Oracle® Fusion Middleware

Release Notes

11*g* Release 1 (11.1.1) for HP-UX Itanium

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Oracle Fusion Middleware Release Notes, 11*g* Release 1 (11.1.1) for HP-UX Itanium

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Preface

This preface includes the following sections:

- Audience
- Documentation Accessibility
- Related Documents
- Conventions

Audience

This document is intended for users of Oracle Fusion Middleware 11*g* .

Documentation Accessibility

Our goal is to make Oracle products, services, and supporting documentation accessible to all users, including users that are disabled. 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. Accessibility standards will continue to evolve over time, and Oracle 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 more information, visit the Oracle Accessibility Program Web site at `http://www.oracle.com/accessibility/`.

Accessibility of Code Examples in Documentation

Screen readers 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, some screen readers may not always read a line of text that consists solely of a bracket or brace.

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Access to Oracle Support

Oracle customers have access to electronic support through My Oracle Support. For information, visit `http://www.oracle.com/support/contact.html` or visit `http://www.oracle.com/accessibility/support.html` if you are hearing impaired.

Related Documents

For more information, see these Oracle resources:

- Oracle Fusion Middleware Documentation on Oracle Fusion Middleware Disk 1

- Oracle Fusion Middleware Documentation Library 11g Release 1 (11.1.1)

- Oracle Technology Network at
  http://www.oracle.com/technology/index.html.

Conventions

The following text conventions are used in this document:

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

Part I

Oracle Fusion Middleware

Part I contains the following chapters:

1

Introduction

This chapter introduces Oracle Fusion Middleware Release Notes, 11g Release 1 (11.1.1). It includes the following topics:

- Section 1.1, "Latest Release Information"
- Section 1.2, "Purpose of this Document"
- Section 1.3, "Operating System Requirements"
- Section 1.4, "Memory Requirements"
- Section 1.5, "Certification Information"
- Section 1.6, "Licensing Information"

1.1 Latest Release Information

This document is accurate at the time of publication. Oracle will update the release notes periodically after the software release. You can access the latest information and additions to these release notes on the Oracle Technology Network at:

http://www.oracle.com/technology/documentation/

1.2 Purpose of this Document

This document contains the release information for Oracle Fusion Middleware 11g Release 1 (11.1.1). It describes differences between Oracle Fusion Middleware and its documented functionality.

Oracle recommends you review its contents before installing, or working with the product.

1.3 Operating System Requirements

Oracle Fusion Middleware installation and configuration will not complete successfully unless users meet the hardware and software pre-requisite requirements before installation. See the Oracle Fusion Middleware Installation Planning Guide for a complete list of operating system requirements.

1.4 Memory Requirements

Oracle Fusion Middleware memory requirements for installation, configuration, and runtime are as follows:

1. Without a Database on the same server: Minimum 4 GB physical memory and 4 GB swap.

2. With a Database on the same server: Minimum 6 GB physical memory and 6 GB swap.

> **Note:** These minimum memory values are with the assumption that no user or operating system process is consuming any unusually high amount of memory. If such a condition exists, corresponding amount of additional physical memory will be required.

1.5 Certification Information

This section contains the following:

- Section 1.5.1, "Where to Find Oracle Fusion Middleware Certification Information"
- Section 1.5.2, "Certification Exceptions"

1.5.1 Where to Find Oracle Fusion Middleware Certification Information

The latest certification information for Oracle Fusion Middleware 11g Release 1 (11.1.1) is available at the Oracle Fusion Middleware Supported System Configurations Central Hub:

http://www.oracle.com/technology/software/products/ias/files/fusion_certification.html

1.5.2 Certification Exceptions

This section describes known issues (exceptions) and their workarounds that are associated with Oracle Fusion Middleware 11g certifications. For a list of known issues that are associated with specific Oracle Fusion Middleware 11g Release 1 (11.1.1) components, see the Release Notes for the specific Oracle Fusion Middleware 11g Release 1 (11.1.1) component.

1.5.2.1 Certification Information for Oracle Fusion Middleware 11g R1 with Oracle Database 11.2.0.1

If you choose to configure Oracle Internet Directory with Database vault, do the following:

1. Apply patch 8897382 to fix bug 8897382.

> **Note:** the following workaround is required only if the Oracle Fusion Middleware version is 11.1.1.1.0 (11gR1). This issue will be fixed in 11.1.1.2.0.

2. Apply the workaround for bug 8987186 by editing `<OH>/ldap/datasecurity/dbv_oid_command_rules.sql` file and find the following declaration:

```
/declare
 begin
      dvsys.dbms_macadm.CREATE_COMMAND_RULE(
      command => 'CONNECT'
      ,rule_set_name => 'OID App Access'
```

```
        ,object_owner => 'ODS'
        ,object_name => '%'
        ,enabled => 'Y');
    commit;
    end;/
```

and change the line that is indicated in **bold**:

```
/declare
 begin
     dvsys.dbms_macadm.CREATE_COMMAND_RULE(
     command => 'CONNECT'
     ,rule_set_name => 'OID App Access'
     ,object_owner => '%'
     ,object_name => '%'
     ,enabled => 'Y');
 commit;
end;/
```

1.5.2.2 Restrictions on Specific Browsers

1.5.2.2.1   Java Plugin for Discoverer Plus Not Downloaded Automatically on Firefox When you
attempt to connect to Discoverer Plus by using the Mozilla Firefox browser on a
computer that does not have Java 1.6 installed, Firefox does not download the JRE 1.6
plug-in automatically. Instead, Firefox displays the following message: "Additional
plugins are required to display this page..."

The workaround is to download the JRE 1.6 plug-in by clicking the Install Missing
Plugin link to install it manually.

1.5.2.3 Process to Install and Configure WebCenter With 32-bit JDK on Supported 64-Bit Platform

For WebCenter 11*g* Release 1, the following platform has been verified with 32-bit
JDK:

HP Itanium and HP PA-RISC:

```
32-bit HP JDK 1.6.0.02+
```

To install and configure WebLogic Server with 32-bit JDK perform the following steps:

1. Install the supported 32-bit JDK

2. Export the 32-bit JDK environment. For example:

    ```
    export JAVA_HOME=/scratch/aime/jdk1.6.0_11
    export PATH=/scratch/aime/jdk1.6.0_11/bin:$PATH
    ```

3. Run the WebLogic Server generic installer to install WebLogic Server with 32-bit
    JDK:

    ```
    java -jar  wls1031_generic.jar
    ```

4. Install WebCenter with the required 64-bit JDK. Unzip the shiphome and go to
    Disk1, then invoke runInstaller command with `-jreLoc` pointing to the 64-bit
    JDK. For example:

    ```
    ./runInstaller -jreLoc /scratch/aime/jdk1.6.0_11/jre
    ```

5. Run the configuration script to create the WebCenter Domain:

```
$ORACLE_HOME/common/bin/config.sh
```

6. Provide the 32-bit JDK location while running the configuration script. After the domain is configured with 32-bit JDK, no further updates are required.

1.6 Licensing Information

Licensing information for Oracle Fusion Middleware is available at:

http://oraclestore.oracle.com

Detailed information regarding license compliance for Oracle Fusion Middleware is available at:

http://www.oracle.com/technology/products/ias/index.html

2

Installation, Patching, and Configuration

This chapter describes issues associated with Oracle Fusion Middleware installation, patching, and configuration. It includes the following topics:

- Section 2.1, "Installation Issues and Workarounds"
- Section 2.2, "Patching Issues and Workarounds"
- Section 2.3, "Configuration Issues and Workarounds"
- Section 2.4, "Known Issues"
- Section 2.5, "Documentation Errata"

2.1 Installation Issues and Workarounds

This section describes installation issue and workarounds. It includes the following topics:

- Section 2.1.1, "Installing Oracle SOA Suite on a Dual Stack Host with IPv4"
- Section 2.1.2, "Installing Oracle SOA Suite Release 11.1.1.3.0 in a Turkish Environment"
- Section 2.1.3, "Installing Oracle Service Registry in the Same Domain as Oracle SOA Suite"
- Section 2.1.4, "Prerequisite Warnings During Installation"
- Section 0.0.4, ""Null" Dialog Box Appears When Installing Oracle Identity Management to FAT32 File System on Windows"
- Section 2.1.5, "JRF Startup Class Exceptions May Appear in Oracle WebLogic Managed Server Logs After Extending Oracle Identity Management Domain"
- Section 2.1.6, "WebLogic Administration Server Must Be Running When Extending Oracle Identity Management Domains"
- Section 2.1.7, "Problems Installing in Thai and Turkish Locales"
- Section 2.1.8, "Installing Oracle UCM in Stand-Alone Mode"
- Section 2.1.9, "Setting the nls_length_semantics Parameter in your Database"
- Section 2.1.10, "Proper Deinstallation for Reinstallation in the Event of a Failed Installation"
- Section 2.1.11, "Running irca.sh or irca.bat Against an Oracle 10g Database"
- Section 2.1.12, "Installing the SOAINFRA Schema with DBA Permissions"
- Section 2.1.13, "Deinstallation Does Not Remove WebLogic Domains"

- Section 2.1.14, "Failures in the Installation Log File"

- Section 2.1.15, "Response File is Missing the MIDDLEWARE_HOME Entry"

- Section 2.1.16, "Ignore Error Message CheckPatchApplicableOnCurrentPlatform Failed"

- Section 2.1.17, "Database Connection Failure During Schema Creation When Installing Oracle Internet Directory"

- Section 2.1.18, "Benign Errors Logged When Patching Oracle Identity Management 11.1.1.2.0 Installation to 11.1.1.3.0"

- Section 2.1.19, "Unable to Extend an Existing Domain by Selecting Only Oracle Directory Integration Platform Without Cluster"

- Section 2.1.20, "Starting Managed Servers on Remote Machines After Packing and Unpacking Domain"

- Section 2.1.21, "Errors Logged to Managed Server Log Files When Extending a 11.1.1.3.0 Oracle Identity Management Domain on a Remote Machine"

- Section 2.1.22, "WebLogic Administration Server Fails to Start Due to Memory Issues"

- Section 2.1.23, "Installation Fails on 64-bit Operating Systems with 32-bit JDKs"

2.1.1 Installing Oracle SOA Suite on a Dual Stack Host with IPv4

If you install Oracle SOA Suite on a dual stack host and the SOA front end URL is only set to IPv4, Oracle BPM Worklist or asynchronous callbacks from IPv6-only clients may have problems resolving IPv4 callback URLs (and vice-versa).

The work around is to use either a split Domain Name System (DNS) or another forward proxy configuration. This enables the IPv6-only client to connect to a dual stack box through its IPv6 interface.

2.1.2 Installing Oracle SOA Suite Release 11.1.1.3.0 in a Turkish Environment

If you are installing Oracle SOA Suite Release 11.1.1.3.0 in a Turkish environment, there will be some functionality loss for Oracle Enterprise Manager Fusion Middleware Control.

There is no work around for this issue. Oracle recommends that you avoid installing in a Turkish environment and install in an English environment instead.

2.1.3 Installing Oracle Service Registry in the Same Domain as Oracle SOA Suite

When installing Oracle Service Registry 11*g* in the same Weblogic Domain as Oracle SOA Suite 11*g* Release 11.1.1.2.0 or Release 11.1.1.3.0, you may see the following error message on the WebLogic Server console when Oracle Service Registry is starting up:

```
java.lang.LinkageError: loader constraint violation in interface itable
initialization:....
```

To work around this issue:

1. Make sure Oracle Service Registry is installed on a different Managed Server from Oracle SOA Suite.

2. Download patch 9499508 and follow the instructions in the README file included with the patch:

    a. Go to My Oracle Support.

      http://support.oracle.com

    b. Click on the **Patches & Updates** tab.

    c. In the Patch Search area, search for patch 9499508.

    d. Download the patch.

3. Edit the `setDomainEnv.sh` file and, for Oracle Service Registry Server, remove `fabric.jar` from classpath:

```
if [ "${SERVER_NAME}" != "osr_server1" ] ; then
POST_CLASSPATH="${SOA_ORACLE_HOME}/soa/modules/oracle.soa.fabric_
11.1.1/oracle.soa.fabric.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.adapter_
11.1.1/oracle.soa.adapter.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.b2b_
11.1.1/oracle.soa.b2b.jar
${CLASSPATHSEP}${POST_CLASSPATH}"
else
POST_CLASSPATH="${SOA_ORACLE_HOME}/soa/modules/oracle.soa.adapter_
11.1.1/oracle.soa.adapter.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.b2b_
11.1.1/oracle.soa.b2b.jar
${CLASSPATHSEP}${POST_CLASSPATH}"
fi
```

When installing Oracle Service Registry 11*g* in the same Weblogic Domain as Oracle SOA Suite 11*g* Release 11.1.1.3.0, you may see the following error message when accessing the Oracle Service Registry console:

```
ClassCastException
java.lang.ClassCastException:org.systinet.uddi.client.serialization.UDDIFaultSeria
lizer
```

To work around this error, edit the `setDomainEnv.sh` file and remove `oracle.soa.fabric.jar` from the classpath when running the Oracle Service Registry Managed Server. To do this:

1. Make a backup of the *MW_HOME*/`user_projects/domains/`*soa_domain_name*/`bin/setDomainEnv.sh` file.

2. Edit the `setDomainEnv.sh` file and replace the following line:

```
POST_CLASSPATH="${SOA_ORACLE_HOME}/soa/modules/oracle.soa.fabric_
11.1.1/oracle.soa.fabric.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.adapter_
11.1.1/oracle.soa.adapter.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.b2b_
11.1.1/oracle.soa.b2b.jar
${CLASSPATHSEP}${POST_CLASSPATH}"
```

with the following:

```
if [ "${SERVER_NAME}" != "<your_osr_server_name>" ] ;
then
POST_CLASSPATH="${SOA_ORACLE_HOME}/soa/modules/oracle.soa.fabric_
11.1.1/oracle.soa.fabric.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.adapter_
11.1.1/oracle.soa.adapter.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.b2b_
```

```
11.1.1/oracle.soa.b2b.jar
${CLASSPATHSEP}${POST_CLASSPATH}"
else
POST_CLASSPATH="${SOA_ORACLE_HOME}/soa/modules/oracle.soa.adapter_
11.1.1/oracle.soa.adapter.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.b2b_
11.1.1/oracle.soa.b2b.jar
${CLASSPATHSEP}${POST_CLASSPATH}"
fi
```

3. Restart the Oracle Service Registry Managed Server.

    If you have multiple Oracle Service Registry Managed Servers in the domain, each
    Managed Server must be added to the condition. For example, if you have two Oracle
    Service Registry Managed Servers named WLS_OSR1 and WLS_OSR2:

```
case "$SERVER_NAME" in
.
'WLS_OSR1')
.
echo "Setting WLS_OSR1 CLASSPATH..."

POST_CLASSPATH="${SOA_ORACLE_HOME}/soa/modules/oracle.soa.adapter_
11.1.1/oracle.soa.adapter.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.b2b_
11.1.1/oracle.soa.b2b.jar
${CLASSPATHSEP}${POST_CLASSPATH}"
exit;;


.
'WLS_OSR2')
.
echo "Setting WLS_OSR2 CLASSPATH..."

POST_CLASSPATH="${SOA_ORACLE_HOME}/soa/modules/oracle.soa.adapter_
11.1.1/oracle.soa.adapter.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.b2b_
11.1.1/oracle.soa.b2b.jar
${CLASSPATHSEP}${POST_CLASSPATH}"
exit;;
.
*)
.
echo "Setting default SOA CLASSPATH..."

POST_CLASSPATH="${SOA_ORACLE_HOME}/soa/modules/oracle.soa.fabric_
11.1.1/oracle.soa.fabric.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.adapter_
11.1.1/oracle.soa.adapter.jar
${CLASSPATHSEP}${SOA_ORACLE_HOME}/soa/modules/oracle.soa.b2b_
11.1.1/oracle.soa.b2b.jar
${CLASSPATHSEP}${POST_CLASSPATH}"
exit;;
.
esac
```

2.1.4 Prerequisite Warnings During Installation

Vendor release updates cummulative patches and/or packages that may superseed
our listed Oracle Fusion Middleware 11*g* Release 1 prerequisites for platforms. As

long as vendor approved patches and/or packages are installed, the prerequisite warnings could be ignored and the installation completed.

Another option is to use `-ignoreSysPreReqs` command line additional argument to the `runInstaller` as:

```
$ Mount_Point/runInstaller -ignoreSysPreReqs other required install options
```

2.1.5 JRF Startup Class Exceptions May Appear in Oracle WebLogic Managed Server Logs After Extending Oracle Identity Management Domain

After extending an Oracle Identity Management domain, you may see exception messages related to JRF Startup Class in the managed server log files. For example:

```
Failed to invoke startup class "JRF Startup Class",
oracle.jrf.PortabilityLayerException: Fail to retrieve the property for the Common
Components Home.
oracle.jrf.PortabilityLayerException: Fail to retrieve the property for the Common
Components Home.
```

You can safely ignore these exception messages—there is no loss in functionality.

2.1.6 WebLogic Administration Server Must Be Running When Extending Oracle Identity Management Domains

When you install Oracle Identity Management, you have several options for choosing how the Oracle Identity Management components are installed in relation to an Oracle WebLogic Server administration domain. If you select the **Extend Existing Domain** option on the installer's Select Domain screen, Oracle Identity Management components are installed in an existing Oracle WebLogic Server administration domain.

To install Oracle Identity Management components in an existing administration domain using the **Extend Existing Domain** option, the Oracle WebLogic Administration Server instance must be running.

2.1.7 Problems Installing in Thai and Turkish Locales

Turkish and Thai users are recommended to install and run Oracle Fusion Middleware using the English locale. Oracle Fusion Middleware does support Turkish and Thai locales as clients.

2.1.8 Installing Oracle UCM in Stand-Alone Mode

The Oracle WebCenter installation gives you the option of installing Oracle Universal Content Management (UCM). If you choose not to install Oracle UCM during the Oracle WebCenter installation, you can install Oracle UCM separately in stand-alone mode. Installation instructions are available at the following location:

http://download.oracle.com/docs/cd/E10316_01/owc.htm

These installation instructions are missing some important information, which is covered below. The following topics are covered:

- Section 2.1.8.1, "Do Not Include Folders_g in the Installation"
- Section 2.1.8.2, "Disable Trash in the Installation"

2.1.8.1 Do Not Include Folders_g in the Installation

The last question is during the installation procedure is:

```
Select components to install.
        1. ContentFolios: Collect related items in folios
        2. Folders_g: Organize content into hierarchical folders
        3. LinkManager8: Hypertext link management support
        4. OracleTextSearch: External Oracle 11g database as
           search indexer support
        5. ThreadedDiscussions: Threaded discussion management
Enter numbers separated by commas to toggle, 0 to unselect all, F to finish:
```

Make sure you DO NOT include number 2 (`Folders_g`) for this answer; you should not install `Folders_g` using the installation script. `Folders_g` will be installed when the `wc_contentserverconfig.sh` script is run.

2.1.8.2 Disable Trash in the Installation

Instead of installing an new Content Server to use with Oracle WebCenter, you have the option of using an existing Content Server. Any existing Content Server used with Oracle WebCenter should have the Trash disabled. Trash will only be in the Content Server if you have installed a foldering component.

To see if Trash is enabled in the Content Server:

1. Go to Administration.

2. Go to Folder Configuration.

3. Go to System Folder Configuration.

   The colour of the dot next to the Trash folder indicates whether or not the Trash is enabled:

   - Green = enabled
   - Gray = disabled

To disable the Trash:

1. Ensure you can edit marked folders:

   a. Open the *stellent_dir*/custom/Folders_g/folders_ environment.cfg (on UNIX) or *stellent_dir*\custom\Folders_ g\folders_environment.cfg (on Windows) file.

   b. Verify that the `CollectionReadOnlyMarkedFolders` value is set to `true`:

      ```
      CollectionReadOnlyMarkedFolders=true
      ```

2. Restart the Content Server if you changed the `folders_environment.cfg` file.

3. Log in to the Content Server Home Page as a user with Administrator privileges.

4. Go to Administration.

5. Go to Folder Configuration.

6. Go to System Folder Configuration.

7. Click on the green dot next to Trash. This will disable the Trash folder and will turn the dot grey.

8. Restore the value of `CollectionReadOnlyMarkedFolders` if you had changed it and restart the Content Server.

2.1.9 Setting the nls_length_semantics Parameter in your Database

Oracle Fusion Middleware only supports schemas in a byte-mode database. The `nls_length_semantics` initialization parameter on the database where the schemas reside must be set to `BYTE`; setting this parameter to `CHAR` is not supported.

To check the values of this parameter using SQL*Plus, you can use the `show parameters` command:

```
prompt> sqlplus "sys/password as sysdba"SQL> show parameters nls_length_semantics
```

Replace `password` with the actual password for the SYS user.

Alternatively, you can check the values by querying the `V$PARAMETER` view:

```
prompt> sqlplus "sys/password as sysdba"SQL> select name,value from v$parameter;
```

2.1.10 Proper Deinstallation for Reinstallation in the Event of a Failed Installation

In the event that an installation fails, and you want to deinstall the failed installation and then reinstall the software to the same location, you must do the following:

1. Make sure that all the managed servers in the failed installation are shut down. You must verify this in the Administration Console; the word "SHUTDOWN" must appear next to the managed server name.

2. Deinstall the binaries in the Oracle Home directory using the deinstaller in the `ORACLE_HOME/oui/bin` directory.

3. Delete all the managed servers from the failed installation in the `config.xml` file by using the Administration Console or WLST.

4. Delete all directories in the `DOMAIN_HOME/servers` directory:

This procedure will enable you to reinstall the software to the same location, using the same managed server names.

2.1.11 Running irca.sh or irca.bat Against an Oracle 10*g* Database

If you run the Integration Repository Creation Assistance Tool (`irca.sh` on UNIX operating systems or `irca.bat` on Windows operating systems) against an Oracle 10*g* database, you will get a `java.lang.UnsupportedClassVersionError` error.

2.1.12 Installing the SOAINFRA Schema with DBA Permissions

If you need to install the `SOAINFRA` schema and you are using a user with only DBA permissions, run the following commands on your database prior to running RCU:

```
GRANT ALL ON dbms_aqadm TO user WITH GRANT OPTION;
GRANT ALL ON dbms_aq TO user WITH GRANT OPTION;
```

Replace `user` in the command with the name of your database user.

2.1.13 Deinstallation Does Not Remove WebLogic Domains

There may be certain scenarios where you will need to remove WebLogic Domains that you have created. The Oracle Universal Installer is used to remove Oracle Instances and Oracle Home directories only; it does not remove WebLogic Domains.

If you need to remove a WebLogic Domain, you must do so manually. Please refer to your Oracle WebLogic Server documentation for more information.

2.1.14 Failures in the Installation Log File

Upon completing of an Oracle Web Tier, Oracle Identity Management, or Oracle Portal, Forms, Reports and Discoverer installation, the following errors may be seen in the `install`*`time_and_date`*`.log` file:

```
[2009-11-04T21:15:13.959-06:00] [OUI] [NOTIFICATION] [] [OUI] [tid: 16]
[ecid: 0000IJ2LeAeFs1ALJa5Eif1Aw^9l000007,0] OUI-10080:The pre-requisite for
the component Sun JDK 1.6.0.14.08  has failed.

[2009-11-04T21:15:13.960-06:00] [OUI] [NOTIFICATION] [] [OUI] [tid: 16]
[ecid: 0000IJ2LeAeFs1ALJa5Eif1Aw^9l000007,0] OUI-10080:The pre-requisite for
the component Oracle Configuration Manager 10.3.1.2.0  has failed.
```

These messages occur because the Sun JDK and Oracle Configuration Manager are not installed in the `oracle_common` directory. You can safely ignore these messages.

2.1.15 Response File is Missing the MIDDLEWARE_HOME Entry

When installing Oracle Web Tier, the sample response files that are provided in the `Disk1/stage/Response` (on UNIX operating systems) or `Disk1\stage\Response` (on Windows operating systems) directories are missing an entry for specifying the Middleware Home directory.

If you plan on using these response files for silent installation, you must add the `MIDDLEWARE_HOME` entry to the file. For example:

```
MIDDLEWARE_HOME=/home/Oracle/Middleware
```

2.1.16 Ignore Error Message CheckPatchApplicableOnCurrentPlatform Failed

On applying OPatch during Web Tier installation, the following error messages are seen in OraInventory log file:

```
Prerequisite check "CheckPatchApplicableOnCurrentPlatform" failed.
OPatch failed with error code 74
```

This error occurs as HP-UX PA-RISC and HP-UX Itanium patches are available in the same folder, and the OPatch executes all the patches in that folder to overcome a bug that returns the platform name.

The workaround is to ignore the error messages.

2.1.17 Database Connection Failure During Schema Creation When Installing Oracle Internet Directory

If the installation of Oracle Internet Directory fails due to timeout or connection failure when connecting to a database for schema creation, you can try to reset the timeout parameter in the `rcu.properties` file. This file is located in the `IDM_Home/rcu/config` directory on UNIX operating systems. On Windows operating systems, this file is located in the `IDM_Home\rcu\config` directory.

Open the `rcu.properties` file in a text editor, search for the property `JDBC_LOGIN_TIMEOUT`, and set its value to 30.

2.1.18 Benign Errors Logged When Patching Oracle Identity Management 11.1.1.2.0 Installation to 11.1.1.3.0

You may see some benign error messages in installation log files, such as the following, after you patch an Oracle Identity Management 11.1.1.2.0 installation to 11.1.1.3.0:

```
External name..INVALID_ORACLE_DIRECTORY_MSG_STRING
```

```
In doFinish method checking for inventory
lock...InstallProgressPage
```

```
Next page is a progress page and the inventory lock is false
```

```
/bin/chmod: changing permissions of
/scratch/aime1/Oracle/Middleware/oracle_ps2/install/root.log':
Operation not permitted
```

```
/bin/chmod: changing permissions of
/scratch/aime1/Oracle/Middleware/oracle_ps2/bin/nmb': Operation
not permitted
```

```
/bin/chmod: changing permissions of
/scratch/aime1/Oracle/Middleware/oracle_ps2/bin/nmhs': Operation
not permitted
```

```
/bin/chmod: changing permissions of
/scratch/aime1/Oracle/Middleware/oracle_ps2/bin/nmo': Operation
not permitted
```

```
inventoryLocation: /scratch/aime1/oraInventory
```

```
Mode:init
```

Such messages can be ignored.

2.1.19 Unable to Extend an Existing Domain by Selecting Only Oracle Directory Integration Platform Without Cluster

Selecting only Oracle Directory Integration Platform without cluster in a session followed by creating cluster and extending domain on the same machine fails.

In this domain configuration scenario, ensure that you install and configure Oracle Directory Services Manager on the same machine where you extending the domain to configure Oracle Directory Integration Platform.

2.1.20 Starting Managed Servers on Remote Machines After Packing and Unpacking Domain

After you unpack a domain on a remote machine using the `unpack` command, complete the following steps:

1. Start Node Manager on the remote machine. This action creates a nodemanager.properties file on your machine in the `<MW_HOME>/wlserver_ 10.3/common/nodemanager/` directory (on UNIX). On Windows, this file is created in the `<MW_HOME>\wlserver_10.3\common\nodemanager\` the directory.

2. Stop Node Manager.

3. Open the nodemanager.properties file in a text editor and set the `StartScriptEnabled` property to `true`.

4. Start the Node Manager on the remote machine before starting the Managed Server on the remote machine through the Oracle WebLogic Administration Console.

2.1.21 Errors Logged to Managed Server Log Files When Extending a 11.1.1.3.0 Oracle Identity Management Domain on a Remote Machine

When extending a 11.1.1.3.0 (patched) domain on a remote machine, you may see a Null Pointer exception message, such as the following, in the Managed Server log files after installation:

```
0000IW5hUxgDc_Y5HrDCif1Bm1sl000000,0] [APP: DMS Application#11.1.1.1.0]
    initialization error[[java.lang.NullPointerException
        at java.io.File.<init>(File.java:222)
        at oracle.dms.impl.util.AdmlLocator.<init>(AdmlLocator.java:59)
        at oracle.dms.app.DmsSpy.init(DmsSpy.java:86)
        at
weblogic.servlet.internal.StubSecurityHelper$ServletInitAction.run(StubSecurityHel
per.java:283)
```

To work around this issue, do the following:

1. Stop the instance running on the second machine.

2. Stop the Managed Server on the second machine.

3. Stop the instance running on the first machine.

4. Stop Managed Servers on the first machine.

5. Stop the Administration Server on the first machine.

6. Start the instance, the Administration Server, and then Managed Servers on the first machine manually from the command line.

7. Start the instance and then Managed Servers on the second machine manually from the command line.

For information about starting and stopping Oracle Fusion Middleware, see the "Starting and Stopping Oracle Fusion Middleware" chapter in the *Oracle Fusion Middleware Administrator's Guide*.

2.1.22 WebLogic Administration Server Fails to Start Due to Memory Issues

On Windows 32-bit operating systems, the WebLogic Administration Server may fail to start, as it cannot allocate sufficient memory despite the availability of free memory.

As a workaround, complete the following steps:

1. Open the `setSOADomainEnv.cmd` file, located in your `<Domain_Home>\bin` directory, in a text editor.

2. Update the `PORT_MEM_ARGS` entry as follows:

   `set PORT_MEM_ARGS=-Xms512m -Xmx1024m`

3. Save the file and close.

2.1.23 Installation Fails on 64-bit Operating Systems with 32-bit JDKs

To work around this issue:

Append `-jreLoc` and the 32-bit JDK path to the install command.

In UNIX/Linux environments:

```
INSTALL_PATH/runInstaller -jreLoc 32BIT_JAVA_HOME
```

In Windows environments:

```
INSTALL_PATH\setup.exe -jreLoc 32BIT_JAVA_HOME
```

2.2 Patching Issues and Workarounds

This section describes patching issues and their workarounds. It includes the following topics:

- Section 2.2.1, "Deploying WebCenterWorklistDetailApp.ear for WebCenter Spaces Workflows"

- Section 2.2.2, "Running Oracle Business Process Management Suite with Microsoft SQL Server 2008 Database"

- Section 2.2.3, "Some WebCenter Applications Show Old Version Number"

- Section 2.2.4, ""Patch Already Installed" Warning Mesage in Log File"

- Section 2.2.5, "Exception Seen When Extending Your Existing Oracle SOA Suite Domain with Oracle Business Process Management Suite"

- Section 2.2.6, "Exception Seen When Undeploying any SOA Composite with Range-Based Dimension Business Indicators"

- Section 2.2.7, "Updating Oracle WebCenter Wiki and Blog Server Files"

- Section 2.2.8, "OID AND DIP Resource Usage Graph Has No Data"

- Section 2.2.9, "Update to Oracle SOA Suite Release 11.1.1.3.0 Does Not Remove the b2b.r1ps1 Property"

- Section 2.2.10, "Redeploy System Components to Ensure Proper Deinstallation"

- Section 2.2.11, "Manual Steps for Migrating Oracle UMS and Oracle MDS"

- Section 2.2.12, "Warning Message When Migrating Oracle Identity Federation from Release 11.1.1.1.0 to Release 11.1.1.2.0"

- Section 2.2.13, "Setting Execute Permissions for emctl When Migrating System Components"

2.2.1 Deploying WebCenterWorklistDetailApp.ear for WebCenter Spaces Workflows

After running the Oracle Fusion Middleware 11.1.1.3.0 Patch Set Installer, you must redeploy `WebCenterWorklistDetailApp.ear`. This file is located at the following path in your Oracle SOA Suite 11.1.1.2.0 installation path: *SOA_ORACLE_ HOME*/webcenter/applications/WebCenterWorklistDetailApp.ear.

2.2.2 Running Oracle Business Process Management Suite with Microsoft SQL Server 2008 Database

If you have patched your existing Oracle SOA Suite installation with the Patch Set Installer to include Oracle Business Process Management Suite and you are using a Microsoft SQL Server 2008 database, the following procedure is required after you have patched your software:

1. Login to the Administration Console.

2. In the "Connection Pools" tab, add the following property in the "Properties" section for the `mds-owsm` and `mds-soa` data sources:

```
ReportDateTimeTypes=false
```

2.2.3 Some WebCenter Applications Show Old Version Number

After applying the patch for Oracle WebCenter, some applications still show the version number from previous releases.

There is no work around for this issue.

2.2.4 "Patch Already Installed" Warning Mesage in Log File

In a scenario where you have a product that is already patched to version 11.1.1.3.0 in a Middleware home, and then you attempt to patch a second product to the same version in the same Middleware home, a warning message similar to the following will appear in the `install`*timestamp*`.out` file:

```
Attempting to install 1 patches
Mar 3, 2010 1:00:07 PM [THREAD: Thread-1]
com.bea.cie.paf.internal.attach.PatchManagerImpl install
WARNING: Warning:  Patch already installed: PBY8

Patch installation success
Patch installation success
Success..
[SOARootService.getRootActions] autoPortsDetect =null
[SOARootService.getRootActions] privilegedPorts =null
```

This warning message can be safely ignored.

2.2.5 Exception Seen When Extending Your Existing Oracle SOA Suite Domain with Oracle Business Process Management Suite

The following intermittent exception may be seen in cases where you have upgraded your Oracle SOA Suite software to release 11.1.1.3.0 with the Patch Set Installer, and are extending your existing domain to include Oracle Business Process Management Suite:

```
javax.ejb.EJBTransactionRolledbackException: EJB Exception: ; nested exception
 is: javax.persistence.PersistenceException: Exception
[EclipseLink-4002] (Eclipse Persistence Services - 2.0.2.v20100323-r6872):
 org.eclipse.persistence.exceptions.DatabaseException
Internal Exception: java.sql.SQLIntegrityConstraintViolationException:
 ORA-02292: integrity constraint (DB9128_SOAINFRA.BPM_CUBE_ROLE_FK1) violated -
 child record found.
Error Code: 2292
Call: DELETE FROM BPM_CUBE_PROCESS WHERE (PROCESSID = ?)
        bind => [247]
Query: DeleteObjectQuery(CubeProcess(domain:default, composite:counter_extended,
 revision:1.0, name:Process, hasNametab:true));
nested exception is: javax.persistence.PersistenceException: Exception
[EclipseLink-4002] (Eclipse Persistence Services - 2.0.2.v20100323-r6872):
 org.eclipse.persistence.exceptions.DatabaseException
Internal Exception: java.sql.SQLIntegrityConstraintViolationException:
ORA-02292: integrity constraint (DB9128_SOAINFRA.BPM_CUBE_ROLE_FK1) violated -
 child record found
```

This is a harmless exception. To avoid seeing this exception, do the following:

1. Connect to your databsae as the SOA schema user.

2. Drop the `BPM_CUBE_ROLE_FK1` constraint by executing the following:

   ```
   ALTER TABLE BPM_CUBE_ROLE DROP CONSTRAINT BPM_CUBE_ROLE_FK1;
   ```

3. Recreate the `BPM_CUBE_ROLE_FK1` constraint by executing the following:

   ```
   ALTER TABLE BPM_CUBE_ROLE ADD CONSTRAINT BPM_CUBE_ROLE_FK1 FOREIGN KEY @
   (ProcessId) REFERENCES BPM_CUBE_PROCESS(ProcessId) ON DELETE CASCADE;
   ```

4. Restart the Oracle SOA Managed Server.

2.2.6 Exception Seen When Undeploying any SOA Composite with Range-Based Dimension Business Indicators

The following intermittent exception may be seen in cases where you have upgraded your Oracle SOA Suite software to release 11.1.1.3.0 with the Patch Set Installer, and have undeployed SOA composites that have range-based dimension business indicators:

```
javax.ejb.EJBTransactionRolledbackException: EJB Exception: ; nested
exception is: javax.persistence.PersistenceException: Exception
[EclipseLink-4002] (Eclipse Persistence Services - 2.0.2.v20100323-r6872):
org.eclipse.persistence.exceptions.DatabaseException
Internal Exception: java.sql.SQLIntegrityConstraintViolationException:
ORA-02292: integrity constraint (DB9967_SOAINFRA.BPM_CUBE_NAMETAB_RANGE_FK1)
violated - child record found


Error Code: 2292
Call: DELETE FROM BPM_CUBE_NAMETAB WHERE ((EXTENSIONID = ?) AND (NAMETABID =
?))
        bind => [0, 603]
Query:
DeleteObjectQuery(oracle.bpm.analytics.cube.persistence.model.CubeNametab@b7b8
2a); nested exception is: javax.persistence.PersistenceException: Exception
[EclipseLink-4002] (Eclipse Persistence Services - 2.0.2.v20100323-r6872):
org.eclipse.persistence.exceptions.DatabaseException
Internal Exception: java.sql.SQLIntegrityConstraintViolationException:
ORA-02292: integrity constraint (DB9967_SOAINFRA.BPM_CUBE_NAMETAB_RANGE_FK1)
violated - child record found
```

This exception is harmless and can be safely ignored. To avoid seeing this exception, do the following:

1. Connect to your databsae as the SOA schema user.

2. Drop the `BPM_CUBE_NAMETAB_RANGE_FK1` constraint by executing the following:

   ```
   ALTER TABLE BPM_CUBE_NAMETAB_RANGE  DROP CONSTRAINT BPM_CUBE_NAMETAB_RANGE_FK1;
   ```

3. Recreate the `BPM_CUBE_NAMETAB_RANGE_FK1` constraint by executing the following:

   ```
   ALTER TABLE BPM_CUBE_NAMETAB_RANGE ADD CONSTRAINT BPM_CUBE_NAMETAB_RANGE_FK1
   FOREIGN KEY @ (ProcessId, NametabId, ExtensionId) REFERENCES
   BPM_CUBE_NAMETAB (ProcessId, NametabId, ExtensionId) ON DELETE CASCADE;
   ```

4. Restart the Oracle SOA Managed Server.

2.2.7 Updating Oracle WebCenter Wiki and Blog Server Files

After applying the Oracle Fusion Middleware 11.1.1.3.0 patch set, to work with Oracle WebCenter Wiki and Blog Server, you must copy the updated wiki and blog files to the `applications` directory where all applications created in your WebCenter domain reside.

To copy updated wiki and blog files:

- Back up your wiki configuration file, `application_config.script` located at:

  MW_HOME/user_projects/applications/*domain_name*/owc_
  wiki/WEB-INF/classes/application_config.script

  Where, *domain_name* refers to your WebCenter domain.

- Copy files from Oracle WebCenter Wiki and Blog Server's deployment directory in *ORACLE_HOME* to the *DOMAIN_HOME* directory of Oracle WebCenter. That is:

  Copy files from: *ORACLE_HOME*/wikiserver/owc_wiki

  Copy files to: *MW_HOME*/user_projects/applications/*domain_name*

  For example, you can use the following command:

  cp -r *ORACLE_HOME*/wikiserver/owc_wiki *MW_HOME*/user_
  projects/applications/*domain_name*/.

2.2.8 OID AND DIP Resource Usage Graph Has No Data

In Enterprise Manager, the resource usage graphs about memory and CPU display zero values for OID and DIP.

To work around this issue, perform the following steps:

1. Download and apply the one-off patch for Bug 9592163.

2. Stop and start `emagent` using the following command:

   $*INSTANCE_HOME*/bin/opmnctl (stop)startproc process-type=EMAGENT

2.2.9 Update to Oracle SOA Suite Release 11.1.1.3.0 Does Not Remove the b2b.r1ps1 Property

After you update your Release 11.1.1.2.0 software to Release 11.1.1.3.0, and login to the Oracle Enterprise Manager Console and navigate to the b2b Properties screen, the `b2b.r1ps1` property (used to enable Release 11.1.1.2.0 features such as DocProvisioning and TransportCallout) is still visible. This property is removed for Release 11.1.1.3.0.

To remove this property, use the MBean browser remove property operation in Fusion Middleware Control. For more information, see "Configuring B2B Operations" in *Oracle Fusion Middleware Administrator's Guide for Oracle SOA Suite and Oracle BPM Suite*.

2.2.10 Redeploy System Components to Ensure Proper Deinstallation

After you have patched your system component software (Oracle Portal, Forms, Reports and Discoverer, Oracle Identity Management, or Oracle Web Tier) and started all services, you must manually redeploy your system components if you are extending your existing domain. To do so, follow the instructions in "Redeploying

System Components for Extend Domain Scenarios" in the *Oracle Fusion Middleware Patching Guide*.

If you do not redeploy your system components, you will encounter problems when you attempt to remove them.

2.2.11 Manual Steps for Migrating Oracle UMS and Oracle MDS

If you migrate your database schemas from Release 11.1.1.1.0 to Release 11.1.1.2.0 with the BAM Alone option:

```
ant master-patch-schema -DpatchMaster.Componentlist=BAM
```

The Oracle BAM server will not start and you will receive UMS and MDS exceptions. After executing above command, if no errors are seen in the log files and if the version in schema_version_registry is changed to 11.1.1.2.0 for Oracle BAM, then the following commands must be executed to manually migrate Oracle UMS and MDS:

```
ant master-patch-schema -DpatchMaster.Componentlist=MDS
ant master-patch-schema -DpatchMaster.Componentlist=UMS
```

Then, start the Oracle BAM server after running these commands.

