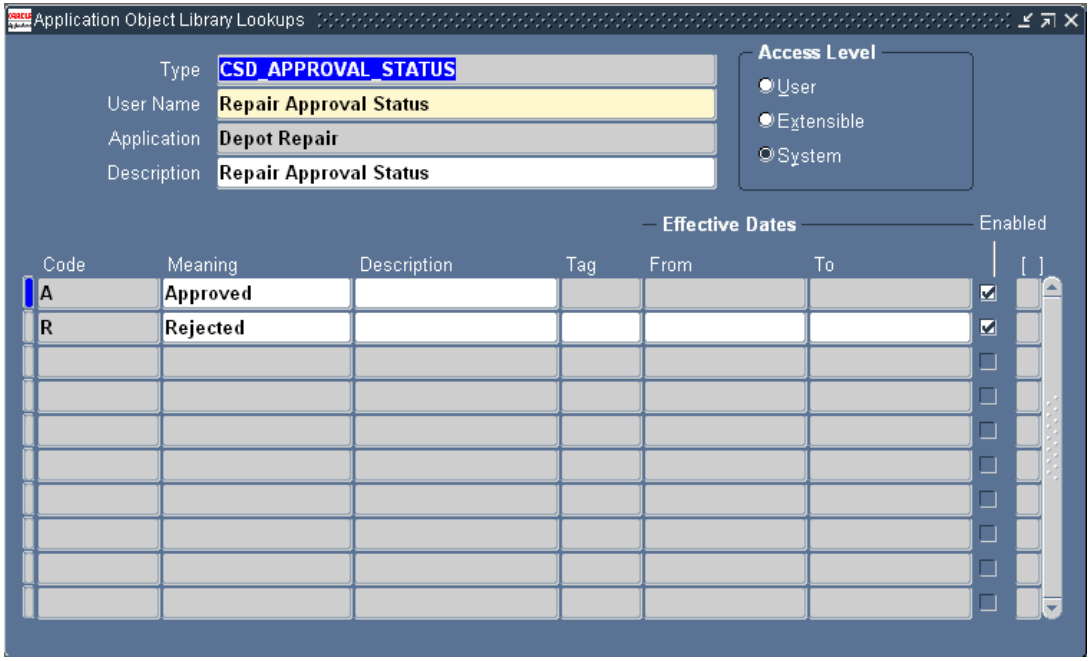
Lookup Type	Description
CSD_REPAIR_TYPES	Depot Repair Types (Advance Exchange, Walk-In with Return and Repair etc.)
CSD_RO_TXN_STATUS	Repair Order Transaction Status (OM Booked, OM Received, OM Released etc.)
CSD_UNIT_OF_MEASURE	Lead Time Unit of Measure (Hour, Week, Day)
CSD_WIP_JOB_STATUS	Repair Job Status (Released, Unreleased)

To define Oracle Depot Repair specific Lookup Codes:

Switch to the Application Developer responsibility.

1. From the Application Developer Navigator window, use the following path to navigate to the Applications Object Library Lookups window:

   Functions (tab) > Application > Lookups > Application Object Library



2. Run a query to display the details of the Lookup Type under which you want to define the lookup code. Several lookup types (listed above) are pre-seeded in Oracle Depot Repair.
3. Click anywhere in the spread table. Now click the New tool bar button to open a blank row.
4. Enter a name for the Lookup Code in the Code field. The code name is internal to the system.
5. Enter a User Name for the Lookup Code in the meaning field. This value is displayed in the LOV.
6. Optionally enter a description in the Description field.
7. If you want the Lookup Code to be effective only for a specific period, set the period by selecting the Effective Dates From and To fields.
8. Verify that the Enabled checkbox is selected. Only enabled Lookup Codes will appear in the List of Values.
9. Save your work.

Setting up Oracle Depot Repair Profile Options

Profile is a set of changeable options that affect the way your application looks and behaves. As System Administrator, you control how Oracle Depot Repair operates by setting profile options to the values you want. You can set profile options at four different levels: site, application, responsibility, and user. For a detailed discussion of User Profile options, refer to the *Oracle Applications System Administrator's Guide*.

When a profile option may be set at more than one level, site has the lowest priority, superseded by application, then responsibility, with user having the highest priority. For example, a value entered at the site level may be overridden by values entered at any other level. A value entered at the user level has the highest priority, and overrides values entered at any other level.

Use the System Profile Values window to set up the profile values. The following profile options may be modified to customize Oracle Depot Repair to suit your specific requirements.

