Oracle® Retail Service Layer
Release Notes
Release 12.0
May 2006

ORACLE

Preface

A Release Notes document can include some or all of the following sections, depending upon the release:

- Overview of the release.
- Functional, technical, integration, and/or performance enhancements.
- Assumptions.
- Fixed and/or known issues/defects.

Audience

Release Notes are a critical communication link between Oracle Retail and its retailer clients. There are four audiences in general for whom a Release Notes document is written:

- Retail clients who wish to understand the contents of this release.
- Integrators and implementation staff who have the overall responsibility for implementing Retail Service Layer (RSL) into their enterprise.
- Business analysts who are looking for high-level functional information about this release.
- System analysts and system operation personnel who are looking for high-level functional and technical content related to this release.

Related Documents

You can find more information about this product in these resources:

- Oracle Retail Service Layer Installation Guide
- Oracle Retail Service Layer Programmer's Guide

Customer Support

- https://metalink.oracle.com

When contacting Customer Support, please provide:

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

Release Notes

Overview

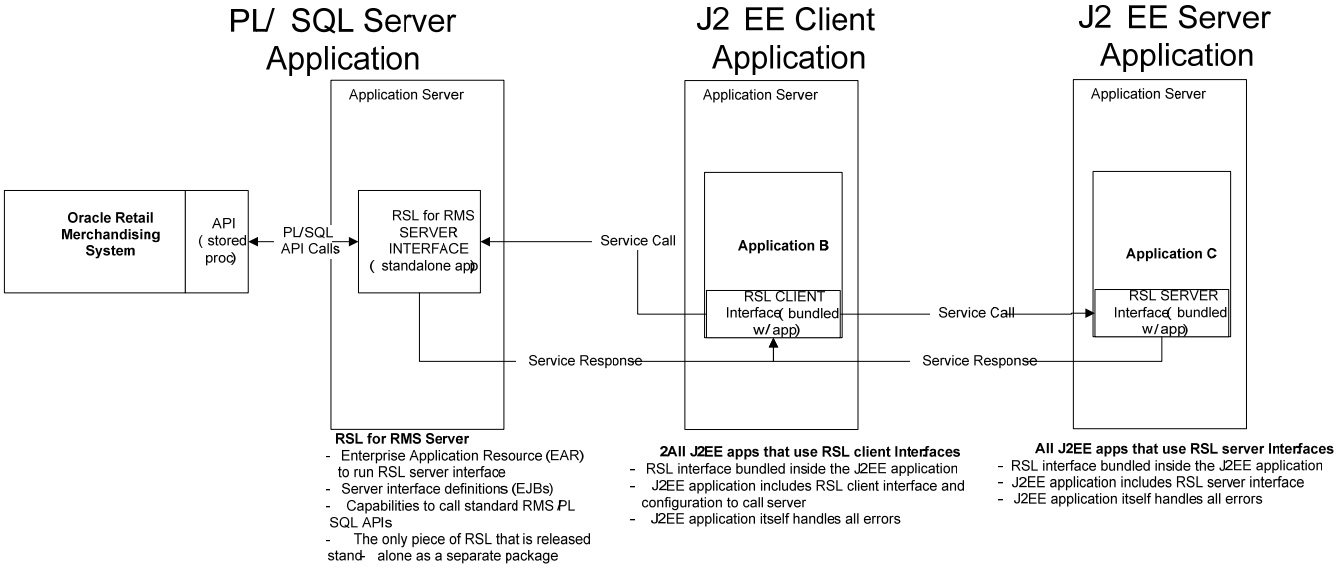
RSL handles the interface between a client application and a server application wishing to communicate in a synchronous fashion. The client application typically runs on a different computing host than the service. However, RSL allows for the service to be called internally in the same program or Java Virtual Machine as the client without the need for code modification.

RSL works within the J2EE framework. All services are contained within an interface offered by a Stateless Session Bean. To a client application, each service appears to be merely a method call.

Some Oracle Retail applications, such as RMS, are implemented in the PL/SQL language, which runs inside of the Oracle database. These PL/SQL applications require that RSL runs as a separate instance and as its own application. However, for the non-PL/SQL applications that use RSL (that is, Oracle Retail Price Management and Oracle Retail Allocation), the RSL packages are bundled inside of, installed with, and run with the non-PL/SQL application. In these cases, RSL essentially becomes a part of that application.

RSL provides two different models for service providers. The election of what model to use depends on what type of application the 'service provider' developer is adding the RSL layer to. For applications that follow the J2EE or simple Java architecture, a J2EE model is a better fit. An Oracle PL/SQL model is a better fit for applications that heavily depend on database business logic, such as Oracle Forms-based applications (RMS, for example).

The diagram below illustrates RSL processing.



RSL Processing Overview

Technical Enhancements

Certifications

RSL can support the Oracle Application Server 10g in the RSLforRMS server PAK.

Certification Matrices with Oracle Retail Applications

The following is a list of Oracle Retail products recently certified with recent RSL releases.

Oracle Retail Application	Oracle Retail Application Version	RSL Last Tested Date	RSL Last Tested Version	Comments
Oracle Retail Merchandising System (RMS)	12.0.0	5/05/2006	RSL 12.0.0	
Oracle Retail Price Management (RPM)	12.0.0	5/05/2006	RSL 12.0.0	

Certification Matrices with Third-Party Applications

The following is a list of third-party products, platforms, or components recently certified with RSL releases.