2.2.12 Warning Message When Migrating Oracle Identity Federation from Release 11.1.1.1.0 to Release 11.1.1.2.0

When you are using the Patch Assistant migration scripts to migrate Oracle Identity Federation from Release 11.1.1.1.0 to Release 11.1.1.2.0, you may see the following error message:

```
WLSTException: Error occured while performing addHelpCommandGroup : Error
getting resource bundle: : Can't find bundle for base name
oifWLSTResourceBundle, locale en_US
```

This message is harmless and can be safely ignored.

2.2.13 Setting Execute Permissions for emctl When Migrating System Components

When you migrate any Release 11.1.1.1.0 system component to Release 11.1.1.2.0, the following error message can be seen on the console window:

```
Process (index=1,uid=1270434032,pid=0)
Executable file does not have execute permission.

INSTANCE_HOME/EMAGENT/EMAGENT/bin/emctl
failed to start a managed process after the maximum retry limit
Executable file does not have execute permission.
```

The work around is to manually change the permissions of the emctl executable. For example:

```
chmod +x INSTANCE_HOME/EMAGENT/EMAGENT/bin/emctl
```

After changing the permissions, restart all the opmnctl processes.

2.3 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

2.3.1 Extend Domain and Expand Cluster Scenarios with Remote Machines

In scenarios where you are using the Fusion Middleware Configuration Wizard to extend a domain or expand a cluster with remote machines, you must make sure that both the source and destination Middleware Home and Oracle Home directories are identical.

2.3.2 Specify Security Updates Screen Does Not Appear in the Configuration Wizard

If you use silent installation (response file) to configure Oracle Identity Management, security updates (through Oracle Configuration Manager) are not configured. However, the ocm.rsp file is created in the Oracle Home directory. If you run the Configuration Wizard GUI from the Oracle Home, you will not see the Specify Security Updates Screen because of the presence of the ocm.rsp file.

To work around this issue, delete the ocm.rsp file from the Oracle Home and run the Configuration Wizard to see the Specify Security Updates screen.

2.3.3 Log Messages Appearing on Console During Oracle Identity Management Schema Creation

During the creation of the Oracle Identity Management (OIM) schema, some log messages will appear in the RCU console window. These log messages are specific to Quartz, which is used by Oracle Identity Management, and can be safely ignored.

If there are any errors encoutered during the loading of this Quartz-specific data, the errors will be written to the RCU log files. Refer to *Oracle Fusion Middleware Repository Creation Utility User's Guide* for more informaiton about the RCU log files.

2.3.4 Configuring Oracle Identity Management When WebLogic Node Manager is Running

To configure Oracle Identity Management, using either the Install and Configure option or the Configuration Wizard, when the WebLogic Node Manager utility is running from the same Middleware Home directory where Oracle Identity Management is installed, the `StartScriptEnabled` parameter in the nodemanager.properties file must be set to true. For example:
`StartScriptEnabled=true`

To configure Oracle Identity Management when the `StartScriptEnabled` parameter is set to `false`, you must:

1. Set the `StartScriptEnabled` parameter to true.

2. Stop, then restart the Node Manager utility.

3. Configure Oracle Identity Management using either the Install and Configure option or the Configuration Wizard.

> **Note:** The nodemanager.properties file is located in the *WL_HOME*/common/nodemanager/ directory.

2.3.5 Configuring OID with Oracle Data Vault

If you choose to configure Oracle Internet Directory (OID) with Oracle Data Vault:

1. Apply patch 8897382 (see the README file in the patch for instructions).

2. In the *ORACLE_HOME*/ldap/datasecurity/dbv_oid_command_rules.sql (on UNIX operating systems) or *ORACLE_HOME*\ldap\datasecurity\dbv_oid_command_rules.sql (on Windows operating systems) file, find the following code:

```
/declare
.
begin
.
   dvsys.dbms_macadm.CREATE_COMMAND_RULE(
   command => 'CONNECT'
   ,rule_set_name => 'OID App Access'
   ,object_owner => 'ODS'
   ,object_name => '%'
   ,enabled => 'Y');
.
commit;
.
end;/
```

3. Change the following line:

```
,object_owner => 'ODS'
```

to:

```
,object_owner => '%'
```

2.3.6 Password Requirements for Oracle Internet Directory Administrator

When configuring Oracle Internet Directory, using either the installer's Install and Configure option or the Configuration Wizard, you must enter and confirm the Administrator Password.

The following is a list of the requirements for the Oracle Internet Directory Administrator Password. The password must contain:

- At least 5 characters
- No more than 30 characters
- At least one number
- Only alpha-numeric characters, underscore (_), dollar sign ($), and pound/hash (#)

> **Note:** If the password you enter does not satisfy these requirements, the following error message appears:
>
> ```
> INST-07037: Administrator Password field value contains one or more
> invalid characters or the value is not in proper format.
> ```

2.3.7 Changing the Listen Address of a Managed Server

When you run the Configuration Wizard after installing Oracle Identity Management or Oracle Portal, Forms, Reports and Discoverer, the listen address for WebLogic managed servers is left blank by default (to listen to all network interfaces). If you change the listen address to the actual host name, the managed server stops listening from outside the machine.

It is recommended that you either leave the listen address blank, or specify the IP address of the host rather than using the host name.

2.3.8 Expand Cluster Requires Changes to the emd.properties File

After running the Oracle Fusion Middleware Configuration Wizard to expand a cluster, the `EMD_URL` parameter in the *INSTANCE_HOME*`/EMAGENT/EMAGENT/sysman/config/emd.properties` (on UNIX) or *INSTANCE_HOME*`\EMAGENT\EMAGENT\sysman\config\emd.properties` (on Windows) file contains the values shown below:

```
EMD_URL=http://localhost.localdomain:port/emd/main
```

You must edit this parameter and replace `localhost` and `localdomain` with the actual host and domain information of your environment. For example, using `5160` as the port number:

```
EMD_URL=http://myhost.mydomain.mycompany.com:5160/emd/main
```

2.3.9 Domain Extension Overwrites JDBC Data Source Name

When a WebLogic Domain with JDBC resources is extended to either Oracle SOA Suite or Oracle WebCenter, the JDBC data source name will be changed. This behavior is commonly observed in cases where WebLogic Server version lower than 9.x is upgraded to a version higher than 9.x and then extended to Oracle SOA Suite or Oracle WebCenter.

To work around this issue, you must manually edit the JDBC data source names.

2.3.10 Schemas Are Not Visible After Upgrade of Oracle Identity Management

After upgrading Oracle Identity Management from Release 10*g* (10.1.4.3) to 11*g* Release 1 (11.1.1), the Oracle Directory Service schemas (`ODS` and `ODSSM`) are not visible in the Repository Creation Utility (RCU).

The reason for this is because RCU is not used during the upgrade process, and RCU only recognizes schemas that are created by RCU. Refer to *Oracle Fusion Middleware Repository Creation Utility User's Guide* for more information.

2.3.11 RCU Summary Screen Issues

If you are dropping the Identity Management schemas and you select both Oracle Internet Directory (`ODS`) and Oracle Identity Federation (`OIF`) to be dropped, the RCU summary screen may not be displayed and an exception may be thrown in the console.

To work around this issue, select and drop one component at a time instead of selecting them both and dropping them together.

When other components are selected for a drop schema operation, the summary screen may display inaccurate information. However, the selected schemas will be successfully dropped from the database in spite of the erroneous information on the summary screen.

To work around this issue, select and drop only one component at a time.

2.3.12 Error Message When Configuring Oracle Identity Federation

During the configuration of Oracle Identity Federation (OIF), the following error message regarding key store and password may be seen in the configuration log file:

```
[app:OIF module:/fed path:/fed spec-version:2.5
version:11.1.1.1.0]: Failed while destroying servlet: usermanager.
java.lang.RuntimeException: The server could not initialize properly:
oracle.security.fed.sec.util.KeySourceException: Invalid/unsupported
key store or incorrect password. Please verify that the password is correct
and the store is a valid PKCS#12 PFX wallet or Java KeyStore file.
```

This error message can be safely ignored if OIF is running properly.

2.3.13 Ensure There Are No Missing Products When Using unpack.sh or unpack.cmd

Oracle SOA Suite, Oracle WebCenter, and Application Developer all contain the `pack.sh` and `unpack.sh` (on UNIX systems) or `pack.cmd` and `unpack.cmd` (on Window systems) commands in their respective *ORACLE_HOME*/common/bin (on UNIX systems) or *ORACLE_HOME*\common\bin (on Windows systems) directories.

The `pack.sh` and `pack.cmd` scripts are used to create a template archive (`.jar`) file that contains a snapshot of either an entire domain or a subset of a domain. The `unpack.sh` and `unpack.cmd` scripts are used to create a full domain or a subset of a domain used for a Managed Server domain directory on a remote machine.

The `unpack.sh` and `unpack.cmd` commands will fail if any installed products are missing from the machine where you are running the `unpack.sh` or `unpack.cmd` command.

2.3.14 Running unpack.sh or unpack.cmd on a Different Host

If you are running the unpack.sh (on UNIX) or unpack.cmd (on Windows) command to unpack a domain on a remote host, the Oracle Home location and the Middleware Home location on the remote host should match the locations on the host where the pack was performed.

Below is a valid example:

```
Host 1:
MW_HOME = /user/home/Middleware
ORACLE_HOME =/user/home/Middleware/Oracle_SOA1

@ Host 2:
MW_HOME = /user/home/Middleware
ORACLE_HOME =/user/home/Middleware/Oracle_SOA1
```

The example below is NOT valid because the Oracle Homes do not match:

```
Host 1:
MW_HOME = /user/home/Middleware
ORACLE_HOME =/user/home/Middleware/Oracle_SOA1

@ Host 2:
MW_HOME = /user/home/Middleware
ORACLE_HOME =/user/home/Middleware/SOA_Home
```

The example below is NOT valid because the Middleware Homes do not match:

```
Host 1:
MW_HOME = /user/home/Middleware
ORACLE_HOME =/user/home/Middleware/Oracle_SOA1

@ Host 2:
MW_HOME = /user/home/MWHome
ORACLE_HOME =/user/home/Middleware/Oracle_SOA1
```

2.3.15 Rerouting to Original URL After SSO Authentication in Firefox and Safari Browsers

When configuring Oracle Portal, Forms, Reports and Discoverer, when both Oracle HTTP Server and Oracle Web Cache are selected for configuration, re-routing (back to the original URL) after Single Sign-On (SSO) authentication does not work in Firefox and Safari browsers when the initial request comes from Oracle HTTP Server.

The work arounds are to either use the Internet Explorer browser, or manually modify the *INSTANCE_HOME*/config/OHS/instance_name/httpd.conf file and change the ServerName entry to include the port number. For example:

```
ServerName myhost.mydomain.com
```

should be changed to:

```
ServerName myhost.mydomain.com:port
```

Replace *port* with the actual port number.

2.4 Known Issues

This section describes known issues. It includes the following topics:

- Section 2.4.1, "Deinstall Command Runs Into java.lang.UnsatisfiedLink Error"

- Section 2.4.2, "Forms and Reports Builder Not Supported"

- Section 2.4.3, "CFGFWK-60895 Error While Running Config.sh with SOA or WebCenter Using HP JDK 1.6.0.02"

- Section 2.4.4, "Cloning on HP-UX Itanium and HP-UX PA-RISC (64-Bit) Platforms Succeeds with Chmod:Invalid Option Message"

2.4.1 Deinstall Command Runs Into java.lang.UnsatisfiedLink Error

When command `runInstaller -deinstall` is run on HP-UX Itanium (64-Bit) with HP 64bit JVM to deinstall WebCenter or SOA shiphome, it fails to start deinstalling OUI and runs into `java.lang.UnsatisfiedLink` error. This happens as *-d64* flag is missing in `oraparam.ini jre` memory options.

Workaround

Run command `runInstaller -deinstall` *-J-d64* to continue the deinstallation process.

2.4.2 Forms and Reports Builder Not Supported

Forms and Reports Builder is not suported on Linux x86-64, Solaris Operating System (SPARC 64-Bit), AIX Based Systems (64-Bit), HP-UX PA-RISC (64-Bit), HP-UX Itanium, and Microsoft Windows x64 platforms. It is supported on Linux x86 and Microsoft Windows (32-Bit) platforms only.

2.4.3 CFGFWK-60895 Error While Running Config.sh with SOA or WebCenter Using HP JDK 1.6.0.02

After installing SOA or WebCenter on HP-UX Itanium, config.sh is executed to create a domain. At the Configure Server Start Mode and JDK step, if HP JDK 1.6.0.02 is selected, the following error message shows after clicking the **Next** button:

CFGFWK-60895: The selected jdk version is lower than recommended minimum version.

Workaround

Ignore the error message and click the OK button to continue with creating the domain. *HP JDK 1.6.0.02* is certified for use with both SOA and WebCenter so this error can be ignored. The other option to avoid this error message is to use *HP JDK1.6.0.03* (or higher).

2.4.4 Cloning on HP-UX Itanium and HP-UX PA-RISC (64-Bit) Platforms Succeeds with Chmod:Invalid Option Message

Cloning is successfully done on HP-UX PA-RISC (64-Bit) and HP-UX Itanium platforms. However, the installation logs show the `chmod:invalid option` message.

Workaround

Ignore the message because cloning completes successfully.

2.5 Documentation Errata

This section describes documentation errata. It includes the following topics:

- Section 2.5.1, "Missing Installer Startup Instructions for a 32-bit JDK on a 64-bit Platform"

- Section 2.5.2, "Missing Information in the Oracle Web Tier Installation Guides"

- Section 2.5.3, "Missing Post-Installation Steps in the Oracle WebCenter Installation Guide"

- Section 2.5.4, "Updating OIM Configuration to Use Oracle HTTP Server 10g WebGate"

- Section 2.5.5, "Missing Logout Configuration Steps in the Oracle Identity Management Installation Guide"

2.5.1 Missing Installer Startup Instructions for a 32-bit JDK on a 64-bit Platform

The following information is missing from the installer startup instructions in the quick installation guides for Oracle SOA Suite and Oracle WebCenter:

If you are installing your product on a 64-bit UNIX or Windows operating system with a 32-bit JDK, you must specify the *JRE_LOCATION* using the -jreLoc option from the command line. The option to provide your *JRE_LOCATION* at the prompt is not supported in such cases, and the installer will not start.

2.5.2 Missing Information in the Oracle Web Tier Installation Guides

This section contains documentation errata in the Oracle Web Tier installation guides. The following topics are covered:

- Section 2.5.2.1, "Starting Node Manager When Registering Oracle Web Tier with a WebLogic Domain"

- Section 2.5.2.2, "Using Oracle Enterprise Manager for GUI-Based Administration"

2.5.2.1 Starting Node Manager When Registering Oracle Web Tier with a WebLogic Domain

The following information is missing from the *Oracle Fusion Middleware Installation Guide for Oracle Web Tier*:

If you are registering your Oracle Web Tier instance with an existing WebLogic Domain, you must start Node Manager as described below:

1. On UNIX operating systems, run the *ORACLE_HOME*/common/bin/setNMProps.sh script.

   On Windows operating systems, run the *ORACLE_HOME*\common\bin\setNMProps.cmd script.

   This script appends the required properties to the nodemanager.properties file. These properties can also be appended manually, or provided as command-line arguments.

   > **Note:** The StartScriptEnabled=true property is required for Managed Servers to receive proper classpath and command arguments.

2. On UNIX operating systems, start Node Manager by running the
   `MWHome/wlserver_10.3/server/bin/startNodeManager.sh` script.

   On Windows operating systems, start Node Manager by running the
   `MWHome\wlserver_10.3\server\bin\startNodeManager.cmd` script.

For more information about Node Manager, refer to *Oracle Fusion Middleware Node Manager Administrator's Guide for Oracle WebLogic Server*.

2.5.2.2 Using Oracle Enterprise Manager for GUI-Based Administration

The following information is missing from the *Oracle Fusion Middleware Installation Guide for Oracle Web Tier*:

Oracle Web Tier can be installed and configured in two ways:

- Stand-alone.

  Oracle Web Tier is configured without a WebLogic Domain and administered from the command line.

- Using Oracle Enterprise Manager Fusion Middleware Control.

  This approach requires Oracle Web Tier to be associated with a Weblogic Domain.

Follow the instructions below to associate Oracle Web Tier with a WebLogic Domain:

1. Create a WebLogic Domain.

   Oracle Web Tier requires an existing WebLogic Domain; you cannot create a WebLogic Domain during the Oracle Web Tier installation.

   a. Read "Before you Begin" in *Oracle Fusion Middleware Installation Planning Guide* for information about whether or not you need a database and database schemas, and also for information about installing Oracle WebLogic Server.

   b. After you have installed Oracle WebLogic Server, install (do not configure) any Oracle Fusion Middleware product.

      Installation of an Oracle Fusion Middleware product creates the Oracle Common home directory (`MW_HOME/oracle_common` on UNIX operating systems, or `MW_HOME\oracle_common` on Windows operating systems). This directory contains the domain templates for Enterprise Manager and Java Required Files (JRF).

   c. Run the Configuration Wizard from the Oracle Common home directory (`config.sh` on UNIX operating systems or `config.cmd` on Windows operating systems).

      On the Select Domain Source screen, select the **Oracle Enterprise Manager** and **Oracle JRF** templates associated with the `oracle_common` directory. The Oracle JRF template is selected automatically when the Oracle Enterprise Manager template is selected.

2. Install Oracle Web Tier as described in *Oracle Fusion Middleware Installation Guide for Oracle Web Tier*.

   On the Configure Components screen, select **Associate Selected Components with WebLogic Domain**.

   On the Specify WebLogic Domain screen, provide the credentials to the WebLogic Domain you just created.

3. After the installation is complete, start the Administration Server in the domain, and then verify that the Oracle Web Tier components are listed by accessing the following URL:

```
http://host:port/em
```

2.5.3 Missing Post-Installation Steps in the Oracle WebCenter Installation Guide

The following information about how to start Managed Servers from the Administration Console is missing from the *Oracle Fusion Middleware Installation Guide for Oracle WebCenter*:

In order to start a managed server from the Administration Console, you must first create a machine, then associate the managed server with that machine:

1. Login to the Administration Console.

2. Navigate to **Environment > Machines**.

3. Click **New**.

4. Enter a machine name (for example, `Machine-WC`).

5. In the Administration Console, navigate to **Environment > Servers** and select the managed server for which you want to associate this machine (`Machine-WC`). Use the drop-down list to associate the managed server with the machine.

> **Note:** This procedure only works if the managed servers are shut down. If the managed servers are up and running, then no values will appear in the drop-down list.

After this procedure, the managed server will start successfully and be accessible.

2.5.4 Updating OIM Configuration to Use Oracle HTTP Server 10*g* WebGate

Step 4 in the Section 22.8 "Optional: Updating Oracle Identity Manager Configuration" in the chapter "Migrating from Domain Agent to Oracle HTTP Server 10g Webgate for OAM" requires you to update the OIM Configuration when the OAM URL or agent profile changes. This section is in the *Oracle Fusion Middleware Installation Guide for Oracle Identity Management*.

To update Oracle Identity Manager configuration, complete the following steps:

1. Export the `oim-config.xml` file from metadata by running `<IDM_Home>/server/bin/weblogicExportMetadata.sh` (on UNIX), and export the file - `/db/oim-config.xml`. On Windows operating systems, you can use the weblogicExportMetadata.bat file located in the same directory.

2. Update the file to use Oracle HTTP Server 10*g* Webgate by updating following element under the `<ssoConfig>` tag:

   `<webgateType>javaWebgate</webgateType>` to `<webgateType>ohsWebgate10g</webgateType>`

3. Import `oim-config.xml` back to metadata by running `<IDM_Home>/server/bin/weblogicImportMetadata.sh` on UNIX. On Windows, use the `weblogicImportMetadata.bat` located in the same directory.

4. Log in to Oracle Enterprise Manager using your WebLogic Server administrator credentials.

5. Click **Identity and access > oim > oim(version)**. Right-click and select **System MBean Browser**. The System MBean Browser page is displayed.

6. Under Application Defined MBeans, select `oracle.iam` > `Server:oim_ server1` > `Application: oim` > `XMLConfig` > `config`.

7. Replace the front-end URL with the URL of Oracle HTTP Server. This should be the same Oracle HTTP Server that was used before installing Oracle HTTP Server 10*g* Webgate for Oracle Access Manager. Complete the following steps:

   a. Under `XMLConfig` MBean, move to `XMLConfig.DiscoveryConfig`.

   b. Update **OimFrontEndURL** with the URL of Oracle HTTP Server.

   c. Click **Apply**.

8. Restart the OIM server.

2.5.5 Missing Logout Configuration Steps in the Oracle Identity Management Installation Guide

Steps to perform logout configuration after updating the OIM Server Configuration are missing from the *Oracle Fusion Middleware Installation Guide for Oracle Identity Management*.

You must perform logout configuration after updating the OIM Server configuration, as described in the Section 22.6 "Updating OIM Server Configuration" in the chapter "Migrating from Domain Agent to Oracle HTTP Server 10g Webgate for OAM".

> **Note:** Ensure that you have set up integration between Oracle Identity Manager and Oracle Access Manager, as described in the topic "Integration Between OIM and OAM" in the *Oracle Fusion Middleware Installation Guide for Oracle Identity Management*.

After updating OIM Server configuration, you must perform logout configuration as follows:

1. Copy the `logout.html` file from the `<IDM_HOME>/oam/server/oamsso` directory to the `<10gWebgateInstallation>/access/oamsso` directory.

2. Edit the `SERVER_LOGOUTURL` variable in the `logout.html` file to point to the host and port of the Oracle Access Manager Server. Follow the instructions in the `logout.html` file.

3. If the `http.conf` file of the web server includes the following entries, remove the entries from the `http.conf` file:

```
<LocationMatch "/oamsso/*">
    Satisfy any
    </LocationMatch>
```

3

Upgrade

This chapter describes issues associated with upgrading your environment and your applications to Oracle Fusion Middleware 11*g*. It includes the following topics:

- Section 3.1, "General Issues and Workarounds"

- Section 3.2, "General Issues and Workarounds for Migrating from 11.1.1.1.0"

- Section 3.3, "Documentation Errata for Upgrade"

3.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topics:

- Section 3.1.1, "Patches Required to Address Specific Upgrade and Compatibility Requirements"

- Section 3.1.2, "Unable to Read Composite Model Error During SOA Application Upgrade"

- Section 3.1.3, "Oracle BAM Upgrade Issues"

- Section 3.1.4, "Error When Upgrading Oracle Internet Directory Due to Invalid ODS Schema"

- Section 3.1.5, "Restore From Backup Required If Upgrade Fails During a Colocated Oracle Internet Directory and Oracle Directory Integration Platform Upgrade"

- Section 3.1.6, "Cannot Verify Oracle Forms Services Upgrade When Oracle HTTP Server is Running On a Separate Host"

- Section 3.1.7, "WebCenter Security Upgrade Release Notes"

- Section 3.1.8, "Oracle B2B Upgrade Release Notes"

- Section 3.1.9, "Problem Accessing the Welcome Pages in Oracle HTTP Server After Upgrade"

- Section 3.1.10, "Misleading Error Message When Upgrading Oracle Internet Directory"

- Section 3.1.11, "Additional Steps Required When Redeploying the SOA Order Booking Sample Application on Oracle Fusion Middleware 11g"

- Section 3.1.12, "Additional Steps Required When Upgrading Human Taskflow Projects"

- Section 3.1.13, "Stopping Oracle Virtual Directory Processes During Upgrade"

- Section 3.1.14, "Providing Input to Upgrade Assistant Screens When Oracle Internet Directory Upgrade Fails"

3.1.1 Patches Required to Address Specific Upgrade and Compatibility Requirements

In general, Oracle assumes that you are running the latest Oracle Application Server 10*g* patch sets before you begin the upgrade to Oracle Fusion Middleware 11*g*.

In addition, in some specific cases, you must apply an additional software patches to your Oracle Application Server 10*g* components before you start the upgrade process. These patches are designed to address specific interoperability issues that you might encounter while upgrading your Oracle Application Server 10*g* environment to Oracle Fusion Middleware 11*g*.

Table 3–1 lists the specific patch sets required to address specific upgrade and compatibility requirements for Oracle Fusion Middleware 11*g*.

For more information, refer to the following sections:

- Section 3.1.1.1, "Obtaining Patches and Support Documents From My Oracle Support (Formerly OracleMetaLink)"

Table 3–1   Patches Required to Address Specific Upgrade and Compatibility Requirements

Patch Set Number	Description and Purpose	Additional Information
8404955	Before you can perform the Oracle B2B schema upgrade, you must apply this required patch to the Oracle Application Server Integration B2B 10g Release 2 (10.1.2) middle tier. This patch set is required in order to enable the Java command that you use to export the trading partner agreements, as described in the following step.	"Task 6b: If Necessary, Upgrade the B2B Schema" in the *Oracle Fusion Middleware Upgrade Guide for Oracle SOA Suite, WebCenter, and ADF*
5746866	If the database that hosts your Oracle Application Server 10*g* schemas is an Oracle Database 10g (10.1.0.x) database, then make sure that this database patch (or database patch 5126270) has been applied to the 10*g* (10.1.0.*x*) database before you upgrade the database to the required Oracle Database 10g (10.2.0.4). Note that database patch 5746866 includes patch 5126270.	"Upgrading to Oracle Database 10g Release 2 (10.2.0.4)" in the *Oracle Fusion Middleware Upgrade Planning Guide*
7685124	Apply this patch against Oracle Secure Enterprise Search (10.1.8.3.0) before you attempt to use Oracle Secure Enterprise Search with Oracle Portal 11*g*.	"Oracle Secure Enterprise Search" in the *Oracle Fusion Middleware Administrator's Guide for Oracle Portal* Section 44.4, "Interoperability Issues and Workarounds."
8372141	Apply this patch on your Oracle Application Server 10g Release 3 (10.1.3.4) environment to enable interoperability between Oracle SOA Suite 10g Release 3 (10.1.3.4) and Oracle BPEL Process Manager 11*g*. This patch is also referred to as the Oracle SOA Suite 10g Release 3 (10.1.3.4) Cumulative MLR #7.	"Applying Patch Sets to Address Specific Upgrade Interoperability Issues" in the *Oracle Fusion Middleware Upgrade Planning Guide* "Upgrading Oracle SOA Suite Client Applications" in the *Oracle Fusion Middleware Upgrade Guide for Oracle SOA Suite, WebCenter, and ADF*

Table 3–1   (Cont.) Patches Required to Address Specific Upgrade and Compatibility Requirements

Patch Set Number	Description and Purpose	Additional Information

6522654	Apply this patch to your Oracle Database before you attempt to upgrade your Oracle BAM schema.
	
	If you do not apply this patch to your Oracle Database 10*g* (10.2.0.3), 10*g* (10.2.0.4), or Oracle Database 11*g* (11.1.0.7) before performing the schema upgrade, you will likely see the following error:
	
	`BAM MRUA: SCHEMA UPGRADE FAILED`
	`SQLException: ORA-39002: invalid`
	`operation`
	
	The description for this patch on My Oracle Support is "USING DATA PUMP THROUGH DBLINK CAUSED DATA CORRUPTION FOR CLOB VALUES".
		"Task 6c: If Necessary, Upgrade the BAM Schema" in the *Oracle Fusion Middleware Upgrade Guide for Oracle SOA Suite, WebCenter, and ADF*
		
		Section 3.1.3.1, "Datapump Export for Oracle BAM Upgrade Plug-in Fails in Oracle Database 10g (10.2.0.3), 10g (10.1.2.0.4), and Oracle Database 11g (11.1.0.7)"

7675269	Apply this patch to prevent the occurrence of an ORA-01591 error in an Oracle Real Application Clusters (RAC) 11*g* (11.1.0.7) database. This error can occur for rows locked by transactions which were in the middle of two-phase commit. The description of this patch on My Oracle Support is "ODAC 2008:RAC NODE AFFINITY: DISTRIBUTED TXN ABORTS WITH ORA-01591."	"Upgrading and Preparing Your Databases" in the *Oracle Fusion Middleware Upgrade Planning Guide*
8291981	Apply this patch to correct a problem where Metadata Repository (MDS) queries against an Oracle Database 11*g* (11.1.0.7) database do not find all of the results (documents or elements) that they should. The description of this patch on My Oracle Support is: "SELECT INCORRECT RESULTS: SOME RESULTS NOT FOUND".	"Managing the MDS Repository" in the *Oracle Fusion Middleware Administrator's Guide*

Table 3–1 (Cont.) Patches Required to Address Specific Upgrade and Compatibility Requirements

Patch Set Number	Description and Purpose	Additional Information
9007079	Apply this bundled patch to your Oracle Database 11*g* (11.1.0.7) Real Application Clusters (RAC) environment to address three known issues while using the RAC database with Oracle Fusion Middleware Oracle SOA Suite components. See the Readme file for the patch for a list of the bugs addressed by the patch. The description of this patch on My Oracle Support is: "MERGE REQUEST FOR 8886255 AND 7675269".	"Oracle Real Application Clusters and Fusion Middleware" in the *Oracle Fusion Middleware High Availability Guide*.
8607693	Apply this patch to your Oracle Real Application Clusters (RAC) 11*g* (11.1.0.7) database to prevent an error that can occur if an XA transaction branch was being asynchronously rolled back by two or more sessions. The description of this patch on My Oracle Support is: "STRESS SOA - ORA-00600: INTERNAL ERROR CODE, ARGUMENTS: [504] (RAC)".	"Oracle Real Application Clusters and Fusion Middleware" in the *Oracle Fusion Middleware High Availability Guide*.
7682186	Apply this patch to your Oracle Real Application Clusters (RAC) 11*g* (11.1.0.7) database to prevent an issue that results in an ORA-600 error. Behavior includes CR-inconsistencies between index and the block, or incorrect results in a RAC multi-node global transaction environment. The description of this patch on My Oracle Support is: "ORA-600[KDSGRP1] SIGNALLED DURING BUGOLTP-XA WORKLOAD".	"Oracle Real Application Clusters and Fusion Middleware" in the *Oracle Fusion Middleware High Availability Guide*.

3.1.1.1 Obtaining Patches and Support Documents From My Oracle Support (Formerly Oracle*MetaLink*)

To obtain a patch, log in to My Oracle Support (formerly Oracle*MetaLink*), click **Patches and Updates**, and search for the patch number:

```
http://metalink.oracle.com/
```

To obtain a support note or document, log in to My Oracle Support and enter the support note number in the **Quick Find** search field at the top of the My Oracle Support window and search the Knowledge Base for the note number.

3.1.2 Unable to Read Composite Model Error During SOA Application Upgrade

The *Oracle Fusion Middleware Upgrade Guide for Oracle SOA Suite, WebCenter, and ADF* describes how Oracle JDeveloper 11*g* will automatically upgrade specific features of your Oracle SOA Suite 10*g* applications to 11*g*.

However, if you see the following error while upgrading your application in JDeveloper 11g, then you can safely ignore the error. Your application will be upgraded, but you will need to create a new SOA-SAR deployment profile after the application upgrade. And use this newly created profile for deploying SOA composite:

```
SEVERE: Unable to read composite model for project project_name
```

For more information, see 43.2, "Deploying a Single SOA Composite in Oracle JDeveloper," in the *Oracle Fusion Middleware Developer's Guide for Oracle SOA Suite*.

3.1.3 Oracle BAM Upgrade Issues

The following sections provide information about specific issues related to upgrading Oracle BAM 10*g* to Oracle BAM 11*g*:

- Section 3.1.3.1, "Datapump Export for Oracle BAM Upgrade Plug-in Fails in Oracle Database 10g (10.2.0.3), 10g (10.1.2.0.4), and Oracle Database 11g (11.1.0.7)"

- Section 3.1.3.2, "Dependent Alerts Do Not Upgrade Correctly"

- Section 3.1.3.3, "Problem Upgrading a Report that Contains Calculated Fields"

- Section 3.1.3.4, "Calculated Fields Reference the Field ID Rather Than Field Names After Upgrade to Oracle BAM 11g"

- Section 3.1.3.5, "Using the Oracle BAM 11g Samples After Upgrade from Oracle BAM 10g"

3.1.3.1 Datapump Export for Oracle BAM Upgrade Plug-in Fails in Oracle Database 10*g* (10.2.0.3), 10*g* (10.1.2.0.4), and Oracle Database 11*g* (11.1.0.7)

Before you upgrade the Oracle BAM 11*g* schema to 11*g*, you must first apply patch 6522654 to your Oracle Database 10*g* (10.2.0.3), 10*g* (10.1.2.0.4), and Oracle Database 11*g* (11.1.0.7).

If you do not apply this patch, then you will likely experience the following error during Oracle BAM schema upgrade:

```
BAM MRUA: SCHEMA UPGRADE FAILED SQLException: ORA-39002: invalid operation
```

For more information, see Section 3.1.1, "Patches Required to Address Specific Upgrade and Compatibility Requirements".

3.1.3.2 Dependent Alerts Do Not Upgrade Correctly

When an alert in Oracle BAM 10g is dependent upon another alert, the dependent alert keeps a reference to the parent alert with a GUID reference. When such an alert is exported from 10g it will contain a GUID reference to the parent alert, and import to an Oracle BAM 11g system is not successful.

The following modification to the exported alert definition file can be used as a workaround for import to an Oracle BAM 11g system.

Edit the exported file contents of the dependent alert from the Oracle BAM 10g system, and modify the following element containing reference to parent alert.

Change this:

```
&lt;param name=&quot;RuleID&quot; order=&quot;0&quot;&gt;
  //private:weblogic/Rule/624567ffe84de34c-6e6bdbaa120eb7f6ea6-8000
&lt;/param&gt;
```

To this:

```
&lt;param name=&quot;RuleID&quot; order=&quot;0&quot;&gt;
  ParentAlertName
&lt;/param&gt;
```

In other words, the GUID reference for parent alert must be replaced by the parent alert's name.

3.1.3.3 Problem Upgrading a Report that Contains Calculated Fields

If you created a report in Oracle BAM 10*g* or in Oracle BAM 11*g* Release 1 (11.1.1.1.0) and the report contains calculated fields that use using `datetime` type fields, then the Calculations tab displays this error in Oracle BAM 11*g* Release 1 (11.1.1.2.0):

```
BAM-01610: INVALID FILTER EXPRESSION
```

More specifically, this error occurs when the calculation is an expression for equality check against a datetime field in String format. For example, for a datetime field such as Last Modified, the following calculation does not work:

```
If {Last Modified}=="7/18/2002 1:33:10 PM"
```

Before you can upgrade the report, you must remove the calculated fields.

3.1.3.4 Calculated Fields Reference the Field ID Rather Than Field Names After Upgrade to Oracle BAM 11*g*

After upgrading to Oracle BAM 11*g* Release 1 (11.1.1.2.0), any calculated fields in your reports will reference fields by the field ID, rather than the field name.

Specifically, after upgrade, the field name referenced in the expression will be converted to use the field id (for example, `_Num_Sold`).

For example, the field reference might appear as follows after the upgrade:

```
If({_Num_Sold}==5000)
    Then("met")
    Else("notmet")
```

Note that the calculated fields will continue to work after the upgrade and after this automatic conversion.

3.1.3.5 Using the Oracle BAM 11*g* Samples After Upgrade from Oracle BAM 10*g*

When you install Oracle BAM 11*g*, the installer copies a set of sample applications to the Oracle SOA Suite Oracle home. Refer to the following sections for more information about using these samples after upgrading to Oracle BAM 11*g* from Oracle BAM 10*g*:

- Section 3.1.3.5.1, "General Information About the Oracle BAM Samples"

- Section 3.1.3.5.2, "Removing Any 10g Sample Applications Before Configuring the Oracle BAM 11g Samples"

For information about using the Oracle BAM 11*g* after migrating from Oracle Fusion Middleware 11*g* Release 1 (11.1.1.1.0), see Section 3.2.7, "Using the Oracle BAM 11g Prepackaged Samples After Migrating from 11.1.1.1.0".

3.1.3.5.1 General Information About the Oracle BAM Samples The Oracle Fusion Middleware installer copies the Oracle BAM samples to the following location in the Oracle SOA Suite Oracle home:

```
SOA_ORACLE_HOME/bam/samples/bam/
```

Instructions for configuring and using the samples, as well as updated samples, can be found at the following URL on the Oracle Technology Network (OTN):

```
http://www.oracle.com/technology/products/integration/bam/collateral/samples11g.html
```

The instructions explain how to use the propert setup script to configure the demos in your Oracle BAM 11*g* environment. You can also find individual readme file for each demo within each sample directory.

3.1.3.5.2 Removing Any 10*g* Sample Applications Before Configuring the Oracle BAM 11*g* Samples Before you use the instructions on OTN to set up the Oracle BAM 11*g* samples, remove any data objects, reports, or alerts associated with any existing 10*g* samples.

For example, be sure to remove any artifacts associated with the Oracle BAM 10*g* Call Center and Atherton demos before you run the setup scripts.

3.1.4 Error When Upgrading Oracle Internet Directory Due to Invalid ODS Schema

If you receive an error when using the Upgrade Assistant to upgrade the Oracle Internet Directory schema from 10g Release 2 (10.1.2.3) to 11*g*, then verify that the ODS 10*g* schema is valid.

To view the status of the Oracle Application Server 10*g* schemas in your database, use the following SQL command:

```
SELECT comp_id, version, status FROM app_registry;
```

If the output from this command shows that the ODS schema is INVALID, then use the instructions in the following My Oracle Support document to install and configure Referential Integrity:

```
730360.1, "Referential Integrity in Oracle Internet Directory Version 10.1.2.3"
```

After performing the instructions in the support document, then retry the Oracle Internet Directory schema upgrade.

3.1.5 Restore From Backup Required If Upgrade Fails During a Colocated Oracle Internet Directory and Oracle Directory Integration Platform Upgrade

If you are using the Upgrade Assistant to upgrade both Oracle Internet Directory and Oracle Directory Integration Platform, consider the following.

If the Oracle Internet Directory upgrade fails, then before you can run the Upgrade Assistant again, you must restore your Oracle Internet Directory 10*g* backup before you can run the Upgrade Assistant again. Otherwise, the Upgrade Assistant will not attempt to upgrade Oracle Directory Integration Platform.

3.1.6 Cannot Verify Oracle Forms Services Upgrade When Oracle HTTP Server is Running On a Separate Host

If you use the Upgrade Assistant to upgrade an Oracle Forms Services instance that does not include a local instance of Oracle HTTP Server, then the Verify feature of the Upgrade Assistant cannot verify that the upgrade was successful. Instead of reporting that the upgrade was successful, the Verify feature will report that the server is unavailable. This verification error may not be valid if the Oracle HTTP Server is installed and configured on a different host than the Oracle Forms Services instance.

3.1.7 WebCenter Security Upgrade Release Notes

The following bugs/release notes relate to security changes for Custom WebCenter applications upgrading from 10.1.3.*x*:

- Section 3.1.7.1, "RowSetPermission check fails with compatibility flag set"
- Section 3.1.7.2, "Grants not migrated properly if application contains grants without permissions"
- Section 3.1.7.3, "Shared/public credentials not found after external application deployed"

3.1.7.1 RowSetPermission check fails with compatibility flag set

In 10.1.3, the ADF framework performed rowset, attribute, and method permission checks in addition to page permission checks. If a 10.1.3 application grants 'read' permission on the rowset and attribute and 'invoke' permission on the method for all users, then the application will behave as expected in 11R1 without any additional setup.

However, if the 10.1.3 application was designed to allow only certain users to view the rowset, attribute, or invoke method, then a special flag needs to be set to support this style of security. If this flag is not set, then anyone who has page access can view attributes and rowsets and invoke methods since in 11R1 the permission check is performed only on pages and taskflows. The flag must be set for each application in the `adf-config.xml` file.

```
<sec:adf-security-child xmlns="http://xmlns.oracle.com/adf/security/config">
   <JaasSecurityContext
      initialContextFactoryClass=
         "oracle.adf.share.security.JAASInitialContextFactory"
      jaasProviderClass=
         "oracle.adf.share.security.providers.jps.JpsSecurityContext"
      authorizationEnforce="true"/>
   <contextEnv name="oracle.adf.security.metadata" value="false"/>
   <CredentialStoreContext
      credentialStoreClass=
         "oracle.adf.share.security.providers.jps.CSFCredentialStore"
      credentialStoreLocation="../../src/META-INF/jps-config.xml"/>
</sec:adf-security-child>
```

3.1.7.2 Grants not migrated properly if application contains grants without permissions

Grants are not migrated properly if a 10.1.3 application contains grants without any permissions. Developers should inspect the `app-jazn-data.xml` file in the 10.1.3 workspace and remove any grants that have empty permission set prior to performing the migration.