Table 3–6 Oracle Depot Repair Profile Options

Profile Name	Possible Values	Description
CSD: Customer Approval Required	Yes or No	Determines whether customer approval of the estimate is required for creating a repair job
CSD: Debug Level	1 to 10	Determines the Debug level for Depot Repair transactions.
CSD: CSD_PRINTER_NAME	<Printer Name>	Determines Printer for printing repair estimate report
CSD: Repair Mode for Depot Repair Orders	Work in Process, Task, None/ Not Applicable, All	Determines Repair Mode for Depot Repair Processes, site level
CSD: Default Return Reason Code for RMAs	Damaged Product etc.	Determines default Return Reason Code for product transaction: RMAs
CSD: Default Pick Release Rule for Sales Orders	Standard etc.	Determines default Pick Release Rule for Repair Order related sales orders. This is a mandatory profile option.
CSD: CSD_PRINTER_ REQUIRED	Yes or No	Determines whether a printer is required
CSD: Directory for Depot Repair Log files	No predefined set of values. The value is specified at the time of implementation. For example, it can be set up as /sqlcom/log/SRVSTR9.	Determines directory for Depot Repair log files. This is a mandatory profile option.
CSD: Default Repair Type	■ Advanced Exchange ■ Exchange ■ Loaner ■ Loaner, Repair, and Return ■ Repair and Return ■ Replacement ■ Standard ■ Walk-In	Determines the default repair type for new repair orders
CSD: Estimate Approval Required	Yes or No	Determines whether customer approval of the estimate is required for creating the repair job

Table 3–6 Oracle Depot Repair Profile Options

Profile Name	Possible Values	Description
CSD: Enable Knowledge Management	Yes or No	If set to No, the Knowledge Base section in the Repair Estimate tab will be disabled.
CSD: Default Price List	<Price List>	Sets the default price list for the Depot Repair application.
CSD: Default Sales Representative	<Sales Representative>	Specifies the default sales representative.
CSD: Default Country Code (Phone)	<Country Code>	Specifies the default country code for phone number fields.
CSD: Enable Estimates	Yes or No	This determines whether the Repair Estimate tab will be enabled or disabled in the Repair Orders window.
CSD: Allow Creating WIP Job without RMA	Yes or No	Determines whether creation of WIP job without RMA is allowed. If set to Yes, you can create repair jobs without an RMA. Otherwise, the restriction requiring an RMA to create a WIP job will remain enforced.
CSD: Allow Internal Repair	Yes or No	Determines whether internal repair is allowed. If set to Yes, this will allow you to view and select products that are in in-house inventory when you create a repair order. The Serial Number and Install Base Reference Number List of Values for the repair order will display product instances within the service organization along with the product instances at customer site. To create a repair order against an internally owned product instance, you will need to leave the Product related fields blank in the Repair Header Information section of the Depot Repair workbench. For leaving the Product fields blank in the Repair Header Information region, the profile CSD: Require Product for Service Request must be set to No.
CSD: Require Product for Service Request	Yes or No	Determines whether Product is required for service request creation. When the profile is set to Yes (default), a product will be required in order to create a service request. When this profile is set to No, no product is required to create a service request. Also, when set to No, you can specify an installed base product without specifying a reference number in the service request.

Table 3–6 Oracle Depot Repair Profile Options

Profile Name	Possible Values	Description
CSD: Allow processing product txn w/o Serial Number	Yes or No	Determines whether to allow processing of product transaction without Serial Number. If the profile option value is No, then the Serial Number field is mandatory. If the profile option value is Yes, then the Serial Number field is not mandatory. If the Serial Number field is not mandatory, you will not be able to automate the shipping of the sales order directly from Oracle Depot Repair; rather, you will need to launch the Oracle Shipping forms and enter the Serial Number before shipping. The Ship checkbox on the Receive/Ship tab will be disabled if no serial number has been entered when the item on the Receive/Ship line is serialized. After a Receive/Ship line has been interfaced to OM, that line (including the Serial Number field) cannot be updated. Note that this profile value does not apply to RMA lines. If the product transaction line is of line category Return, Serial Number is mandatory for serialized items, irrespective of the value of this profile. This profile applies only for product transaction lines of line category Order.
CSD: Allow Charge Override for Estimates	Yes or No	Determines whether to allow overriding of Charge field value for estimate lines.
CSD: Default Repair Job Status	Released or Unreleased	Determines the default Repair Job Status. If set to Released, repair jobs will be submitted to WIP as released, by default, allowing the job to begin, and permitting material transactions against the job.

The following profile options, though not owned by Oracle Depot Repair, provide certain application functionality:

Table 3–7 Impacting Profile Options not Owned by Oracle Depot Repair

Profile Name	Possible Values	Description
Service: Default Group Owner for Service Requests	Profile options Service: Default Group Owner for Service Requests and Service: Default Group Owner Type for Service Request both have to be either defined or NULL	Restricts the Service Request Owner List of Values depending on the selected profile value.
Service: Default Group Owner Type for Service Request	Profile options Service: Default Group Owner for Service Requests and Service: Default Group Owner Type for Service Request both have to be either defined or NULL	Restricts the Service Request Owner List of Values depending on the selected profile value.
Service: Default Service Request Owner	No predefined set of values. The value has to be specified during implementation.	This defaults the Service Request Owner in the Repair Order form.
Service: Default Service Request Owner Type	No predefined set of values. The value has to be specified during implementation.	This defaults the Service Request Owner Type. This field is not displayed in the Repair Orders form.
Service: Inventory Validation Organization	No predefined set of values. The value has to be specified during implementation.	Items are validated against the Organization specified by this profile. This is mandatory and can usually be set to the Master Inventory Organization.
Service: Restrict Installed Base for location validation	Yes or No	If set to Yes, the Install Base Reference Number List of Values will be restricted to HZ_PARTY_SITES or HZ_LOCATIONS.