Third-Party Product, Platform, or Component	Third-Party Product, Platform, or Component Version	Last Tested Date	Last Tested Version	Comments
Oracle Application Server	10.1.3.0	5/05/2006	RSL 12.0.0	RSLforRMS standalone only
Solaris	9	5/05/2006	RSL 12.0.0	
AIX	5.3	5/05/2006	RSL 12.0.0	

Note: The above components are listed for RSLforRMS standalone only.

Recommended Prerequisite Actions

Before you begin any RSL 12.0 installation or development work, perform the following:

- Review the RSL Programmer's Guide in its entirety. General details of this release are fully expressed in the RSL Programmer's Guide.
- Read the RSL 12 Installation Guide and follow its steps carefully.
- Read and understand the 'Known Issues' section of these Release Notes.
- Note the specific information regarding RSL interfaces that is described within other application's documentation.
- Take care to extensively complete all certifications and regression/volume testing with RSL 12.0 versions before deployment to production environments.

Deliverables/Package Summary

The list below contains the name of deliverable packages and their content with a brief explanation of each one. Packages denoted as '(internal release)' are delivered to other Oracle Retail application teams to distribute with their software and are not packaged standalone. Packages denoted as '(external release)' are standalone enterprise applications that include an installer.

rslclientpak1200forrms1200_eng_ga.tar (internal release):

This package provides API calls that developers integrate into their applications. This package contains APIs and dependencies for calling RMS services.

- rsl.jar: Core RSL classes.
- rsl-rms-access.jar: Classes that wraps the functionality to call the remote RMS services. Application developers interact with RSL through these classes. All of the communication infrastructure is hidden so 'client application' developers can use them just as they would use any other simple Java class. The 'wrapper' interfaces were provided as the 'old mechanism' of wrapping the actual interfaces and are not provided for new interfaces (for example, LocPO) going forward.
- jndi_providers.xml: JNDI configuration file with host and port information to contact the RMS services. It needs to be configured with correct values for the environment.
- service_flavors.xml, services_rsl.xml: Configuration files used by RSL core classes to contact the desired RMS services. These are already configured and do not require environment specific changes.

rslpak1200forrms1200_eng_ga.tar (external release):

Standalone enterprise application that provides services for RMS for other 'client applications' to call.

- rsl-rms.ear: Enterprise application that contains implementation of RMS services.
- ojdbc14.jar: Oracle JDBC driver classes.
- *.sql: Oracle object declarations to be imported in database.
- commons-logging.properties, log4j.dtd, log4j.xml, service_flavors.xml, services_rsl.xml: Configuration files used by RSL core classes and services. No user configuration is required.
- *.sh, rsl-config.properties, RSLPak1200forRMS1200.bom.out: These files are required to successfully install the enterprise application.

rslclientpak1200forrpm1200_eng_ga.tar (internal release):

This package provides API calls that developers integrate into their applications. This package contains APIs and dependencies for calling RPM services.

- rsl.jar: Core RSL classes.
- rsl-pricemgt-access.jar: Classes that wraps the functionality to call the remote RPM services. Application developers will interact with RSL through these classes. The 'wrapper' interfaces were provided as the 'old mechanism' of wrapping the actual interfaces and will not be provided for new interfaces (that is, LocPO) going forward.
- jndi_providers.xml: JNDI configuration file with host and port information to contact the RPM services. It needs to be configured with correct values for the environment.
- service_flavors.xml, services_rsl.xml: Configuration files used by RSL core classes to contact the desired RMS services. These are already configured and do not require environment specific changes.

rslpak1200forrpm1200_eng_ga.tar (internal release):

This package implements RPM services for other 'client' applications to call and is distributed inside RPM.

- rsl.jar: Core RSL classes.
- rsl-pricemgt-access.jar: Classes that wrap the functionality to call the remote RPM services. Application developers interact with RSL through these classes. The 'wrapper' interfaces were provided as the 'old mechanism' of wrapping the actual interfaces and will not be provided for new interfaces (that is, LocPO) going forward.
- rsl-pricemgt-ejb.jar: EJB implementation of RPM services. Currently not used.
- rsl-pricemgt-server.jar: Local RPM services. These classes forward the client calls to the business logic services implemented by the 'service provider' developers. All of the service infrastructure is hidden so the developer can concentrate on the business logic.

Note: Source code for RSL is not provided.

RSL 12.0 Known Issues

- RMS LocPO Server interface Performance issues
  Calling the RMS LocPO RSL interface from Oracle Retail Allocation can result in slow response times for large numbers of locations per purchase order (PO).
- BugDB# 4992357: IllegalAccessError when attempting to load oracle.sql.CharacterSet class
  In Oracle AS 10.1.3.0.0 an attempt to load the oracle.sql.CharacterSet class will result in a "java.lang.IllegalAccessError: tried to access class oracle.sql.CharacterSetFactoryDefault from class oracle.sql.CharacterSet" error. Subsequent attempts to load the same class will result in a java.lang.NoClassDefFoundError.

  This issue was due to duplicate JDBC classes in another jar package that prevented the correct implementation class to be loaded.

  A patch has been released through Oracle Automated Release Updates system - ARU # 8345630. It can be downloaded from http://aru.us.oracle.com:8080/ARU/ViewPatchRequest/process_form?aru=8345630

Release Modification Summary

Changes Since RSL 11.1

Defect #	Title	Description
1053	Thread safety issue with static DateFormat.	All classes that previously used java.text.SimpleDateFormat, java.text.MessageFormat and java.text.DecimalFormat has been modified to use new thread-safe classes.
1803	12.0 RSL on Oracle 10gR2 db, 10.1.3 Oracle AS.	Must include xercesImpl.jar; required for using new Platform v12. Removed redirection of error to /dev/null
1853	Make changes for new Platform .jar.	Added platform-resources.jar to the classpath.