3.1.7.3 Shared/public credentials not found after external application deployed

If you have secured your 10.1.3 application, ensure there are no duplicate `JaasSecurityContext` and `CredentialStoreContext` elements in the application's `adf-config.xml` file prior to migration.In the following example, the first `JaasSecurityContext` element is empty and should be removed (see "**Remove entry**" in the XML snippet below).

```
<adf-config-child xmlns="http://xmlns.oracle.com/adf/security/config">
   <CredentialStoreContext
      credentialStoreClass=
```

```
            "oracle.adf.share.security.providers.jazn.JAZNCredentialStore"
        credentialStoreDefaultUser="anonymous"
        credentialStoreLocation="./credential-store.xml"/>
    <JaasSecurityContext/> <!--Remove entry-->
    <JaasSecurityContext
        initialContextFactoryClass=
            "oracle.adf.share.security.JAASInitialContextFactory"
        jaasProviderClass=
            "oracle.adf.share.security.providers.jazn.JAZNSecurityContext"
        authorizationEnforce="true"/>
</adf-config-child>
```

3.1.8 Oracle B2B Upgrade Release Notes

The following release notes apply when you are upgrading Oracle B2B 10*g* to Oracle B2B 11*g*:

- Section 3.1.8.1, "Service Name Is Required When Using ebMS with Oracle B2B"
- Section 3.1.8.2, "Converting Wallets to Keystores for Oracle B2B 11g"
- Section 3.1.8.3, "Oracle B2B UCCnet Documents Not Upgraded to 11g"

3.1.8.1 Service Name Is Required When Using ebMS with Oracle B2B

Because the Service Name parameter is required when using the ebMS protocol in Oracle B2B 11*g*, you may need to provide a value for this field after importing 10g data.

With the agreement in the draft state, update the field on the **Partners** > **Documents** tab. When you select a document definition that uses the ebMS protocol, the **Document Type** > **ebMS** tab appears in the Document Details area. The Service Name field is on this tab.

3.1.8.2 Converting Wallets to Keystores for Oracle B2B 11*g*

After upgrading to Oracle B2B 11*g*, use the `orapki pkcs12_to_jks` option to replace the entire keystore. Convert the wallet to a keystore as follows:

1. Back up the original keystore.

2. Use the orapki wallet `pkcs12_to_jks` option to convert to the keystore.

3. Use `keytool -list` to list the aliases and verify.

4. Use `keytool -importkeystore` to import the converted keystore to the backup of the original keystore (as done in Step 1)

3.1.8.3 Oracle B2B UCCnet Documents Not Upgraded to 11*g*

OracleAS Integration B2B provides support for UCCnet under the Custom Document option. UCCnet is a service that enables trading partners to exchange standards-compliant data in the retail and consumer goods industries.

Note, however, that UCCnet documents are not upgraded automatically to Oracle B2B 11*g*. For information about using UCCnet documents in Oracle B2B 11*g*, see "Using the UCCnet Document Protocol" in the *Oracle Fusion Middleware User's Guide for Oracle B2B*.

3.1.9 Problem Accessing the Welcome Pages in Oracle HTTP Server After Upgrade

After you upgrade to Oracle HTTP Server 11*g*, the `DirectoryIndex` directive in the `httpd.conf` set to `index.html`. As a result, if you go to the recommended URL to view the Oracle Fusion Middleware Welcome pages you instead see the "hello world" sample application page.

To address this issue:

1. Edit the `httpd.conf` file in the following location:

   `ORACLE_INSTANCE/config/OHS/ohs_component_name/`

2. Locate the `DirectoryIndex` directive in the `httpd.conf` file and change `index.html` to `welcome-index.html`.

3. Restart the Oracle HTTP Server instance.

3.1.10 Misleading Error Message When Upgrading Oracle Internet Directory

When upgrading to Oracle Internet Directory 11*g*, you might notice an error message in the Upgrade Assistant (Example 3–1). This error message indicates that some managed processes failed to start.

You can safely ignore this message, as long as the Upgrade Assistant messages also indicates that all components were upgraded successfully. This error occurs when the Upgrade Assistant attempts to start the Oracle Enterprise Manager agent and the agent is already running.

Example 3–1   Error Message When Upgrading Oracle Internet Directory

```
-----------------------------------------------------------
Starting Destination Components
    Starting OPMN and managed processes in the destination Oracle instance.
    ->UPGAST-00141: startup of 11g OPMN managed processes failed.
    Starting WebLogic managed server wls_ods1
    Clicked OK to continue
    Upgrade Progress 100%
    All components were upgraded successfully.
-----------------------------------------------------------
```

3.1.11 Additional Steps Required When Redeploying the SOA Order Booking Sample Application on Oracle Fusion Middleware 11*g*

Appendix A of the *Oracle Fusion Middleware Upgrade Guide for Oracle SOA Suite, WebCenter, and ADF* provides an example of how to use Oracle JDeveloper 11*g* upgrade and redeploy a complex application on Oracle Fusion Middleware 11*g*.

However, after you install Oracle Fusion Middleware 11g (11.1.1.3.0), you must perform the following additional tasks before you can successfully compile and deploy the application with Oracle JDeveloper 11*g*:

1. Before you open and upgrade the application with Oracle JDeveloper 11*g*, edit the original `web.xml` and replace the <web-app> element with the following:

   ```
   <web-app xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
        xsi:schemaLocation="http://java.sun.com/xml/ns/javaee
        http://java.sun.com/xml/ns/javaee/web-app_2_5.xsd"
        version="2.5" xmlns="http://java.sun.com/xml/ns/javaee">
   ```

2. Follow the steps in Appendix A of the *Oracle Fusion Middleware Upgrade Guide for Oracle SOA Suite, WebCenter, and ADF* to open the SOA Order Booking application in Oracle JDeveloper 11*g* and to upgrade the projects within the application.

3. When you get to Section A.8.10, "ApproveOrderTaskForm," open the `web.xml` and verify that it contains a `<servlet>` element and `<servlet_mapping>` element for the `WFTTaskUpdate` servlet.

   If such an element does not exist in the `web.xml` file, then edit the `web.xml` file and add the elements shown in Example 3–2.

4. Continue with the rest of the instructions for deploying the project.

Example 3–2   Servlet Elements to Add to the SOA Order Booking web.xml File

```
<servlet>
    <servlet-name>
        WFTaskUpdate
    </servlet-name>
    <servlet-class>
        oracle.bpel.services.workflow.worklist.servlet.WFTaskUpdate
    </servlet-class>
</servlet>
<servlet-mapping>
     <servlet-name>
        WFTaskUpdate
     </servlet-name>
    <url-pattern>
        /WFTaskUpdate
     </url-pattern>
</servlet-mapping>
```

3.1.12 Additional Steps Required When Upgrading Human Taskflow Projects

By default, if you deploy an upgraded Oracle SOA Suite 10g Release 3 (10.1.3) application that includes a Human Taskflow project on Oracle Fusion Middleware 11g (11.1.1.3.0), you will not be able to view the taskflow details.

To work around this problem, perform the following additional steps when you are deploying an application with a Human Taskflow project:

1. Before you open and upgrade the application with Oracle JDeveloper 11*g*, edit the original `web.xml` and replace the `<web-app>` element with the following:

   ```
   <web-app xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
        xsi:schemaLocation="http://java.sun.com/xml/ns/javaee
        http://java.sun.com/xml/ns/javaee/web-app_2_5.xsd"
        version="2.5" xmlns="http://java.sun.com/xml/ns/javaee">
   ```

2. After you open and upgrade the application in Oracle JDeveloper 11*g*, do the following:

   a. In Oracle JDeveloper 11*g*, deploy the application to an EAR file.

   b. Expand the EAR file on disk, and then expand the packaged WAR file on disk.

      For example:

      ```
      jar -xvf ear_file_name.ear
      jar -xvf war_file_name.war
      ```

   c. Open the `web.xml` file in the `WEB-INF` directory of the WAR file and comment out the following entry:

```
<!--servlet-mapping>
      <servlet-name>jsp</servlet-name>
      <url-pattern>*.jsp</url-pattern>
  </servlet-mapping-->
```

d. Repackage WAR and subsequently the EAR.

For example:

```
jar -cvf war_file_name.war *
jar -cvf ear_file_name.ear *
```

e. Deploy the EAR using the WebLogic Administration Console.

Note that is important that you use the Oracle WebLogic Server Administration Console to deploy the application and not Oracle JDeveloper 11*g*. This is because Oracle JDeveloper forces a rebuild of the applciation and your changes will be overwritten.

3.1.13 Stopping Oracle Virtual Directory Processes During Upgrade

When upgrading Oracle Virtual Directory to 11*g*, you must manually stop Oracle Virtual Directory processes if multiple Oracle Virtual Directory processes are running. When you attempt to stop Oracle Virtual Directory, only the last process that started will stop. If multiple Oracle Virtual Directory processes are running, you must use the `kill -9` command to stop the processes before upgrading to Oracle Virtual Directory 11*g*.

3.1.14 Providing Input to Upgrade Assistant Screens When Oracle Internet Directory Upgrade Fails

If Oracle Internet Directory upgrade fails during the **Examine** phase in the upgrade process, do not modify the input you entered in the screens. Instead, dismiss the Upgrade Assistant wizard and the upgrade process again.

3.2 General Issues and Workarounds for Migrating from 11.1.1.1.0

This section describes general issue and workarounds. It includes the following topics:

- Section 3.2.1, "Stopping the 11.1.1.2.0 Domain"
- Section 3.2.2, "Patching the Schema for Oracle Internet Directory"
- Section 3.2.3, "Changing the patchmaster.ValidationErrorContinue Property"
- Section 3.2.4, "Changing the Default Setting for Validation Tasks"
- Section 3.2.5, "Severe Error When Running the execute-sql-rcu Macro"
- Section 3.2.6, "Machine Names Do Not Appear in the Oracle WebLogic Server Administration Console"

3.2.1 Stopping the 11.1.1.2.0 Domain

While stopping the 11.1.1.2.0 domain by using the `ant master-stop-domain-new` command, you may see the following exceptions if the Administration Server and the Managed Servers are down:

```
java.net.ConnectException: Connection refused: connect; No available router to
destination.
```

```
The admin server and the managed servers should be up while running the command.
```

3.2.2 Patching the Schema for Oracle Internet Directory

While patching the schema for Oracle Internet Directory, ensure that you specify only `OID` as the parameter for the `patchMaster.Componentlist` property in the `patchMaster.properties` file.

3.2.3 Changing the patchmaster.ValidationErrorContinue Property

By default, the `patchMaster.ValidationErrorContinue` file appears as `patchmaster.ValidationErrorContinue`. When you run this property, an error occurs.

Therefore, if you are using this property, replace the default property with `patchMaster.ValidationErrorContinue` before running Patch Assistant.

3.2.4 Changing the Default Setting for Validation Tasks

Patch Assistant validates the properties specified in the `patchMaster.properties` file. Additionally it performs the following validation tasks:

- Verify whether the potential source, target home, and instance paths exist.

- Verify locations to discover it they are an instance, home, and so on.

- Validate individual migration task. For example, if you are migrating a domain, then schema-based properties are not required. If the schema-based properties are specified, be sure to set the complete and proper set of schema-based properties.

- Attempts to recognize exceptions to specific components. For example, if Oracle Internet Directory is solely specified as the component being patched, then the `property patchMaster.Schemaprefix` is not necessary. However, if other components are being patched, then it is assumed that `patchMaster.Schemaprefix` is a necessary part of schema property validation.

If you want to continue with the Patch Assistant task after a validation error occurs, then you can open the `patchMaster.properties` file (Located in your `patchMaster` directory) in a text editor, and change the value to `true` for the `patchMaster.ValidationErrorContinue` property (The default value is `false`). Alternatively, you can use the `Ant` command-line utility to override the properties set in the `patchMaster.properties` file. You must specify the required property on the command line as follows:

```
ant-DpatchMaster.ValidationErrorContinue
```

3.2.5 Severe Error When Running the execute-sql-rcu Macro

When running the `execute-sql-rcu` macro, you may see the following error message, while the SQL script is still running:

```
[java] SEVERE: Error while registering Oracle JDBC Diagnosability MBean.
[java] java.security.AccessControlException: access denied
(javax.management.MBeanTrustPermission register)
```

To resolve this error, you must grant the register permission by adding the following syntax to the `java.policy` file (Located at `JAVA_HOME/jre/lib/security` in UNIX and `JAVA_HOME\jre\lib\security` in Windows):

```
.
 grant codeBase "file:${PATCH-MASTER-HOME}/lib/*.jar" {
```

```
                        permission javax.management.MBeanTrustPermission "register";
        };
```

> **Note:** Ensure that you replace {PATCH-MASTER-HOME} with your home path.

3.2.6 Machine Names Do Not Appear in the Oracle WebLogic Server Administration Console

After running Patch Assistant, you cannot see the list of machines (Machine-0 and Machine-1) configured during 11.1.1.1.0 and 11.1.1.2.0, in the Oracle WebLogic Server Administration Console. After migrating to 11.1.1.2.0, you must re-enter the machine names using the Oracle WebLogic Server Administration Console. For more information, see Create and configure machines topic in the *Oracle Fusion Middleware Oracle WebLogic Server Administration Console Online Help*.

3.2.7 Using the Oracle BAM 11*g* Prepackaged Samples After Migrating from 11.1.1.1.0

If you are using the Oracle BAM 11*g* sample applications, refer to the following sections for information about using the samples after migrating from Oracle Fusion Middleware 11*g* Release 1 (11.1.1.1.0) to Release 1 (11.1.1.2.0):

- Section 3.2.7.1, "Configuring the Oracle BAM 11g Samples After Migrating from 11.1.1.1.0"

- Section 3.2.7.2, "Using the Foreign Exchange Sample After Migrating from 11.1.1.1.0"

For more information about the Oracle BAM 11*g* samples, see Section 3.1.3.5.1, "General Information About the Oracle BAM Samples".

3.2.7.1 Configuring the Oracle BAM 11*g* Samples After Migrating from 11.1.1.1.0

After you migrate from Oracle Fusion Middleware 11*g* Release 1 (11.1.1.1.0) to 11*g* Release 1 (11.1.1.2.0), be sure to run the proper setup script for setting up samples. Specifically, you must run the recreate script instead of the setup script.

For more information, see the readme file for each of the Oracle BAM 11*g* samples.

3.2.7.2 Using the Foreign Exchange Sample After Migrating from 11.1.1.1.0

After you run the recreate script to set up the Foreign Exchange sample after migrating from 11.1.1.1.0, you might experience the following error when you open the report (Shared Reports/Demos/Foreign Exchange):

```
The "Trade Volume" has an error:
CACHEEXCEPTION_NULL_NULL_NULL
Message:BAM-01274: The field ID 1 is not recognized.
```

To fix this problem, perform the following steps:

1. Open Active Studio.

2. Open the report:

   ```
   Shared Reports/Demos/Foreign Exchange/SLAViolation Report
   ```

3. Click **Edit**.

4. Select the **Trade Volume** view and click **Edit View**.

5. In the **Fields** tab under **Group By**, select the field **GroupBy**.

6. Go to the **Surface Prompts** tab.

7. From the **Display in** drop-down menu, in select **View Title**.

8. Click **Apply** and save the report.

Visit the Oracle BAM samples page on OTN regularly to obtain updated samples and more information about the Oracle BAM sample applications.

3.3 Documentation Errata for Upgrade

This section provides documentation errata for the following guides:

- Section 3.3.1, "Documentation Errata for the Upgrade Guide for Oracle SOA Suite, WebCenter, and ADF"

- Section 3.3.2, "Documentation Errata for the Oracle Fusion Middleware Upgrade Guide for Oracle Identity Management"

- Section 3.3.3, "Documentation Errata for Using Patch Assistant to Migrate from 11.1.1.1.0 to 11.1.1.2"

3.3.1 Documentation Errata for the Upgrade Guide for Oracle SOA Suite, WebCenter, and ADF

This section contains documentation errata for the Oracle Fusion Middleware Upgrade Guide for Oracle SOA Suite, WebCenter, and ADF:

- Section 3.3.1.1, "Errors in Additional Steps for Upgrading Technology Adapter Headers"

3.3.1.1 Errors in Additional Steps for Upgrading Technology Adapter Headers

In the section, "Additional Steps When Upgrading Technology Adapter Headers" in the *Oracle Fusion Middleware Upgrade Guide for Oracle SOA Suite, WebCenter, and ADF*, note the following:

- In the subsection, "Example Steps to Perform After Upgrading to Oracle Mediator," the example shown should appear as follows:

```
<copy target="$out.property.jca.aq.HeaderDocument" expression="'&lt;?xml
  version = &quot;1.0&quot; standalone= &quot;yes&quot;?>&lt;tns:Header
  xmlns:tns=&quot;http://xmlns.oracle.com/pcbpel/adapter/aq/outbound/">
  <tns:PayloadHeader>&lt;MSG_ID>&lt;
    /MSG_ID>&lt;INREPLYTO_MSG_ID>&lt;
    /INREPLYTO_MSG_ID>&lt;FROM_PARTY>GlobalChips&lt;
    /FROM_PARTY>&lt;TOPARTY>Acme&lt;
    /TO_PARTY>&lt;ACTION_NAME>&lt;/ACTION_NAME>&lt;DOCTYPE_NAME>ORDERS&lt;
    /DOCTYPE_NAME>&lt;DOCTYPE_REVISION>D98A&lt;
    /DOCTYPE_REVISION>&lt;MSG_TYPE>1&lt;
    /MSG_TYPE>&lt;PAYLOAD>&lt;
    /PAYLOAD>&lt;/tns:PayloadHeader>&lt;/tns:Header>'"/>
```

- In the subsection, "Example Steps to Perform After Upgrading to Oracle BPEL Process Manager," Example 14-1, "Assign Block When Upgrading Adapter Headings" should appear as follows:

```
<assign name="assign header">
```

```
          <copy>
            <from expression="'&lt;?xml version = &quot;1.0&quot;standalone =
&quot;yes&quot;?>&lt;tns:Header
xmlns:tns=&quot;http://xmlns.oracle.com/pcbpel/adapter/aq/Inbound/">
   <tns:PayloadHeader>&lt;MSG_ID>12345&lt;
       /MSG_ID>&lt;INREPLYTO_MSG_ID>54321&lt;
       /INREPLYTO_MSG_ID>&lt;FROM_PARTY>Acme&lt;
       /FROM_PARTY>&lt;TO_PARTY>GlobalChips&lt;
       /TO_PARTY>&lt;ACTION_NAME>contentType:application/octet-stream;
            filename:abc.xml&lt;
       /ACTION_NAME>&lt;DOCTYPE_NAME>850&lt;
       /DOCTYPE_NAME>&lt;DOCTYPE_REVISION>4010&lt;
       /DOCTYPE_REVISION>&lt;MSG_TYPE>1&lt;/MSG_TYPE>&lt;PAYLOAD>&lt;
       /PAYLOAD>&lt;/tns:PayloadHeader>&lt;/tns:Header>'"/>
       <to variable="headerVariable"/>
   </copy>
</assign>
```

3.3.2 Documentation Errata for the Oracle Fusion Middleware Upgrade Guide for Oracle Identity Management

This section describes documentation errata. It includes the following topics:

- Section 3.3.2.1, "Error in Procedure for Identifying Additional Oracle Internet Directory Instances"

- Section 3.3.2.2, "Error in Oracle Virtual Directory Releases Supported"

3.3.2.1 Error in Procedure for Identifying Additional Oracle Internet Directory Instances

In the section, "Recreating Any Non-Default Oracle Internet Directory Instances," in the Oracle Fusion Middleware Upgrade Guide for Oracle Identity Management, step 1 describes how to identify any additional, non-default Oracle Internet Directory instances you have created.

However, the procedure fails to indicate that the command provided will display a list of the default instances, as well as any non-default instances. Be sure to review the output of the command in Step 1 and identify only the Oracle Internet Directory instances that were not created by default, during the Oracle Internet Directory installation procedure.

If you have not created any non-default Oracle Internet Directory instances, then there is no need to perform the steps in the section, "Recreating Any Non-Default Oracle Internet Directory Instances."

3.3.2.2 Error in Oracle Virtual Directory Releases Supported

In Table 2-2, "Oracle Virtual Directory Releases Supported By This Guide," the "Description or Notes" section states:

This version of Oracle Identity Federation was available as part of Oracle Application Server 10g (10.1.4.0.1). It was installed using a separate installation procedure and installation guide.

It should say:

This version of Oracle Virtual Directory was available as part of Oracle Application Server 10g (10.1.4.0.1). It was installed using a separate installation procedure and installation guide.

3.3.3 Documentation Errata for Using Patch Assistant to Migrate from 11.1.1.1.0 to 11.1.1.2

This section describes documentation errata. It includes the following topics:

- Section 3.3.3.1, "Update the Translation Table in Audit Schema"
- Section 3.3.3.2, "Migrating Oracle Internet Directory Policy and Credential Store and Reusing an Existing Oracle Internet Directory Server"
- Section 3.3.3.3, "Migrating Configuration for User Messaging Service Worklist Driver"

3.3.3.1 Update the Translation Table in Audit Schema

Section "3.3.1.1 Update the Translation Table in Audit Schema" in the *Oracle Fusion Middleware Using Patch Assistant to Migrate from 11.1.1.1.0 to 11.1.1.2.0*, has an additional information. This information is for step 2, as follows:

To avoid scrambled characters, an Unicode-supported database is required to store the translation data. In addition, to ensure proper character set conversion between SQL*Plus and the database server, a compatible character set, such as `UTF8` or `AL32UTF8`, needs to be set for the `NLS_LANG` environment variable before running `disp_names.sql`.

For the complete list of legal `NLS_LANG` values, see the Oracle Database Documentation Library at http://www.oracle.com/technology/documentation/database.html.

3.3.3.2 Migrating Oracle Internet Directory Policy and Credential Store and Reusing an Existing Oracle Internet Directory Server

To start Oracle Internet Directory mentioned in step 7, in section "3.3.5.2 Migrating Oracle Internet Directory Policy and Credential Store and Reusing an Existing Oracle Internet Directory Server" in the *Oracle Fusion Middleware Using Patch Assistant to Migrate from 11.1.1.1.0 to 11.1.1.2.0* is not required. You must skip this step and proceed to the next step.

3.3.3.3 Migrating Configuration for User Messaging Service Worklist Driver

Section "3.3.8.2 Migrating Configuration for User Messaging Service Worklist Driver" in the *Oracle Fusion Middleware Using Patch Assistant to Migrate from 11.1.1.1.0 to 11.1.1.2.0*, has an inaccurate information. The correct information is as follows:

If your Oracle Fusion Middleware 11*g* Release 1 (11.1.1.1.0) domain has the User Messaging Service Worklist Driver installed and configured, the configuration of the Worklist Driver is automatically migrated by the Patch Assistant. Patch Assistant does not install this additional driver. You must re-install the driver in the Oracle Fusion Middleware 11*g* Release 1 (11.1.1.2.0) domain. For more information, see "Install the Worklist Driver" section in the *Oracle Fusion Middleware Administrator's Guide for Oracle SOA Suite and Oracle BPM Suite*.

4

Oracle Fusion Middleware Administration

This chapter describes issues associated with Oracle Fusion Middleware administration. It includes the following topics:

- Section 4.1, "General Issues and Workarounds"
- Section 4.2, "Configuration Issues and Workarounds"
- Section 4.3, "Documentation Errata"

4.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topic:

- Section 4.1.1, "Fusion Middleware Control May Return Error in Mixed IPv6 and IPv4 Environment"
- Section 4.1.2, "Deploying JSF Applications"
- Section 4.1.3, "Limitations in Cloning"

4.1.1 Fusion Middleware Control May Return Error in Mixed IPv6 and IPv4 Environment

If your environment contains both IPv6 and IPv4 network protocols, Fusion Middleware Control may return an error in certain circumstances.

If the browser that is accessing Fusion Middleware Control is on a host using the IPv4 protocol, and selects a control that accesses a host using the IPv6 protocol, Fusion Middleware Control will return an error. Similarly, if the browser that is accessing Fusion Middleware Control is on a host using the IPv6 protocol, and selects a control that accesses a host using the IPv4 protocol, Fusion Middleware Control will return an error.

For example, if you are using a browser that is on a host using the IPv4 protocol and you are using Fusion Middleware Control, Fusion Middleware Control returns an error when you navigate to an entity that is running on a host using the IPv6 protocol, such as in the following situations:

- From the Oracle Internet Directory home page, you select Directory Services Manager from the Oracle Internet Directory menu. Oracle Directory Services Manager is running on a host using the IPv6 protocol.
- From a Managed Server home page, you click the link for Oracle WebLogic Server Administration Console, which is running on IPv6.
- You test Web Services endpoints, which are on a host using IPv6.
- You click an application URL or Java application which is on a host using IPv6.

To work around this issue, you can add the following entry to the /etc/hosts file:

nnn.nn.nn.nn myserver-ipv6 myserver-ipv6.example.com

In the example, *nnn.nn.nn.nn* is the IPv4 address of the Administration Server host, myserver.example.com.

4.1.2 Deploying JSF Applications

Some JSF applications may experience a memory leak due to incorrect Abstract Window Toolkit (AWT) application context classloader initialization in the Java class library. Setting the `oracle.jrf.EnableAppContextInit` system property to **true** will attempt eager initialization of the AWT application context classloader to prevent this leak from occurring. By default, this property is set to **false**.

4.1.3 Limitations in Cloning

- If your Middleware home contains more than one JDK, such as JRockit and a Sun JDK, but is configured to use JRockit, and you cloned the Middleware home to another host with a location similar to the source Middleware home, any configuration would fail.

  To work around this issue, edit the following file to change the JAVA_HOME environment variable to the Jrockit location:

  MW_HOME/common/bin/commEnv.sh

- Cloning of Oracle Internet Directory does not work on Microsoft Windows. The pasteConfig.sh command fails with the following error:

  ```
  Caused by: java.io.IOException: Cannot run program
  "C:\MW_HOME\Instance_home\bin\opmnctl": CreateProcess error=2, The system
  cannot find the file specified
  ```

- Note the following limitations in cloning Oracle Virtual Directory

  - When you are cloning Oracle Virtual Directory, the Oracle instance name in the source environment cannot be the same as the Oracle instance name in the target environment. The Oracle instance name in the target must be different than the name in the source.

  - After you clone Oracle Virtual Directory from one host to another, you must add a self-signed certificate to the Oracle Virtual Directory keystore and EM Agent wallet on Host B. Take the following steps:

    a. Set the ORACLE_HOME and JAVA_HOME environment variables.

    b. Delete the existing self-signed certificate:

    ```
    $JAVA_HOME/bin/keytool -delete -alias serverselfsigned
      -keystore ORACLE_INSTANCE/config/OVD/ovd_component_
    name/keystores/keys.jks
      -storepass OVD_Admin_password
    ```

    c. Generate a key pair:

    ```
    $JAVA_HOME/bin/keytool -genkeypair
      -keystore ORACLE_INSTANCE/config/OVD/ovd_component_
    name/keystores/keys.jks
      -storepass OVD_Admin_password -keypass OVD_Admin_password -alias
    serverselfsigned
      -keyalg rsa -dname "CN=Fully_qualified_hostname,O=test"
    ```

    d. Export the certificate:

```
$JAVA_HOME/bin/keytool -exportcert
  -keystore ORACLE_INSTANCE/config/OVD/ovd_component_
name/keystores/keys.jks
  -storepass OVD_Admin_password -rfc -alias serverselfsigned
  -file ORACLE_INSTANCE/config/OVD/ovd_component_
name/keystores/ovdcert.txt
```

    e. Add a wallet to the EM Agent:

```
ORACLE_HOME/../oracle_common/bin/orapki wallet add
  -wallet ORACLE_INSTANCE/EMAGENT/EMAGENT/sysman/config/monwallet
  -pwd EM_Agent_Wallet_password -trusted_cert
  -cert ORACLE_INSTANCE/config/OVD/ovd_component_
name/keystores/ovdcert.txt
```

    f. Stop and start the Oracle Virtual Directory server.

    g. Stop and start the EM Agent.

4.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 4.2.1, "Must Stop Oracle SOA Suite Managed Server Before Stopping soa-infra"
- Section 4.2.2, "Configuring Fusion Middleware Control for Windows Native Authentication"
- Section 4.2.3, "Fusion Middleware Control Does Not Keep Column Preferences in Log Viewer Pages"
- Section 4.2.4, "Topology Viewer Does Not Display Applications Deployed to a Cluster"
- Section 4.2.5, "Changing Log File Format"

4.2.1 Must Stop Oracle SOA Suite Managed Server Before Stopping soa-infra

Using Fusion Middleware Control, if you stop a Oracle SOA Suite Managed Server before you stop soa-infra, then you start the Managed Server, the soa-infra application is not restarted automatically. If you try to restart the soa-infra, you will received an error. When you encounter the problem, you cannot close the dialog box in the browser, so you cannot take any further actions in Fusion Middleware Control.

To avoid this situation, you should stop the Managed Server, which stops all applications, including the soa-infra application. To start the Managed Server and the soa-infra, start the Managed Server.

To close the browser dialog box, enter the following URL in your browser:

```
http://host:port/em
```

4.2.2 Configuring Fusion Middleware Control for Windows Native Authentication

To use Windows Native Authentication (WNA) as the single sign-on mechanism between Fusion Middleware Control and Oracle WebLogic Server Administration Console, you must make changes to the following files:

■ web.xml

■ weblogic.xml

These files are located in the em.ear file. You must explode the em.ear file, edit the files, then rearchive the em.ear file. Take the following steps (which assume that while the front end is on Windows, the em.ear file is on UNIX):

1. Set the JAVA_HOME environment variable. For example:

```
setenv JAVA_HOME /scratch/Oracle/Middleware/jrockit_160_05_R27.6.2-20
```

2. Change to the directory containing the em.ear, and explode the file. For example:

```
cd /scratch/Oracle/Middleware/user_projects/applications/domain_name
JAVA_HOME/bin/jar xvf em.ear em.war
JAVA_HOME/bin/jar xvf em.war WEB-INF/web.xml
JAVA_HOME/bin/jar xvf em.war WEB-INF/weblogic.xml
```

3. Edit web.xml, commenting out the first login-config block and uncommenting the login-config block for WNA. (The file contains information about which block to comment and uncomment.) When you have done this, the portion of the file will appear as in the following example:

```
<!--<login-config>
     <auth-method>CLIENT-CERT</auth-method>
   </login-config>
-->
 <!--
  the following block is for Windows Native Authentication, if you are using
 WNA, do the following:
    1. uncomment the following block
    2. comment out the previous <login-config> section.
    3. you also need to uncomment a block in weblogic.xml
 -->
   <login-config>
     <auth-method>CLIENT-CERT,FORM</auth-method>
     <form-login-config>
       <form-login-page>/faces/targetauth/emasLogin</form-login-page>
       <form-error-page>/login/LoginError.jsp</form-error-page>
     </form-login-config>
   </login-config>
   <security-constraint>
 .
 .
 .
   <security-role>
     <role-name>Monitor</role-name>
   </security-role>
```

4. Edit weblogic.xml, uncommenting the following block. (The file contains information about which block to uncomment.) When you have done this, the portion of the file will appear as in the following example:

```
<!--
the following block is for Windows Native Authentication, if you are using
WNA, uncomment the following block.
-->
 <security-role-assignment>
     <role-name>Admin</role-name>
     <externally-defined/>
   </security-role-assignment>
```

```
    .
    .
    .
  <security-role-assignment>
    <role-name>Deployer</role-name>
    <externally-defined/>
  </security-role-assignment>
```

5. Rearchive the em.ear file. For example:

```
JAVA_HOME/bin/jar uvf em.war WEB-INF/web.xml
JAVA_HOME/bin/jar uvf em.war WEB-INF/weblogic.xml
JAVA_HOME/bin/jar uvf em.ear em.war
```

4.2.3 Fusion Middleware Control Does Not Keep Column Preferences in Log Viewer Pages

In Fusion Middleware Control, you can reorder the columns in the pages that display log files and log file messages. However, if you navigate away from the page and then back to it, the columns are set to their original order.

4.2.4 Topology Viewer Does Not Display Applications Deployed to a Cluster

In Fusion Middleware Control, the Topology Viewer does not display applications that are deployed to a cluster.

4.2.5 Changing Log File Format

When you change the log file format note the following:

- When you change the log file format from text to xml, specify the path, but omit the file name. The new file will be named log. xml.

- When you change the log file format from xml to text, specify both the path and the file name.

4.3 Documentation Errata

This section describes documentation errata for Oracle Fusion Middleware administration. It contains the following topic:

- Corrected Procedures for Moving Oracle Access Manager 11g to a Production Environment

4.3.1 Corrected Procedures for Moving Oracle Access Manager 11*g* to a Production Environment

The *Oracle Fusion Middleware Administrator's Guide* contains incorrect procedures for moving Oracle Access Manager to a production environment. The following topics contain the correct procedures:

- Moving Oracle Access Manager 11g to a New Production Environment
- Move Oracle Access Manager 11g to an Existing Production Environment

4.3.1.1 Moving Oracle Access Manager 11*g* to a New Production Environment

> **Note:** The Administration Servers in both the test environment and the production environment must be started.

To replicate the policy configuration information from the test system into the production system:

1. Install and configure Oracle WebLogic Server, creating a Middleware home, as described in *Oracle Fusion Middleware Installation Guide for Oracle Identity Management*.

2. Install and configure Oracle Access Manager, specifying the information for the production environment, as described in *Oracle Fusion Middleware Installation Guide for Oracle Identity Management*.

3. Set the environment variable JAVA_HOME and add JAVA_HOME to the PATH.

4. Export the policies from the test system, using the following WLST command:

   ```
   exportPolicy(pathTempOAMPolicyFile='path_of_Temp_PolicyFile')
   ```

5. Copy the policy file to the production environment.

6. Import the policies into the production environment, using the following command:

   ```
   importPolicy(pathTempOAMPolicyFile='path_of_Temp_PolicyFile')
   ```

To replicate the configuration and the partner information from the test system to the production system, take the following steps:

1. Follow steps 1 through 6 in the preceding procedure.

2. Export the partner information from the test environment, using the following WLST command:

   ```
   exportPartners(pathTempOAMPartnerFile='path_of_Temp_PartnerFile')
   ```

3. Copy the partner file to the production environment.

4. Import the partner information to the production environment, using the following WLST command:

   ```
   importPartners(pathTempOAMPartnerFile='path_of_Temp_PartnerFile')
   ```

4.3.1.2 Move Oracle Access Manager 11*g* to an Existing Production Environment

In this scenario, you move incremental changes that you have made in the test environment to the production environment.

> **Note:** The Administration Servers in both the test environment and the production environment must be started.

To replicate the policy configuration information from the test system into the production system:

1. Set the environment variable JAVA_HOME and add JAVA_HOME to the PATH.

2. Export the policies from the test system, using the following WLST command:

```
exportPolicy(pathTempOAMPolicyFile='path_of_Temp_PolicyFile')
```

3. Copy the policy file to the production environment.

4. Import the policies into the production environment, using the following command:

```
importPolicy(pathTempOAMPolicyFile='path_of_Temp_PolicyFile')
```

5

Oracle Enterprise Manager Fusion Middleware Control

This chapter describes issues associated with Fusion Middleware Control. It includes the following topics:

- Section 5.1, "General Issues and Workarounds"
- Section 5.2, "Documentation Errata"

5.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topic:

- Section 5.1.1, "Product Behavior After a Session Timeout"
- Section 5.1.2, "Fixing Errors Displayed When Selecting the TopLink Sessions Command in Fusion Middleware Control"
- Section 5.1.3, "Verifying the DISPLAY Variable to Correct Problems Displaying Graphics"
- Section 5.1.4, "Incomplete Information Available on the MDS Configuration Page"
- Section 5.1.5, "Exceptions When Starting Oracle Web Cache After Accessing Configuration Pages from Oracle Enterprise Manager Fusion Middleware Control"
- Section 5.1.6, "Table Display Problems When Using Some Language Variants"
- Section 5.1.7, "Problems When Internet Explorer 7 is Configured to Open Pop-Up Windows in a New Tab."
- Section 5.1.8, "Additional Fusion Middleware Control Release Notes"
- Section 5.1.9, "Problem with Performance Charts After Moving a Chart Region"

5.1.1 Product Behavior After a Session Timeout

For security purposes, your sessions with the Fusion Middleware Control will time out after a predefined period of inactivity, and you will be asked to log in to the console again. In most cases, you are returned to the page you had displayed before the session timed out.

However, in some circumstances, such as when you are using the Fusion Middleware Control deployment wizards, you will not be returned the same location in the product after you log in. In those cases, you will have to navigate to the specific Fusion Middleware Control page you were using before the session timed out.

5.1.2 Fixing Errors Displayed When Selecting the TopLink Sessions Command in Fusion Middleware Control

In Fusion Middleware Control, you can view the Oracle TopLink management pages by selecting **TopLink Sessions** from the **Application Deployment** menu.

However, if you receive an error message when you select this command, you can remedy the problem by adding one or both of the following MBean system properties, as follows

On Windows operating systems:

```
rem set JAVA_OPTIONS=%JAVA_OPTIONS% -Declipselink.register.dev.mbean=true
rem set JAVA_OPTIONS=%JAVA_OPTIONS% -Declipselink.register.run.mbean=true
```

On UNIX operating systems:

```
JAVA_OPTIONS="${JAVA_OPTIONS} -Declipselink.register.dev.mbean=true"
JAVA_OPTIONS="${JAVA_OPTIONS} -Declipselink.register.run.mbean=true"
```

For more information, see the following URL on the Eclipse WIKI Web site:

```
http://wiki.eclipse.org/Integrating_EclipseLink_with_an_Application_Server_
(ELUG)#How_to_Integrate_JMX
```

5.1.3 Verifying the DISPLAY Variable to Correct Problems Displaying Graphics

The graphics subsystem for the Fusion Middleware Control generates some of its graphics on demand, and if the DISPLAY environment variable is set, Fusion Middleware Control tries to open the specified DISPLAY environment.

If Fusion Middleware Control fails to start due to graphics errors, check to see whether the DISPLAY environment variable is set to a proper DISPLAY environment.

If the DISPLAY environment variable is set incorrectly, unset the DISPLAY environment variable. Then restart Fusion Middleware Control.

5.1.4 Incomplete Information Available on the MDS Configuration Page

After deploying a Oracle SOA Suite application that requires Oracle Metadata Services (MDS), in some rare circumstances, you may find that the MDS configuration page for the application does not contain complete information about the MDS repository.

To address this problem, use the Metadata Repositories page to register the repository again. For more information, see "Create and Register an MDS Repository" in the Fusion Middleware Control online help.

5.1.5 Exceptions When Starting Oracle Web Cache After Accessing Configuration Pages from Oracle Enterprise Manager Fusion Middleware Control

To start, stop, or restart Oracle Web Cache from Fusion Middleware Control, from the **Web Cache** menu, you can choose **Control**, and then **Start Up**, **Shut Down**, or **Restart**.

If you select **Shut Down**, and then **Start Up** on a configuration page, Fusion Middleware Control may return exception errors. If these errors occur in your environment, perform the operations from Web Cache Home page.

5.1.6 Table Display Problems When Using Some Language Variants

When you use Fusion Middleware Control in some non-English language environments, some of the tables on the component home pages display incorrectly. For example, some rows of the table appear to be merged and without content.

These issues can be safely ignored, since no data on the pages is hidden. The table cells that appear incorrectly do not contain performance data or other information.

5.1.7 Problems When Internet Explorer 7 is Configured to Open Pop-Up Windows in a New Tab

If you configure Microsoft Internet Explorer 7 so it always displays pop-up windows in a new browser tab, then you may experience problems using Fusion Middleware Control. For example, in some cases, Enteprise Manager content displays in a new tab as expected, but Fusion Middleware Control stops responding to mouse clicks. The only way to continue working is to close the tab.

To avoid this problem, use the Internet Options dialog box in Internet Explorer to disable the option for displaying pop-up windows in a new tab.

5.1.8 Additional Fusion Middleware Control Release Notes

Refer to Chapter 4, "Oracle Fusion Middleware Administration" for additional Fusion Middleware Control release notes.

Additional Fusion Middleware Control release notes are also included in the component chapters of the Release Notes.

5.1.9 Problem with Performance Charts After Moving a Chart Region

Oracle Enterprise Manager Fusion Middleware Control provides performance charts on many of the component home pages. For example, it provides charts that display the current response and load metrics, as well as the CPU and memory usage.

If you move one of these charts to a new location on the home page, then sometimes the Table View link (which provides a tabular view of the data) does not work properly and the chart might stop refreshing automatically.

To fix this problem, click the refresh icon at the top, right corner of the page to refresh the page.