Table 3–7 Impacting Profile Options not Owned by Oracle Depot Repair

Profile Name	Possible Values	Description
Task Manager: Default Task Status	The value has to be specified during implementation.	If a status transition rule is defined, and is mapped to the Oracle Depot Repair responsibility being used, then this profile is mandatory. This profile specifies the default starting status for a Task in the Repair Tasks tab in the Repair Order form. If this profile is not set, then when creating a task, the status LOV will have no values. If no status transition rule is mapped to the Depot Repair Responsibility, then this profile is not mandatory, and the task status LOV in this case will list all the task statuses. It is recommended to setup status transition rules.
Task Manager: Default Task Owner	The value has to be specified during implementation.	Determines the default value for the Task Owner field on the Repair Tasks tab in the Repair Orders window
Task Manager: Default Priority	The value has to be specified during implementation.	Determines the default Task Priority value on the Repair Tasks tab.
Task Manager: Default Task Type	The value has to be specified during implementation.	Determines the default Task Type on the Repair Tasks tab in the Repair Orders window
Task Manager: Owner Type for a Task	The value has to be specified during implementation.	Determines the default Owner Type for a task selected on the Repair Tasks tab in the Repair Orders window.
Server Timezone	The value has to be specified during implementation.	Determines the server time zone, and is mandatory. This is used in the Product Coverage tab in the Repair Orders window to sort the contracts by response resolution time.
Start Menu in Quickmenu	Depot Repair Quick Menu	Quick Menu under the Tools Menu in the Repair Orders window points to the menu specified by this profile. This profile has to be set at the responsibility level, and must be set to the seeded menu: Depot Repair Quick Menu.

Setting up Message Action Codes

Please refer to *Oracle Support Implementation Guide* for instructions on setting up Message Action Codes. Message Action Codes are used to specify the type of action you want a message recipient to take.

Managing Users

This section discusses how to handle user management issues when setting up Oracle Depot Repair.

Login Interfaces

The menus that appear after login depend upon the roles and responsibilities assigned to the log in parameters assigned to a user. Users will not be able to access Oracle Depot Repair functionality until they have been assigned both roles and responsibilities.

Roles, Responsibilities, and Permissions

During the implementation process and throughout the life span of Oracle Depot Repair, it will be necessary for an administrator to assign roles, responsibilities, and permissions to users.

A role is a collection of page and function level permissions that are granted to maintain application security. A permission is the smallest unit making up a role.

There are two types of permissions: Functional and Data Access Control (DAC). Permissions dictate the actions that a user can perform.

Responsibilities control the presentation of menus, tabs, and screens. For example, the responsibility Depot Repair Super User gives users a different set of menus than the responsibility given to a technician.

Oracle Depot Repair provides Depot Repair Super User as the seeded responsibility.

Creating Oracle Depot Repair Users

A user refers to any person who needs access to Oracle Depot Repair. This includes employees ranging from call center agents to depot planners, technicians, accountants etc.

While you can create a number of user types, the basic procedures for defining them remain identical. The roles and responsibilities assigned to each user type may be different.

Creating users involves the following tasks:

- Defining responsibilities
- Defining users
- Assigning responsibilities to users

To perform these tasks, switch to the System Administrator Responsibility and navigate to Security > Responsibility, or Security > User as the case may be, then select Define to open the Responsibilities or Users window.

For detailed instructions on creating users, refer to the online help available from the two windows.

Oracle Depot Repair Update Programs

The following Update Programs are available in the Tools menu in the Depot Repair Repair Order form:

- Update Receiving
- Update Repair Job
- Update Shipping

You can process one repair order, or a repair order group using these update programs.

Update Receiving

The Update Receiving program is used to update repair orders and create repair history records when returns are received.

Overview

Return Material Authorizations (RMA) to receive repair items are created using the Receive/Ship tab of the Repair Orders window. RMAs are pushed into Order Management for standard processing, and subsequently into Inventory/Receiving for inspection and receiving. When an RMA related to a repair line is received, the program updates the total quantity received for the repair line, and creates a repair history record. Note that the Depot Repair Update Receiving program picks up only the receiving lines that are delivered to a subinventory.

Program Logic

The Update Receiving program is run from the Tools menu in the Repair Order window.

The program logic is as follows:

1. Check if the receiving transaction process is complete for the RMA received. If not, wait until the process is complete.
2. If the process is complete, in the Tools menu in repair order form, select Update Receiving program. This will check the receiving record and update the Depot Repair tables.

   The Update Receiving Program picks only the receiving lines that are actually delivered to a subinventory; for example, when inspection is stated as mandatory for items before being received, only the items that passed inspection and were not returned.

Dependencies

The Update Receiving program is dependent on the following application modules:

- Oracle Depot Repair, Release 11i
- Oracle Order Management, Release 11i
- Oracle Inventory, Release 11i

Update Repair Job

The Update Repair Job program is used to update repair orders, and to create repair history records when WIP jobs related to Depot Repair are completed.