5.2 Documentation Errata

This section describes documentation errata. It includes the following topics:

- Section 5.2.1, "Search Unavailable for Some Embedded Administrator's Guides"
- Section 5.2.2, "Links from Help Topics to the Oracle Fusion Middleware System Administrator's Guide for Content Server"

5.2.1 Search Unavailable for Some Embedded Administrator's Guides

Search is unavailable for the following embedded administrator's guides in the Fusion Middleware Control help system:

- *Oracle Fusion Middleware Administrator's Guide for Oracle Identity Federation*
- *Oracle Fusion Middleware System Administrator's Guide for Content Server* for installations with Oracle Enterprise Content Management Suite

5.2.2 Links from Help Topics to the Oracle Fusion Middleware System Administrator's Guide for Content Server

Links in the Fusion Middleware Control help system to the *Oracle Fusion Middleware System Administrator's Guide for Content Server* direct to a default topic from the following help topics:

- Manage Oracle Universal Content Management Content Server

- Modify Oracle Universal Content Management Content Server Configuration and Parameters

- View Oracle Universal Content Management Content Performance Information

From the help system, you can manually navigate to content in the *Oracle Fusion Middleware System Administrator's Guide for Content Server* from **Managing Oracle Fusion Middleware 11g** > **How Do I?** > **System Administrator's Guide for Content Server.**

6

Oracle Fusion Middleware High Availability and Enterprise Deployment

This chapter describes issues associated with Oracle Fusion Middleware high availability and enterprise deployment. It includes the following topics:

- Section 6.1, "General Issues and Workarounds"
- Section 6.2, "Configuration Issues and Workarounds"
- Section 6.3, "Testing Abrupt Failures of WebLogic Server When Using File Stores on NFS"
- Section 6.4, "Documentation Errata"

6.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topics:

- Section 6.1.1, "Secure Resources in Application Tier"
- Section 6.1.2, "mod_wl Not Supported for OHS Routing to Managed Server Cluster"
- Section 6.1.3, "Only Documented Procedures Supported"
- Section 6.1.4, "SOA Composer Generates Error During Failover"
- Section 6.1.5, "Accessing Web Services Policies Page in Cold Failover Environment"
- Section 6.1.6, "Considerations for Oracle Identity Federation HA in SSL Mode"
- Section 6.1.7, "Online Help Context May be Lost When Failover Occurs in High Availability Environment"
- Section 6.1.8, "ASCRS Cannot be Used to Create a Database Resource for the Oracle Database Console Service on Windows"
- Section 6.1.9, "Changes to Rulesets May Not be Persisted During an Oracle RAC Instance Failover"
- Section 6.1.10, "Manual Retries May be Necessary When Redeploying Tasks During an Oracle RAC Failover"
- Section 6.1.11, "Timeout Settings for SOA Request-Response Operations are Not Propagated in a Node Failure"
- Section 6.1.12, "Scale Out and Scale Up Operations Fail"

- Section 6.1.13, "Harmless SQLIntegrityConstraintViolationException Can be Received in a SOA Cluster"

- Section 6.1.14, "WebLogic Cluster WS-AT Recovery Can Put a Server into a 'Warning' State"

- Section 6.1.15, "Very Intensive Uploads from I/PM to UCM May Require Use of IP-Based Filters in UCM Instead of Hostname-Based Filters"

- Section 6.1.16, "Worklist Application May Throw Exception if Action Dropdown Menu is Used During a Failover"

- Section 6.1.17, "ClassCastExceptions in a SOA Cluster for the SOA Worklist Application"

- Section 6.1.18, "Use srvctl in 11.2 Oracle RAC Databases to Set Up AQ Notification and Server-side TAF"

- Section 6.1.19, "Oracle I/PM Input Files May Not be Processed Correctly During an Oracle RAC Failover"

6.1.1 Secure Resources in Application Tier

It is highly recommended that the application tier in the SOA Enterprise Deployment topology and the WebCenter Enterprise Deployment topology is protected against anonymous RMI connections. To prevent RMI access to the middle tier from outside the subset configured, follow the steps in "Configure connection filtering" in the Oracle WebLogic Server Administration Console Online Help. Execute all of the steps, except as noted in the following:

1. Do not execute the substep for configuring the default connection filter. Execute the substep for configuring a custom connection filter.

2. In the Connection Filter Rules field, add the rules that will allow all protocol access to servers from the middle tier subnet while allowing only http(s) access from outside the subnet, as shown in the following example:

```
nnn.nnn.0.0/nnn.nnn.0.0  * * allow
0.0.0.0/0 * * allow t3 t3s
```

6.1.2 mod_wl Not Supported for OHS Routing to Managed Server Cluster

Oracle Fusion Middleware supports only `mod_wls_ohs` and does not support `mod_wl` for Oracle HTTP Server routing to a cluster of managed servers.

6.1.3 Only Documented Procedures Supported

For Oracle Fusion Middleware high availability deployments, Oracle strongly recommends following only the configuration procedures documented in the *Oracle Fusion Middleware High Availability Guide* and the *Oracle Fusion Middleware Enterprise Deployment Guides*.

6.1.4 SOA Composer Generates Error During Failover

During failover, if you are in a SOA Composer dialog box and the connected server is down, you will receive an error, such as `Target Unreachable, 'messageData' returned null`.

To continue working in the SOA Composer, open a new browser window and navigate to the SOA Composer.

6.1.5 Accessing Web Services Policies Page in Cold Failover Environment

In a Cold Failover Cluster (CFC) environment, the following exception is displayed when Web Services policies page is accessed in Fusion Middleware Control:

```
Unable to connect to Oracle WSM Policy Manager.
Cannot locate policy manager query/update service. Policy manager service
look up did not find a valid service.
```

To avoid this, implement one the following options:

- Create virtual hostname aliased SSL certificate and add to the key store.

- Add "-Dweblogic.security.SSL.ignoreHostnameVerification=true" to the JAVA_OPTIONS parameter in the startWeblogic.sh or startWeblogic.cmd files

6.1.6 Considerations for Oracle Identity Federation HA in SSL Mode

In a high availability environment with two (or more) Oracle Identity Federation servers mirroring one another and a load balancer at the front-end, there are two ways to set up SSL:

- Configure SSL on the load balancer, so that the SSL connection is between the user and the load balancer. In that case, the keystore/certificate used by the load balancer has a CN referencing the address of the load balancer.

  The communication between the load balancer and the WLS/Oracle Identity Federation can be clear or SSL (and in the latter case, Oracle WebLogic Server can use any keystore/certificates, as long as these are trusted by the load balancer).

- SSL is configured on the Oracle Identity Federation servers, so that the SSL connection is between the user and the Oracle Identity Federation server. In this case, the CN of the keystore/certificate from the Oracle WebLogic Server/Oracle Identity Federation installation needs to reference the address of the load balancer, as the user will connect using the hostname of the load balancer, and the Certificate CN needs to match the load balancer's address.

  In short, the keystore/certificate of the SSL endpoint connected to the user (load balancer or Oracle WebLogic Server/Oracle Identity Federation) needs to have its CN set to the hostname of the load balancer, since it is the address that the user will use to connect to Oracle Identity Federation.

6.1.7 Online Help Context May be Lost When Failover Occurs in High Availability Environment

In a high availability environment, if you are using online help and a failover occurs on one of the machines in your environment, your context in online help may be lost when the application is failed over.

For example, the online help table of contents may not remember the topic that was selected prior to the failover, or the last online help search results may be lost.

No data is lost, and your next online help request after the failover will be handled properly.

6.1.8 ASCRS Cannot be Used to Create a Database Resource for the Oracle Database Console Service on Windows

In Patch Set 2 of the Oracle Fusion Middleware 11*g* Release 1 (11.1.1) release, a new feature was added to Application Server Cluster Ready Services (ASCRS) to enable

users to create an ASCRS database resource for the Oracle Database Console service. Using ASCRS to create an ASCRS database resource is described in the "Creating an Oracle Database Resource" section of the "Using Cluster Ready Services" chapter in the *Oracle Fusion Middleware High Availability Guide*.

This feature works on UNIX, because the Oracle Database Console can be CFC enabled on UNIX.

However, on Windows, there is no CFC support for the Oracle Database Console service. Therefore, you cannot use ASCRS to create a database resource for the Oracle Database Console service on Windows.

6.1.9 Changes to Rulesets May Not be Persisted During an Oracle RAC Instance Failover

When you update rulesets (used in Human Workflow or BPEL) through the Worklist configuration UI or the SOA Composer application during an Oracle RAC instance failover, the new rule metadata may not get persisted to the database. In this case, you will need to perform a manual retry. However, you can continue to use the older version of metadata without any errors.

6.1.10 Manual Retries May be Necessary When Redeploying Tasks During an Oracle RAC Failover

When redeploying tasks with large number of rules during an Oracle RAC instance failover, a manual retry may be needed by the end user occasionally.

6.1.11 Timeout Settings for SOA Request-Response Operations are Not Propagated in a Node Failure

In an active-active Oracle SOA cluster, when a node failure occurs, the timeout settings for request-response operations in receive activities are not propagated from one node to the other node or nodes. If a failure occurs in the server that scheduled these activities, they must be rescheduled with the scheduler upon server restart.

6.1.12 Scale Out and Scale Up Operations Fail

The scale out and scale up operations performed on your environment after re-associating the local file based WLS LDAP store with an external LDAP store will fail. To avoid this failure, follow the steps below before performing a scale up or scale out operation.

1. Edit the `setDomainEnv.sh` file located under the *DOMAIN_HOME*/bin directory and add the "-Dcommon.components.home=${*COMMON_ COMPONENTS_HOME*}" and "-Djrf.version=11.1.1" variables to the the file.

2. These variables should be added to the "EXTRA_JAVA_PROPERTIES". For example:

```
EXTRA_JAVA_PROPERTIES="-Ddomain.home=${DOMAIN_HOME}
-Dcommon.components.home=${COMMON_COMPONENTS_HOME} -Djrf.version=11.1.1
    .
    .
    .
```

3. Save the file and proceed with the scale out or scale up operation.

6.1.13 Harmless SQLIntegrityConstraintViolationException Can be Received in a SOA Cluster

The following SQLIntegrityConstraintViolationException can be received in a SOA cluster:

```
[TopLink Warning]: 2010.04.11 14:26:53.941--UnitOfWork(275924841)--Exception
[TOPLINK-4002] (Oracle TopLink - 11g Release 1 (11.1.1.3.0):
Internal Exception: java.sql.SQLIntegrityConstraintViolationException:
ORA-00001: unique constraint (JYIPS2RC4B49_SOAINFRA.SYS_C0035333) violated
    .
    .
    .
```

This is not a bug. In a cluster environment, when the messages for the same group arrive on both the nodes, one node is bound to experience this exception for the first message. The application is aware of this exception and handles it properly. It does not break any functionality.

This exception can also come on a single node after you restart the server and send the message for the existing group. Again, this exception will be experienced on the very first message.

In summary, this exception is within the application design and does not impact any functionality. It is for this reason that you do not see this exception logged as severe in the soa-diagnostic logs.

Toplink does, however, log it in its server logs.

6.1.14 WebLogic Cluster WS-AT Recovery Can Put a Server into a 'Warning' State

In certain WebLogic cluster process crash scenarios, WS-AT recovery will result in stuck threads that put the server into a "warning" state. WS-AT data recovery is successful in these cases despite the fact that the logs display "failed state" messages, due to the fact that commit acks are not being processed correctly for this scenario (this issue does not occur when the scenario involves the rollback of the transaction). While the server may continue to function in this "warning" state, the threads will continue to be stuck until the transaction abandonment timeout (which defaults to 24 hours) is reached. The workaround is to restart the server, which removes the stuck threads and "warning" state. A patch for this issue can be obtained from Oracle Support.

6.1.15 Very Intensive Uploads from I/PM to UCM May Require Use of IP-Based Filters in UCM Instead of Hostname-Based Filters

The "Adding the I/PM Server Listen Addresses to the List of Allowed Hosts in UCM" section in the *Oracle Fusion Middleware Enterprise Deployment Guide for Oracle Enterprise Content Management Suite* and the "Adding the I/PM Server Listen Addresses to the List of Allowed Hosts in UCM" section in the *Oracle Fusion Middleware High Availability Guide* describe how to add hostname-based filters for Oracle I/PM managed server listen addresses to the list of allowed hosts in Oracle UCM.

When using hostname-based filters in Oracle UCM (`config.cfg` file) a high latency/performance impact may be observed in the system for very intensive uploads of documents from Oracle I/PM to Oracle UCM. This is caused by the reverse DNS lookup that is required in Oracle UCM to allow the connections from Oracle I/PM servers. Using hostname-based filters is recommended in preparation for configuring the system for Disaster Protection and to restore to a different host (since the configuration used is IP-agnostic when using hostname-based filters). However if

the performance of the uploads needs to be improved, users can use instead IP-based filters. To do this:

1. Edit the file `/u01/app/oracle/admin/`*domainName*`/ucm_`
    `cluster/config/config.cfg` and remove or comment out:

    ```
    SocketHostNameSecurityFilter=localhost|localhost.mydomain.com|ecmhost1vhn1|ecmh
    ost2vhn1

    AlwaysReverseLookupForHost=Yes
    ```

2. Add the IP addresses (listen address) of the WLS_IPM1 and WLS_IPM2 managed servers (ECMHOST1VHN1 and ECMHOST2VHN1, respectively) to the SocketHostAddressSecurityFilter parameter list as follows:

    ```
    SocketHostAddressSecurityFilter=127.0.0.1|0:0:0:0:0:0:0:1|X.X.X.X|Y.Y.Y.
    ```

    where X.X.X.X and Y.Y.Y.Y are the listen addresses of WLS_IPM1 and WLS_IPM2 respectively. Notice that 127.0.0.1 also needs to be added as shown above.

3. Restart the UCM servers.

6.1.16 Worklist Application May Throw Exception if Action Dropdown Menu is Used During a Failover

If you use the Oracle Business Process Management Suite Worklist application **Actions** dropdown menu to take action on a task while a failover is in progress, an exception similar to the following may be thrown:

```
<oracle.adf.view.rich.component.fragment.UIXInclude> <ADF_FACES-10020> <Tear
down of include component context failed due to an unhandled e
xception.
java.util.NoSuchElementException
        at java.util.ArrayDeque.removeFirst(ArrayDeque.java:251)
        at java.util.ArrayDeque.pop(ArrayDeque.java:480)
        at
oracle.adfinternal.view.faces.context.ApplicationContextManagerImpl.popContext
Change(ApplicationContextManagerImpl.java:66)
  .
  .
  .
```

In this case, the approval or rejection of the task does not go through.

To work around this problem, use either of these approaches:

-   Instead of using the **Actions** dropdown menu to take action on the task, use the TaskForm to take action.

-   Do a refresh after the error message. Then take the action again using the **Actions** dropdown menu.

6.1.17 ClassCastExceptions in a SOA Cluster for the SOA Worklist Application

ClassCastExceptions may arise in a SOA cluster for the Oracle SOA Worklist application (`java.lang.ClassCastException:` `oracle.adf.model.dcframe.DataControlFrameImpl` is reported in the logs). As a result, the Worklist application state may not be replicated to other managed servers in the cluster. The Worklist application and the corresponding user sessions will be usable after the exception is thrown, but any failovers to other servers in the cluster will not succeed.

There is no workaround to this problem.

To solve this problem, download the patch for bug 9561444, which solves the problem. Follow these steps:

1. To obtain the patch, log into My Oracle Support (formerly Oracle*MetaLink*) at the following URL:

   http://metalink.oracle.com

2. Click the **Patches & Updates** tab.

3. In the **Patch Search** section, enter 9561444 in the **Patch ID or number is** field, and enter your platform in the field after the **and Platform is** field.

4. Click **Search**.

5. On the Patch Search page, click the patch number in the **Patch ID** column. This causes the page content to change to display detailed information about the patch.

6. Click **Download** to download the patch.

6.1.18 Use srvctl in 11.2 Oracle RAC Databases to Set Up AQ Notification and Server-side TAF

Because of a known issue in 11.2 Oracle RAC databases, it is required to use `srvctl` to set up AQ notification and server-side TAF. Using DBMS_SQL packages will not work as expected.

Here is an example use of `srvctl`:

```
srvctl modify service -d orcl -s orclSVC -e SELECT -m BASIC -w 5 -z 5 -q TRUE
```

In the example:

orcl - Database Name

orclSVC - Service Name used by middleware component

SELECT - Failover type

BASIC - Failover method

5 - Failover delay

5 - Failover retry

TRUE - AQ HA notifications set to TRUE

Please refer to the Oracle 11.2 Oracle database documentation for detailed information about this command usage.

6.1.19 Oracle I/PM Input Files May Not be Processed Correctly During an Oracle RAC Failover

With Oracle I/PM and Oracle UCM file processing, some files may not get loaded in UCM properly during an Oracle RAC instance failover.

The incoming files to be processed by Oracle I/PM are put into an input folder. Oracle I/PM processes the files in the input folder and then puts them into Oracle UCM, which is backed by an Oracle RAC database. Sometimes when an Oracle RAC instance failure occurs, the retry may not happen correctly, and the incoming files do not get processed. These unprocessed files show up in an error folder. These unprocessed files can manually be put back into the input folder and processed.

6.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

6.2.1 jca.retry.count Doubled in a Clustered Environment

In a clustered environment, each node maintains its own in-memory Hasmap for inbound retry. The `jca.retry.count` property is specified as **3** for the inbound retry feature. However, each node tries three times. As a result, the total retry count becomes 6 if the clustered environment has two nodes.

6.2.2 Cluster Time Zones Must Be the Same

All the machines in a cluster must be in the same time zone. WAN clusters are not supported by Oracle Fusion Middleware high availability. Even machines in the same time zone may have issues when started by command line. Oracle recommends using Node Manager to start the servers.

6.2.3 Fusion Middleware Control May Display Incorrect Status

In some instances, Oracle WebLogic Fusion Middleware Control may display the incorrect status of a component immediately after the component has been restarted or failed over.

6.2.4 Accumulated BPEL Instances Cause Performance Decrease

In a scaled out clustered environment, if a large number of BPEL instances are accumulated in the database, it causes the database's performance to decrease, and the following error is generated: MANY THREADS STUCK FOR 600+ SECONDS.

To avoid this error, remove old BPEL instances from the database.

6.2.5 Extra Message Enqueue when One a Cluster Server is Brought Down and Back Up

In a non-XA environment, MQSeries Adapters do not guarantee the only once delivery of the messages from inbound adapters to the endpoint in case of local transaction. In this scenario, if an inbound message is published to the endpoint, and before committing the transaction, the SOA server is brought down, inbound message are rolled back and the same message is again dequeued and published to the endpoint. This creates an extra message in outbound queue.

In an XA environment, MQ Messages are actually not lost but held by Queue Manager due to an inconsistent state. To retrieve the held messages, restart the Queue Manager.

6.2.6 Duplicate Unrecoverable Human Workflow Instance Created with Oracle RAC Failover

As soon as Oracle Human Workflow commits its transaction, the control passes back to BPEL, which almost instantaneously commits its transaction. Between this window, if the Oracle RAC instance goes down, on failover, the message is retried and can cause duplicate tasks. The duplicate task can show up in two ways - either a duplicate task appears in worklistapp, or an unrecoverable BPEL instance is created. This BPEL instance appears in BPEL Recovery. It is not possible to recover this BPEL instance as **consumer**, because this task has already completed.

6.2.7 Configuration Files Missing after Planned Administration Server Node Shutdown or Reboot

The following information refers to Chapter 10, "Managing the Topology," of the *Oracle Fusion Middleware Enterprise Deployment Guide for Oracle SOA Suite*.

When performing a planned stop of the Administration Server's node (rebooting or shutting down the Admin Server's machine), it may occur that the OS NFS service is disabled before the Administration Server itself is stopped. This (depending on the configuration of services at the OS level) can cause the detection of missing files in the Administration Server's domain directory and trigger their deletion in the domain directories in other nodes. This can result in the framework deleting some of the files under `domain_dir/fmwconfig/`. This behavior is typically not observed for unplanned downtimes, such as machine panic, power loss, or machine crash. To avoid this behavior, shutdown the Administration Server before performing reboots or, alternatively, use the appropriate OS configuration to set the order of services in such a way that NFS service is disabled with later precedence than the Administration Server's process. See your OS administration documentation for the corresponding required configuration for the services' order.

6.2.8 No High Availability Support for SOA B2B TCP/IP

High availability failover support is not available for SOA B2B TCP/IP protocol. This effects primarily deployments using HL7 over MLLP. For inbound communication in a clustered environment, all B2B servers are active and the address exposed for inbound traffic is a load balancer virtual server. Also, in an outage scenario where an active managed server is no longer available, the persistent TCP/IP connection is lost and the client is expected to reestablish the connection.

6.2.9 WebLogic Administration Server on Machines with Multiple Network Cards

When installing Oracle WebLogic Server on a server with multiple network cards, always specify a Listen Address for the Administration Server. The address used should be the DNS Name/IP Address of the network card you wish to use for Administration Server communication.

To set the Listen Address:

1. In the Oracle WebLogic Server Administration Console, select **Environment**, and then **Servers** from the domain structure menu.

2. Click the Administration Server.

3. Click **Lock and Edit** from the Change Center to allow editing.

4. Enter a Listen Address.

5. Click **Save**.

6. Click **Activate Changes** in the Change Center.

6.2.10 Additional Parameters for SOA and Oracle RAC Data Sources

In some deployments of SOA with Oracle RAC, you may need to set additional parameters in addition to the out of the box configuration of the individual data sources in an Oracle RAC configuration. The additional parameters are:

1. Add property `oracle.jdbc.ReadTimeout=300000` (300000 milliseconds) for each data source.

   The actual value of the `ReadTimeout` parameter may differ based on additional considerations.

2. If the network is not reliable, then it is difficult for a client to detect the frequent disconnections when the server is abruptly disconnected. By default, a client running on Linux takes 7200 seconds (2 hours) to sense the abrupt disconnections. This value is equal to the value of the `tcp_keepalive_time` property. To configure the application to detect the disconnections faster, set the value of the `tcp_keepalive_time`, `tcp_keepalive_interval`, and `tcp_keepalive_probes` properties to a lower value at the operating system level.

   > **Note:** Setting a low value for the `tcp_keepalive_interval` property leads to frequent probe packets on the network, which can make the system slower. Therefore, the value of this property should be set appropriately based on system requirements.

For example, set `tcp_keepalive_time=600` at the system running the WebLogic Server managed server.

Also, you must specify the `ENABLE=BROKEN` parameter in the `DESCRIPTION` clause in the connection descriptor. For example:

```
dbc:oracle:thin:@(DESCRIPTION=(enable=broken)(ADDRESS_LIST=(ADDRESS=(PRO
TOCOL=TCP)(HOST=node1-vip.mycompany.com)(PORT=1521)))(CONNECT_DATA=(SERVICE_
NAME=orcl.us.oracle.com)(INSTANCE_NAME=orcl1)))
```

As a result, the data source configuration appears as follows:

```
<url>jdbc:oracle:thin:@(DESCRIPTION=(enable=broken)(ADDRESS_LIST=(ADDRESS=(PRO
TOCOL=TCP)(HOST=node1-vip.us.oracle.com)(PORT=1521)))(CONNECT_DATA=(SERVICE_
NAME=orcl.us.oracle.com)(INSTANCE_NAME=orcl1)))</url>
```

```
<driver-name>oracle.jdbc.xa.client.OracleXADataSource</driver-name>
<properties>
  <property>
    <name>oracle.jdbc.ReadTimeout</name>
    <value>300000</value>
  </property>
  <property>
    <name>user</name>
    <value>jmsuser</value>
  </property>
  <property>
    <name>oracle.net.CONNECT_TIMEOUT</name>
    <value>10000</value>
  </property>
</properties>
```

6.2.11 Message Sequencing and MLLP Not Supported in Oracle B2B HA Environments

Message sequencing and MLLP are not supported in oracle B2B high availability (HA) environments.

6.2.12 Access Control Exception After Expanding Cluster Against an Extended Domain

The Oracle Identity Federation server has been observed to fail due to access control exceptions under the following circumstances:

1. You create a domain with no Identity Management components on `host1`.

2. On `host2`, you extend that domain in clustered mode, select all Identity Management components, and select `Create Schema`.

3. On `host1`, you expand the cluster and select all components.

Due to a bug, the file *DOMAIN_HOME*/config/fmwconfig system-jazn-data.xml on `host1` is overwritten so that the `<grant>` element is removed, which causes the access control exceptions when the Oracle Identity Federation server is started.

To restore the `<grant>` element, you use the WLST `grantPermission` command.

On Linux, enter the following three commands at the bash prompt. Type each command on one line.

When typing the commands, replace *ORACLE_COMMON_HOME* with the path to the Oracle Common Home folder, located in the Middleware Home. When prompted for information to connect to WebLogic, enter the WLS Administrator Credentials and the location of the WebLogic Administration Server.

```
ORACLE_COMMON_HOME/common/bin/wlst.sh
ORACLE_COMMON_HOME/modules/oracle.jps_11.1.1/common/wlstscripts/grantPermissi
on.py -codeBaseURL
file:\${domain.home}/servers/\${weblogic.Name}/tmp/_WL_user/OIF_11.1.1.2.0/-
-permClass oracle.security.jps.service.credstore.CredentialAccessPermission
-permTarget context=SYSTEM,mapName=OIF,keyName=* -permActions read

ORACLE_COMMON_HOME/common/bin/wlst.sh
ORACLE_COMMON_HOME/modules/oracle.jps_11.1.1/common/wlstscripts/grantPermissi
on.py -codeBaseURL
file:\${domain.home}/servers/\${weblogic.Name}/tmp/_WL_user/OIF_11.1.1.2.0/-
-permClass oracle.security.jps.service.credstore.CredentialAccessPermission
-permTarget credstoressp.credstore -permActions read
```

```
ORACLE_COMMON_HOME/common/bin/wlst.sh
ORACLE_COMMON_HOME/modules/oracle.jps_11.1.1/common/wlstscripts/grantPermissi
on.py -codeBaseURL
file:\${domain.home}/servers/\${weblogic.Name}/tmp/_WL_user/OIF_11.1.1.2.0/-
-permClass oracle.security.jps.service.credstore.CredentialAccessPermission
-permTarget credstoressp.credstore.OIF.* -permActions read
```

On Windows, enter the following three commands at the command prompt. Type each command on one line.

When typing the commands, replace *ORACLE_COMMON_HOME* with the path to the Oracle Common Home folder, located in the Middleware Home. When prompted for information to connect to WebLogic, enter the WLS Administrator Credentials and the location of the WebLogic Administration Server.

```
ORACLE_COMMON_HOME\common\bin\wlst.cmd
ORACLE_COMMON_HOME\modules\oracle.jps_11.1.1\common\wlstscripts\grantPermiss
ion.py -codeBaseURL
file:${domain.home}/servers/\${weblogic.Name}/tmp/_WL_user/OIF_11.1.1.2.0/-
-permClass oracle.security.jps.service.credstore.CredentialAccessPermission
-permTarget context=SYSTEM,mapName=OIF,keyName=* -permActions read
```

```
ORACLE_COMMON_HOME\common\bin\wlst.cmd
ORACLE_COMMON_HOME\modules\oracle.jps_11.1.1\common\wlstscripts\grantPermiss
ion.py -codeBaseURL
file:${domain.home}/servers/${weblogic.Name}/tmp/_WL_user/OIF_11.1.1.2.0/-
-permClass oracle.security.jps.service.credstore.CredentialAccessPermission
-permTarget credstoressp.credstore -permActions read
```

```
ORACLE_COMMON_HOME\common\bin\wlst.cmd
ORACLE_COMMON_HOME\modules\oracle.jps_11.1.1\common\wlstscripts\grantPermiss
ion.py -codeBaseURL
file:${domain.home}/servers/${weblogic.Name}/tmp/_WL_user/OIF_11.1.1.2.0/-
-permClass oracle.security.jps.service.credstore.CredentialAccessPermission
-permTarget credstoressp.credstore.OIF.* -permActions read
```

6.3 Testing Abrupt Failures of WebLogic Server When Using File Stores on NFS

Oracle strongly recommends verifying the behavior of a server restart after abrupt machine failures when the JMS messages and transaction logs are stored on an NFS mounted directory. Depending on the NFS implementation, different issues can arise post failover/restart. The behavior can be verified by abruptly shutting down the node hosting the Web Logic servers while these are running. If the server is configured for server migration, it should be started automatically in the failover node after the corresponding failover period. If not, a manual restart of the WebLogic Server on the same host (after the node has completely rebooted) can be performed. Specifically, if Oracle WebLogic Server does not restart after abrupt machine failure when JMS messages and transaction logs are stored on NFS mounted directory, the following errors may appear in the server log files:

```
<MMM dd, yyyy hh:mm:ss a z> <Error> <Store> <BEA-280061> <The persistent
store "_WLS_server_soa1" could not be deployed:
weblogic.store.PersistentStoreException: java.io.IOException:
[Store:280021]There was an error while opening the file store file
"_WLS_SERVER_SOA1000000.DAT"
weblogic.store.PersistentStoreException: java.io.IOException:
```

```
[Store:280021]There was an error while opening the file store file
"_WLS_SERVER_SOA1000000.DAT"
        at weblogic.store.io.file.Heap.open(Heap.java:168)
        at weblogic.store.io.file.FileStoreIO.open(FileStoreIO.java:88)
...
java.io.IOException: Error from fcntl() for file locking, Resource
temporarily unavailable, errno=11
```

This error is due to the NFS system not releasing the lock on the stores. WebLogic
Server maintains locks on files used for storing JMS data and transaction logs to
protect from potential data corruption if two instances of the same WebLogic Server
are accidentally started. The NFS storage device does not become aware of machine
failure in a timely manner; therefore, the locks are not released by the storage device.
As a result, after abrupt machine failure, followed by a restart, any subsequent attempt
by WebLogic Server to acquire locks on the previously locked files may fail. Refer to
your storage vendor documentation for additional information on the locking of files
stored in NFS mounted directories on the storage device. If it is not reasonably
possible to tune locking behavior in your NFS environment, use one of the following
two solutions to unlock the logs and data files.

Use one of the following two solutions to unlock the logs and data files.

Solution 1

Manually unlock the logs and JMS data files and start the servers by creating a copy of
the locked persistence store file and using the copy for subsequent operations. To
create a copy of the locked persistence store file, rename the file, and then copy it back
to its original name. The following sample steps assume that transaction logs are
stored in the /shared/tlogs directory and JMS data is stored in the /shared/jms
directory.

```
cd /shared/tlogs
mv _WLS_SOA_SERVER1000000.DAT _WLS_SOA_SERVER1000000.DAT.old
cp _WLS_SOA_SERVER1000000.DAT.old _WLS_SOA_SERVER1000000.DAT
cd /shared/jms
mv SOAJMSFILESTORE_AUTO_1000000.DAT SOAJMSFILESTORE_AUTO_1000000.DAT.old
cp SOAJMSFILESTORE_AUTO_1000000.DAT.old SOAJMSFILESTORE_AUTO_1000000.DAT
mv UMSJMSFILESTORE_AUTO_1000000.DAT UMSJMSFILESTORE_AUTO_1000000.DAT.old
cp UMSJMSFILESTORE_AUTO_1000000.DAT.old UMSJMSFILESTORE_AUTO_1000000.DAT
```

With this solution, the WebLogic file locking mechanism continues to provide
protection from any accidental data corruption if multiple instances of the same
servers were accidently started. However, the servers must be restarted manually after
abrupt machine failures. File stores will create multiple consecutively numbered .DAT
files when they are used to store large amounts of data. All files may need to be copied
and renamed when this occurs.

Solution 2

You can also use the WebLogic Server Administration Console to disable WebLogic
file locking mechanisms for the default file store, a custom file store, a JMS paging file
store, and a Diagnostics file store, as described in the following sections.

> **WARNING:**   With this solution, since the WebLogic locking is
> disabled, automated server restarts and failovers should succeed. Be
> very cautious, however, when using this option. The WebLogic file
> locking feature is designed to help prevent severe file corruptions
> that can occur in undesired concurrency scenarios. If the server
> using the file store is configured for server migration, always
> configure the database based leasing option. This enforces
> additional locking mechanisms using database tables, and prevents
> automated restart of more than one instance of the same WebLogic
> Server. Addtional procedural precautions must be implemented to
> avoid any human error and to ensure that one and only one instance
> of a server is manually started at any give point in time. Similarly,
> extra precautions must be taken to ensure that no two domains have
> a store with the same name that references the same directory.

Disabling File Locking for the Default File Store

Follow these steps to disable file locking for the default file store using the WebLogic
Server Administration Console:

1. If necessary, click **Lock & Edit** in the Change Center (upper left corner) of the
   Administration Console to get an Edit lock for the domain.

2. In the **Domain Structure** tree, expand the **Environment** node and select **Servers**.

3. In the **Summary of Servers** list, select the server you want to modify.

4. Select the **Configuration > Services** tab.

5. Scroll down to the **Default Store** section and click **Advanced**.

6. Scroll down and deselect the **Enable File Locking** check box.

7. Click **Save** to save the changes. If necessary, click **Activate Changes** in the Change
   Center.

8. **Restart** the server you modified for the changes to take effect.

The resulting `config.xml` entry will look like the following:

```
<server>
  <name>examplesServer</name>
  ...
  <default-file-store>
    <synchronous-write-policy>Direct-Write</synchronous-write-policy>
    <io-buffer-size>-1</io-buffer-size>
    <max-file-size>1342177280</max-file-size>
    <block-size>-1</block-size>
    <initial-size>0</initial-size>
    <file-locking-enabled>false</file-locking-enabled>
  </default-file-store>
</server>
```

Disabling File Locking for a Custom File Store

Follow these steps to disable file locking for a custom file store using the WebLogic
Server Administration Console:

1. If necessary, click **Lock & Edit** in the Change Center (upper left corner) of the
   Administration Console to get an Edit lock for the domain.

2. In the **Domain Structure** tree, expand the **Services** node and select **Persistent Stores**.

3. In the **Summary of Persistent Stores** list, select the custom file store you want to modify.

4. On the **Configuration** tab for the custom file store, click **Advanced** to display advanced store settings.

5. Scroll down to the bottom of the page and deselect the **Enable File Locking** check box.

6. Click **Save** to save the changes. If necessary, click **Activate Changes** in the Change Center.

7. If the custom file store was in use, you must restart the server for the changes to take effect.

The resulting `config.xml` entry will look like the following:

```
<file-store>
    <name>CustomFileStore-0</name>
    <directory>C:\custom-file-store</directory>
    <synchronous-write-policy>Direct-Write</synchronous-write-policy>
    <io-buffer-size>-1</io-buffer-size>
    <max-file-size>1342177280</max-file-size>
    <block-size>-1</block-size>
    <initial-size>0</initial-size>
    <file-locking-enabled>false</file-locking-enabled>
    <target>examplesServer</target>
</file-store>
```

Disabling File Locking for a JMS Paging File Store

Follow these steps to disable file locking for a JMS paging file store using the WebLogic Server Administration Console:

1. If necessary, click **Lock & Edit** in the Change Center (upper left corner) of the Administration Console to get an Edit lock for the domain.

2. In the **Domain Structure** tree, expand the **Services** node, expand the **Messaging** node, and select **JMS Servers**.

3. In the **Summary of JMS Servers** list, select the JMS server you want to modify.

4. On the **Configuration > General** tab for the JMS Server, scroll down and deselect the **Paging File Locking Enabled** check box.

5. Click **Save** to save the changes. If necessary, click **Activate Changes** in the Change Center.

6. **Restart** the server you modified for the changes to take effect.

The resulting `config.xml` file entry will look like the following:

```
<jms-server>
    <name>examplesJMSServer</name>
    <target>examplesServer</target>
    <persistent-store>exampleJDBCStore</persistent-store>
    ...
    <paging-file-locking-enabled>false</paging-file-locking-enabled>
    ...
</jms-server>
```

Disabling File Locking for a Diagnostics File Store

Follow these steps to disable file locking for a Diagnostics file store using the WebLogic Server Administration Console:

1. If necessary, click **Lock & Edit** in the Change Center (upper left corner) of the Administration Console to get an Edit lock for the domain.

2. In the **Domain Structure** tree, expand the **Diagnostics** node and select **Archives**.

3. In the **Summary of Diagnostic Archives** list, select the server name of the archive that you want to modify.

4. On the **Settings for [server_name]** page, deselect the **Diagnostic Store File Locking Enabled** check box.

5. Click **Save** to save the changes. If necessary, click **Activate Changes** in the Change Center.

6. **Restart** the server you modified for the changes to take effect.

The resulting `config.xml` file will look like this:

```
<server>
  <name>examplesServer</name>
  ...
  <server-diagnostic-config>
    <diagnostic-store-dir>data/store/diagnostics</diagnostic-store-dir>
    <diagnostic-store-file-locking-enabled>false</diagnostic-store-file-locking-
enabled>

<diagnostic-data-archive-type>FileStoreArchive</diagnostic-data-archive-type>
    <data-retirement-enabled>true</data-retirement-enabled>
    <preferred-store-size-limit>100</preferred-store-size-limit>
    <store-size-check-period>1</store-size-check-period>
  </server-diagnostic-config>
</server>
```

6.4 Documentation Errata

This section describes documentation errata. It includes the following topics:

- Section 6.4.1, "Documentation Errata for the Fusion Middleware High Availability Guide"

- Section 6.4.2, "Documentation Errata for the Fusion Middleware Enterprise Deployment Guide for Oracle WebCenter"

- Section 6.4.3, "Documentation Errata for the Fusion Middleware Enterprise Deployment Guide for Oracle SOA Suite"

- Section 6.4.4, "Documentation Errata for the Fusion Middleware Enterprise Deployment Guide for Oracle Identity Management"

6.4.1 Documentation Errata for the Fusion Middleware High Availability Guide

This section contains Documentation Errata for *Oracle Fusion Middleware High Availability Guide*.

It includes the following topic:

- Section 6.4.1.1, "Latest Requirements and Certification Information"

6.4.1.1 Latest Requirements and Certification Information

Several manuals in the Oracle Fusion Middleware 11g documentation set have information on Oracle Fusion Middleware system requirements, prerequisites, specifications, and certification information.

- The latest information on Oracle Fusion Middleware system requirements, prerequisites, specifications, and certification information can be found in the following documents on Oracle Technology Network:

  http://www.oracle.com/technology/software/products/ias/files/fusion_certification.html

  This document contains information related to hardware and software requirements, minimum disk space and memory requirements, and required system libraries, packages, or patches.

- Oracle Fusion Middleware Certification information at:

  http://www.oracle.com/technology/software/products/ias/files/fusion_certification.html

  This document contains information related to supported installation types, platforms, operating systems, databases, JDKs, and third-party products.

6.4.2 Documentation Errata for the Fusion Middleware Enterprise Deployment Guide for Oracle WebCenter

This section contains Documentation Errata for *Oracle Fusion Middleware Enterprise Deployment Guide for Oracle WebCenter*.

It includes the following topics:

- Section 6.4.2.1, "Link to Section 8.1.3 is Missing"
- Section 6.4.2.2, "Additional Information for Discussions Forum Mulitcast to Unicast Conversion"
- Section 6.4.2.3, "Additional Discussion Connection Properties Explained in Administration Guide"
- Section 6.4.2.4, "Section on Configuring IP Validation for the WebGate is Missing from WebCenter EDG Manual"

6.4.2.1 Link to Section 8.1.3 is Missing

In Section 8.1, "Configuring the Discussion Forum Connection" of the *Oracle Fusion Middleware Enterprise Deployment Guide for Oracle WebCenter*, the link to section 8.1.3, "Creating a Discussions Server Connection for WebCenter From EM" is missing.

6.4.2.2 Additional Information for Discussions Forum Mulitcast to Unicast Conversion

In section 6.14, "Converting Discussions Forum from Multicast to Unicast" of the *Oracle Fusion Middleware Enterprise Deployment Guide for Oracle WebCenter*, the following information is missing from Step 3:

Step 3: Repeat steps 1 and 2 for WLS_Services2, swapping WCHost1 for WCHost2, and WCHost2 for WCHost1 as follows:

```
-Dtangosol.coherence.wka1=WCHost2 -Dtangosol.coherence.wka2=WCHost1
-Dtangosol.coherence.localhost=WCHost2 -Dtangosol.coherence.wka1.port=8089
-Dtangosol.coherence.wka2.port=8089
```

6.4.2.3 Additional Discussion Connection Properties Explained in Administration Guide

For additional Discussions Server connection properties associated with the procedure in Section 8.1.3 "Creating a Discussions Server Connection for WebCenter From EM" of the *Oracle Fusion Middleware Enterprise Deployment Guide for Oracle WebCenter*, refer to section 12.3.1, "Registering Discussions Servers Using Fusion Middleware Control," in the *Oracle Fusion Middleware Administrator's Guide for Oracle WebCenter*.