Overview

WIP Jobs for repair lines are created using the Submit Repair Jobs window. A given repair line can be represented by multiple repair jobs in WIP, or multiple repair lines can be grouped as a single job. The program updates the repair line with the quantity processed, and creates a repair job history record for each updated line.

Program Logic

The Update Repair Job program is called from the Tools menu in the Repair Order window.

The program logic is as follows:

1. After creating the WIP job, from the Tools menu, select Update Repair Job to update the details of repair jobs submitted to WIP.
2. Complete the WIP job by clicking the Complete button on the Repair Job tab in the Repair Order window.
3. In the Tools menu in the Repair Order form, select Update Repair Job. This program will find the WIP Job, and update the Depot Repair tables.

Dependencies

The Update Repair Job program is dependent on the following application modules:

- Oracle Depot Repair, Release 11i
- Oracle WIP, Release 11i

Update Shipping

The Update Shipping program is used to update repair orders and create repair history records when repaired goods are shipped and a related sales order is generated.

Overview

Sales orders for repair line shipments are created using the Receive/Ship tab of the Repair Orders window. The sales orders are submitted to Order Management for processing, and are shipped by the Shipping module. The associated repair lines in Depot Repair need to be updated with the shipped quantity. A history record must be created to record the shipped quantity and shipped date against the repair line.

Program Logic

The Update Shipping program is called from the Tools menu in the Repair Order window.

The program logic is as follows:

1. Check whether the interface trip stop concurrent program is complete.
2. If the process is complete, from the Tools menu in the Repair Order form, select Update Shipping. This program will find the shipment record, and update the Depot Repair tables with the data.

Dependencies

The Update Shipping program is dependent on the following application modules:

- Oracle Depot Repair, Release 11i
- Oracle Order Management, Release 11i
- Oracle Shipping Execution, Release 11i

Charges and Repair Types Setup Example

The following examples illustrate Charges and Repair Types setup for Install Base and Non-Install Base trackable products. Separate Service Activities and Repair Types are required for Install Base trackable products and non-Install Base trackable products. Refer to the relevant sections within this document for navigation paths and other details.

Service Activities and Billing Types

Perform the following steps to set up Service Activities and Billing Types.

Service Activity: Return for Repair, Install Base Trackable Product

Consider the Service Activity Return for Repair for an Install Base trackable product. This Service Activity will be used for returns for repair, and requires a corresponding Install Base Transaction Sub Type. Perform the following set up.

Service Activity

- Service Activity: Return for Repair
- Line Category: Return
- Depot Repair Quantity Update checkbox: Selected

Billing Type

Billing Type: Material

Order Management Header and Line Types

- Operating Unit: Vision Operations
- Order Type: Mixed
- Line Type: Return (Receipt)

Service Activity: Return for Repair, Non-Install Base Trackable Product

Consider the Service Activity Return for Repair for a non-Install Base product. This Service Activity will be used to process returns for repair, and does not have a corresponding Install Base Transaction Sub Type set up.

Enter Service Activity value as Return for Repair, non-Install Base. Set Billing Type and Order Management Header and Line Types as detailed above for the Install Base product.

Service Activity: Replacement, Install Base Trackable Product

Consider the Service Activity Replacement for an Install Base product. This Service Activity will be used for shipping replacements, and requires a corresponding Install Base Transaction Sub Type. Perform the following set up.

- Service Activity: Replacement
- Line Category: Order
- Depot Repair Quantity Update: Selected

Set up Billing Type and Order Management Header and Line Types as explained in the first example.

Service Activity: Replacement, Non-Install Base Trackable Product

A separate Service Activity has to be set up for Replacement of non-Install Base products. Set up the Replacement Service Activity for a non-Install Base product as you did for the Return for Repair example. This Service Activity setup does not have a corresponding Install Base Transaction Sub Type set up.

Service Business Processes

After defining required Service Activities and Billing Types as illustrated in the above example, define a Service Business Process and include the required Service Activities.

Install Base Transaction Sub Types

After defining Service Activities and Billing Types and Service Business Processes, set up the Install Base Transaction Sub Types as follows:

- Transaction Sub Type: Return for Repair. This Transaction Sub Type is seeded.

- Transaction Sub Type: Replacement. The Change Owner checkbox in the Source Info region of the Transaction Sub Types window is selected when the Service Activity is Replacement. Also select the Reference Reqd checkbox in the Non Source Info region. The Change Owner To Status and Status fields in the Source Info region must be populated with the values External and Replaced respectively. The Status field in the Non Source Info region has the value EXPIRED.

Other seeded Transaction Sub Types include Ship Loaner, Return Loaner, Material Transaction, and Ship Repaired Item. For Return for Repair, Ship Repaired Item, Ship Loaner, and Return Loaner, the Change Owner checkbox in the Source Info region is not selected. This is because, in these transactions, the owner does not change.

Repair Types Setup

After you set up all the required Install Base Transaction Sub Types, set up the Repair Types as follows:

You have to set up separate Repair Types for Install Base trackable products and non-Install Base trackable products.

Repair Type: Repair and Return, Install Base Trackable Product

Enter the following values:

- Repair Type: Repair and Return
- Business Process: Depot Repair
- Repair Mode: Work In Process
- Repair Type Reference: Repair and Return
- Pre-Repair RMA: Return for Repair
- Pre-Repair Ship: (Not Applicable)
- Post-Repair RMA: (Not Applicable)
- Post-Repair Ship: Ship Repaired Item
- Automatically Enter and Book RMA checkbox: Select
- Book Order radio button: Select
- Automate Order Processing Steps through checkbox: Select
- Book Sales Order checkbox: Select

If you are using the Estimates functionality, you need to set up the Billing Type and Service Activity Codes for Material, Labor, and Expense.

- Material: Material Transaction
- Labor: Labor Transaction
- Expense: Expense Transaction

Repair Type: Repair and Return, Non-Install Base Trackable Product

Enter the following values:

- Repair Type: Repair and Return, non-Install Base
- Business Process: Depot Repair
- Repair Mode: Work In Process
- Repair Type Reference: Repair and Return
- Pre-Repair RMA: Return for Repair, non-Install Base
- Pre-Repair Ship: (Not Applicable)
- Post-Repair RMA: (Not Applicable)
- Post-Repair Ship: Ship Repaired Item, non-Install Base
- Automatically Enter and Book RMA checkbox: Select
- Automate Order Processing Steps through checkbox: Select
- Book Order radio button: Select

If you are using Estimates functionality, you need to set up the Billing Type and Service Activity Codes for Material, Labor, and Expense.

> **Note:** Since estimate lines are created as Bill Only lines in Order Management, Transaction Sub Types for the associated Service Activity Codes are not relevant. This implies that even if a Transaction Sub Type exists for the Service Activity Code set up for the estimate line, it is ignored.

- Material: Material Transaction
- Labor: Labor Transaction
- Expense: Expense Transaction

Repair Type: Replacement, Install Base Trackable Product

- Repair Type: Replacement
- Business Process: Depot Repair
- Repair Mode: None/Not Applicable
- Repair Type Reference: Replacement
- Pre-Repair RMA: (Not Applicable)
- Pre-Repair Ship: (Not Applicable)
- Post-Repair RMA: (Not Applicable)
- Post-Repair Ship: Replacement
- Automatically Enter and Book RMA checkbox: Do not select (leave unchecked)
- Automate Order Processing Steps through checkbox: Select
- Book Order radio button: Select

Since Estimates may not be needed in case of Replacements, you do not have to set up the Billing Type and Service Activity Codes for Material, Labor and Expense.

Repair Type: Replacement, Non-Install Base Trackable Product

You will need to set up a separate Repair Type for Replacement of non-Install Base trackable products, just as you did for the Repair and Return example.

Seeded Repair Types Setup

The following is the Repair Type setup summary for all the seeded repair types. The following table applies to Install Base trackable products. The repair type details can be set up as explained in the examples above. For Non-Install Base trackable products, you will need to define separate repair types, as illustrated in the above examples.

In the Repair Type Summary table below, Service Activities Return Exchange, Ship Exchange, and Replacement need to be defined before they can be set up in the Repair Type form. The other service activities are available as seeded.

For Repair Types Exchange, Advance Exchange, and Replacement, the owner of the product is changed when the product is returned or shipped. This is specified in the Source Info region for Transaction Sub Types Return Exchange, Ship Exchange, and Replacement. For Transaction Sub Types Ship Exchange and Replacement, the

Reference Reqd checkbox in the Non Source Info region should be selected, so that the warranty information is transferred to the shipped product.

Table 3–8 Seeded Repair Types Setup

Repair Type	Business Process	Repair Mode	Repair Type Reference	Pre Repair RMA	Pre Repair Ship	Post Repair RMA	Post Repair Ship
Repair and Return	Depot Repair	Work in Process	Repair and Return	Return for Repair	-	-	Ship Repaired Item
Repalcement	Depot Repair	None/Not Applicable	Replacement	-	-	-	Replacement
Advance Exchange	Depot Repair	None/Not Applicable	Advance Exchange	Return Exchange	-	-	Ship Exchange
Exchange	Depot Repair	None/Not Applicable	Exchange	Return Exchange	-	-	Ship Exchange
Loaner	Depot Repair	None/Not Applicable	Loaner	-	Ship Loaner	Return Loaner	-
Loaner, Repair and Return	Depot Repair	Work in Process	Loaner, Repair and Return	Return for Repair	Ship Loaner	Return Loaner	Ship Repaired Item
Walk-In Repair	Depot Repair	Task	Walk-In Repair	Return for Repair	-	-	Ship Repaired Item
Walk-In Repair with Loaner	Depot Repair	Task	Walk-In Repair with Loaner	Return for Repair	Ship Loaner	Return Loaner	Ship Repaired Item
Standard	Depot Repair	Work In Process	Standard	-	-	-	-

A

Oracle Depot Repair Public APIs

This appendix presents information on the Oracle Depot Repair public API.