6.4.2.4 Section on Configuring IP Validation for the WebGate is Missing from WebCenter EDG Manual

The following section should appear in the *Oracle Fusion Middleware Administrator's Guide for Oracle WebCenter* after the "Installing and Configuring WebGate" section:

Configuring IP Validation for the WebGate

IP Validation determines if a client's IP address is the same as the IP address stored in the `ObSSOCookie` generated for single sign-on. IP Validation can cause issues in systems using load balancer devices configured to perform IP termination, or when the authenticating WebGate is front-ended by a different load balancer from the one front-ending the enterprise deployment. To configure your load balancer so that it is not validated in these cases, follow these steps:

1. Navigate to the Access System Console using the following URL:

   ```
   http://hostname:port/access/oblix
   ```

   Where the *hostname* refers to the host where the WebPass Oracle HTTP Server instance is running, and *port* refers to the HTTP port of the Oracle HTTP Server instance.

2. On the Access System main page, click the **Access System Console** link, and then log in as an administrator.

3. On the Access System Console main page, click **Access System Configuration**, and then click the **Access Gate Configuration** link on the left pane to display the AccessGates Search page.

4. Enter the proper search criteria and click **Go** to display a list of AccessGates.

5. Select the AccessGate created by the Oracle Access Manager configuration tool.

6. Click **Modify** at the bottom of the page.

7. In the **IPValidationException** field, enter the address of the load balancer used to front-end the deployment.

8. Click **Save** at the bottom of the page.

6.4.3 Documentation Errata for the Fusion Middleware Enterprise Deployment Guide for Oracle SOA Suite

This section contains documentation errata for *Oracle Fusion Middleware Enterprise Deployment Guide for Oracle SOA Suite*.

It includes the following topic:

- Section 6.4.3.1, "Incorrect Directory Name Used for BAM Directory"

6.4.3.1 Incorrect Directory Name Used for BAM Directory

The following incorrect directory name appears twice in the "Configuration Changes Applied to BAM components in an EDG Topology" section of the *Oracle Fusion Middleware Enterprise Deployment Guide for Oracle SOA Suite*:

```
ORACLE_BASE/admin/<domain_name>/mserver/<domain_name>/servers/<servername>/
tmp/_WL_user/oracle-bam_11.1.1/*/APP-INF/classes/config/
```

The following correct directory name should appear instead of the incorrect directory name above:

```
DOMAIN_HOME/config/fmwconfig/servers/<server_name>/applications/
oracle_bam-11.1.1/config
```

6.4.4 Documentation Errata for the Fusion Middleware Enterprise Deployment Guide for Oracle Identity Management

This section contains Documentation Errata for *Oracle Fusion Middleware Enterprise Deployment Guide for Oracle Identity Management*.

It includes the following topic:

- Section 6.4.4.1, "Section on Configuring IP Validation for the WebGate is Missing from Identity Management EDG Manual"

- Section 6.4.4.2, "Doc Errata Affecting Multiple Enterprise Deployment Guides"

6.4.4.1 Section on Configuring IP Validation for the WebGate is Missing from Identity Management EDG Manual

The following section should appear in the *Oracle Fusion Middleware Administrator's Guide for Oracle Identity Management* after the "Installing the WebGate" section:

Configuring IP Validation for the WebGate

IP Validation determines if a client's IP address is the same as the IP address stored in the `ObSSOCookie` generated for single sign-on. IP Validation can cause issues in systems using load balancer devices configured to perform IP termination, or when the authenticating WebGate is front-ended by a different load balancer from the one front-ending the enterprise deployment. To configure your load balancer so that it is not validated in these cases, follow these steps:

1. Navigate to the Access System Console using the following URL:

   ```
   http://hostname:port/access/oblix
   ```

   Where the *hostname* refers to the host where the WebPass Oracle HTTP Server instance is running, and *port* refers to the HTTP port of the Oracle HTTP Server instance.

2. On the Access System main page, click the **Access System Console** link, and then log in as an administrator.

3. On the Access System Console main page, click **Access System Configuration**, and then click the **Access Gate Configuration** link on the left pane to display the AccessGates Search page.

4. Enter the proper search criteria and click **Go** to display a list of AccessGates.

5. Select the AccessGate created by the Oracle Access Manager configuration tool.

6. Click **Modify** at the bottom of the page.

7. In the **IPValidationException** field, enter the address of the load balancer used to front-end the deployment.

8. Click **Save** at the bottom of the page.

6.4.4.2 Doc Errata Affecting Multiple Enterprise Deployment Guides

This section describes documentation errata that affects multiple Enterprise Deployment Guides. Any Enterprise Deployment Guide that have the documentation errata issue discussed in the release notes below should be updated as specified in that release note.

It includes these topics:

- Section 6.4.4.2.1, "Sections on Configuring Oracle Coherence for SOA Composites Need Fixes"

- Section 6.4.4.2.2, "Updates are Needed to Steps for Testing Server Migration"

- Section 6.4.4.2.3, "Steps for Updating Data Sources for Server Migration Need Updates"

6.4.4.2.1 Sections on Configuring Oracle Coherence for SOA Composites Need Fixes Several Enterprise Deployment Guide manuals have a "Configuring Oracle Coherence for Deploying Composites" section that includes a Note like the following:

> **Note:**   The Coherence cluster used for deployment uses port 8088 by default. This port can be changed by specifying the `-Dtangosol.coherence.wkan.port` startup parameter.

This Note should read as follows:

> **Note:**   The Coherence cluster used for deployment uses port 8088 by default. This port can be changed by specifying a different port (for example, 8089) with the `-Dtangosol.coherence.wkan.port` and `-Dtangosol.coherence.localport` startup parameters. For example:
>
> WLS_SOA1 (enter the following into the Arguments field on a single line, without a carriage return):
>
> ```
> -Dtangosol.coherence.wka1=soahost1vhn1
> -Dtangosol.coherence.wka2=soahost2vhn1
> -Dtangosol.coherence.localhost=soahost1vhn1
> -Dtangosol.coherence.localport=8089
> -Dtangosol.coherence.wka1.port=8089
> -Dtangosol.coherence.wka2.port=8089
> ```
>
> WLS_SOA2 (enter the following into the Arguments field on a single line, without a carriage return):
>
> ```
> -Dtangosol.coherence.wka1=soahost1vhn1
> -Dtangosol.coherence.wka2=soahost2vhn1
> -Dtangosol.coherence.localhost=soahost2vhn1
> -Dtangosol.coherence.localport=8089
> -Dtangosol.coherence.wka1.port=8089
> -Dtangosol.coherence.wka2.port=8089
> ```

6.4.4.2.2 Updates are Needed to Steps for Testing Server Migration Several Enterprise
Deployment Guide manuals have one or more subsections that describe how to test
server migration.

The following Note should appear at the end of every section on testing server
migration:

> **Note:** After a server is migrated, to fail it back to its original
> node/machine, stop the managed server from the Oracle WebLogic
> Administration Console and then start it again. The appropriate Node
> Manager will start the managed server on the machine to which it was
> originally assigned.

6.4.4.2.3 Steps for Updating Data Sources for Server Migration Need Updates Several
Enterprise Deployment Guide manuals have one or more subsections that describe
how to update the data sources used for leasing when you configure server migration.

The following text appears in the instructions on how to update data sources for
leasing as part of server migration configuration:

Use Supports Global Transactions, One-Phase Commit, and specify a service name for
your database

That text should appear as follows:

Data sources do not require support for global transactions. Therefore, do *not* use any
type of distributed transaction emulation/participation algorithm for the data source
(do not choose the **Supports Global Transactions** option, or the **Logging Last
Resource**, **Emulate Two-Phase Commit**, or **One-Phase Commit** options of the
Supports Global Transactions option), and specify a service name for your database.

Part II

Oracle Development Tools

Part II contains the following chapters:

-

-

7

Oracle JDeveloper and Oracle Application Development Framework (ADF)

The latest known issues associated with Oracle JDeveloper and Application Developer Framework (ADF) are available on the Oracle Technology Network (OTN) at: `http://www.oracle.com/technology/products/jdev/htdocs/11/index.html`.

For more information and technical resources for Oracle JDeveloper and Application Developer Framework (ADF), visit the product center on the Oracle Technology Network at: `http://www.oracle.com/technology/products/jdev/index.html`.

8

Oracle TopLink

This chapter describes issues associated with Oracle TopLink. It includes the following topics:

- Section 8.1, "General Issues and Workarounds"

8.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topic:

- Section 8.1.1, "TopLink Object-Relational Issues"
- Section 8.1.2, "TopLink Workbench Issues"
- Section 8.1.3, "Oracle Database Extensions with TopLink"
- Section 8.1.4, "Allowing Zero Value Primary Keys"
- Section 8.1.5, "Managed Servers on Sybase with JCA Oracle Database Service"
- Section 8.1.6, "Logging Configuration with EclipseLink Using Container Managed JPA"
- Section 8.1.7, "TopLink DBWS with JRockit JVM"

8.1.1 TopLink Object-Relational Issues

This section contains information on the following issues:

- Section 8.1.1.1, "Incorrect outer join SQL on SQLServer2005"
- Section 8.1.1.2, "UnitOfWork.release() not Supported with External Transaction Control"
- Section 8.1.1.3, "Returning Policy for UPDATE with Optimistic Locking"
- Section 8.1.1.4, "JDBC Drivers returning Timestamps as Strings"
- Section 8.1.1.5, "Proxy Authentication with Oracle Containers for Java EE (OC4J) Managed Data Sources"
- Section 8.1.1.6, "Unit of Work does not add Deleted Objects to Change Set"

8.1.1.1 Incorrect outer join SQL on SQLServer2005

TopLink generates incorrect outer join for SQL Server v2005. The outer join syntax generated is correct for earlier versions of this database. To work around this limitation, reconfigure the database compatibility (refer to the SQLServer documentation for details). Alternatively, you can use a custom TopLink database platform.

8.1.1.2 UnitOfWork.release() not Supported with External Transaction Control

A unit of work synchronized with a Java Transaction API (JTA) will throw an exception if it is released. If the current transaction requires its changes to not be persisted, the JTA transaction must be rolled back.

When in a container-demarcated transaction, call `setRollbackOnly()` on the EJB/session context:

```
@Stateless
public class MySessionBean
{    @Resource
    SessionContext sc;

    public void someMethod()
    {
        ...
        sc.setRollbackOnly();
    }
}
```

When in a bean-demarcated transaction then you call `rollback()` on the UserTransaction obtained from the EJB/session context:

```
@Stateless
@TransactionManagement(TransactionManagementType.BEAN)
public class MySessionBean implements SomeInterface
{
    @Resource
    SessionContext sc;

    public void someMethod()
    {
        sc.getUserTransaction().begin();
        ...
        sc.getUserTransaction().rollback();
    }
}
```

8.1.1.3 Returning Policy for UPDATE with Optimistic Locking

The returning policy, which allows values modified during INSERT and UPDATE to be returned and populated in cached objects, does not work in conjunction with numeric version optimistic locking for UPDATE. The value returned for all UPDATE operations is **1** and does not provide meaningful locking protection.

Do not use a returning policy for UPDATE in conjunction with numeric optimistic locking.

The use of returning policy for INSERT when using optimistic locking works correctly.

8.1.1.4 JDBC Drivers returning Timestamps as Strings

TopLink assumes that date and time information returned from the server will use Timestamp. If the JDBC driver returns a String for the current date, TopLink will throw an exception. This is the case when using a DB2 JDBC driver.

To work around this issue, consider using a driver that returns Timestamp (such as COM.ibm.db2.jdbc.app.DB2Driver) or change the policy to use local time instead of server time.

Another option is to use a query re-director on the `ValueReadQuery` used by the platform:

```
ValueReadQuery vrq = new ValueReadQuery(
    "SELECT to_char(sysdate, 'YYYY-MM-DD HH:MM:SS.SSSSS') FROM DUAL"
);
vrq.setRedirector(new TSQueryRedirector());
...
class TSQueryRedirector implements QueryRedirector
{
    public Object invokeQuery(DatabaseQuery query, Record arguments, Session session)
    {
        String value = (String)session.executeQuery(query);
        return ConversionManager.getDefaultManager().convertObject(
            value, java.sql.Timestamp.class
        );
    }
}
```

8.1.1.5 Proxy Authentication with Oracle Containers for Java EE (OC4J) Managed Data Sources

Proxy authentication does not work with OC4J managed data sources. Instead of using the data source provided by the application server, you must create a data source yourself.

Refer to the "Configuring Oracle Database Proxy Authentication" in the *Oracle Fusion Middleware Developer's Guide for Oracle TopLink* for more information.

For example, replace this code:

```
login.setConnector(
    new OracleJDBC10_1_0_2ProxyConnector(
        ((JNDIConnectorlogin.getConnector()).getName()
    )
);
```

with the following:

```
oracle.jdbc.pool.OracleDataSource ds = new oracle.jdbc.pool.OracleDataSource();
ds.setUser("MyMainUser");
ds.setPassword("MyPassword");
ds.setUrl("jdbc:oracle:thin:@MyServer:1521:MyDb");
login.setConnector(new OracleJDBC10_1_0_2ProxyConnector(ds));
```

8.1.1.6 Unit of Work does not add Deleted Objects to Change Set

When accessing the change set of a Unit of Work to determine what has changed, objects that are pending deletion (such as `uow.deleteObject( )` and `uow.deleteAllObjects( )`) will not be returned from the result set.

The objects pending deletion are only available through the Unit of Work `getDeletedObjects` call.

8.1.2 TopLink Workbench Issues

This section contains information on the following issues:

8.1.2.1 Accessibility

Due to an issue with HP-UX JDK 1.6, if NullPointExecption error dialog is generated when saving a file, the error dialog window is not in focus.

8.1.2.2 Running the TopLink Workbench on Windows OS

Due to an issue with certain configurations and versions of Windows operating systems, users that launch the TopLink Workbench with the `workbench.cmd` file may receive a dialog that states: *Could not find the main class*. This occurs because the classpath specified contains a directory path which has periods in it. The workaround is to rename the offending directory or change the classpath to use directory paths which do not contain periods.

8.1.3 Oracle Database Extensions with TopLink

This section contains information on the following issue:

- Section 8.1.3.1, "Template JAR for Spatial and XDB Support in Oracle WebLogic Server"

8.1.3.1 Template JAR for Spatial and XDB Support in Oracle WebLogic Server

To fully support Oracle Spatial and Oracle XDB mapping capabilities (in both standalone Oracle WebLogic Server and the Oracle JDeveloper integrated WebLogic Server), you must use the `toplink-spatial-template.jar` and `toplink-xdb-template.jar` to extend the WebLogic Server domain to support Oracle Spatial and XDB, respectively.

To extend your WebLogic Server domain:

1. Download the `toplink-spatial-template.jar` (to support Oracle Spatial) and `toplink-xdb-template.jar` (to support Oracle XDB) files from:

   - http://download.oracle.com/otn/java/toplink/111110/toplink-spatial-template.jar

   - http://download.oracle.com/otn/java/toplink/111110/toplink-xdb-template.jar

2. Use Table 8–1, " To Support Oracle Spatial" or Table 8–2, " To Support Oracle XDB" to determine which files to copy.

Table 8–1   To Support Oracle Spatial

Copy this file	From...[1]	To...[2]
sdoapi.jar	*<ORACLE_DATABASE_ HOME>*/md/jlib	*<WEBLOGIC_ HOME>*/server/lib

[1] These are the default locations. Your actual location may vary depending on your specific environment, installed options, and version.

[2] When using Oracle JDeveloper integrated WebLogic Server, the *<WEBLOGIC_HOME>* is located within the *<JDEVELOPER_HOME>* directory.

Table 8–2   To Support Oracle XDB

Copy this file	From...[1]	To...[2]
xdb.jar	*<ORACLE_DATABASE_ HOME>*/rdbms/jlib	*<WEBLOGIC_HOME>*/server/lib
xml.jar	*<ORACLE_DATABASE_HOME>*/lib	*<WEBLOGIC_HOME>*/server/lib

Table 8–2 (Cont.) To Support Oracle XDB

Copy this file	From...[1]	To...[2]
xmlparserv2.jar	*<ORACLE_DATABASE_HOME>*/lib	*<WEBLOGIC_HOME>*/server/lib

[1] These are the default locations. Your actual location may vary depending on your specific environment, installed options, and version.

[2] When using Oracle JDeveloper integrated WebLogic Server, the *<WEBLOGIC_HOME>* is located within the *<JDEVELOPER_HOME>* directory.

> **Note:** Although the actual JAR file may be named differently in your **From** directory, the file must be named as shown, when copied to the **To** directory.

3. Launch the Config Wizard (*<WEBLOGIC_HOME>*/common/bin/config.sh (or .bat).

4. Select **Extend an existing WebLogic domain**.

5. Browse and select your WebLogic Server domain.

   When using JDeveloper with integrated WebLogic Server, the typical WebLogic Server domain location may be similar to:

   - In Windows environments:
     %APPDATA%\JDeveloper\systemXX.XX.XX.XX\DefaultDomain

     where XX.XX.XX.XX is the unique number of the product build.

     For Windows platforms, you must enable the **Show hidden files and folders** folder option.

   - In non-Windows environments, the default location is under the current user's default home directory: *<$Home>*/DefaultDomain

   Refer to the Oracle JDeveloper documentation for details.

6. Select **Extend my domain using an existing extension template**.

7. Browse and select the required template JAR (**toplink-spatial-template.jar** for Oracle Spatial, **toplink-xdb-template.jar** for Oracle XDB).

8. Complete the remaining pages of the wizard.

8.1.4 Allowing Zero Value Primary Keys

By default, EclipseLink interprets *zero* as *null* for primitive types that cannot be null (such as int and long) causing zero to be an invalid value for primary keys. You can modify this setting by using the allow-zero-id property in the persistence.xml file. Valid values are:

- **true** – EclipseLink interprets zero values as *zero*. This permits primary keys to use a value of zero.
- **false** (default) – EclipseLink interprets zero as *null*.

Refer the *EclipseLink User's Guide* at http://wiki.eclipse.org/EclipseLink/UserGuide for more information.

8.1.5 Managed Servers on Sybase with JCA Oracle Database Service

When using a JCA service with the Oracle Database adapter in a cluster to perform database operations on a Sybase database, the managed nodes in the cluster process the messages and may attempt to perform duplicate operations.

Because supported versions of Sybase do not support Oracle TopLink record locking, Sybase allows the duplicate operation attempts.

8.1.6 Logging Configuration with EclipseLink Using Container Managed JPA

By default, EclipseLink users in container managed JPA will use the Oracle WebLogic Server logging options to report all log messages generated by EclipseLink. Refer to "Configuring WebLogic Logging Services" in *Oracle® Fusion Middleware Configuring Log Files and Filtering Log Messages for Oracle WebLogic Server*.

To use the EclipseLink native logging configuration, add the following property to your `persistence.xml` file:

```
<property name="eclipselink.logging.logger" value="DefaultLogger"/>
```

8.1.7 TopLink DBWS with JRockit JVM

TopLink DBWS deployment may fail in JRockit VM environment. When generating a WAR file for deployment, the TopLink Database Web Services (DBWS) design-time utility uses a version of ASM for code generation which is not compatible with the version of JRockit that is bundled with Oracle WebLogic Server (WLS) 10.3.3. This results in a deployment failure with the SOAP message exception **Illegal target of jump or branch**.

Note: This issue does not occur when running the application server in a Sun JVM environment.

To generate a DBWS deployment WAR file that will successfully deploy in a JRockit JVM environment, use this procedure:

Note: You can complete this procedure using an IDE, such as Oracle JDeveloper.

---

1. Create a new project. Add the following libraries to the classpath:

   - Java EE
   - Oracle TopLink
   - Oracle JWSDL
   - Oracle SOAP
   - JAX-WS Web services
   - JDBC Library
   - `utils/dbws/eclipselink-dbwsutils.jar`

2. Import the `dbws-bulider.xml` file and add it to the project classpath.

3. Create a new file named `META-INF/services/org.eclipse.persistence.tools.dbws.DBWSPack`

`ager` in the project's `src` directory. The file should contain the following, single line:

```
org.eclipse.persistence.tools.dbws.JDevPackager
```

Add this newly created file to the project classpath.

4. Use the `DBWSBuilder` utility to generate the web service artifacts in the specified directory:

   - Main class: `org.eclipse.persistence.tools.dbws.DBWSBuilder`

   - Arguments: `-builderFile dbws-builder.xml -stageDir .`
     `-packageAs jdev`

5. Rebuild the project. This will generate a `DBWSProvider.class` file.

6. Use the web service artifacts to generate a WAR deployment profile. The `.war` file should contain the following:

   - `WEB-INF/web.xml`

   - `WEB-INF/weblogic.xml`

   - `WEB-INF/classes/_dbws/DBWSProvider.class`

   - `WEB-INF/classes/META-INF/eclipselink-dbws.xml`

   - `WEB-INF/classes/META-INF/eclipselink-dbws-or.xml`

   - `WEB-INF/classes/META-INF/eclipselink-dbws-ox.xml`

   - `WEB-INF/classes/META-INF/eclipselink-dbws-sessions.xml`

   - `WEB-INF/wsdl/eclipselink-dbws.wsdl`

   - `WEB-INF/wsdl/eclipselink-dbws-schema.xsd`

7. You can now deploy the WAR file to your application server

Part III

Web Tier

Part III contains the following chapters:

-

9

Oracle HTTP Server

This chapter describes issues associated with Oracle HTTP Server. However, there are no known issues at this time.

10

Oracle Web Cache

This chapter describes issues associated with Oracle Web Cache. It includes the following topics:

- Section 10.1, "Configuration Issues and Workarounds"

10.1 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 10.1.1, "Reset the Random Password Generated in the Oracle Portal, Forms, Reports and Discoverer Install Types"
- Section 10.1.2, "Running Oracle Web Cache Processes as a Different User Is Not Supported"
- Section 10.1.3, "Processing Order of Request Filters Is Incorrect"

10.1.1 Reset the Random Password Generated in the Oracle Portal, Forms, Reports and Discoverer Install Types

For enhanced security, no default hard-coded passwords are used for managing Oracle Web Cache.

When you install the Oracle Web Tier installation type, the Oracle Universal Installer prompts you to choose a password. The Web Cache Administrator page of the Oracle Universal Installer prompts you to enter a password for the `administrator` account. The `administrator` account is the Oracle Web Cache administrator authorized to log in to Oracle Web Cache Manager and make configuration changes through that interface.

When you install the Oracle Portal, Forms, Reports and Discoverer installation type, the prompt for the `administrator` password is missing. Instead, the Oracle Portal, Forms, Reports and Discoverer install type uses a random value chosen at install time.

No matter the installation type, before you begin configuration, change the passwords for these accounts to a secure password. If you are configuring a cache cluster, all members of the cluster must use the same password for the `administrator` account.

To change the password, use the Passwords page of Fusion Middleware Control, as described in Section 5.2, "Configuring Password Security," of the *Oracle Fusion Middleware Administrator's Guide for Oracle Web Cache*.

10.1.2 Running Oracle Web Cache Processes as a Different User Is Not Supported

Running Oracle Web Cache as a user other than the installed user through the use of the `webcache_setuser.sh setidentity` command is not supported for this release. Specifically, you cannot change the user ID with the following sequence:

1. Change the process identity of the Oracle Web Cache processes in the Process Identity page using Oracle Web Cache Manager (**Properties** > **Process Identity**).

2. Use the `webcache_setuser.sh` script as follows to change file and directory ownership:

    ```
    webcache_setuser.sh setidentity <user_ID>
    ```

    where `<user_ID>` is the user you specified in the **User ID** field of the Process Identity page.

3. Restart Oracle Web Cache using `opmnctl`.

    Oracle Web Cache will start and then immediately shut down.

    In addition, messages similar to the following appear in the event log:

    ```
    [2009-06-02T21:22:46+00:00] [webcache] [ERROR:1] [WXE-13212] [logging] [ecid: ]
    Access log file
    /scratch/webtier/home/instances/instance1/diagnostics/logs/WebCache/webcache1/a
    ccess_log could not be opened.
    [2009-06-02T21:22:46+00:00] [webcache] [WARNING:1] [WXE-13310] [io] [ecid: ]
    Problem opening file
    /scratch/webtier/home/instances/instance1/config/WebCache/webcache1/webcache.pi
    d (Access Denied).
    [2009-06-02T21:22:46+00:00] [webcache] [ERROR:1] [WXE-11985] [esi] [ecid: ]
    Oracle Web Cache is unable to obtain the size of the default ESI fragment page
    /scratch/webtier/home/instances/instance1/config/WebCache/webcache1/files/esi_
    fragment_error.txt.
    [2009-06-02T21:22:46+00:00] [webcache] [WARNING:1] [WXE-11905] [security]
    [ecid: ] SSL additional information: The system could not open the specified
    file.
    ```

For further information about the `webcache_setuser.sh` script, see Section 5.9, "Running webcached with Root Privilege," of the *Oracle Fusion Middleware Administrator's Guide for Oracle Web Cache*.

10.1.3 Processing Order of Request Filters Is Incorrect

Both Fusion Middleware Control and Oracle Web Cache Manager display the request filters in the following order:

1. Privileged IP
2. Client IP
3. Method
4. URL
5. Header
6. Query String
7. Format

Instead, Oracle Web Cache processes the filters in the following order, where the Header request filter follows the Client IP filter:

1. Privileged IP

2. Client IP

3. Header

4. Method

5. URL

6. Query String

7. Format

For example, a deny by the Header filter type would occur before a deny by the Method or URL filter.

Part IV

Oracle WebLogic Server

Part IV contains the following chapters:

11

Oracle WebLogic Server

This chapter describes issues associated with Oracle WebLogic Server. It includes the following topics:

- Section 11.27, "Protocols Issues and Workarounds"

- Section 11.28, "RMI-IIOP Issues and Workarounds"

- Section 11.29, "Security Issues and Workarounds"

- Section 11.30, "SNMP Issues and Workarounds"

- Section 11.31, "Spring Framework on WebLogic Server Issues and Workarounds"

- Section 11.32, "System Component Architecture (SCA) Issues and Workarounds"

- Section 11.33, "Upgrade Issues and Workarounds"

- Section 11.34, "Web Applications Issues and Workarounds"

- Section 11.35, "WebLogic Server Scripting Tool (WLST) Issues and Workarounds"

- Section 11.36, "Web Server Plug-Ins Issues and Workarounds"

- Section 11.37, "Web Services and XML Issues and Workarounds"

- Section 11.38, "WebLogic Tuxedo Connector Issues and Workarounds"

- Section 11.39, "Documentation Errata"

> **Note:** For a list of bugs that are fixed in WebLogic Server 11*g* Release 1 (10.3.3), enter the following document ID in the Search Knowledge Base field. You must enter the entire document ID.
>
> 1080299.1
>
> The 10.3.3 list includes bugs that were fixed in the WebLogic Server 10.3.1, 10.3.2, and 10.3.3 releases.
>
> The same list is also stored in your WebLogic Server installation in the following location:
>
> *WL_HOME*/bugsfixed/bugsfixed.htm

11.1 General Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.1.1, "Oracle WebLogic Server Version Number"

- Section 11.1.2, "Oracle ojdbc14.jar File Has Been Changed to ojdbc6.jar"

- Section 11.1.3, "Strong Password Enforcement May Cause Issues With WLST Offline Scripts"

- Section 11.1.4, "In Turkish Locale, MDS Initialization Fails"

- Section 11.1.5, "Administration Server Reports a 'Too Many Open Files' Message on the Enterprise Manager Console"

- Section 11.1.6, "Increase MaxPermSize"

11.1.1 Oracle WebLogic Server Version Number

Oracle Fusion Middleware 11*g* contains Oracle WebLogic Server 11*g*. The version number of Oracle WebLogic Server is 10.3.3.

11.1.2 Oracle ojdbc14.jar File Has Been Changed to ojdbc6.jar

The Oracle `ojdbc14.jar` file has been changed to `ojdbc6.jar`, for use with JDK 5 or 6. As a result, any explicit references you make to `ojdbc14.jar` must be changed to `ojdbc6.jar`.

11.1.3 Strong Password Enforcement May Cause Issues With WLST Offline Scripts

With the implementation of strong password enforcement (8 character minimum with one numeric or special character) in this release of WebLogic Server, existing scripts could potentially encounter issues.

Workaround

Use either of the following workarounds to bypass the new password restrictions.

- Set the `BACKWARD_COMPAT_PW_CHECK` environment variable to `true`.

- Include the `-Dbackward.compat.pw.check=true` option when invoking WLST.

Oracle recommends that you change passwords to comply with the new password requirements, as this variable and option will be removed in a future release of WebLogic Server.

11.1.4 In Turkish Locale, MDS Initialization Fails

Any applications that use an MDS repository cannot be deployed or run with the JAXB version bundled with WebLogic Server as null values are returned for attributes named `id`.

Workaround

Start the server in English locale.

11.1.5 Administration Server Reports a 'Too Many Open Files' Message on the Enterprise Manager Console

The WebLogic Server Administration Server reports a `Too Many Open Files` message on the Enterprise Manager console when the maximum number of file descriptors configured for the Administration Server is less than 65535.

Workaround

Increase the number of file descriptors within the shell and restart the WLS Administration Server within that shell. The command to increase the number of file descriptors (nofiles) differs across Operating Systems and shells but it's usually done with the ulimit command on UNIX platforms so consult the man pages for `ulimit`.

For example:

```
$ ulimit -n 65535
```

11.1.6 Increase MaxPermSize

You may need to increase the `MaxPermSize` parameter based on application requirements.

11.2 Administration Console Issues and Workarounds

This section describes the following issues and workarounds:

11.2.1 Cached JDBC Information is not Displayed

Information about cached JDBC statements is not displayed on the JDBC Monitoring pages.

11.2.2 Pressing Browser Back Button Discards Context

After a page flow completes in the Administration Console, it forwards to a different page, typically a table.

Pressing the browser Back button at this point results in an attempt to load the last JSP file in the completed assistant. At this point, all of the context for this assistant is discarded.

Workaround

Oracle recommends that you do not use the browser Back button to step back into an assistant once changes are cancelled or finished, and that you do not go back to a previous step in an assistant. Instead, use the navigation links and buttons in the Administration Console.

11.2.3 Unsupported Work Manager Configurations Can Be Created

The Administration Console permits the creation of Work Manager configurations that are not supported and do not function as intended. Incorrect Work Manager configurations may result in a number of exceptions being recorded in the server logs, most commonly `'Validation problems were found'` exceptions while parsing deployment descriptors.

Workaround

Follow the guidelines described in the online help for Work Manager configurations. Specifically, you can only assign one request class to any given Work Manager, and that request class must be of the same or a broader scope than the Work Manager. You should not assign an application-scoped request class to a global Work Manager, and you should not create more than one application-scoped request class for an application-scoped Work Manager.

Correcting the Work Manager configurations to match the documented constraints resolves these issues.

11.2.4 Server Status Table Reflects Inconsistent Information

The Server Status table on the **Cluster: Monitoring: Summary** page includes two default columns: **Primary** and **Secondary Distribution Names**. These fields do not always reflect all of the replication statistics that are collected and displayed on the **Cluster: Monitoring: Failover** page, depending on the replication scenario.

Please refer to the **Cluster: Monitoring: Failover** page for definitive information.

11.2.5 Exceptions When Defining a Security Policy for an EJB

When defining security policies in the Administration Console for an EJB deployment that references types defined in a separate library deployment, exceptions can be observed if that library deployment is not available to the Console.

Workaround

All library deployments should be targeted at the WebLogic Server Administration Server as well as any Managed Servers needed to support referencing applications. This will ensure that when defining policies, the Console will have access to those library deployments so that referenced types can be class-loaded as needed.

11.2.6 Administration Console Does Not Always Reflect External Changes Made in a Deployment Plan

The Administration Console does not always reflect external changes made in a deployment plan. If a change is made in a deployment plan outside of the Console (for example, using Workshop, editing the plan text files directly, or updating a deployment with a new plan using WLST or webLogic.Deployer) while a Console user is also viewing that deployment plan, the Console user will not see those changes.

Workaround

Navigate to a configuration page for a different deployment, then navigate back to the original deployment again.

11.2.7 Oracle OCI Driver Support

The Oracle OCI driver is no longer explicitly listed as a preconfigured driver type in the Administration Console.

Workaround

The Oracle OCI driver remains a supported driver for application data connectivity, consistent with prior releases of Oracle WebLogic Server. However, users must now specify all required configuration properties manually, including the data base username.

11.2.8 Web Services WSDL Tab Has Been Removed

Prior to WebLogic Server 10.3.3, you could view the WSDL for the current Web service by selecting the **Configuration > WSDL** tab. The **WSDL** tab has been removed as of WebLogic Server 10.3.3. To view the WSDL for the current Web service, select the **Testing** tab, expand the name of the Web service to view its test points, and click **WSDL**.

11.2.9 Data Takes a Long Time to Display on the Metric Browser Tab

When using Internet Explorer 7 (IE 7) to display data on the Metric Browser tab of the Monitoring Dashboard, it takes an unusually long time for the data to display, and during this time, the page is unresponsive. The amount of time it takes to display data on this tab depends on the size of the domain.

Workaround

If you need to display data on the Monitoring Dashboard > Metric Browser tab, open the Administration Console in a supported web browser other than IE 7, such as Internet Explorer 8 or greater, Firefox 3 or greater, or Safari 4 or greater.

11.3 Apache Beehive Support Issues and Workarounds

There are no known Apache Beehive Support issues in this release of WebLogic Server.

11.4 Clustering Issues and Workarounds

There are no known Clustering issues in this release of WebLogic Server.

11.5 Configuration Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.5.1, "Directory For a Non-Existent Server Name Is Created"
- Section 11.5.2, "Abnormal Behavior in Terminal Window After Entering WebLogic Password"

11.5.1 Directory For a Non-Existent Server Name Is Created

If you attempt to connect to the WebLogic Server Administration Server with a non-existent server name, a directory for the non-existent server name is created under the *domain_name*/servers directory.

Workaround

Specify a valid server name when connecting to the Administration Server.

11.5.2 Abnormal Behavior in Terminal Window After Entering WebLogic Password

After pressing Ctrl-C to terminate the startManagedWebLogic.sh process immediately after entering the WebLogic password, abnormal behavior may be experienced in the terminal window. For example, when pressing Return, the prompt is tabbed instead of going to the next line, and any characters that are entered at the prompt are not displayed in the terminal.

Workaround

Either close the current xterm and start a new one, or enter stty echo into the xterm.

11.6 Connector (Resource Adapter) Issues and Workarounds

This section describes the following issue and workaround:

11.6.1 No available router to destination Message is Displayed When Attempting to Connect to the Administration Server from WLST

When trying to connect to the WebLogic Server Administration Server from WLST using `localhost` as the host name, the following message may be displayed if the listen-address attribute of the Administration Server has been restricted to certain IP addresses:

```
 javax.naming.CommunicationException [Root exception is
java.net.ConnectException : <t3://HOST:PORT> : Destination unreachable;
nested exception is: java.net.ConnectException: Connection refused; No
available router to destination
```

Workaround

Use either of the following workarounds:

- Check that the listen-address attribute of the Administration Server has been set correctly in the domain configuration file. You can either remove the `listen-address` line or simply comment it out. Oracle recommends that you comment it out in case you need to know the value at a later time. For example, in the domain configuration file:

```
<server>
   <name>AdminServer</name>
   <ssl>
   .
   .
   .
   </ssl>
   <machine>machine_name</machine>
   <!-- listen-address>machine_ip_address</listen-address -->
</server>
```

- Use the host name of the Administration Server, instead of `localhost`, in the WLST `connect` command.

11.7 Console Extensions Issues and Workarounds

There are no known Extensions issues in this release of WebLogic Server.

11.8 Core Server and Core Work Manager Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.8.7, "Servers Configured to Listen on a Hostname Are Listening on a Different Hostname After Startup"

- Section 11.8.8, "Administration Server or Node Manager Cannot Track the Status of a Managed Server"

- Section 11.8.9, "Multicast Traffic Observed to be Unreliable During or After a Network Partition"

11.8.1 Threads Become Stuck While Waiting to Get a Connection

When a machine that is hosting one of the Managed Servers is abruptly shut down, a network cable is pulled, or its network interface card has issues, and any server attempts communication with that managed server, threads become stuck waiting to get a connection.

Workaround

This can currently be resolved by using a private flag:

```
-Dweblogic.client.SocketConnectTimeoutInSecs
```

and setting an appropriate timeout value that will release the thread attempting to make the connection and allow the request to fail quickly.

11.8.2 Using IPv6-Formatted Addresses

When using an IPv6-formatted address for WebLogic Server, the URL should include square brackets ('[' and ']') for the host address. Otherwise, WLST may fail to connect to the running server.

Workaround

Add square brackets to the host address. For example:

```
t3://[fe80:0:0:0:203:baff:fe2f:59e5]:9991
```

11.8.3 Change in Ipv6 Support

Prior to HP SDK 1.6.0.03, the default protocol stack was IPv4. Starting with HP SDK 1.6.0.03, the default protocol stack is now IPv6. See http://docs.hp.com/en/JDKJRE60RN/jdk_rnotes_6.0.03.html#ipv6.

Workaround

To switch to IPv6, use the following command:

```
-Djava.net.preferIPv4Stack="false"
```

11.8.4 Server Cannot Be Started After a Whole Server Migration

If the WebLogic Server Administration Server is down when a Whole Server Migration occurs for a clustered server, and the server migrates to a machine on which it was never run before, the server cannot be started on the new machine.

Workaround

Use one of the following workarounds for this issue:

- Ensure that the Administration Server is up when the server migration is being performed.

- Use a shared disk/NFS for all the migratable servers in the cluster.

11.8.5 Object State is not Retained After Renaming Field

When FastSwap is enabled in a J2EE application, you can make certain types of changes to Java classes during development and expect to see the change without re-deploying, with all instance states of the Java object being retained.

One type of change that does NOT retain the object state is that when a field name is changed, it is treated as follows:

- the field with old name is deleted

- the field with new name is added

Thus, in this case, any state in the old field is not carried over to the renamed field.

Using the Workshop or FastSwap ant task, you may see a `FastSwap operation completed successfully` message, even when an instance field name change causes a value reset.

Workaround

You should expect an instance value to be reset when you change a field name.

11.8.6 Forcing Unicast Messages To Be Processed in Order

The following conditions can cause very frequent JNDI updates, and as a result, JMS subscribers may encounter a `java.naming.NameNotFoundException`:

1. Unicast messaging is being used for cluster communication.

2. The JMS topic connection is set with `setReconnectPolicy("all")`.

3. JMS durable subscribers on topic are created and removed very frequently.

Workaround

To fix this issue, a new property, `MessageOrderingEnabled`, has been added to the `ClusterMBean`. This property forces unicast messages to be processed in strict order. By default, this property is not enabled. To enable the property, add the following line manually to the `<cluster>` element in `config.xml`.

```
<message-ordering-enabled>true</message-ordering-enabled>
```

11.8.7 Servers Configured to Listen on a Hostname Are Listening on a Different Hostname After Startup

When using a hostname to specify configuring the listen address on the WebLogic Server Administration Server or a Managed Server, machines that are configured with multiple Ethernet cards may listen on a different hostname after startup. For example:

- The machine has 3 Ethernet cards

- Card 1 is mapped to `hostname1-s` (DNS registered hostname)

- Card 2 is mapped to `hostname1-i` (DNS registered hostname)

- Card 3 is mapped to `hostname1` (actual node's hostname)

- You configure the server to listen on `hostname1`

- After starting the server, it is listening on `hostname1-s` because Windows resolves the actual node's hostname to the first enabled Ethernet card address

Workaround

Use one of the following three workarounds for this issue:

1. Use the IP address, instead of the hostname, as the listen address of the WebLogic Server Administration Server. On Managed Servers, use the IP address as the listen address, or configure the actual physical hostname to the first Ethernet card in the machine.

2. Add the following entry to the C:\Windows\system32\drivers\etc\hosts file on the machine:

   `<ip_address> <hostname>`

3. Change the order of the network cards in the machine so that the card with the actual node's hostname is Card 1.

11.8.8 Administration Server or Node Manager Cannot Track the Status of a Managed Server

If you start a managed server by providing an incorrect WebLogic Server Administration Server URL from the command line (that is, the Administration Server cannot be reachable at the provided URL), the managed server will start in Managed Server Independence (MSI) mode.

In this case, neither the Administration Server nor Node Manager can track the status of the managed server. The Administration Console will show the status of the managed server as UNKNOWN, but the server will actually be RUNNING in MSI mode.

11.8.9 Multicast Traffic Observed to be Unreliable During or After a Network Partition

During or after a network partition that causes a server migration to take place, multicast traffic has been observed to be unreliable. For example, one node may be receiving multicast traffic, but traffic originating from this node is not received on other nodes in the network. As a result, the migrated servers are not added to the cluster because their heartbeats were not received.

Workaround

Currently, the only known workaround is to use unicast cluster messaging.