Depot Repair Public Packages

Depot Repair provides the following public API.

CSD_REPAIRS_PUB

This API includes the following two procedures:

Table A–1 List of Procedures

Procedure Name	Description
Create_Repair_Order	This procedure is called to create a repair order.
Update_Repair_Order	This procedure is called to update a repair order.

Create Repair Order

This API will create a repair order. User can pass REPAIR_LINE_ID and REPAIR_NUMBER. If passed, the ID or NUMBER will be validated for uniqueness. If valid, the same ID or NUMBER will be returned.

Procedure Name

Create_Repair_Order

Prerequisites

None

Parameters

```
IN
p_api_version_number      IN   NUMBER     Required
p_init_msg_list           IN   VARCHAR2   Optional  Default = FND_API.G_FALSE
p_commit                  IN   VARCHAR2   Optional  Default = FND_API.G_FALSE
p_validation_level        IN   NUMBER     Optional  Default = FND_API.G_VALID_
LEVEL_FULL
p_repair_line_id          IN   NUMBER     Optional  Default = FND_API.G_MISS_NUM
P_REPLN_Rec               IN   CSD_REPAIRS_PUB.REPLN_Rec_Type Required

OUT
x_return_status           OUT  VARCHAR2
x_msg_count               OUT  NUMBER
x_msg_data                OUT  VARCHAR2
x_repair_line_id          OUT  NUMBER
x_repair_number           OUT  NUMBER
```

Current Version

1.0

Procedure Specification

```
Create_Repair_Order
(
P_Api_Version_Number      IN   NUMBER,
P_Init_Msg_List           IN   VARCHAR2     := FND_API.G_FALSE,
P_Commit                  IN   VARCHAR2     := FND_API.G_FALSE,
p_validation_level        IN   NUMBER       := FND_API.G_VALID_LEVEL_FULL,
p_repair_line_id          IN   NUMBER       := FND_API.G_MISS_NUM,
P_REPLN_Rec               IN   CSD_REPAIRS_PUB.REPLN_Rec_Type,
X_REPAIR_LINE_ID          OUT NOCOPY NUMBER,
X_REPAIR_NUMBER           OUT  NOCOPY VARCHAR2,
X_Return_Status           OUT  NOCOPY VARCHAR2,
X_Msg_Count               OUT  NOCOPY NUMBER,
X_Msg_Data                OUT  NOCOPY VARCHAR2
);
```

Update Repair Order

This procedure will update a repair order.

Procedure Name

Update_Repair_Order

Prerequisites

None

Parameters

```
IN
p_api_version_number      IN   NUMBER     Required
p_init_msg_list           IN   VARCHAR2   Optional  Default = FND_API.G_FALSE
p_commit                  IN   VARCHAR2   Optional  Default = FND_API.G_FALSE
p_validation_level        IN   NUMBER     Optional  Default = FND_API.G_VALID_
LEVEL_FULL
p_repair_line_id          IN   NUMBER     Required
P_REPLN_Rec               IN   CSD_REPAIRS_PUB.REPLN_Rec_Type Required

OUT
x_return_status           OUT  VARCHAR2
x_msg_count               OUT  NUMBER
x_msg_data                OUT  VARCHAR2
```

Current Version

1.0

Procedure Specification

```
Update_Repair_Order
(
P_Api_Version_Number         IN   NUMBER,
P_Init_Msg_List              IN   VARCHAR2     := FND_API.G_FALSE,
P_Commit                     IN   VARCHAR2     := FND_API.G_FALSE,
p_validation_level           IN   NUMBER       := FND_API.G_VALID_LEVEL_FULL,
p_repair_line_id             IN   NUMBER,
P_REPLN_Rec                  IN OUT NOCOPY
CSD_REPAIRS_PUB.REPLN_Rec_Type,
X_Return_Status              OUT NOCOPY  VARCHAR2,
X_Msg_Count                  OUT NOCOPY NUMBER,
X_Msg_Data                   OUT  NOCOPY VARCHAR2
);
```

Parameter Descriptions

The following table describes the IN parameters associated with this API.

Table A–2 IN Parameters

Parameter	Data Type	Description
p_api_version	NUMBER	This must match the version number of the API. An unexpected error is returned if the calling program version number is incompatible with the current API version number (provided in the documentation).
p_init_msg_list	VARCHAR2	Default = FND_API.G_FALSE. If set to true, then the API makes a call to fnd_msg_pub.initialize to initialize the message stack. If set to false then the calling program must initialize the message stack. This action is required to be performed only once, even in cases where more than one API is called.
p_commit	VARCHAR2	Default = FND_API.G_FALSE If set to true, then the API commits before returning to the calling program. If set to false, then it is the calling program's responsibility to commit the transaction.
p_validation_level	NUMBER	Default = FND_API.G_VALID_LEVEL_FULL If set to full, then the API validates all the IN parameter values. If set to none, then the API validates parameters that are a minimum requirement to create a repair order.
p_repair_line_id	NUMBER	If the repair line id is not passed, then the API uses sequence to generate the repair line id. If the repair line id is passed, then it validates to ensure that the repair line id does not exist in csd_repairs table.
P_REPLN_Rec	PL/SQL Record	It accepts the Repair Order record.

The following table describes the OUT parameters associated with this API.

Table A–3 OUT Parameters

Parameter	Data Type	Description
x_return_status	VARCHAR2(1)	If the API successfully creates a repair order, then it returns the status 'S', Else it returns the status as 'E' or 'U'.
x_msg_count	NUMBER	Returns the number of messages logged in the message stack.
x_msg_data	VARCHAR2	It retrieves the message from the message stack and returns the message to the calling APIs.
x_repair_line_id	NUMBER	It returns the repair line id after the repair order is created successfully.
x_repair_number	NUMBER	It returns the repair number after the repair order is created successfully. The repair number can be different from the repair line id as different sequences are used.

Data Structure Specifications

Depot Repair API uses the following data structure.

REPLN_Rec_Type

The following table presents descriptions of data structures.

Table A–4 Data Structure Specifications

Name	Description
Repair_Number	If this value is passed during repair order creation, it will be validated for uniqueness and used for creation of repair order.
Incident_id	This is the Service Request id.
Inventory_item_id	Item information.
Customer_product_id	Instance ID of IB reference number.
Unit_of_measure	Unit of Measure Code.
Repair_type_id	Repair type information.
Resource_id	Resource to which the repair order is to be linked.
Project_id	Not used currently.
Task_id	Not used currently.

Table A–4 Data Structure Specifications

Name	Description
Contract_line_id	Used to store the contract information.
Auto_process_rma	Used to determine if the RMA has to be created automatically for the repair order.
Repair_mode	Used to determine if the repair order has to be created in WIP/Task/None mode.
Object_version_number	For repair order creation, the version number should be 1. For repair order update, the version number must be the same as that of the repair order in the database.
Item_revision	If the item is revision controlled, then pass the revision.
Instance_id	Same as customer product id.
Status	Repair Order transaction status.
Status_reason_code	Estimate approval reason code. It is required only if there is an estimate.
Date_closed	Repair order close date.
Approval_required_flag	This flag is used to check if the approval is required.
Approval_status	Estimate approval status.
Serial_number	Serial number if the serialized item is selected.
Promise_date	The promise date of repair completion.
Attribute_category	Context of the descriptive flexfield.
Attribute1	Attribute1
Attribute2	Attribute2
Attribute3	Attribute3
Attribute4	Attribute4
Attribute5	Attribute5
Attribute6	Attribute6
Attribute7	Attribute7
Attribute8	Attribute8
Attribute9	Attribute9
Attribute10	Attribute10

Table A–4 Data Structure Specifications

Name	Description
Attribute11	Attribute11
Attribute12	Attribute12
Attribute13	Attribute13
Attribute14	Attribute14
Attribute15	Attribute15
Quantity	Total Quantity for which the repair order has to be created.
Quantity_in_wip	To store quantity submitted for Work in Process (WIP) process.
Quantity_rcvd	To store the received quantity.
Quantity_shipped	To store the shipped quantity.
Currency_code	To store the currency code
RO_txn_status	Used internally to store the Repair Order Status.
Order_line_id	Not used currently.
Original_source_ reference	Not used currently.

B

Oracle Depot Repair Lookup Codes

Depot Repair Types (CSD_REPAIR_TYPES)

The following lookup values are seeded for Repair Types in Oracle Depot Repair.

Code	Description	Editable?
AE	Advanced Exchange	No
AL	Loaner	No
ARR	Loaner, Repair and Return	No
E	Exchange	No
R	Replacement	No
RR	Repair and Return	No
SR	Standard Repair	No
WR	Walk-In Repair	No
WRL	Walk-In Repair with Loaner	No

Repair Type Reason (CSD_REASON)

Repair Type Reasons are values seeded for the different reasons that affect the return of a product for repair.

Code	Description	Editable?
ADV_EXCH	Advanced Exchange	No
APPRV	Customer approves the RMA	No

Code	Description	Editable?
EST	Estimate approved	No
HOLD	Repair on hold	No
LOANER	Loaner	No
PRCD RPAIR	Proceed with Repair	No
REJECT_1	Product unrepairable	No
REJECT_2	Declined repair	No
REV_EST	Revised estimate approved	No
WAIT_1	Customer contacted	No
WAIT_2	Awaiting approval	No

Repair Mode for the Depot Repair Processes (CSD_REPAIR_MODE)

The following seeded lookup values are used to define the repair mode used to process a repair using Oracle Depot Repair.

Code	Description	Editable?
ALL	Display all the values for repair modes	No
NONE	None of the modes are applicable	No
TASK	JTF Tasks	No
WIP	Discrete Jobs in Work in Process module	No

Repair Approval Status (CSD_APPROVAL_STATUS)

Repair Approval Status lookup values are defined (seeded) to represent the acceptance or rejection of an item's repair.

Code	Meaning	Editable?
A	Approved	No
R	Rejected	No

Repair Status (CSD_REPAIR_STATUS)

The Repair Status lookup values define whether a repair order is open, closed, or on hold. The following values are seeded.