11.9 Deployment Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.9.1, "security-permission Element is not Available in weblogic-application.xml"

- Section 11.9.2, "Extraneous String Values Interpreted as File Specification"

- Section 11.9.3, "java.lang.NoClassDefFoundError is Displayed"

- Section 11.9.4, "The restore Method Does Not Update the DConfig Bean With Plan Overrides"

- Section 11.9.5, "config-root <directory> not found Warning Is Displayed When Applying a Plan"

- Section 11.9.6, "Application State Is Not Updated If the Server Starts in MSI Mode"
- Section 11.9.7, "Attempting to Redeploy an Application Fails if the Application is Already Deployed Using a Different Source File Location"

11.9.1 security-permission Element is not Available in weblogic-application.xml

The `security-permission` element is available in the `weblogic.xml` and `weblogic-ejb-jar.xml` deployment descriptors, but is not available in the `weblogic-application.xml` descriptor. Therefore, in an Enterprise application, you can only apply security policies to JAR files that are EJBs or Web applications.

11.9.2 Extraneous String Values Interpreted as File Specification

The weblogic.Deployer tool interprets any extraneous string values between command-line arguments as a file specification. For example, if you enter the command:

```
java weblogic.Deployer -activate -nostage true -name myname
-source c:\myapp\mymodule
```

the tool attempts to activate a file specification named true, because the `-nostage` option takes no arguments and `true` is an extraneous string value.

11.9.3 java.lang.NoClassDefFoundError is Displayed

While using the WebLogic Server Administration Console with applications or EJBs deployed on a Managed Server that depend on a deployed library, you may encounter a `java.lang.NoClassDefFoundError`.

Workaround

The WebLogic Server Administration Console needs access to any shared library deployments so that Java data types and annotations can be processed. Therefore, all shared library deployments should always be targeted to the WebLogic Server Administration Server in addition to any Managed Servers or clusters.

11.9.4 The restore Method Does Not Update the DConfig Bean With Plan Overrides

The restore method does not correctly update the DConfig Bean with the plan overrides. For example, given the following steps:

```
DeployableObject dObject =
   WebLogicDeployableObject.createDeployableObject(new File(appName));
DeploymentConfiguration dConfig =
   WebLogicDeploymentManager.createConfiguration(dObject);
dConfig.restore(new FileInputStream(new File(plan)));
```

the plan does not correctly override the DConfig Bean.

Workaround

Specify the plan when initializing the configuration for the application. For example:

```
helper = SessionHelper.getInstance(
    SessionHelper.getDisconnectedDeploymentManager());
helper.setApplication(app);
helper.setPlan(new File(plan));
helper.initializeConfiguration();
```

11.9.5 config-root *<directory>* not found Warning Is Displayed When Applying a Plan

If you use the Administration Console to make configuration changes to an application, a deployment plan will be generated. If external descriptors are generated as part of the deployment plan, they are placed in the config root plan directory. This directory will be set in the deployment plan 'config-root' attribute.

If no external descriptors are required, the config root directory will not be created, and a warning is displayed when you apply the deployment plan. This results in the following warning in the server output:

```
<Warning <WWebLogicDescriptorWL> <BEA-2156000><"config-root" C:\deployments\plan
was not found>.
```

Workaround

Create the plan directory manually.

11.9.6 Application State Is Not Updated If the Server Starts in MSI Mode

A managed server will start in MSI mode if the WebLogic Server Administration Server is not available when the managed server starts. If you start the Administration Server later, the managed server will connect to the Administration Server. However, the state of each application deployed to the managed server is not updated to reflect the state of the applications on the managed server. Each application's state is displayed as NEW or PREPARED in the WebLogic Server Administration Console.

Workaround

There are two workarounds for this issue:

- Start the Administration Server before starting the managed server, or
- Redeploy the application after starting the Administration Server.

11.9.7 Attempting to Redeploy an Application Fails if the Application is Already Deployed Using a Different Source File Location

If you initially deployed an application using one source file location, then attempt to redeploy the application using a new location for the source file, the deployment fails with the following exception:

```
New source location <new_source_file_path> cannot be configured deployed to
configured application, <application_name>. The application source is at
original_source_file_path. Changing the source location is not allowed for a
previously attempted deployment. Try deploying without specifying the source.
```

This is due to a WebLogic Server deployment restriction. Once you specify the source file for a deployment, you cannot change it on a redeployment.

Workaround

Undeploy the application before attempting to redeploy it using a new source file location.

11.10 EJB Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.10.1, "Primary Key in Oracle Table is CHAR"

11.10.1 Primary Key in Oracle Table is CHAR

The primary key in an Oracle table is a CHAR but the query field in the SQL table is a VARCHAR2.

Workaround

Change the database schema from CHAR to VARCHAR2. Using CHAR as a primary key is not recommended for the Oracle database.

11.10.2 No Available Annotation That Enables Creation of a Clusterable Timer

There is no annotation for EJB3 beans or `Ejbgen` that enables creation of a clusterable timer.

Workaround

Create a weblogic-ejb-jar.xml file and put the `<timer-implementation>` element and corresponding values into the file.

11.10.3 Kodo's MappingTool Cannot Generate Schemas

Kodo's MappingTool cannot generate schemas for classes that use BLOBs in their primary key. BLOBs can be used in a primary key, but the schema must be defined manually. Note that support for BLOB columns in primary keys is not mandated by either the JDO or JPA specifications.

11.10.4 Extensions to the JPA Metadata Model Can Only Be Specified Via Annotations

Extensions to the JPA metadata model can only be specified via annotations, and not via a structure similar to the orm.xml file defined by the specification.

Workaround

To specify Kodo-specific metadata for your object model, either:

- use the Kodo-specific annotations, or
- convert your XML-based metadata to the JDO metadata format, which does support XML specification of extensions.

11.10.5 Lookup Method Injection Not Supported by Spring

The Weblogic Spring injection extension model doesn't support lookup method injection.

11.10.6 Deserializing a JDO PersistenceManagerFactory in a Managed Environment May Fail

Deserializing a JDO `PersistenceManagerFactory` in a managed environment may fail. The exception states that the `javax.jdo.PersistenceManagerFactoryClass` property is missing. Note that serializing a `PersistenceManagerFactory` should not generally be necessary in a managed environment.

11.10.7 Indexes Not Always Created During Schema Creation

Indexes declared at the class level are not always created during schema creation.

Workaround

Create the indexes manually after running the schema generation tools.

11.10.8 OpenJPA throws an exception when @Id fields are also annotated as @Unique

OpenJPA throws an exception when `@Id` fields are also annotated as `@Unique` in some databases. Database primary keys are unique by definition. Some databases implement this by creating a unique index on the column.

Workaround

Do not specify both `@Id` and `@Unique` on a single field.

11.10.9 Cache Hit and Miss Counts May Rise Unexpectedly

The cache hit and miss counts may rise unexpectedly when manipulating entities without version data. The extra cache access occurs when the EntityManager closes and all contained entities are detached. Entities without version fields appear to the system to be missing their version data, and the system responds by checking their version in the cache before detachment.

Workaround

Entities with version fields or other version strategies do not cause extra cache access.

11.10.10 Open JPA Tries to Create a Table Even if the Table Exists

When using the MySQL database, and OpenJPA is configured to automatically run the mapping tool at runtime and create tables within the default schema (for example):

```
<property name='openjpa.jdbc.SynchronizeMappings' value='buildSchema'/>
<property name='openjpa.jdbc.Schema' value='MySQL database name' />
```

OpenJPA will try to create the table even if the table already exists in the database. A PersistenceException will be thrown to indicate that the table already exists and the table creation statement fails.

Workaround

To avoid this problem, if you are using the MySQL database, don't configure OpenJPA to automatically run the mapping tool at runtime and specify the default schema at the same time.

11.10.11 EJB Applications Fail During Serialization

EJB applications that use IIOP and send JPA entities from the server to the client will fail during deserialization if the entities are Serializable (but not Externalizable) and do not declare a `writeObject()` method.

Workaround

Add a `writeObject()` method to such entity classes. The write object can be trivial:

```
private void
writeObject(java.io.ObjectOutputStream out)
   throws IOException {
  out.defaultWriteObject();
}
```

11.10.12 Non-Transactional Message-Driven Bean Container Can Fail to Provide Reproducible Behavior For Foreign Topics

When using multi-threaded processing for non-transactional topic Message-Driven Beans (MDBs) that specify a foreign topic (non-WebLogic) JMS, the MDB container can fail to provide reproducible behavior. For example, if a `runtimeException` is thrown in the `onmessage()` method, the container may still acknowledge the message.

Workaround

Set the `max-beans-in-free-pool` attribute to 1 in the deployment descriptor.

11.11 Examples Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.11.1, "Security Configuration in medrec.wls.config"
- Section 11.11.2, "HTML File not Created for StreamParser.java File"
- Section 11.11.3, "Warning Message Appears When Starting Medrec or Samples Domain"

11.11.1 Security Configuration in medrec.wls.config

The `medrec.wls.config` target in *SAMPLES_HOME*/server/medrec/setup/build.xml has a known issue with respect to security configuration.

11.11.2 HTML File not Created for StreamParser.java File

The `../xml/stax` example contains two files with the same root but different extensions: `StreamParser.java` and `StreamParser.jsp`. The samples viewer build, however, creates just one corresponding HTML file, rather than two for each type of file. In this case only the `StreamParser.jsp` file has an equivalent HTML file; the `StreamParser.java` file does not.

The problem occurs because of a setting in the build.xml file that controls the behavior of `java2html` to generate the files for the documentation.

When using `java2html`, the `useShortFileName="true"` parameter crops off the file extensions for the source files to create the file names for the HTML output files. If two files have the same name and different file extensions, whichever HTML file is generated last will overwrite previous ones.

Workaround

Set the `useShortFileName` parameter to "false". This setting generates HTML files with the file extensions included in the name. The drawback to this solution is that every link that points to the HTML output file needs to be revised, regardless of whether the files in question were affected by the bug.

11.11.3 Warning Message Appears When Starting Medrec or Samples Domain

When you start the medrec or samples domains, you may see a warning message similar to this:

```
<Warning> <WorkManager> <BEA-002919> <Unable to find a WorkManager with name
weblogic.wsee.mdb.DispatchPolicy. Dispatch policy
weblogic.wsee.mdb.DispatchPolicy will map to the default WorkManager for the
application bea_wls_async_response>
```

This warning message appears in the standard output of the Console while starting a WebLogic Server sample application with an asynchronous Web Service deployed.

Workaround

The warning is harmless and can be ignored.

11.12 HTTP Publish/Subscribe Server Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.12.1, "Authentication and Authorization of the Local Client is not Supported"

- Section 11.12.2, "Event Messages Published by Local Clients Cannot Be Received"

- Section 11.12.3, "Event Messages Published By Local Clients Do Not Go Through Filters"

11.12.1 Authentication and Authorization of the Local Client is not Supported

The HTTP Publish/Subscribe server does not support authentication and authorization of the local client. The local client has full permissions to operate on channels of the HTTP Publish/Subscribe server, which means the local client can create/delete channels and publish/subscribe events from channels.

11.12.2 Event Messages Published by Local Clients Cannot Be Received

In a clustering environment, event messages published by a local client on a server can be received only by subscribed clients connected to the same server. These messages cannot be received by subscribed clients connected to other servers in the cluster.

11.12.3 Event Messages Published By Local Clients Do Not Go Through Filters

Event messages published to a channel by a local client will not go through the Message Filters configured to that channel.

11.13 Installation Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.13.1, "Issue with Oracle WebLogic Server Upgrade Installation"
- Section 11.13.2, "Improper Rollback to Previous Installation May Occur After Exiting an Upgrade Installation Prematurely"
- Section 11.13.3, "Installation Fails with Fatal Error"

11.13.1 Issue with Oracle WebLogic Server Upgrade Installation

The Oracle WebLogic Server 11*g* Release 1 installer does not download the Sybase JDBC drivers. When you try to upgrade an existing WebLogic Server 10.3 installation using the latest installer, it does not remove the Sybase JAR files from the original installation. The installer upgrades only the weblogic.jar file.

The Sybase JAR files (jconn2.jar, jconn3.jar, and jConnect.jar) in the /server/lib or /server/ext/jdbc/sybase directories are removed from the manifest classpath in the upgraded weblogic.jar file. Therefore, if the classpath of a WebLogic Server application does not include Sybase JAR files and only includes weblogic.jar then after the upgrade installation, the application will throw a ClassNotFoundException.

To work around this issue, explicitly add Sybase JAR files in the WebLogic Server application classpath.

11.13.2 Improper Rollback to Previous Installation May Occur After Exiting an Upgrade Installation Prematurely

When using an Upgrade installer or Smart Update to upgrade an existing WebLogic Server 10.3.x installation to WebLogic Server 10.3.3, if you abort the upgrade before completion, the installation should automatically roll back to the prior installation. This may not always occur, resulting in an unusable installation.

11.13.3 Installation Fails with Fatal Error

The installer does not verify whether sufficient disk space is available on the machine prior to completing the installation. As a result, if an installation cannot be completed due to insufficient space, the installer displays the following error message and exits:

```
Fatal error encountered during file installation. The installer will now
cleanup and exit!
```

Workaround

If this problem occurs, restart the installer using the following command:

```
server103_linux32.bin -log=log.out -log_priority=debug
```

The preceding command generates a log of the installation procedure, providing details about the exact cause of the failure. If the cause is indeed insufficient space, the log file indicates it explicitly.

11.14 Java EE Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.14.1, "FastSwap May Relax the Access Modifiers of Fields and Methods"

- Section 11.14.2, "FastSwap Does Not Support Redefinition of the Entity Bean and ejbClass"

- Section 11.14.3, "Classpath Order Is Not Guaranteed When There Are Multiple JARs in an EAR File"

11.14.1 FastSwap May Relax the Access Modifiers of Fields and Methods

FastSwap may relax the access modifiers of fields and methods. Private and protected members may be made public at runtime. This changes the behavior of reflection and may affect reflection-based frameworks such as Struts.

11.14.2 FastSwap Does Not Support Redefinition of the Entity Bean and ejbClass

FastSwap does not support redefinition of the Entity bean and ejbClass (Session/MDB). Therefore, any updates to entity classes will cause redefinition errors.

Workaround

After updating an entity class, redeploy the application.

11.14.3 Classpath Order Is Not Guaranteed When There Are Multiple JARs in an EAR File

When you have an EAR file containing separate JAR files, and two or more of those JAR files have a class with the same name, it is not possible to predict from which of those JAR files WebLogic Server will instantiate the class. This is not an issue if the classes are the same, but if they are different implementations, the results are unpredictable.

Workaround

Currently there is no known workaround for this issue.

11.15 JDBC Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.15.1, "Queries Can Take Longer When Using Data Direct 4.0 MSSQL Driver"

- Section 11.15.2, "An Attempt to Access a Remote 10.3.2 or Later WLS Data Source Configured With the 1PC, Emulate XA, or LLR Global Transaction Option Fails"

- Section 11.15.3, "SQLException Occurs When Retrieving an NClob Object From an Oracle Database"

- Section 11.15.4, "Issues When Using WLCachedRowSet to Update NClob Data or Get NClob Objects"

- Section 11.15.5, "BLOB Data Is Not Updating in the Database"

11.15.1 Queries Can Take Longer When Using Data Direct 4.0 MSSQL Driver

In WebLogic Server Release 10.3.2, our OEM DataDirect drivers were upgraded to 4.0. In order for the SQLServer driver to fully handle new DBMS data types, when running in it's default configuration, queries will take longer. If application access to new data types can be limited to `getString()`, the following configuration workarounds will restore the performance.

Workaround

Add the following driver property to the list of driver properties for the WebLogic data source's connection pool. From the Administration Console, select the **Configuration>Connection Pool** tab for the data source.

For a non-XA connection pool, add:

`ReportDateTimeTypes=false`

For an XA connection pool, add:

`ExtendedOptions=ReportDateTimeTypes=false`

Alternatively, you can accomplish the same result by adding the property to the data source's XML configuration file.

For non-XA:

```
<jdbc-driver-params>
   <properties>
      <property>
        <name>ReportDateTimeTypes</name>
        <value>false</value>
      </property>
```

For XA:

```
<jdbc-driver-params>
   <properties>
      <property>
        <name>ExtendedOptions</name>
        <value>ReportDateTimeTypes=false</value>
      </property>
```

11.15.2 An Attempt to Access a Remote 10.3.2 or Later WLS Data Source Configured With the 1PC, Emulate XA, or LLR Global Transaction Option Fails

A new system property, `-Dweblogic.jdbc.remoteEnabled`, has been added to JDBC in Oracle WebLogic Server 10.3.2. For compatibility with prior releases of WebLogic Server, the default setting of this property is `true`. When this property is set to `false`, remote JDBC access is turned off, and such access via a remote client will result in an exception.

System Limitation

When the `-Dweblogic.jdbc.remoteEnabled` option, which is available in WebLogic Server 10.3.2 or later, is set to `false`, any attempt to access a non-XA data

source with a transaction option of LLR, 1PC or Emulate XA on multiple WebLogic Server instances in a global transaction will fail.

Notes: A 1PC, Emulate XA, or LLR participant in a global transaction that is hosted locally on the transaction coordinating server will continue to work. This can sometimes be accomplished by optimizing your applications to use connection instances directly hosted on the coordinator as described in "Optimizing Performance with LLR" in *Oracle Fusion Middleware Programming JTA for Oracle WebLogic Server*.

It may not be possible to optimize an application to use connection instances directly hosted on the coordinator. For example, an MDB that receives messages from a remote WebLogic JMS server will always use a remote coordinator.

Workaround

Change the data source to use XA instead. This may lower performance.

11.15.3 SQLException Occurs When Retrieving an NClob Object From an Oracle Database

When using a `JdbcRowSet` object to retrieve an `NClob` object from an Oracle database via the Oracle Thin driver, the following SQLException occurs:

```
Incorrect form of use to create NCLOB.
```

As a result, the `NClob` object cannot be retrieved.

11.15.4 Issues When Using WLCachedRowSet to Update NClob Data or Get NClob Objects

When using WLCachedRowSet, the following two issues have been seen:

- An `Object has been closed` SQL exception occurs when updating the NClob data in a `Rowset` object.

- A `This column cannot be converted to a NClob` SQL exception occurs when getting NClob objects from `WLCachedRowSet` objects.

11.15.5 BLOB Data Is Not Updating in the Database

When using MSSQL and using the `updateBlob()` and `updateBinaryStream()` methods to update BLOB data in `RowSet` objects, the data is not being updated in the database.

11.16 JDK Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.16.1, "stopWebLogic.sh Command Exposes Password"

11.16.1 stopWebLogic.sh Command Exposes Password

The WebLogic Server system password may appear in clear text while prompted for userid and password when using the `stopWebLogic.sh` command.

Workaround

Do one of the following:

- Include `$JAVA_VM` in the java command of the stopWeblogic.sh script.

- Include `-d64` in the java command of the stopWeblogic.sh script if you are using a 64-bit HP JDK.

11.17 JMS Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.17.1, "Deployment Descriptor Validation Fails"

- Section 11.17.2, "Exception When Multiple Producers Use the Same Client SAF Instance"

- Section 11.17.3, "Multi-byte Characters are not Supported in Store File and Directory Names"

- Section 11.17.4, "Generation of the Default UOO Name Has Changed"

- Section 11.17.5, "Testing Abrupt Failures of WebLogic Server When Using File Stores on NFS"

- Section 11.17.6, "JMS Message Consumers Will Not Always Reconnect After a Service Migration"

11.17.1 Deployment Descriptor Validation Fails

Deployment descriptor validation fails when descriptor validation is enabled, and an EAR file contains only JMS modules.

Workaround

Make sure that there is at least one J2EE specification-compliant module in the EAR.

11.17.2 Exception When Multiple Producers Use the Same Client SAF Instance

When multiple JMS producers use the same JMS Client SAF instance (within a single JVM), depending on the timing of the JMS SAF client creation, you might receive the following exception:

```
Error getting GXA resource [Root exception is weblogic.jms.common.JMSException:
weblogic.messaging.kernel.KernelException: Error getting GXA resource]
```

Workaround

When using multiple JMS SAF client producers, try introducing a small delay between the creation of each new client.

11.17.3 Multi-byte Characters are not Supported in Store File and Directory Names

There is no support for multi-byte characters in WebLogic Store file and directory names. For instance, when the WebLogic Server name has multi-byte characters, the default store cannot be created, and WebLogic Server will not boot.

Workaround

Create WebLogic Server instances without multi-byte characters in the path name and use that path name for the default store configuration. Do not use multi-byte characters in the Weblogic Server name.

11.17.4 Generation of the Default UOO Name Has Changed

WebLogic Server 10.3.3 contains a fix for configurations that set a default unit-of-order (UOO) on a JMS regular destination, distributed destination, or template. This fix ensures that the default unit-of-order name stays the same even after a restart of the destination's host JMS server. The default UOO name is now based on the domain, JMS server, and destination names.

11.17.5 Testing Abrupt Failures of WebLogic Server When Using File Stores on NFS

Oracle strongly recommends verifying the behavior of a server restart after abrupt machine failures when the JMS messages and transaction logs are stored on an NFS mounted directory. Depending on the NFS implementation, different issues can arise post failover/restart. For more information, see Section 6.3, "Testing Abrupt Failures of WebLogic Server When Using File Stores on NFS."

11.17.6 JMS Message Consumers Will Not Always Reconnect After a Service Migration

JMS message consumers will not always reconnect after a service migration when an application's `WLConnection.getReconnectPolicy()` attribute is set to `all`. If the consumers do not get migrated, either an exception is thrown or `onException` will occur to inform the application that the consumer is no longer valid.

Workaround

The application can refresh the consumer either in the exception handler or through `onException`.

11.17.7 Forcing Unicast Messages To Be Processed in Order

Certain conditions can cause very frequent JNDI updates, and as a result, JMS subscribers may encounter a `java.naming.NameNotFoundException`. For more information, see Section 11.8.6, "Forcing Unicast Messages To Be Processed in Order."

11.18 JNDI Issues and Workarounds

There are no known JNDI issues in this release of WebLogic Server.

11.19 JSP and Servlet Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.19.1, "Deployment Plans Cannot Be Used To Override Two Descriptors"

- Section 11.19.2, "Spring Dependency Injection Not Supported on JSP Tag Handlers"

- Section 11.19.3, "503 Error When Accessing an Application With a Valid sessionid"

11.19.1 Deployment Plans Cannot Be Used To Override Two Descriptors

Deployment plans cannot be used to override the following two descriptors during deployment of a Web application or a Web module:
WEB-INF/classes/META-INF/persistence.xml and
WEB-INF/classes/META-INF/persistence-configuration.xml. Deployment plans can otherwise be used to override any descriptor.

Workaround

Package WEB-INF/classes/META-INF/persistence.xml and
WEB-INF/classes/META-INF/persistence-configuration.xml (if present) along with related class files into a JAR file. The JAR file must then be placed in the WEB-INF/lib directory of the Web application or Web module. A deployment plan can be used to override the two descriptors in such a JAR file.

11.19.2 Spring Dependency Injection Not Supported on JSP Tag Handlers

With the Spring extension model enabled, WebLogic Server 10.3 or later does not support Spring Dependency Injection (DI) on JSP tag handlers for performance reasons.

Currently, WebLogic Server supports Spring DI on most Web components, for example, servlets, filters and listeners. Spring DI is not, however, presently supported on JSP tag handlers for performance reasons.

11.19.3 503 Error When Accessing an Application With a Valid sessionid

When a session is persistent and an older version of a servlet context is retired, accessing the application with a valid `sessionid` will cause a 503 error.

For example, the session-persistent type of a versioned Web application is 'file'. A user can access the application successfully. Later, version 2 of the application is redeployed and version 1 is retired. If the same user accesses the application, they will get a 503 error.

11.20 JTA Issues and Workarounds

There are no known JTA issues in this release of WebLogic Server.

11.21 Java Virtual Machine (JVM) Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.21.1, "1.4 Thin Client Applet Cannot Contact WebLogic Server"
- Section 11.21.2, "Using AWT libraries May Cause a JVM Crash"

11.21.1 1.4 Thin Client Applet Cannot Contact WebLogic Server

Due to a known Sun Microsystems VM bug (513552), a 1.4 Thin Client Applet cannot contact WebLogic Server 9.0 or later. This is because the VM does not distinguish correctly between a client and a server connection. The VM creates a server-type connection and caches it. It then attempts to make a client-type connection, finds the cached connection and tries to use that, but then encounters an error because clients are not allowed to use server connections.

Workaround

None. This issue must be resolved by Sun Microsystems.

11.21.2 Using AWT libraries May Cause a JVM Crash

You might encounter a JVM crash when using GUI libraries such as AWT or javax.swing (which often delegates to AWT).

Workaround

Start the server using the following flag:

```
-Djava.awt.headless=true
```

11.22 Monitoring Issues and Workarounds

This section describes the following issue and workaround:

- Section 11.22.2, "The BEA Prefix in Message IDs Will Be Changed in a Future Release"

11.22.1 MBean Attributes Not Explicitly Marked as @unharvestable Appear as Harvestable

The `@unharvestable` tag is not being honored at the interface level. If MBean attributes are not explicitly marked as `@unharvestable`, they are considered to be harvestable and will appear as harvestable in the WebLogic Administration Console.

Workaround

You can explicitly mark MBean attributes as `@unharvestable`.

11.22.2 The BEA Prefix in Message IDs Will Be Changed in a Future Release

In an upcoming release of WebLogic Server, the current default prefix for catalog and non-catalog Message IDs will be changed from the current BEA prefix to WL.

Workaround

You should be prepared for this future change. In the interim, here are some guidelines to consider:

- Avoid depending on BEA for Message ID prefixes in scripts, filter expressions, etc.
- For log messages such as the following:

```
<Jan 30, 2009 12:51:49 AM CST> <Notice> <WebLogicServer> <BEA-000365>
<Server state changed to STARTING>
```

  it is better for you to filter on '000365' and not on the BEA prefix itself.
- Your log parsing scripts should be updated to look for both BEA and WL, instead of filtering only on BEA.

11.23 Node Manager Issues and Workarounds

There are no known Node Manager issues in this release of WebLogic Server.

11.24 Operations, Administration, and Management Issues and Workarounds

There are no known Operations, Administration, and Management issues in this release of WebLogic Server.

11.25 Oracle Kodo Issues and Workarounds

There are no known Oracle Kodo issues in this release of WebLogic Server.

11.26 Plug-ins Issues and Workarounds

This section describes the following issue for various WebLogic Server plug-ins:

■ Section 11.26.1, "apr_socket_connection Exception Occurs When Using the IIS Plug-In"

11.26.1 apr_socket_connection Exception Occurs When Using the IIS Plug-In

Under the following circumstances, the IIS plug-in may not work, resulting in an `apr_socket_connection` error:

1. Both the IIS and Weblogic Server instances are on the same machine.

2. IPv6 is enabled on the machine, but the machine is not in an IPv6 environment (that is, the IPv6 interface is enabled but is not working).

3. The listen address of the WebLogic Server instance is set to the simple host name.

4. Either the directive WebLogicHost or WebLogicCluster is set to the simple host name for the IIS instance.

11.27 Protocols Issues and Workarounds

There are no known Protocols issues in this release of WebLogic Server.

11.28 RMI-IIOP Issues and Workarounds

This section describes the following issue and workaround:

■ Section 11.28.1, "Ant 1.7 rmic Task Incompatibility"

11.28.1 Ant 1.7 rmic Task Incompatibility

Calls to the Ant version 1.7 `rmic` task automatically add a `-vcompat flag`, which is not compatible with `rmic` for Oracle WebLogic Server.

Workaround

Use either of the following workarounds if your rmic call is of the form:

```
rmic classname="com.bea.crmsimulation.legacyra.LegacyAdapter"
   base="${module_location}/core-legacy-ra/classes"
   classpath="${core.classes}" compiler="weblogic" />
```

■ Add a `stubversion`

```
<rmic classname="com.bea.crmsimulation.legacyra.LegacyAdapter"
   base="${module_location}/core-legacy-ra/classes"
```

```
            classpath="${core.classes}" compiler="weblogic"
            stubversion="1.2"/>
```

- Remove the `compiler` flag

```
<rmic classname="com.bea.crmsimulation.legacyra.LegacyAdapter"
    base="${module_location}/core-legacy-ra/classes"
    classpath="${core.classes}"
```

11.29 Security Issues and Workarounds

This section describes the following issues and workarounds:

11.29.1 StoreBootIdentity Works Only if the Appropriate Server Security Directory Exists

The option `-Dweblogic.system.StoreBootIdentity` works only if the appropriate server security directory exists. This directory is usually created by the Configuration Wizard or upgrade tool.

However, the appropriate server security directory could be absent in domains checked into source-control systems.

11.29.2 Connections Requiring a NULL Cipher Will Fail Unless AllowUnencryptedNull Cipher is Set to True

WebLogic Server allows for a NULL cipher to be used with an SSL connection, which results in data not being encrypted.

In WebLogic Server 10.3 or greater, the use of the NULL cipher is now disabled by default. In order for a client to enable the NULL cipher, set the `weblogic.ssl.AllowUnencryptedNullCipher` system property to true. For example:

```
-Dweblogic.ssl.AllowUnencryptedNullCipher=true
```

In WebLogic Server 10.3 or greater, client SSL connections requiring a NULL cipher will fail unless this system property explicitly enables the use of the NULL cipher. For

NULL cipher to be used, you need to enable NULL cipher on both the server side and client side. If not enabled on both sides, the SSL handshake will fail.

11.29.3 Boot Time Failure Occurs With SecurityServiceException

A WebLogic Server instance can experience a boot time failure with a `SecurityServiceException` when the RDBMS Security Data Store is configured for a DB2 database using the DB2 driver supplied with WebLogic Server.

Workaround

When RDBMS Security Data Store is using the `AlternateId` connection property for a DB2 database, you must also set the additional property `BatchPerformanceWorkaround` as `true` when using the DB2 driver supplied with WebLogic Server.

11.29.4 Authentication Failure After Upgrading a Domain From WLS 6.1

After upgrading a domain from WLS 6.1, the WebLogic Server instance will not boot due to an authentication failure.

Workaround

A system user password must be set up in the WLS 6.1 domain before or after the upgrade process in order for the WebLogic Server instance to boot properly.

11.29.5 InvalidParameterException Message Generated and Displayed

After you configure either the Identity Provider or Service Provider services for SAML 2.0 and attempt to publish the SAML 2.0 services metadata file, an `InvalidParameterException` message may be generated and displayed in the Administration Console.

Workaround

When configuring the SAML 2.0 federation services for a WebLogic Server instance, be sure to enable all binding types that are available for the SAML role being configured. For example, when configuring SAML 2.0 Identity Provider services, you should enable the POST, Redirect, and Artifact bindings. When configuring SAML 2.0 Service Provider services, enable the POST and Artifact bindings. Optionally, you may choose a preferred binding.

11.29.6 Default Web Permissions in weblogic.policy Do Not Work

If you define your default Web application permissions in `weblogic.policy`, but your Web application does not have a `weblogic.xml` descriptor file, the default Web permissions will not take effect, and you may see an `AccessControlException`.

Workaround

Add a `weblogic.xml` descriptor file to your application.

11.29.7 Enabling Both the Authentication and Passive Attributes In SML 2.0 Service Provider Services Is an Invalid Configuration

When configuring SAML 2.0 Service Provider services, enabling both the Force Authentication and Passive attributes is an invalid configuration that WebLogic Server is unable to detect. If both these attributes are enabled, and an unauthenticated user

attempts to access a resource that is hosted at the Service Provider site, an exception is generated and the single sign-on session fails.

Note that the Force Authentication attribute has no effect because SAML logout is not supported in WebLogic Server. So even if the user is already authenticated at the Identity Provider site and Force Authentication is enabled, the user is not forced to authenticate again at the Identity Provider site.

Avoid enabling both these attributes.

11.29.8 Authentication May Fail When Group Membership Caching Is Enabled

When configuring any of the authentication providers included in WebLogic Server, setting **Group Membership Searching** to "limited" may result in authentication failures if **Enable Group Membership Lookup Hierarchy Caching** is enabled. Authentication may succeed or fail depending on the current content of the group membership cache.

In the authentication provider configuration page of the WebLogic Server Administration Console, the **Group Membership Searching** attribute is available from the **Provider Specific** tab, and the **Enable Group Membership Lookup Hierarchy Caching** attribute is available from the **Performance** tab.

Note that the default settings for these attributes are as follows:

- **Group Membership Searching** is set to "unlimited".

- **Enable Group Membership Lookup Hierarchy Caching** is enabled.

Workaround

These two configuration settings should not be used together. When configuring an authentication provider, use either of the following methods to avoid this problem:

1. Avoid setting **Group Membership Searching** to "limited".

2. If you must use the "limited" setting, disable the **Enable Group Membership Lookup Hierarchy Caching** setting. Note that disabling the group membership cache typically results in slower system performance.

11.29.9 Random Number Generator May Be Slow on Machines With Inadequate Entropy

In order to generate random numbers that are not predictable, SSL security code relies upon "entropy" on a machine. Entropy is activity such as mouse movement, disk IO, or network traffic. If entropy is minimal or non-existent, then the random number generator will be slow, and security operations may time out. This may disrupt activities such as booting a Managed Server into a domain using a secure admin channel. This issue generally occurs for a period after startup. Once sufficient entropy has been achieved on a JVM, the random number generator should be satisfied for the lifetime of the machine.

For further information, see Sun bugs 6202721 and 6521844 at:

http://bugs.sun.com/bugdatabase/view_bug.do?bug_id=6202721

http://bugs.sun.com/bugdatabase/view_bug.do?bug_id=6521844

Workaround

On low-entropy systems, you can use a non-blocking random number generator, providing your site can tolerate lessened security. To do this, add the

`-Djava.security.egd=file:///dev/urandom` switch or
`file:/dev/./urandom` to the command that starts the Java process. Note that this
workaround should not be used in production environments because it uses
pseudo-random numbers instead of genuine random numbers.

11.30 SNMP Issues and Workarounds

This section describes the following issue and workaround:

- Section 11.30.1, "SNMP Agent Does Not Lazily Load Custom MBean Nodes"

11.30.1 SNMP Agent Does Not Lazily Load Custom MBean Nodes

In WebLogic Server 10.3.3, an optimization has been included to conserve the initial
memory usage by the SNMP Agent, by lazily loading the nodes for the MIB when the
user accesses those nodes with a `get`, `getnext` or other SNMP request. While the
nodes corresponding to the WebLogic Server Runtime and Configuration MBeans are
loaded lazily, the nodes for custom MBeans are initially loaded at startup. Note that
custom MBeans are not registered in the MIB by default. To register custom MBeans in
the MIB, the `SNMPAccessForUserMBeansEnabled` attribute on the
`SNMPAgentMBean` must be set to `true`.

Workaround

There is no workaround for this issue. You see this issue only if the
`SNMPAccessForUserMBeansEnabled` attribute is enabled and the SNMP Agent is
running.

11.31 Spring Framework on WebLogic Server Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.31.1, "OpenJPA ClassFileTranformer Does Not Work When Running on JRockit"
- Section 11.31.2, "petclinic.ear Does Not Deploy on WebLogic Server"

11.31.1 OpenJPA ClassFileTranformer Does Not Work When Running on JRockit

The OpenJPA `ClassFileTranformer` does not work when running WebLogic
Server on JRockit.

Workaround

Use an alternative method of applying enhancements at build time through an
OpenJPA enhancer compiler; do not use the `LoadTimeWeaver`.

11.31.2 petclinic.ear Does Not Deploy on WebLogic Server

For the SpringSource `petclinic` sample, the `petclinic.war` deploys without any
problems. The `petclinic.ear` will not deploy on WebLogic Server because it is not
packaged correctly. A request has been sent to SpringSource to fix the
`petclinic.ear` packaging.

11.32 System Component Architecture (SCA) Issues and Workarounds

This section describes the following SCA issue:

- Section 11.32.1, "Unable to internalize message Error Occurs"

11.32.1 Unable to internalize message Error Occurs

In the System Component Architecture (SCA) Spring bean Web service, if a service bean is using SOAP 1.2 and `swaRef(@XmlAttachmentRef)` in the `response(return value)`, the `Content-Type` is incorrectly set to "text/xml" when producing the response SOAP message. The incorrect `Content-Type` causes the SAAJ MessageFactory to throw an `Unable to internalize message` error, and the service then responds with a fault.

Workaround

Use SOAP 1.1 or Message Transmission Optimization Mechanism (MTOM) for the attachment.

11.33 Upgrade Issues and Workarounds

This section describes the following issues:

- Section 11.33.1, "Domains Created on WebLogic Server 10.3.1 Cannot Be Run on WebLogic Server 10.3"

- Section 11.33.2, "Downgrade Option is Unavailable in Smart Update After Upgrade"

11.33.1 Domains Created on WebLogic Server 10.3.1 Cannot Be Run on WebLogic Server 10.3

If you create a domain using WebLogic Server 10.3.1, then roll back to WebLogic Server 10.3, you will not be able to start the servers that you created in that domain. This is a known restriction, as the `config.xml` file contains references to newer schema definitions (`xmlns.oracle.com`) that did not exist in WebLogic Server 10.3.

11.33.2 Downgrade Option is Unavailable in Smart Update After Upgrade

If you have WebLogic Server 10.3.0 or 10.3.1 installed with the WorkShop for WebLogic component, and you use Smart Update to upgrade to WebLogic Server 10.3.2, there is no Downgrade Option available in Smart Update that will allow you to roll back from 10.3.2 to the prior release.

> **Note:** This issue does not occur if your WebLogic Server installation does not include the Workshop for WebLogic component.

Workaround

Run the WebLogic Server uninstaller and select the **Rollback** option to roll back to the original WebLogic Server 10.3.0 or 10.3.1 installation. For information on how to run the WebLogic Server uninstaller, see the *Installation Guide for Oracle WebLogic Server*.

11.34 Web Applications Issues and Workarounds

This section describes the following issue and workaround:

- Section 11.34.1, "Administration Console Fails to Implement session-timeout Changes"

11.34.1 Administration Console Fails to Implement session-timeout Changes

If the `session-timeout` is configured in the `web.xml` file, any changes made to change the `session-timeout` using the Administration Console do not take effect.

Workaround

Use a deployment plan to override the `session-timeout` setting.

11.34.2 Connection Pool Connection Reserve Timeout Seconds Value is Overridden

When using a JDBC session, the value of Connection Reserve Timeout Seconds for a connection pool is changed to be one of the following:

- the JDBC connection timeout seconds, which is defined in the session descriptor (either in `weblogic.xml` or `weblogic-application.xml`)

- the default value of 120 seconds

Workaround

Configure `jdbc-connection-timeout-secs` in the session descriptor.

11.34.3 Database Connections Become Unstable When a PoolLimitSQLException Occurs

When a PoolLimitSQLException occurs during a JDBC persistence session, connections to the database become unstable, and may fail with recovery or fail without recovery. This results in the loss of session data. Either an older session or null is returned.

11.35 WebLogic Server Scripting Tool (WLST) Issues and Workarounds

This section describes the following issues and workarounds:

11.35.1 Property Names Containing '.' Characters Are Not Supported by loadProperties

The WLST `loadProperties` command does not support loading a property with a name that contains "." characters. For example, if the property `myapp.db.default` is present in the property file, WLST throws a name exception:

```
Problem invoking WLST - Traceback (innermost last):
  File "<iostream>", line 7, in ?
  File "<iostream>", line 4, in readCustomProperty
NameError: myapp
```

This is a system limitation of Python and the `loadProperties` command. WLST reads the variable names and values and sets them as variables in the Python interpreter. The Python interpreter uses "." as a delimiter to indicate module scoping for the namespace, or package naming, or both. Therefore, the properties file fails because `myapp.db.default.version=9i` is expected to be in the `myapp.db.default` package. This package does not exist.

Workaround

Use variable names that do not have periods. This will allow you to load the variables from the property file and refer to them in WLST scripts. You could use another character such as "_" or lowercase/uppercase character to delimit the namespace.

As an alternative, you can set variables from a properties files. When you use the variables in your script, during execution, the variables are replaced with the actual values from the properties file. For example:

```
myapp.py
var1=10
var2=20
import myapp
print myapp.var1
10
print myapp.var2
20
```

This will work for one level of namespaces (`myapp.var1`, `myapp.var2`). It will not work for top level variables that share the same name as the namespace (for example, `myapp=oracle` and `myapp.var1=10`). Setting the `myapp` variable will override the `myapp` namespace.

If you need multiple levels, then you can define a package namespace using directories. Create a myapp/db/default directory with a `vars.py` file as follows:

```
var1=10
var2=20
```

Then import:

```
import myapp.db.default.vars
print myapp.db.default.vars.var1
10
```

You may need to add `__init__.py` files to the subdirectories. Refer to the Python documentation for more information on packages:

http://docs.python.org/tut/node8.html

11.35.2 Invalid cachedir Created by Jython Causes WLST to Error Out

The default `cachedir` created by Jython 2.2 is not a valid directory. If you are using Jython directly from `weblogic.jar`, this causes WLST to error out.