Code	Meaning	Editable?
C	Closed	No
H	Hold	No
O	Open	No

Repair Event (CSD_EVENT)

Repair Event lookups are defined to represent particular events that take place in a depot during repair processing. The following values are seeded.

Code	Meaning	Editable?
A	Customer Approved	No
CR	Charges Recorded	No
DIA	Diagnosed	No
DROC	Depot Repair Owner Changed	No
JC	Repair Job Completed	No
JS	Repair Job Created	No
PDC	Promise Date Changed	No
PS	Shipment	No
PSP	Print Shop Paper	No
R	Customer Rejected	No
RC	Repair Order Opened	No
RE	RMA Created	No
RO	Replace Order Created	No
RR	RMA Received	No
RSC	Receipt Serial Number is different	No
SC	Status Changed	No

Code	Meaning	Editable?
SLT	Repair Order Split	No
SOC	Sales Order Created	No
SSC	Shipped Serial Number is different	No
TBR	Ready to be Returned	No
TC	Task Created	No
TOC	Task Owner Change	No
TSC	Task Status Change	No

Estimate Billing Type (CSD_EST_BILLING_TYPE)

Estimate Billing Type lookup values are defined to represent the type of transaction being billed. Following are the seeded values.

Code	Description	Editable?
E	Expense	No
L	Labor	No
M	Material	No

Estimate Status (CSD_ESTIMATE_STATUS)

Estimate statuses are values defined for the different states of an estimate. Following are the seeded Estimate Status values.

Code	Description	Editable?
ACCEPTED	Estimate approved by customer	No
BID	Estimate awaiting customer approval	No
CANCELLED	Estimate is cancelled	No
DRAFT	Estimate with information but not ready to reveal to customer	No
NEW	Estimate with no information entered	No
REJECTED	Estimate not approved by customer	No

Estimate Reject Reasons (CSD_REJECT_REASON)

The following lookup values are seeded to specify the reason for an estimate rejection.

Code	Description	Editable?
CUST_REJECT	Customer Rejects Estimate	No
MAC_SHORTAGE	Machine Not Available in Depot	No
MAT_SHORTAGE	Material Shortage in Depot	No
NOT_PROFITABLE	Unprofitable for depot to repair the product	No
NOT_REPAIRABLE	Product Beyond Repair in Depot	No
RES_SHORTAGE	Resource Shortage in Depot	No

Product Transaction Action Codes (CSD_PRODUCT_ACTION_CODE)

The following are the Product Transaction Action codes seeded for Depot Repair.

Code	Description	Editable?
CUST_PROD	Customer Product	No
EXCHANGE	Product Exchange	No
LOANER	Loaned Product	No
REPLACEMENT	Replacement Product	No

Product Transaction Action Type (CSD_PROD_ACTION_TYPE)

The following Product Transaction Action Type lookup values are seeded in Oracle Depot Repair.

Code	Description	Editable?
RMA	Inbound transaction for returned product	No
SHIP	Outbound transaction for Repaired Product, Loaner etc.	No
WALK_IN_ISSUE	Walk-In Issue transaction	No

Code	Description	Editable?
WALK_IN_RECEIPT	Walk-In Receipt transaction	No

Product Transaction Status (CSD_PRODUCT_TXN_STATUS)

Product Transaction Statuses are lookup values defined for representing the state of product transactions. The following values are seeded.

Code	Description	Editable?
BOOKED	Sales Order Booked	No
ENTERED	Created Product Txn	No
RECEIVED	Received against RMA	No
RELEASED	Sales Order Pick Released	No
SHIPPED	Sales Order Shipped	No
SUBMITTED	Charge Line Interfaced	No

Repair Order Transaction Status (CSD_RO_TXN_STATUS)

Repair Order Statuses are lookup values that define the different stages in repair order processing. The following Repair Order Transaction Status values are seeded in Oracle Depot Repair.

Code	Description	Editable?
CHARGE_ENTERED	Charge Entered	No
ESTIMATE_APPROVED	Estimate Approved	No
ESTIMATE_REJECTED	Estimate Rejected	No
NEW	New	No
OM_BOOKED	OM Booked	No
OM_RECEIVED	OM Received	No
OM_RELEASED	OM Released	No
OM_SHIPPED	OM Shipped	No
OM_SUBMITTED	OM Submitted	No

Code	Description	Editable?
WIP_COMPLETED	WIP Job Complete	No
WIP_SUBMITTED	WIP Job Submitted	No

Units of Measure (CSD_UNIT_OF_MEASURE)

The following are the seeded values for Unit of Measure for the estimated repair lead time.

Code	Description	Editable?
DAY	Day	No
HR	Hour	No
MONTH	Month	No
WEEK	Week	No
YEAR	Year	No

Repair Job Statuses (CSD_WIP_JOB_STATUS)

The following lookup values are seeded for Repair Job Statuses in Oracle Depot Repair.

Code	Description	Editable?
RELEASED	Released	No
UNRELEASED	UnReleased	No