Workaround

There are two workarounds for this issue:

- When invoking WLST, specify the `-Dpython.cachedir=<valid_directory>` parameter, or

- Install Jython 2.2.1 separately instead of using the partial Jython that is included in `weblogic.jar`.

11.35.3 WLST returnType='a' Option Returns Child Management Objects

The WLST `returnType='a'` option should only return attributes from the specified directory. Instead it also returns child management objects. For example:

```
ls('Server')
drw-   AdminServer
drw-   worker01

ls('Server', returnMap='true', returnType='a')
drw-   AdminServer
drw-   worker01

ls('Server', returnMap='true',returnType='c')
drw-   AdminServer
drw-   worker01
```

The `ls` with `returnType='a'` should not list any child management objects, but `AdminServer` and `worker01` are children.

Workaround

When processing the output from `ls(returnType='a')`, check to see if the returned entry is a directory.

11.36 Web Server Plug-Ins Issues and Workarounds

This section describes the following issue:

- Section 11.36.1, "MOD_WLS_OHS Does Not Fail Over"

11.36.1 MOD_WLS_OHS Does Not Fail Over

Currently, `mod_wl` and `mod_wl_ohs` only support container level failover and not application level failover. `mod_wl_ohs` continues to route requests to a down application as long as the managed server is up and running. In the clustered case, requests continue to go to the container where the original session started even when the application is shutdown, typically resulting in the http error 404.

11.37 Web Services and XML Issues and Workarounds

This section describes the following issues and workarounds:

- Section 11.37.1, "Sparse Arrays and Partially Transmitted Arrays Are Not Supported"

- Section 11.37.2, "WSDL Compiler Does Not Generate Serializable Data Types"

- Section 11.37.3, "Use of Custom Exception on a Callback"

- Section 11.37.4, "Cannot Use JMS Transport in an Environment That Also Uses a Proxy Server"

- Section 11.37.5, "clientgen Fails When Processing a WSDL"

- Section 11.37.6, "JAX RPC Handlers in Callback Web Services Are Not Supported"

- Section 11.37.7, "Message-level Security in Callback Web Services Is Not Supported"

- Section 11.37.8, "Handling of Java Method Arguments or Return Parameters That Are JAX-RPC-style JavaBeans"

- Section 11.37.9, "IllegalArgumentException When Using a Two-Dimensional XML Object in a JWS Callback"

- Section 11.37.10, "Using SoapElement[] Results in Empty Array"

- Section 11.37.11, "FileNotFound Exception When a Web Service Invokes Another Web Service"

- Section 11.37.12, "Client Side Fails to Validate the Signature on the Server Response Message"

- Section 11.37.13, "INFO Messages in Log for Domains Created Without Web Services-Specific Resources"

- Section 11.37.14, "xmlcatalog Element Entity Cannot Be a Remote File or a File in an Archive"

- Section 11.37.15, "Catalog File's public Element Is Not Supported When Using XML Catalogs"

- Section 11.37.16, "Local xmlcatalog Element Does Not Work Well"

- Section 11.37.17, "JAXRPC Client Does Not Encode the HTTP SOAPAction Header With Multi-byte Characters"

- Section 11.37.18, "External Catalog File Cannot Be Used in the xmlcatalog Element of clientgen"

- Section 11.37.19, "Exceptions When Running Reliable Messaging Under Heavy Load"

- Section 11.37.20, "jwsc Has Been Modified, Resulting in Methods With No @WebMethod Annotation to Be Included in the Service Endpoint Interface"

- Section 11.37.21, "ClassNotFound Exception Occurs When Using wseeclient.jar"

- Section 11.37.22, "Incomplete Configuration When Adding Advanced Web Services Component to SOA Domain"

- Section 11.37.23, "Exception Occurs During Invocation of Clientside Policy Applied to a Service"

- Section 11.37.24, "WS-AT Interoperation Issues With WebSphere and WebLogic Server"

- Section 11.37.25, "DBWS Invocation Fails When WebLogic Server Is Running JRockit JDK"

- Section 11.37.26, "Server Enters a Warning State After Crash Recovery"

11.37.1 Sparse Arrays and Partially Transmitted Arrays Are Not Supported

WebLogic Server does not support Sparse Arrays and Partially Transmitted Arrays as required by the JAX-RPC 1.1 Spec.

11.37.2 WSDL Compiler Does Not Generate Serializable Data Types

The Web Service Description Language (WSDL) compiler does not generate serializable data types, so data cannot be passed to remote EJBs or stored in a JMS destination.

11.37.3 Use of Custom Exception on a Callback

WebLogic Server does not support using a custom exception on a callback that has a package that does not match the target namespace of the parent Web Service.

Workaround

Make sure that any custom exceptions that are used in callbacks are in a package that matches the target namespace of the parent Web service.

11.37.4 Cannot Use JMS Transport in an Environment That Also Uses a Proxy Server

You cannot use JMS transport in an environment that also uses a proxy server. This is because, in the case of JMS transport, the Web Service client always uses the t3 protocol to connect to the Web Service, and proxy servers accept only HTTP/HTTPS.

11.37.5 clientgen Fails When Processing a WSDL

`clientgen` fails when processing a WSDL that uses the complex type `http://www.w3.org/2001/XMLSchema{schema}` as a Web Service parameter.

11.37.6 JAX RPC Handlers in Callback Web Services Are Not Supported

WebLogic Server 9.2 and later does not support JAX RPC handlers in callback Web Services.

Workaround

If JAX RPC handlers were used with Web Services created with WebLogic Workshop 8.1, then such applications must be redesigned so that they do not use callback handler functionality.

11.37.7 Message-level Security in Callback Web Services Is Not Supported

WebLogic Server 9.2 and later does not support message-level security in callback Web Services.

Workaround

Web Services created with WebLogic Workshop 8.1 that used WS-Security must be redesigned to not use message-level security in callbacks.

11.37.8 Handling of Java Method Arguments or Return Parameters That Are JAX-RPC-style JavaBeans

WebLogic Server does not support handling of Java method arguments or return parameters that are JAX-RPC-style JavaBeans that contain an `XmlBean` property. For example, applications cannot have a method with a signature like this:

```
void myMethod(myJavaBean bean);
```

where `myJavaBean` class is like:

```
public class MyJavaBean {
  private String stringProperty;
  private XmlObject xmlObjectProperty;

  public MyJavaBean() {}
  String getStringProperty() {
```

```
      return stringProperty;
  }
  void   setStringProperty(String s) {
    stringProperty = s;
  }
  XmlObject getXmlObjectProperty() {
    return xmlObjectProperty;
    }
  void       getXmlObjectProperty(XmlObject x) {
    xmlObjectProperty = x;
  }
}
```

Workaround

Currently there is no known workaround for this issue.

11.37.9 IllegalArgumentException When Using a Two-Dimensional XML Object in a JWS Callback

Using a two dimensional `XmlObject` parameter (`XmlObject[][]`) in a JWS callback produces an `IllegalArgumentException`.

Workaround

Currently there is no known workaround for this issue.

11.37.10 Using SoapElement[] Results in Empty Array

Using `SoapElement[]` as a Web Service parameter with `@WildcardBinding(className="javax.xml.soap.SOAPElement[]", binding=WildcardParticle.ANYTYPE)` will always result in an empty array on the client.

Workaround

Do not use the `@WildcardBinding` annotation to change the default binding of `SOAPElement[]` to `WildcardParticle.ANYTYPE`. The `SOAPElement[]` default binding is set to `WildcardParticle.ANY`.

11.37.11 FileNotFound Exception When a Web Service Invokes Another Web Service

When Web Service A wants to invoke Web Service B, Web Service A should use the `@ServiceClient` annotation to do this. If Web Service B needs a custom policy file that is not attached to the WSDL for Web Service B, then Web Service A will fail to run. Web Service A will look for the policy file at `/Web-Inf/classes/policies/`*`filename`*`.xml`. Since no policy file exists at that location, WebLogic Server will throw a 'file not found' exception.

Workaround

Attach the custom policy file to Web Service B, as in this example:

```
@Policy(uri="CustomPolicy.xml",
       attachToWsdl=true)
public class B {
  ...
}
```

11.37.12 Client Side Fails to Validate the Signature on the Server Response Message

When the security policy has one of these Token Assertions, the client side may fail to validate the signature on the server response message.

```
<sp:WssX509PkiPathV1Token11/>
<sp:WssX509Pkcs7Token11/>
<sp:WssX509PkiPathV1Token10/>
<sp:WssX509Pkcs7Token10/>
```

In addition, when there are more than two certifications in the chain for X509 certification for <sp:WssX509Pkcs7Token11/> or <sp:WssX509Pkcs7Token10/> Token Assertion, the server side may fail to validate the signature on the incoming message.

A policy such as the following policy is not supported, unless the entire certificate chain remains on the client side.

```
<sp:AsymmetricBinding>
   <wsp:Policy>
      <sp:InitiatorToken>
         <wsp:Policy>
            <sp:X509Token
               sp:IncludeToken='. . ./IncludeToken/AlwaysToRecipient'>

            <wsp:Policy>
               <sp:WssX509Pkcs7Token11/>
            </wsp:Policy>
         </sp:X509Token>
      </wsp:Policy>
      </sp:InitiatorToken>
      <sp:RecipientToken>
      <wsp:Policy>
      <sp:X509Token sp:IncludeToken='. . ./IncludeToken/Never'>
            <wsp:Policy>
               <sp:WssX509Pkcs7Token11/>
            </wsp:Policy>
         </sp:X509Token>
      </wsp:Policy>
      </sp:RecipientToken>
   . . .
      </wsp:Policy>
   </sp:AsymmetricBinding>
```

Workaround

Use either of the following two solutions:

1. Configure the response with the `<sp:WssX509V3Token10/>` Token Assertion, instead of `WssX509PkiPathV1Token11/>`. The policy will look like this:

```
<sp:AsymmetricBinding>
   <wsp:Policy>
      <sp:InitiatorToken>
         <wsp:Policy>
         <sp:X509Token sp:IncludeToken='. . ./IncludeToken/AlwaysToRecipient'>
            <wsp:Policy>
               WssX509PkiPathV1Token11/>
            </wsp:Policy>
         </sp:X509Token>
         </wsp:Policy>
      </sp:InitiatorToken>
      <sp:RecipientToken>
```

```
                   <wsp:Policy> sp:IncludeToken='. . ./IncludeToken/Never'>
                   <sp:X509Token
                      <wsp:Policy>
                          <sp:WssX509V3Token10/>
                      </wsp:Policy>
                   </sp:X509Token>
                   </wsp:Policy>
               </sp:RecipientToken>
       . . .
               </wsp:Policy>
           </sp:AsymmetricBinding>
```

2. Configure the response with the `WssX509PkiPathV1Token11/>` token
    assertion, but include it in the message. The policy will look like this:

```
<sp:AsymmetricBinding>
  <wsp:Policy>
    <sp:InitiatorToken>
      <wsp:Policy>
      <sp:X509Token sp:IncludeToken='. . ./IncludeToken/AlwaysToRecipient'>
        <wsp:Policy>
           WssX509PkiPathV1Token11/>
        </wsp:Policy>
      </sp:X509Token>
    </wsp:Policy>
    </sp:InitiatorToken>
    <sp:RecipientToken>
      <wsp:Policy>
      <sp:X509Token sp:IncludeToken='. . ./IncludeToken/AlwaysToInitiator'>
         <wsp:Policy>
            WssX509PkiPathV1Token11/>
          </wsp:Policy>
      </sp:X509Token>
      </wsp:Policy>
    </sp:RecipientToken>
 . . .
    </wsp:Policy>
 </sp:AsymmetricBinding>
```

When there are multiple certifications in the X509 Certificate chain,
`WssX509PkiPathV1Token11/>` or `<sp:WssX509PkiPathV1Token10/>` should
be used, instead of `<sp:WssX509Pkcs7Token11/>` or
`<sp:WssX509Pkcs7Token10/>`.

11.37.13 INFO Messages in Log for Domains Created Without Web Services-Specific Resources

WebLogic Web Services expects that each WebLogic Server domain will contain
specific resources needed to support Web services. Some domains, however, are not
created with these resources.

For example, creating a default WebLogic Server domain in the configuration wizard
(without applying any other templates) will not create the needed Web Services
resources.

A domain that doesn't contain Web Services resources will still boot and operate
correctly for non-Web services scenarios, and any Web Services scenario that doesn't
involve asynchronous request/response. You will, however, see INFO messages in the

server log indicating that async resources have not been configured and that the async response service for web services has not been completely deployed.

Workaround

Web Services that use async request/response will not function properly in a domain that doesn't have Web Services resources configured in it. To configure these resources, there are two approaches:

- Use the configuration wizard and apply the `wls_webservice.jar` template to your domain.

- Manually configure these resources according to the rules given in the online documentation under domain configuration for Web services.

> **Note:** The configuration wizard approach mentioned above is not advised for domains that already have JMS servers configured and that enable JMS resource 'default targeting' on JMS resources such as destinations. The wizard automatically creates additional JMS servers, and the default targeted resources can automatically appear on the newly created JMS servers, yielding, for example, distributed destinations that suddenly span many more JMS servers than intended.

11.37.14 xmlcatalog Element Entity Cannot Be a Remote File or a File in an Archive

For the `xmlcatalog` element in `build.xml`, the location of an entity must be a file on the local file system. It cannot be a remote file (for example, `http:`) or a file in an archive (for example, `jar:`).

Workaround

If necessary, define the remote element as an entity in a catalog file instead.

11.37.15 Catalog File's public Element Is Not Supported When Using XML Catalogs

The `public` element in a catalog file is not supported when using the XML Catalogs feature. It is not supported to be consistent with JAX-WS EntityResolver implementation. WebLogic Server only supports defining the `system` element in a catalog file.

11.37.16 Local xmlcatalog Element Does Not Work Well

The local `xmlcatalog` element does not work well due to an Ant limitation.

Workaround

In the ant `build.xml` file, you have to define a local element above a `clientgen(wsdlc)` task when you are in the same target, or define the element out of any targets.

11.37.17 JAXRPC Client Does Not Encode the HTTP SOAPAction Header With Multi-byte Characters

The WebLogic Server Web Service JAXRPC client doesn't encode the HTTP SOAPAction header with multi-byte characters, but WebLogic Server only supports ASCII for HTTP headers.

Workaround

Change the SOAP action to ASCII in the WSDL.

11.37.18 External Catalog File Cannot Be Used in the xmlcatalog Element of clientgen

An external catalog file cannot be used in the `xmlcatalog` element of a `clientgen` task. For example, this snippet of an ant build file will not work:

```
<clientgen ...
  <xmlcatalog>
    <catalogpath>
      <pathelement location='wsdlcatalog.xml'/>
    </catalogpath>
  </xmlcatalog>
```

This is a limitation of the Ant XML Catalog.

Workaround

Resource locations can be specified either in-line or in an external catalog file(s), or both. In order to use an external catalog file, the `xml-commons` resolver library (`resolver.jar`) must be in your classpath. External catalog files may be either plain text format or XML format. If the `xml-commons` resolver library is not found in the classpath, external catalog files, specified in `<catalogpath>` paths, will be ignored and a warning will be logged. In this case, however, processing of inline entries will proceed normally.

Currently, only `<dtd>` and `<entity>` elements may be specified inline. These correspond to the OASIS catalog entry types PUBLIC and URI respectively.

11.37.19 Exceptions When Running Reliable Messaging Under Heavy Load

When running a Web services reliable messaging scenario under heavy load with file based storage that has the `Direct-Write` synchronous write policy setting, you may encounter IO exceptions similar to the following in the WebLogic Server log:

```
weblogic.store.PersistentStoreRuntimeException: [Store:280029]The
persistent store record <number> could not be found
```

or

```
Could not load conversation with id uuid:<some ID> -> Conversation read
failed:
    ...
  weblogic.wsee.jws.conversation.StoreException:
    Conversation read failed: id=uuid:<some ID>
      weblogic.store.PersistentStoreException: [Store:280052]The
      persistent store was not able to read a record.
        java.io.OptionalDataException
```

These exceptions are known to occur only when using Web Services reliable messaging. They indicate a failure to read a record from the file store and are considered 'fatal' data access errors.

The underlying issue causing these errors will be addressed in a future release.

Workaround

The following workarounds are available for this issue:

■   Change the file store synchronous write policy to `Direct-Write-With-Cache`

or

- Change the file store synchronous write policy to `Cache-Flush`.

  or

- Keep the Direct-Write synchronous write policy and add the following Java system property to your WebLogic server startup scripts:

  `-Dweblogic.store.AvoidDirectIO=true`

  > **Note:** The `-Dweblogic.store.AvoidDirectIO` system property has been deprecated in WebLogic Server 10.3.3. Oracle recommends configuring the store synchronous write policy to `Direct-Write-With-Cache` instead.

The `Direct-Write-With-Cache` option may improve performance; it creates additional files in the operating system's temporary directory by default.

The `Cache-Flush` and `AvoidDirectIO` workarounds may lead to some performance degradation; it may be possible to reduce or eliminate the degradation by configuring a different block-size for the file store.

For important information about these settings and additional options, see "Tuning File Stores" in *Oracle Fusion Middleware Performance and Tuning for Oracle WebLogic Server*.

11.37.20 jwsc Has Been Modified, Resulting in Methods With No @WebMethod Annotation to Be Included in the Service Endpoint Interface

Prior to 11*g* Release 1 (WebLogic Server version 10.3.1), a JAX-WS JWS that allowed its service endpoint interface to be inferred from the implementation (that is, no explicit service endpoint interface class was declared) would have the implicit service endpoint interface include only those methods that included an `@WebMethod` annotation (and that annotation did not specify `exclude=true`). This behavior is incorrect according to the JAX-WS 2.1 specification. JAX-WS 2.1 specifies that the service endpoint interface inferred from the JWS should *include* all public non-static methods on the JWS, as long as those methods do not have `@WebMethod(exclude=true)` attached to them.

In WebLogic Server 10.3.1, `jwsc` (and the Web services runtime) have been modified to properly generate the implicit service endpoint interface (and resulting WSDL for the service) according to the JAX-WS 2.1 specification. As a result, the implicitly derived service endpoint interface will include all non-excluded public non-static methods on the JWS. In some cases, you may have written JWS implementations that relied on the prior `jwsc` behavior, assuming that methods with no `@WebMethod` annotation would not be included in the service endpoint interface and resulting WSDL for the service. With the new `jwsc` behavior, such methods *will* be included in the service endpoint interface and resulting WSDL for the service.

Workaround

After installing WebLogic Server 10.3.1 or greater, Oracle recommends that you evaluate your existing services for the following possible errors:

1. Public non-static methods that are not legal Web method declarations (these can cause `jwsc` to fail when building a service).

2. Public non-static methods that are legal Web methods, but were never intended to be exposed publicly on the service.

The two cases are described in detail here:

Case 1: It is possible that some JWS classes will fail to compile in `jwsc` if a previously excluded method is an invalid Web method. The new implicit inclusion of such methods will cause the `jwsc` task to fail. There are many possible reasons for `jwsc` to fail compiling of a newly included Web method. The most common reason is if a method includes parameter types that are incompatible with JAXB (for example, an interface instead of a concrete class with a default no-arg constructor).

Case 2: Any public non-static methods that are not explicitly excluded will now be represented in the service endpoint interface. These methods may be perfectly legal Web method declarations (for example, they compile correctly in `jwsc`), but may never have been intended as public operations on the service.

Oracle recommends that you inspect any implicitly defined service endpoint interface (and dynamically generated WSDL) for their existing services, and ensure that only the intended methods are exposed.

In either of these cases, simply add the following annotation to the method that you want to exclude from the service's endpoint interface and WSDL:

```
@WebMethod(exclude=true)
```

11.37.21 ClassNotFound Exception Occurs When Using wseeclient.jar

In some circumstances, when executing a standalone JAX-WS client application using `wseeclient.jar` (as described in "Using a Stand-Alone Client JAR File When Invoking Web Services" in *Oracle Fusion Middleware Getting Started With JAX-WS Web Services for Oracle WebLogic Server*), the application may fail with a ClassNotFound exception. For example:

```
Exception in thread "Main Thread" java.lang.NoClassDefFoundError:
com/oracle/xml /ws/transport/http/client/HttpTransportPipe at
weblogic.wsee.jaxws.WLSTransportTubeFactory.createHttpTransport(WLSTransportTube
Factory.java:30
```

Workaround

Use the client-side JAX-WS 2.1 that is integrated with the Java Standard Edition Release 6 (JDK 1.6), Update 4 and later. This requires using the JAX-WS API instead of any WebLogic Server specific APIS.

Current releases of JDK 1.6 are available for download at http://java.sun.com/javase/downloads/index.jsp. For information about writing a standalone JAX WS 2.1 client application, see the *JAX-WS Users Guide* on the JAX-WS 2.1 Reference Implementation Web site at https://jax-ws.dev.java.net/.

11.37.22 Incomplete Configuration When Adding Advanced Web Services Component to SOA Domain

An incomplete configuration can result when you use the Configuration Wizard to add the WebLogic Server Advanced Web Services component to a newly created SOA domain. If you create a cluster that contains only the default 'out-of-the-box' soa_server1 server definition, the resulting cluster does not include the resources needed to run WebLogic Server Web Services in that cluster.

Workaround

Use either of the following workarounds for this issue:

1. While running Configuration Wizard, create a second server in the cluster:

    a. On the **Select Optional Configuration** screen, select **Managed Servers, Clusters, and Machines**.

    b. On the **Configure Managed Servers** screen, add a managed server.

    c. On the **Assign Servers to Clusters** screen, add this server to the cluster in which the default soa_server1 server resides.

2. On the **Configuration Wizard Target Services to Servers or Clusters** screen, target Web Services resources (for example, WseeJmsServer, WseeJmsModule) to the cluster.

Either of these workarounds will cause the Configuration Wizard to apply the resources for the WebLogic Server Advanced Web Services component to the cluster.

11.37.23 Exception Occurs During Invocation of Clientside Policy Applied to a Service

After upgrading from WebLogic Server 10.3.1 to WebLogic Server 10.3.2 or 10.3.3, if the value of the name attribute of `@WebParam(header=true)` is different from the Java parameter name in the JWS method, a WSDL part name exception may occur.

Workaround

Run `clientgen` against the service to rebuild the client artifacts.

11.37.24 WS-AT Interoperation Issues With WebSphere and WebLogic Server

Web Services Atomic Transactions (WS-AT) 1.1 interoperation using WebSphere as the client and either WebLogic Server or JRF as the service does not work.

WS-AT 1.1 interoperation does work when WebSphere is the service and either WebLogic Server or JRF is the client. In this case, interoperation works only if you have WebSphere 7 with Fix/Feature Pack 7.

11.37.25 DBWS Invocation Fails When WebLogic Server Is Running JRockit JDK

When a WebLogic Server instance is running the JRockit JDK, invocation of Database Web Services (DBWS) based on either EclipseLink or TopLink fails.

This issue is not seen when running the application server in a Sun JVM environment.

For a workaround for TopLink, see the *Oracle Toplink Release Notes*.

For a workaround for EclipseLink, see
http://wiki.eclipse.org/EclipseLink/Release.

11.37.26 Server Enters a Warning State After Crash Recovery

In certain scenarios, when a server instance in a WebLogic cluster crashes, Web Services-Atomic Transaction (WS-AT) recovery results can result in timeouts during the commit processing of current transactions or stuck threads that cause the server to enter a Warning state. WS-AT data recovery is successful in these cases. The log files, however, contain 'failed state' messages due to the fact that commit acknowledgements for transactions are not being processed properly in this situation. Although the server may continue to function while in the Warning state, the threads

continue to be stuck until the transaction abandonment timeout is reached (the default is 24 hours).

Workaround

Restart the server, which removes the stuck threads and clears the Warning state.

11.38 WebLogic Tuxedo Connector Issues and Workarounds

This section describes the following issue and workaround:

- Section 11.38.1, "View Classes are not Set on a Per Connection Basis"

11.38.1 View Classes are not Set on a Per Connection Basis

View classes are not set on a per connection basis.

A shared WebLogic Tuxedo Connector hash table can cause unexpected behavior in the server if two applications point to the same VIEW name with different definitions. There should be a hash table for the view classes on the connection as well as for the Resource section.

Workaround

Ensure that all VIEW classes defined across all your WebLogic Workshop applications are consistent, meaning that you have the same VIEW name representing the same VIEW class.

11.39 Documentation Errata

This section describes documentation errata:

- Section 11.39.1, "Issues With Search Function in the Samples Viewer"
- Section 11.39.2, "Japanese Text Displays in Some Search Results Topics Avitek Medical Records"
- Section 11.39.3, "Some Interfaces to SAML2 Are Not Documented in the MBean Reference"
- Section 11.39.4, "WS-AT Code Example Is Not Listed on the Examples Page"

11.39.1 Issues With Search Function in the Samples Viewer

The **Search** function in the Samples viewer does not work when accessing the Examples documentation by selecting **Oracle Weblogic > Weblogic Server > Examples > Documentation** from the Windows **Start** menu.

Workaround

To search the Sample Applications and Code Examples, you must start the Examples server and navigate to
`http://localhost:7001/examplesWebApp/docs/core/index.html`. Click **Instructions** and then **Search**.

11.39.2 Japanese Text Displays in Some Search Results Topics Avitek Medical Records

The samples viewer **Search** function may sometimes return topics that display the Japanese and English versions of some Avitek Medical Records topics simultaneously.

11.39.3 Some Interfaces to SAML2 Are Not Documented in the MBean Reference

The WebLogic Server 10.3.1 MBean Reference does not document the interfaces to the SAML 2.0 Identity Asserter and SAML 2.0 Credential Mapping provider. Instead, Javadoc for these MBean interfaces is provided in the *WebLogic Server 10.3.1 MBean API Reference Guide*.

11.39.4 WS-AT Code Example Is Not Listed on the Examples Page

When displaying the WebLogic Server Code Examples web page, the topic "Using Web Services Atomic Transaction" is not listed in the Web Services section of the Table of Contents (under **WebLogic Server Examples > Examples > API > Web Services**).

Workaround

To display this topic, enter the following URL in your web browser:

```
WL_HOME\samples\server\examples\src\examples\webservices\jaxws\wsat\
instructions.html
```

where *WL_HOME* is the WebLogic Server installation directory (the default is `C:\Oracle\Middleware\wlserver_10.3`).

Part V

Oracle WebCenter

Part V contains the following chapter:

12

Oracle WebCenter

This chapter describes issues associated with Oracle WebCenter. It includes the following topics:

- Section 12.1, "General Issues and Workarounds"
- Section 12.2, "Documentation Errata"

12.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 12.1.1, "Using Oracle WebLogic Communications Server"
- Section 12.1.2, "Using Jive Forums Documentation"
- Section 12.1.3, "Using the Rich Text Portlet"
- Section 12.1.4, "Expanding/Collapsing Folders in the All Saved Searches Task Flow (Accessibility Issue)"
- Section 12.1.5, "Clearing Customizations Stored in MDS"
- Section 12.1.6, "Navigating in the Documents Tab in Internet Explorer 7 (Accessibility Issue)"
- Section 12.1.7, "Troubleshooting Service Provisioning Issues"
- Section 12.1.8, "Installing Oracle SES"
- Section 12.1.9, "Setting Up IMP Connections to Microsoft OCS"
- Section 12.1.10, "Crawling WebCenter Spaces with SES over an HTTPS Connection"
- Section 12.1.11, "Running Oracle WebCenter with Microsoft ActiveDirectory"

12.1.1 Using Oracle WebLogic Communications Server

Oracle WebLogic Communications Server (OWLCS) is provided as a sample for development only. It should not be used for production deployments.

12.1.2 Using Jive Forums Documentation

Oracle WebCenter Discussions (Jive Forums) is an optional component of Oracle WebCenter. Complete documentation for Jive Forums is included for reference. However, Jive software installations and upgrades outside of the WebCenter product installation are not supported.

12.1.3 Using the Rich Text Portlet

At runtime, if you encounter a null pointer exception while trying to customize or refresh the content of a Rich Text Portlet, reload the page, and then customize or refresh your portlet.

12.1.4 Expanding/Collapsing Folders in the All Saved Searches Task Flow (Accessibility Issue)

When using only the keyboard in WebCenter Spaces, you cannot expand or collapse folders in the All Saved Searches task flow. To work around this issue, view the saved searches using the Search main view task flow for personal saved searches, or the Search group main view task flow for group space-specific saved searches.

12.1.5 Clearing Customizations Stored in MDS

In Oracle JDeveloper, choosing **Clean Runtime MDS Customizations** from the **Application** menu does not clear the customizations made at runtime that are stored in the MetaData Services (MDS). You can delete customizations by either manually deleting them from the configured directory or by using JDeveloper.

To clear these customizations by using JDeveloper:

1. In the Application Navigator, click the **Application Menu** icon next to your application's name and select **Application Properties**.

2. In the Application Properties dialog, expand the **Run** node in the left pane, then select **MDS**.

3. In the right pane, under **Run: MDS**, select **Delete customizations before each run**. Doing so clears the MDS of any runtime customizations every time you run the application. To save the runtime customizations every time you run the application, select **Preserve customizations across application runs**.

12.1.6 Navigating in the Documents Tab in Internet Explorer 7 (Accessibility Issue)

When using only the keyboard in WebCenter Spaces in Internet Explorer 7, cursor position is not highlighted for certain buttons in the Documents tab and the Document List Viewer task flow in page edit mode. Although the cursor position indicator is not shown, the cursor focus for the button objects is correct. To work around this issue, use Internet Explorer 8 or any other supported browser like Safari 4.x or Firefox 3.x.

12.1.7 Troubleshooting Service Provisioning Issues

When you create a group space, an error similar to the following might be seen if provisioning a service exceeds the time allowed:

Group space created with the following warnings:

```
Issues were faced while provisioning the services.
Errors were encountered for the following services - Discussions and
Announcements. Check if these services have been configured correctly.
```

When a group space is created, services are provisioned in parallel in multiple threads. If provisioning a service exceeds the specified timeout, the thread is interrupted. The timeout may be exceeded due to time needed to copy the metadata when the latency between the midtier and the database is too high, network issues, database performance issues, and so on.

To check if the issue is due to exceeding the timeout, search the log file for a message similar to the following:

```
<Nov 3, 2009 4:44:06 PM GMT> <Warning> <oracle.webcenter.webcenterapp>
<BEA-000000> <Concurr: The thread is timed out in 10000 milisec.
for oracle.webcenter.collab.forum:Execution timedout
queued :     12 ms
suspended :    0 ms
running : 5842 ms
timeout : 5000 ms
service : oracle.webcenter.community
resource : oracle.webcenter.collab.forum
source : oracle.webcenter.concurrent.RunnableTask@23268a92
(oracle.webcenter.concurrent.RunnableTask) submission : 15>

<Nov 3, 2009 4:44:06 PM GMT> <Warning> <oracle.webcenter.webcenterapp>
<BEA-000000> <Concurr: The thread is timed out in 5000 milisec.
for oracle.webcenter.collab.announcement:Execution timedout
queued :    37 ms
suspended :    0 ms
running : 5875 ms
timeout : 5000 ms
service : oracle.webcenter.community
resource : oracle.webcenter.collab.announcement
source : oracle.webcenter.concurrent.RunnableTask@37538945
(oracle.webcenter.concurrent.RunnableTask) submission : 18>

<Nov 3, 2009 4:44:06 PM GMT> <Warning>
<oracle.webcenter.collab.forum.internal.jive.CategoryTaxanomyCreator> <BEA-000000>
 <java.io.InterruptedIOException: Operation interrupted
```

In this case, the running time of 5875 ms exceeded the timeout of 5000 ms. The root cause of the timeout should be addressed; for example, resolve networking or database performance issues.

The networking issues could be resolved by incresing the TCP/IP timeout value.To change the timeout values, log in as a `root` user and execute the following command:

`ndd -set /dev/tcp tcp_time_wait_interval 480000` (default value is 60000)

Restart the Administration and Managed Servers. Once this is done, the group space can be created again and the error will not be encountered. If the performance cannot be improved and the error persists, the timeout value may be increased for the service encountering the error. For more information, see Section A.5.5, "Configuring Concurrency Management."

12.1.8 Installing Oracle SES

To install Oracle Secure Enterprise Search (Oracle SES):

1. Install Oracle SES 10.1.8.2.

   For information about how to install Oracle SES 10.1.8.2, refer to the Oracle Secure Enterprise Online Documentation Library 10*g* Release 1 (10.1.8.2) available here on OTN:

   http://www.oracle.com/technology/documentation/ses.html

2. Install the Oracle SES 10.1.8.4.0 patch set.

   To do this, download patch 7514463 from http://support.oracle.com.

3. Install the Oracle SES Oracle Database Connector 10.1.8.4.4 patch set.

To do this, download patch 9022819 from `http://support.oracle.com`.

12.1.9 Setting Up IMP Connections to Microsoft OCS

When setting up an Instant Messaging and Presence (IMP) connection to Microsoft Office Communications Server (OCS), the connection wizard only shows the `base.connection.url` and `domain` parameters as mandatory. However, the `userDomain` and `ocsServer` parameters also are mandatory.

12.1.10 Crawling WebCenter Spaces with SES over an HTTPS Connection

If you configure Oracle Secure Enterprise Search (SES) to crawl WebCenter Spaces over an HTTPS connection using BASIC authentication, you must apply patch 6690355 to the SES home. Patch 6690355 is for Oracle Containers for J2EE (OC4J) 10.1.3.4.0, which is a standalone installation of OC4J within the SES home. As indicated in the README file for patch 6690355, if you have not also installed patch 5912518, you must apply it first before applying patch 6690355.

To apply both patches:

1. Download patch 5912518 and 6690355 from `http://support.oracle.com`.

2. From your Oracle Secure Enterprise Search 10.1.8.4 home, navigate to *$ORACLE_ HOME* and run the following commands:

```
bin/searchctl stop
cd oc4j
setenv ORACLE_HOME <current-working-directory>
unzip p5912518_111000_GENERIC.zip
unzip p6690355_101340_GENERIC.zip
cd 6690355
$ORACLE_HOME/OPatch/opatch apply -jdk ../../jdk -jre ../../jdk/jre
cd ..
setenv ORACLE_HOME <current-working-directory>
bin/searchctl start
```

12.1.11 Running Oracle WebCenter with Microsoft ActiveDirectory

When running Oracle WebCenter with a Microsoft ActiveDirectory identity store, `ClassCastExceptions` may arise. To work around this issue, you must apply patch 9039508. You can download the patch from `http://support.oracle.com`.

12.2 Documentation Errata

This section describes documentation errata. It includes the following topics:

- Section 12.2.1, "URL Formats for the web Socket Type in an Oracle Content Server Repository Connection"

- Section 12.2.2, "Oracle Virtual Directory Deprecated as Policy Store for Oracle WebCenter"

12.2.1 URL Formats for the web Socket Type in an Oracle Content Server Repository Connection

In *Oracle Fusion Middleware Developer's Guide for Oracle WebCenter*, in the section "How to Create a Content Repository Connection Based on the Oracle Content Server Adapter", the description for the `URL of the Web Server Plugin` parameter in the table "Configuration Parameters for Oracle Content Server" reads:

"If the RIDC socket type is web, then the URL must be in this format: `http://host_name/web_root/plugin_root`. For example: `http://mycontentserver/cms/idcplg`"

This description should read as follows:

"If the RIDC socket type is web, then the URL must be:

For Oracle Content Server release 11.1.1.3.0: `http://host_name:port_number/_dav/web_root/plugin_root`. For example: `http://mycontentserver:4444/_dav/cms/idcplg`

For Oracle Content Server release 10.1.3.4.1 or 10.1.3.5: `http://host_name:port_number/web_root/plugin_root`. For example: `http://mycontentserver:4444/cms/idcplg`"

12.2.2 Oracle Virtual Directory Deprecated as Policy Store for Oracle WebCenter

In *Oracle Fusion Middleware Administrator's Guide for Oracle WebCenter*, in the section "Default Identity and Policy Stores", we describe the LDAPs supported for the policy store as:

"The policy store can only be configured to use Oracle Internet Directory 11gR1 and 10.1.4.3, and OVD 11gR1 with the Local Store Adapter (LSA)."

The description should read:

"The policy store can only be configured to use Oracle Internet Directory 11gR1 and 10.1.4.3."

Oracle WebCenter no longer supports OVD 11gR1 with the Local Store Adapter (LSA) for use with the policy store.

Part VI

Oracle SOA Suite Oracle SOA Suite and Business Process Management Suite

Part VI contains the following chapters:

13

Oracle Adapter for Oracle Applications (Oracle E-Business Suite Adapter)

This chapter describes issues associated with Oracle Adapter for Oracle Applications (Oracle E-Business Suite Adapter) and the *Oracle Fusion Middleware Adapter for Oracle Applications User's Guide*. It includes the following topics:

- Section 13.1, "General Issues and Workarounds"

- Section 13.2, "Configuration Issues and Workarounds"

- Section 13.3, "Documentation Errata"

- For information about Oracle Enterprise Content Management Application Adapters, see Chapter 46, "Oracle ECM Application Adapters."

13.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 13.1.1, "Populating Default Values for Record Types While Using PL/SQL APIs"

- Section 13.1.2, "Re-creating Wrapper Packages While Using Existing PL/SQL SOA Composites Against a Different Release Instance"

13.1.1 Populating Default Values for Record Types While Using PL/SQL APIs

Certain PL/SQL APIs exposed from Oracle E-Business Suite take record types as input. Such APIs expect default values to be populated for parameters within these record types for successful execution.

The default values are `FND_API.G_MISS_CHAR` for characters, `FND_API.G_MISS_DATE` for dates, and `FND_API.G_MISS_NUM` for numbers. Adapter for Oracle Applications can default these values when the parameters within the record type are passed as nil values, as shown in the following example:

```
<PRICE_LIST_REC>
<ATTRIBUTE1 xsi:nil="true"/>
<ATTRIBUTE2 xsi:nil="true"/>
<ATTRIBUTE3 xsi:nil="true"/>
...
</PRICE_LIST_REC>
```

This can be achieved with the help of a function in a Transform activity, or by directly passing the XML input with nil values and then assigning them to the record types within an Assign activity.

13.1.2 Re-creating Wrapper Packages While Using Existing PL/SQL SOA Composites Against a Different Release Instance

When a user has a SOA composite of a PL/SQL API created against an Oracle E-Business Suite Release 11i instance and intends to use it against the Release 12 instance or vice versa, for the compatibility in the target instance, the wrapper package of the SOA composite must be recreated. This approach updates the signature in the generated wrapper SQL file for the target instance and avoids the possible confusion whether the signature is the same or has changed in the target instance.

13.2 Configuration Issues and Workarounds

There are no known configuration issues at this time.

13.3 Documentation Errata

This section describes documentation errata for *Oracle Fusion Middleware Adapter for Oracle Applications User's Guide*. It includes the following topics:

- Section 13.3.1, "Removing Interfaces Definitions Annotated at Design Time"
- Section 13.3.2, "Removing "One-time Workaround for Concurrent Programs and E-Commerce Gateway Interfaces""

13.3.1 Removing Interfaces Definitions Annotated at Design Time

In the section "Support for Oracle Integration Repository" of Chapter 2 "Adapter for Oracle Applications Features", the last sentence of the first paragraph reads:

"These interfaces are exposed because their definitions were annotated at design time as required by Oracle Integration Repository."

This is incorrect and should be removed from the section.

13.3.2 Removing "One-time Workaround for Concurrent Programs and E-Commerce Gateway Interfaces"

In the section "General Issues and Workarounds" of Appendix B, Troubleshooting and Workarounds, the following bullet point reads:

- **One-time Workaround for Concurrent Programs and E-Commerce Gateway Interfaces**

    When working with Concurrent Programs and E-Commerce Gateway interfaces, you must perform the following workaround exactly once for a given E-Business Suite instance.

    > **Note:** This is to work around the known issue with the Adapter Configuration wizard being unable to preserve DEFAULT clauses for PL/SQL wrappers that it generates underneath the covers.

Load the following SQL file into the apps schema (using SQL*Plus) before launching the Adapter Configuration Wizard to create services for either Concurrent Programs or E-Commerce Gateway Interfaces.

```
ORACLE_
HOME\bpel\samples\tutorials\150.AppsAdapter\OrderImportConcur
rentProgram\bpel\XX_BPEL_FND_REQUEST_SUBMIT_REQUEST.sql
```

Since Concurrent Programs and E-Commerce Gateway interfaces work fine without the need of loading SQL file, this one-time workaround needs to be removed.

14

Oracle Application Adapters for Oracle WebLogic Server

This chapter describes issues and workarounds for the following Oracle Application Adapters for Oracle WebLogic Server 11*g*:

- Oracle Application Adapter for PeopleSoft
- Oracle Application Adapter for SAP R/3
- Oracle Application Adapter for Siebel
- Oracle Application Adapter for J.D. Edwards OneWorld

This chapter includes the following topics:

- Section 14.1, "Oracle Application Adapters: New Features"
- Section 14.2, "Oracle Application Adapters: General Issues and Workarounds"
- Section 14.3, "Application Explorer"
- Section 14.4, "Oracle Application Adapter for PeopleSoft: Issues and Workarounds"
- Section 14.5, "Oracle Application Adapter for SAP R/3: Issues and Workarounds"
- Section 14.6, "Oracle Application Adapter for Siebel: Issues and Workarounds"
- Section 14.7, "Oracle Application Adapter for J.D. Edwards OneWorld: Issues and Workarounds"

14.1 Oracle Application Adapters: New Features

The following topics discuss new features that pertain to Oracle Application Adapters for Oracle WebLogic Server 11*g*:

- Section 14.1.1, "Installation"
- Section 14.1.2, "J2CA Log File Management"
- Section 14.1.3, "Oracle Application Adapter for SAP R/3"
- Section 14.1.4, "Oracle Application Adapter for Siebel"
- Section 14.1.5, "Oracle Application Adapter for PeopleSoft"
- Section 14.1.6, "Oracle Application Adapter for J.D. Edwards OneWorld"

14.1.1 Installation

iWay Software provides an installation program to install the Oracle Application Adapters for Oracle WebLogic Server 11*g*. The installation program installs the Oracle Application Adapters, J2CA Connector, J2CA Test Servlet, and BSE framework on your file system. After installation is complete, these components must be deployed and configured. For more information, see the *Oracle Fusion Middleware Application Adapters Installation Guide for Oracle WebLogic Server*.

14.1.2 J2CA Log File Management

Improved management of the log files for the J2CA configuration is now provided. A configuration option is added, which allows you to specify the size and other options for the log files. A rollover facility is also available. For more information, see the *Oracle Fusion Middleware Application Adapters Installation Guide for Oracle WebLogic Server*.

14.1.3 Oracle Application Adapter for SAP R/3

- Support for SAP JCo Version 2.1.9.
- OracleAS 11*g* SCA-compliant WSDL for J2CA configurations.

14.1.4 Oracle Application Adapter for Siebel

- Support for RSA encryption provided by the JDB APIs.
- A PreParser tab is available in Application Explorer when configuring a channel (inbound) for the Siebel adapter. This allows the namespace of the Siebel inbound XML document to match the schema.
- Support for the JDB connection pool facility.
- OracleAS 11*g* SCA-compliant WSDL for J2CA configurations.

14.1.5 Oracle Application Adapter for PeopleSoft

- The HTTP listener is supported for the PeopleTools 8.1 series. This is in addition to the TCP listener.
- OracleAS 11*g* SCA-compliant WSDL for J2CA configurations.

14.1.6 Oracle Application Adapter for J.D. Edwards OneWorld

- The HTTP listener is supported for the J.D. Edwards OneWorld adapter. This is in addition to the TCP listener.
- A PreParser tab is available in Application Explorer when configuring a channel (inbound) for the J.D. Edwards OneWorld adapter. This allows the namespace of the J.D. Edwards OneWorld inbound XML document to match the schema.
- OracleAS 11*g* SCA-compliant WSDL for J2CA configurations.

14.2 Oracle Application Adapters: General Issues and Workarounds

The following topics discuss general issues that pertain to Oracle Application Server Application Adapters, Oracle WebLogic Server Adapter J2CA, and Oracle WebLogic Server Adapter Business Services Engine (BSE):

- Section 14.2.1, "Testing Outbound BPEL and Mediator Processes"

- Section 14.2.2, "HTTP Repository Connection"
- Section 14.2.3, "File Repository Usage"
- Section 14.2.4, "Using Business Services Engine for Inbound Processing"
- Section 14.2.5, "Synchronous Events"
- Section 14.2.6, "Ports Option for Inbound Processing"
- Section 14.2.7, "Supported Custom Objects"
- Section 14.2.8, "Adapter Compatibility"
- Section 14.2.9, "Unsupported Configuration"
- Section 14.2.10, "Encoding Support"
- Section 14.2.11, "J2CA Components"
- Section 14.2.12, "Invoking a Run-Time Message When BSE Is Unavailable"
- Section 14.2.13, "Invoking Outbound BPEL Process at Run Time Using BSE"
- Section 14.2.14, "Java Command Error in iwae.sh"
- Section 14.2.15, "Using the J2CA Test Tool for Outbound Only"
- Section 14.2.16, "BSE Web Services Browser Pages Do Not Support DBCS Input"
- Section 14.2.17, "Adapter Language Certification"
- Section 14.2.18, "File Channel"
- Section 14.2.19, "JDK Version Support for Application Explorer"
- Section 14.2.20, "Unsupported Adapter Functionality"

14.2.1 Testing Outbound BPEL and Mediator Processes

When testing an outbound BPEL process from the BPEL console or an outbound Mediator process from the Enterprise Manager (EM) console, do not use the XML envelopes that are generated by these consoles. Instead, remove them and use the XML payloads that are generated from the schemas, which conform to the WSDLs for namespace qualifications.

The Mediator data flows can be tested using the EM console. When creating a Mediator data flow and interactions, the Web services are created and registered with the Oracle Application Server. For more information about testing Web services, see your Oracle Application Server administrator and the following documentation:

- *Oracle Fusion Middleware Application Adapter for SAP R/3 User's Guide for Oracle WebLogic Server*
- *Oracle Fusion Middleware Application Adapter for Siebel User's Guide for Oracle WebLogic Server*
- *Oracle Fusion Middleware Application Adapter for PeopleSoft User's Guide for Oracle WebLogic Server*
- *Oracle Fusion Middleware Application Adapter for J.D. Edwards OneWorld User's Guide for Oracle WebLogic Server*

14.2.2 HTTP Repository Connection

HTTP repository connections are not supported for 11*g* Release 1 (11.1.1), which prevents you from connecting to the Oracle Application Adapters instance from a

remote machine. As a workaround, you must install Application Explorer on every platform where integration with Oracle Application Adapters using Application Explorer is required.

14.2.3 File Repository Usage

Do not use a File repository in development, testing, and production environments. As a workaround, use a database repository (for example, Oracle).

14.2.4 Using Business Services Engine for Inbound Processing

Using Business Services Engine (BSE) for inbound processing is not supported. BSE only supports services.

14.2.5 Synchronous Events

Synchronous event handling is not supported for the Oracle Application Adapter for Siebel, Oracle Application Adapter PeopleSoft, and Oracle Application Adapter J.D. Edwards OneWorld.

14.2.6 Ports Option for Inbound Processing

The ports option for inbound processing is not supported for J2CA events. Only the no-ports option is supported.

14.2.7 Supported Custom Objects

iWay continues to support the custom objects of an EIS. However, iWay cannot guarantee the support for all custom objects at the customer environment. Support to the custom object will be considered on a case by case option. Custom objects could fall under any of the following category:

- **SAP**

  BAPIs, RFCs, and ALE/IDocs

- **Siebel**

  Business Objects, Business Services, and Integration Objects

- **PeopleSoft**

  Component Interfaces and Messages

- **J.D. Edwards OneWorld**

  Business Functions and Transaction Types

It is recommended that customers who wish to troubleshoot an issue with the custom objects of an EIS, provide the following to iWay:

1. Data and definition of custom objects.

2. Request and response XML documents for the custom objects.

3. Reproduction steps for the custom object.

14.2.8 Adapter Compatibility

You cannot have multiple versions of the client library files in the same lib directory. Therefore, you cannot have one instance of the adapter configured to connect to

different EIS versions at the same time by using different versions of the client library files.

14.2.9 Unsupported Configuration

Installing the Oracle Application Adapters and iWay 55 (iWay Service Manager and the iWay adapters) on the same machine is currently not a supported configuration. As a workaround, use a separate machine for each version.

14.2.10 Encoding Support

The Oracle Application Adapters support only UTF-8 encoding.

14.2.11 J2CA Components

If you are working with a J2CA configuration and you create, update, or delete an adapter target or channel using Application Explorer, you must restart Oracle WebLogic Server. This is required to refresh the repository and recognize the new/updated target or channel in the J2CA Test Servlet, BPEL Process, and Mediator Process. The default URL for the J2CA Test Servlet is:

```
http://hostname:port/iwafjca
```

This applies to J2CA targets and channels only, not BSE targets. This also applies when a target or a channel parameter is modified using Application Explorer.

14.2.12 Invoking a Run-Time Message When BSE Is Unavailable

When invoking a run-time message while BSE is unavailable, a "Whitespace required" exception error occurs.

The error message "unable to connect to URL http://*host:port*/ibse..." appears.

14.2.13 Invoking Outbound BPEL Process at Run Time Using BSE

When invoking an outbound BPEL process at run time using BSE, a "Not able to find SoapRouter" message appears.

Workaround: Add the following element in the respective XML file:

```
<property name "optSoapShortcut">false</property>
```

14.2.14 Java Command Error in iwae.sh

When the **iwae.sh** file is executed, the "Java command is not found" error is generated.

As a workaround, you must set the JAVACMD path in the **iwae.sh** file to *OracleAS_home*/jdk/bin/.

For example:

```
C:\oracle\product\11.1.0\db_1\jdk\bin
```

14.2.15 Using the J2CA Test Tool for Outbound Only

The J2CA Test Tool must be used only for outbound (services). Inbound (events) activity options available in the tool are not supported.

14.2.16 BSE Web Services Browser Pages Do Not Support DBCS Input

When using a BSE configuration, the browser-based test tools add encodings to the content being sent. The BSE test tool causes characters to become garbled due to these added encodings. Therefore, you cannot perform a test using input that contains Japanese characters. A possible workaround is to use a tool that can send pure SOAP requests.

14.2.17 Adapter Language Certification

iWay Adapters are certified with the English language. However, on specific release levels, some iWay Adapters are also certified with the Japanese language. If you have encountered issues with other languages, please contact iWay Customer Support for a workaround.

14.2.18 File Channel

The File channel for events is not supported in production environments for the Oracle Application Adapter for PeopleSoft, Oracle Application Adapter for J.D. Edwards OneWorld, and Oracle Application Adapter for Siebel. The File channel is available only for testing purposes in a non-network environment. As a best practice, it is not recommended to use the File channel.

14.2.19 JDK Version Support for Application Explorer

Application Explorer only supports JDK version 1.6.x. Application Explorer will generate a `java.lang.UnsupportedClassVersionError` exception, if the Java version that is being used is not JDK version 1.6.x. As a workaround, verify that you have the the correct Java version installed when using Application Explorer. For example, your PATH environment variable should be configured as follows:

```
PATH=E:\wls_home\jdk160_05\bin;%PATH%
```

In this example, `wls_home` is the location where Oracle WebLogic Server is installed.

When JDK version 1.4.2_x is used, the following error is generated:

```
---------------------------------------------- starting java
----------------------------------------------
Exception in thread "main" java.lang.UnsupportedClassVersionError:
com/ibi/bse/gui/BseFlashScreen (Unsupported major.minor version 50.0)
        at java.lang.ClassLoader.defineClass0(Native Method)
        at java.lang.ClassLoader.defineClass(Unknown Source)
        at java.security.SecureClassLoader.defineClass(Unknown Source)
        at java.net.URLClassLoader.defineClass(Unknown Source)
        at java.net.URLClassLoader.access$100(Unknown Source)
        at java.net.URLClassLoader$1.run(Unknown Source)
        at java.security.AccessController.doPrivileged(Native Method)
        at java.net.URLClassLoader.findClass(Unknown Source)
        at java.lang.ClassLoader.loadClass(Unknown Source)
        at sun.misc.Launcher$AppClassLoader.loadClass(Unknown Source)
        at java.lang.ClassLoader.loadClass(Unknown Source)
        at java.lang.ClassLoader.loadClassInternal(Unknown Source)
```

When JDK version 1.5.0_x is used, the following error is generated:

```
---------------------------------------------- starting java
----------------------------------------------
Exception in thread "main" java.lang.UnsupportedClassVersionError: Bad
version number in .class file
```

```
                   at java.lang.ClassLoader.defineClass1(Native Method)
                   at java.lang.ClassLoader.defineClass(Unknown Source)
                   at java.security.SecureClassLoader.defineClass(Unknown Source)
                   at java.net.URLClassLoader.defineClass(Unknown Source)
                   at java.net.URLClassLoader.access$100(Unknown Source)
                   at java.net.URLClassLoader$1.run(Unknown Source)
                   at java.security.AccessController.doPrivileged(Native Method)
                   at java.net.URLClassLoader.findClass(Unknown Source)
                   at java.lang.ClassLoader.loadClass(Unknown Source)
                   at sun.misc.Launcher$AppClassLoader.loadClass(Unknown Source)
                   at java.lang.ClassLoader.loadClass(Unknown Source)
                   at java.lang.ClassLoader.loadClassInternal(Unknown Source)
```

14.2.20 Unsupported Adapter Functionality

The Oracle Application Adapter for SAP R/3, Oracle Application Adapter for PeopleSoft, Oracle Application Adapter for Siebel, and Oracle Application Adapter for J.D. Edwards OneWorld does not support functionality such as Transaction, XA, and two-phase commit.

14.3 Application Explorer

The following topics discuss issues that pertain to Application Explorer:

- Section 14.3.1, "Environment Variable and Permission Settings"
- Section 14.3.2, "Unable to Connect to Remote Machines Using File or DB Repositories for J2CA Configurations"

14.3.1 Environment Variable and Permission Settings

When starting Application Explorer, add the executable permission as follows:

```
chmod u+x $ORACLE_HOME/soa/thirdparty/ApplicationAdapters/tools/iwae/bin/iwae.sh
```

14.3.2 Unable to Connect to Remote Machines Using File or DB Repositories for J2CA Configurations

Application Explorer cannot be used to connect to remote machines for a J2CA configuration when using a File or DB repository. When using a J2CA configuration, SOA Suite must be installed on the same machine that is being used as the container for the adapters. If you need to use Application Explorer to connect to the SOA Suite on a remote machine, configure an HTTP repository instead. For more information on how to create a connection using an HTTP repository, see Section 14.2.2, "HTTP Repository Connection".

14.4 Oracle Application Adapter for PeopleSoft: Issues and Workarounds

The following topics discuss issues that pertain to Oracle Application Adapter for PeopleSoft:

- Section 14.4.1, "PeopleSoft LDAP Authentication Incompatible"
- Section 14.4.2, "Automatic Reconnect to PeopleSoft"
- Section 14.4.3, "HTTPS Protocol"
- Section 14.4.4, "PeopleSoft Messages"

- Section 14.4.5, "Limitation with Level 2 Scrolls"

- Section 14.4.6, "Limitation with Level 3 Scrolls"

- Section 14.4.7, "Limitation with Effective Dated Scrolls"

- Section 14.4.8, "Limitation When Inserting a Second Row for Level 1, 2, or 3 Scrolls"

- Section 14.4.9, "Limitation when Creating a Schema for Multilevel Component Interfaces"

- Section 14.4.10, "PeopleTools Date Format"

- Section 14.4.11, "Generating Java APIs"

- Section 14.4.12, "Differences Between Component Interface Functionality and Adapter Functionality"

- Section 14.4.13, "Missing Field Errors When Using a Component Interface"

- Section 14.4.14, "Support for Related Display Fields"

- Section 14.4.15, "Differences Between Component Interface Functionality and Adapter Functionality"

- Section 14.4.16, "Multiple Effective Dated Scrolls"

- Section 14.4.17, "Debug Message"

- Section 14.4.18, "LOCATION Component Interface"

- Section 14.4.19, "Component Interface Names"

- Section 14.4.20, "Component Interface Java API Compilation Errors (People Tools 8.46)"

14.4.1 PeopleSoft LDAP Authentication Incompatible

PeopleSoft LDAP authentication relies on sign-on PeopleCode. However, the authentication services that PeopleSoft provides with Component Interfaces do not invoke sign-on PeopleCode, so you cannot use PeopleSoft LDAP authentication with Oracle Application Adapter for PeopleSoft.

Workaround

None.

14.4.2 Automatic Reconnect to PeopleSoft

Oracle Application Adapter for PeopleSoft does not automatically reconnect when a connection to PeopleSoft becomes unavailable.

Workaround

None.

14.4.3 HTTPS Protocol

Oracle Application Adapter for PeopleSoft does not support the HTTPS protocol for events.

Workaround

None.

14.4.4 PeopleSoft Messages

Oracle Application Adapter for PeopleSoft uses messages only for events and not for services.

Workaround

None.

14.4.5 Limitation with Level 2 Scrolls

PeopleSoft has acknowledged a limitation with Component Interfaces that contain level 2 scrolls. If you try to insert a new row on a level 2 scroll, then a Null Pointer Exception error occurs.

If you receive this error, then you must upgrade your PeopleSoft release level.

This limitation is fixed in PeopleTools Version 8.16.08, and PeopleTools Version 8.17.02 in the 8.1x code line. It is tracked by PeopleSoft Incident T-MZYGAR-2C5YS.

In the 8.4x code line, this limitation is tracked by PeopleSoft Incident T-TCHURY-YZ9FR and is fixed in PeopleSoft 8.41.

Workaround

None.

14.4.6 Limitation with Level 3 Scrolls

PeopleSoft has acknowledged a limitation with Component Interfaces that contain level 3 scrolls. If you try to insert a new row on a level 3 scroll, then a Null Pointer Exception error occurs.

If you receive this error, then you must upgrade your PeopleSoft release level.

This limitation is fixed in PeopleTools Version 8.18 and is tracked by PeopleSoft Incident T-MZYGAR-D2529. However, this is still a limitation in PeopleSoft 8.41 and 8.42 (PeopleSoft Incident T-MZYGAR-3F72X). PeopleSoft has reported that this will be fixed in 8.43 (PeopleSoft incident report, 562734000).

Workaround

None.

14.4.7 Limitation with Effective Dated Scrolls

PeopleSoft has acknowledged that there is a limitation with effective dating and multiple transactions. If you want to insert multiple effective dated rows for the same primary keys, then you must use two separate transactions. This limitation is tracked by PeopleSoft Incident T-ACESAR-BS362.

Workaround

None.

14.4.8 Limitation When Inserting a Second Row for Level 1, 2, or 3 Scrolls

If you are trying to insert a level 1, 2, or 3 scroll and the following conditions exist:

- There is exactly one row for the level 1, 2, or 3 scroll.

- There are required field names that end in a numeric value.

An error message appears, in the following format:

```
This is an invalid property {ADDRESS_1} (91,15)
```

This example was created using the VNDR_ID Component Interface from the Financials application. Note that the actual property name is ADDRESS1.

Workaround

As a workaround, perform the following steps:

1. In the PeopleSoft Application Designer, open the Component Interface with which you are working.

2. Select the property that ends in a numeric value.

3. Right-click and select Edit Name from the context menu.

4. Change the name of the property.

    You can select a name that does not end in a number (for example, ADDRESSA), or you can add an underscore (for example, ADDRESS_1).

5. Save the Component Interface.

6. Regenerate the Java APIs for the Component Interface.

7. Use the revised property name in your XML transaction.

14.4.9 Limitation when Creating a Schema for Multilevel Component Interfaces

In later releases of the 8.1x series, if you try to create a schema for a multilevel Component Interface, then the following error occurs:

```
Index: -1, Size: 0
```

This is a result of a change in the back-end PeopleSoft interface in later versions of the 8.1 series.

Workaround

Use the `iwpsci84.jar` file and delete the `iwpsci81.jar` file from the `wls_home` `\erp-adapters\lib` directory.

> **See Also:**
>
> ■ *Oracle Fusion Middleware Application Adapters Installation Guide for Oracle WebLogic Server*
>
> ■ *Oracle Fusion Middleware Application Adapter for PeopleSoft User's Guide for Oracle WebLogic Server*

14.4.10 PeopleTools Date Format

The YYYY-MM-DD date format does not work for a Component Interface key.

PeopleSoft has acknowledged this limitation for most releases of PeopleTools and has addressed it in the newest releases. For more information, see PeopleSoft Resolution ID 200730918.

Workaround

Use the MM/DD/YYYY format. Alternatively, you can write a PeopleSoft method that takes a date format of YYYY-MM-DD, changes the date to a string, reformats it to DD/MM/YYYY, and passes it to the Component Interface date.

14.4.11 Generating Java APIs

It is possible to create Component Interfaces within PeopleSoft that are internally inconsistent. Inconsistencies have been found in some Component Interface templates that have been delivered by PeopleSoft. Indicators of this problem include errors when generating the Java APIs in the PeopleSoft Application Designer.

If you encounter errors while generating the Java APIs, then the Component Interface is likely to malfunction and can possibly corrupt your database. The correct operation of Component Interfaces when errors appear during API generation cannot be guaranteed. In addition, it is strongly recommended that the source of the errors is fixed before continuing.

Workaround

Fix the Component Interface using PeopleTools.

14.4.12 Differences Between Component Interface Functionality and Adapter Functionality

The differences between Component Interfaces and standard application functionality relating to panel processing have been observed. Among the possible symptoms of these differences are messages such as, "First Operand of . is NULL." Oracle Application Adapter for PeopleSoft should replicate the functionality of a PeopleSoft Component Interface, but only when the Component Interface is run through the PeopleSoft application server in three-tier mode.

If you notice differences between expected Component Interface functionality and adapter functionality, then you must verify that the differences are real by running the Component Interface with the PeopleTools Component Interface test tool in three-tier mode.

Workaround

Test the Component Interface using the PeopleTools Component Interface testing tool in three-tier mode only.

14.4.13 Missing Field Errors When Using a Component Interface

When using a Component Interface, it is difficult to determine which of the required fields are missing when you receive a PeopleSoft error message that states, "The highlighted field is required."

Workaround

You can edit the message in the PeopleSoft message catalog to pass a variable for the field name. For more information, see PeopleSoft Resolution 200731449.

14.4.14 Support for Related Display Fields

Related display fields are not supported by Component Interfaces.

Workaround

For more information, see PeopleSoft Resolution 200731974, which offers several workarounds.

14.4.15 Differences Between Component Interface Functionality and Adapter Functionality

PeopleSoft has acknowledged problems in the Component Interface back-end processor, which will cause the adapter to act differently than the Component Interface test tool in three-tier mode for certain Component Interfaces.

PeopleSoft Case 1965239 describes a problem with the CI_JOB_DATA_HIRE Component Interface in HR 8.1x. In this situation, the NAME field is not populated by PeopleCode correctly. The workaround is to manually populate the NAME field through the XML.

PeopleSoft Resolution ID 200728981 describes a problem with the JOBCODE Component Interface, which does not allow the REG_TEMP field to be changed to empty. As a workaround, customers must upgrade to a later release of PeopleTools.

Workaround

The workaround is dependent on the Component Interface.

14.4.16 Multiple Effective Dated Scrolls

A failure occurs when inserting multiple effective dated rows.

Workaround

If you want to insert multiple effective dated rows for the same primary keys, then you must use two separate transactions. This limitation is tracked by PeopleSoft Incident T-ACESAR-BS362.

14.4.17 Debug Message

For certain releases of PeopleTools 8.4x, you may receive the following message in your debug window:

```
PSProperties not yet initialized!
```

This is a PeopleSoft warning message you can ignore.

Workaround

None.

14.4.18 LOCATION Component Interface

When you attempt to access the LOCATION Component Interface using the Human Resources application, release 8.80.000, a failure occurs during runtime and the following message is displayed:

```
Component Interface Not Found
```

This is due to a problem in the way the PeopleSoft application has been delivered and is not related to the PeopleTools release.

Workaround

Perform the following steps:

1. Open the Component Interface in the PeopleTools Application Designer.

2. Make a small change to the Component Interface.

3. Undo the change.

4. Save the Component Interface.

This procedure resets certain internal PeopleSoft data structures, which enables Oracle Application Adapter for PeopleSoft to find the Component Interface. This has been observed in the LOCATION Component Interface running on the Human Resource applications release 8.8.000 on several different releases of PeopleTools, but it may occur in other Component Interfaces as well.

14.4.19 Component Interface Names

Although PeopleSoft permits Component Interface names that begin with certain special characters (such as an underscore), Application Explorer does not recognize such names.

Workaround

Begin Component Interface names with the letters A-Z or the integers 0-9.

14.4.20 Component Interface Java API Compilation Errors (People Tools 8.46)

When you compile all Java APIs for the Component Interfaces using People Tools 8.46, you may encounter compilation errors with some of the Component Interfaces.

Workaround

You can manually correct the Java source code of the failing Component Interfaces. Alternatively, if the failing Component Interfaces are not going to be used, then remove them from the API build process and do not include them in the build.

14.5 Oracle Application Adapter for SAP R/3: Issues and Workarounds

The following topics discuss issues that pertain to Oracle Application Adapter for SAP R/3.

- Section 14.5.1, "Native IDoc Format Support"
- Section 14.5.2, "SAP Java Connector (SAP JCo) Version Support"
- Section 14.5.3, "Date and Time Field Mapping"
- Section 14.5.4, "Intermediate Documents (IDocs) During Inbound Processing"
- Section 14.5.5, "SAP IDoc Data with Japanese DBCS Characters Overflows and Truncates Characters"
- Section 14.5.6, "No Values Set for Code and Details in Binding Fault"
- Section 14.5.7, "SAP R/3 Adapter Exceptions"
- Section 14.5.8, "Inconsistent Behavior With Multiple Channels"

14.5.1 Native IDoc Format Support

The native IDoc format for inbound processing is not currently supported for 11*g* Release 1 (11.1.1). This issue will be resolved by applying a patch in a future release.

14.5.2 SAP Java Connector (SAP JCo) Version Support

SAP JCo Version 2.1.8 is no longer supported by SAP. SAP recommends using SAP JCo Version 2.1.9. For more information, see SAP Note #1257539 in the SAP Service Marketplace.

For 11*g* Release 1 (11.1.1), the Oracle Application Adapter for SAP R/3 supports SAP JCo Version 2.1.8 and 2.1.9.

SAP JCo Version 2.1.8 is not supported on the Windows 64-bit platform. The JCo API does not support this platform.

iWay Software will fix any adapter issues that are encountered while using SAP JCo Version 2.1.8. However, if there are any SAP JCo issues, then migrating to SAP JCo Version 2.1.9 is recommended.

14.5.3 Date and Time Field Mapping

Many remotely callable functions have a field that has a DATE format. The DATE field object of an adapter is equivalent to the ABAP DATE object as an 8 byte string with the format YYMMDD. In the SAP GUI, other profiles may be executed that transform the data display in the SAP GUI environment. However, the data is always stored in the DATE object format. For ease of use, the SAP Java Connector (JCo) converts data for DATE objects that also have the format YYYY-MM-DD to YYYYMMDD. A field must have format DATE (ABAP type D) to enable these transformations. RFC and BAPI functions employ fields with type D objects. All data for IDocs is type C (Character) by definition of the EDI_DD40 structure in the ABAP dictionary. Therefore, IDocs only accept the YYYYMMDD format as no conversions are performed on the field.

The TIME field object of an adapter is equivalent to the ABAP TIME object as a 6 byte string with the format HHMMSS. In the SAP GUI, other profiles may be executed that transform the time display in the SAP GUI environment. However, the data is always stored in the TIME object format. For ease of use, the SAP Java Connector (JCo) converts data for TIME objects that also have the format HH:MM:SS to HHMMSS. A field must have format TIME (ABAP type T) to enable these transformations. RFC and BAPI functions employ fields with type T objects. All data for IDocs is type C (Character) by definition of the EDI_DD40 structure in the ABAP dictionary. Therefore, IDocs will only accept HHMMSS as no conversions are performed on the field.

14.5.4 Intermediate Documents (IDocs) During Inbound Processing

When using collected IDocs during inbound processing (service mode) where one XML file contains multiple IDocs, if a unique sequence number is not provided, SAP R/3 will correctly identify each header as a new IDoc. However, since SAP R/3 cannot determine a correct sequence, data from the first IDoc is taken and added (duplicated) to each subsequent IDoc. Any data segments that may follow are ignored.

You must provide a unique sequence number when passing collected IDocs to SAP R/3, so SAP R/3 can correctly interpret them as a sequence and determine the order of processing.

14.5.5 SAP IDoc Data with Japanese DBCS Characters Overflows and Truncates Characters

SAP IDoc data with Japanese DBCS characters overflows and truncates characters in all BSE and J2CA events and services.

Workaround

This will be fixed in a future release.

14.5.6 No Values Set for Code and Details in Binding Fault

If you use the wrong request XML to invoke a SAP outbound process in Oracle BPEL Console, then the instance will be faulted and a binding fault will be thrown. Log in to the Oracle BPEL Console, select the faulted instance, and then click **Audit**. No values are set for Code and Details in the binding fault.

Workaround

None.

14.5.7 SAP R/3 Adapter Exceptions

During outbound processing, the following type of exception from the BPEL or Mediator layer may occur in certain situations:

```
failed due to: Error in processing the input document.; nested exception is:
javax.resource.ResourceException: Error in processing the input document.
```

At the same time, the JCA log file that is generated by the adapter shows the exact error message. For example, if you use the GetDetail method for the CompanyCode SAP BAPI in your outbound processing, the following error message is shown in the JCA log file:

```
MySAP response error: BapiError: Company code 1010 does not exist
```

Workaround

Perform the following steps:

1. Open Application Explorer and connect to a configuration.

2. Expand the MySAP adapter node to view the available targets.

3. Right-click an available MySAP target node and select **Edit**.

   The Application Server dialog displays the target connection information.

4. Click the **Advanced** tab.

5. From the Error Handling list, select **Creates Error Document**.

6. Click the **User** tab.

7. In the Password field, type a valid password for the SAP R/3 application.

8. Click **OK**.

9. Close Application Explorer.

   Oracle BPEL or Mediator generates the error message in the response XML document. For example, if you use the GetDetail method for the CompanyCode SAP BAPI in your outbound processing, the following error message is shown in the XML response:

```
<companycode_get_detail_
oct24ProcessResponseurn:sap-com:document:sap:business.responsehttp://xmlns.orac
le.com/companycode_get_detail_oct24>
<COMPANYCODE_ADDRESS> </COMPANYCODE_ADDRESS>
<COMPANYCODE_DETAIL> </COMPANYCODE_DETAIL>
<RETURN>
<TYPE>E</TYPE>
<CODE>FN020</CODE>
<MESSAGE>Company code 1010 does not exist</MESSAGE>
<LOG_MSG_NO>000000</LOG_MSG_NO>
<MESSAGE_V1>1010</MESSAGE_V1>
```

```
            </RETURN>
          </companycode_get_detail_oct24ProcessResponse>
```

14.5.8 Inconsistent Behavior With Multiple Channels

When different channels are created using the same ProgramID, inconsistent behavior results. If JCO.Server is registered for every channel, then SAP R/3 should load balance across different registered JCO servers. For example:

```
PROGRAMID1--->Channel1-->DEBMAS01--->Proxy1
PROGRAMID1--->Channel1-->DEBMAS01--->Proxy2
PROGRAMID1--->Channel2-->DEBMAS01--->Proxy3
```

14.6 Oracle Application Adapter for Siebel: Issues and Workarounds

The following topics discuss issues that pertain to Oracle Application Adapter for Siebel.

- Section 14.6.1, "Additional Configuration in the Siebel Environment"

- Section 14.6.2, "Automatic Reconnect to Siebel"

- Section 14.6.3, "Updating or Deleting Siebel Records Using Oracle Application Adapter for Siebel"

- Section 14.6.4, "Adapter Exception Error If Siebel Request Document Contains Japanese Characters"

- Section 14.6.5, "HTTPS Protocol"

- Section 14.6.6, "Multi-Value Groups"

14.6.1 Additional Configuration in the Siebel Environment

Some out-of-the-box Siebel business services may require additional setup steps in the Siebel environment before they can be run successfully. For example:

- When using a business service such as EAI XML Converter, before generating the XSD for the integration object, you should use Siebel tools to remove the 'xml container element' tag in the integration components you plan to use.

- When building a solution with the EAI dispatch service business service, you may need to set up a named subsystem to handle HTTP requests.

14.6.2 Automatic Reconnect to Siebel

When connecting to Siebel using the Java Data Bean Interface, you cannot reconnect after initial connection loss. This might occur when Application Explorer experiences a brief loss of network connection or if the Siebel Server or Gateway Service is restarted while Application Explorer is logged into the Siebel application.

Workaround

To log in successfully to the Siebel application, restart your application server and Application Explorer. This is a known Siebel API issue. For more information, see Siebel Alert 984.

14.6.3 Updating or Deleting Siebel Records Using Oracle Application Adapter for Siebel

If you are logged in as a Siebel user that does not belong to the team that owns the record being updated or deleted, then you cannot perform the action. By default, the adapter is set to 'My' view. However, in Siebel Access Control there are other views, such as 'All' view and 'Organization' view. Therefore, even if the user does not belong to the team and the record is not visible in 'My' view, the user may be able to update or delete the record through another view in the Siebel front end. This is not possible through the adapter. The adapter requires that the user is part of the team of the record being updated or deleted.

Workaround

There are two possible workarounds:

- Log in through the Siebel adapter as a user that is already part of the team that owns the record you need to update or delete.

- Add the user to the team that owns the record you need to update or delete.

14.6.4 Adapter Exception Error If Siebel Request Document Contains Japanese Characters

An adapter exception error is returned if the Siebel request document contains Japanese characters in J2CA. The same request works in BSE.

Workaround

This will be fixed in a future release.

14.6.5 HTTPS Protocol

Oracle Application Adapter for Siebel does not support the HTTPS protocol for services and events.

Workaround

None.

14.6.6 Multi-Value Groups

Oracle Application Adapter for Siebel does not support Multi-Value Groups (MVG) with join specifications.

Workaround

None.

14.7 Oracle Application Adapter for J.D. Edwards OneWorld: Issues and Workarounds

The following topic discusses issues that pertain to Oracle Application Adapter for J.D. Edwards OneWorld.

- Section 14.7.1, "J.D. Edwards OneWorld Unit Of Work (UOW)"

14.7.1 J.D. Edwards OneWorld Unit Of Work (UOW)

The following section provides information on the J.D. Edwards OneWorld Unit of Work (UOW).

1. iWay recommends you to generate individual business functions of J.D. Edwards OneWorld and then group them together.

2. Generating the individual business functions and grouping them together is completely based on the experience and knowledge related to the business functions of J.D. Edwards OneWorld. There is no documentation on generating the UOW.

3. To create the XML Schema Document (XSD) files that can be used for UOW, perform the following steps:

   a. Trigger the appropriate event from the J.D. Edwards OneWorld GUI and generate an XML output file based on the event.

   b. Using the XML file, create an XSD file using an XML editor, such as XMLSPY.

   c. When creating the XSD, make sure that the XSD satisfies the SOA 11g namespace requirements. Manually add the namespace, target namespace, and other items that are required for SOA 11g.

4. Once generated, copy the XSD files for the UOW into the repository folder. This repository folder is automatically configured on your file system when a J.D. Edwards OneWorld target is created using Application Explorer.

15

Oracle Application Server Legacy Adapters

This document contains the following release information regarding Oracle WebLogic Server Legacy Adapters Version 11.1.1:

■ Notes and Limitations

15.1 Notes and Limitations

The following are the limitations for Oracle WebLogic Server Legacy Adapters Version 11.1.1:

Component	Description
CDC Adapters	When implementing a CDC solution that you created in Oracle Studio in JDeveloper, you must add the following information to the composite.xml:
	In the `binding` section of the composite.xml, add the name of the operation. For example:
	`operation=<name>`
CICS Adapter	OracleWLS fails to work against an interaction when the input and output records of the interaction have a field of the same complex type.
	Workaround: In Oracle Studio, find the Tuxedo adapter you are working with and open it in the Metadata Explorer. Under **Schema**, copy the record that is used in both records, then paste it into the schema with a new name. Open one of the records and replace the field type with the copy instead of the duplicated record name.
	For example:
	■ There is an interaction called `findDog` that includes `findDogInput` as the input record and `findDogResponse` as the output record.
	■ The `findDogResponse` record includes a field with a `findDogInput` type.
	■ In the **Schema** section, copy `findDogInput` and then paste it with a new name, such as `findDogInputCopy`.
	■ Right-click **findDogResponse** and select **Edit**. In the **Type** column, change **findDogInput** to **findDogInputCopy**.
Tuxedo Adapter	Interaction outputs must contain wrapping record that includes the actual interaction output. This record is automatically created by Oracle Studio, however if the user manually edits the interaction and does not use the wrapping record, an error is returned.

Component	Description
VSAM CICS Driver	Wrong results may be returned when executing a query with a less than (`<`) filter expression on an integer index segment. For example: `SELECT * FROM account where accountno < 10;` This occurs when the query processor accesses the table by the index. **Workaround** use the `<access(scan)>:` as shown in the example below to avoid accessing the table by index. `SELECT * FROM account <access(scan)> where accountno < 10;`
Oracle Studio	On Linux systems, the Studio shortcut in the Start menu does not work. To access Oracle Studio, Activate the Studio file in the Oracle Studio installation directory.
Solution Perspective	When selecting the server and staging area machines for a CDC solution, it is not possible to select a language and code page for the machines. English is used as the default language.
Solution Perspective	The CDC captured table list is not refreshed in the Solution Perspective. **Workaround**: Redefine the data source.
Solution Perspective	The **Activate workspaces** and **Deactivate workspaces** buttons are active without regard to whether the requested operation was carried out successfully. If the network is disconnected already, and you click **Deactivate workspaces**, an error is reported, and the **Activate Workspaces** command is available. However, the workspaces are still active.
Solution Perspective	In the CDC Stream Service CDC, when you get to the end and click **Back** to make corrections, the table column filters may become corrupt. To ensure that the columns you want are selected, in the Select Tables and Columns Filter page, expand the tables and make sure the correct columns are selected. If not, select or clear the columns and then proceed to the final page and select **Finish**.
Solution Perspective	When entering a staging-area machine in the Solution perspective, you must make sure to enter the path or other information correctly. For example, if you are using a UNIX machine, use a forward slash (/) separator. Oracle Studio does not verify that the information you entered is correct for the machine you are using. Therefore if you use the wrong information, the solution will not work.
Solution Perspective	The Access Service Manager in the Solution Perspective that is used to customize the staging area workspace is not working. The values that are set in this wizard are not saved and not deployed as part of the solution. **Workaround**: Make workspace customizations after the solution is deployed using the workspace editor in the Configuration view.
Solution Perspective	When selecting **Connect with fixed NAT**, the CDC solution fails on deployment with a connection error.
Solution Perspective	If you open the Design Step wizard when editing a CDC solution, the values for the **Client Type** and **Staging Area** are reset to their default values. Do not open the Design Step wizard to ensure that these values do not return to the default value. If you need to enter the Design Step wizard, make sure to reset these values.

Component	Description
Solution Perspective	If you change the name of a data source created in a CDC solution to a name that is used by another data source in the NAV binding, an error is returned. You should use a unique name for the data source.
Solution Perspective	If a CDC solution is imported and then deployed, Studio marks the solution as deployed, however it is not actually deployed on the server.
Solution Perspective	The link to open the replication script for MS SQL Server ODBC does not work on Linux computers. To open this file, copy it to a location on your Linux computer and open it from a text editor.
Design Perspective	When you create a CDC solution in the Solution perspective and disable the solution workspace, the workspace will be shown as active when you view it in the Design perspective. The status also remains as active after carrying out an update.
Design Perspective	Oracle Studio may lose the server connection without the possibility to refresh the connection from the Configuration view. Restart Oracle Studio to regain the connection.
Design Perspective	The Oracle Studio Test option for the Tuxedo Gateway adapter does not work.
Design Perspective	If you try to delete a cached table that was defined in the Metadata View for a relational data source an error is received. Changing between native metadata and cached metadata views does not work, and no error is returned.
Design Perspective	When selecting **Connect with fixed NAT**, the test adapter fails.
Design Perspective	When exporting the metadata for a data source by using the **Export XML definitions** option, all of the metadata is exported. If you want to export the definitions only, then export the XML through the binding. You can then remove the definitions for any data source included in the binding that you do not need.
Import Managers	The import enqueue and post interaction output are incorrect. For enqueue interactions, the output is always set as ENQ_OUT_ HEADER struct. The post interaction is sync-send only, which means that when you import a post interaction there will be no output and the interaction mode is set to sync-send.
Import Managers	The Tuxedo adapter, Tuxedo Queue adapter, and Tuxedo Gateway import manager wizards do not have a validation mechanism and will accept any data entered.
Import Managers	If you select Finish in the Database adapter metadata import wizard before reaching the final step (called Import the Metadata), incorrect metadata is generated.
Import Manager	In a Tuxedo import, when you retrieve the input files from an FTP connection, an error is returned when you go the next step in the import wizard.
Utilities	The NAV_UTIL service with param option is not recognized.
Utilities	Executing the NAV_UTIL command without parameters in Linux causes the utility to shut down.
Utilities	When calling a procedure which returns at least one result set, the SQL Utility doesn't return the first row of the first record set.
Security	If the daemon is set to be used by a specific user and the database being accessed requires a user and password for access, the CDC solution fails.

Component	Description
Installation	When Uninstalling with an open application that uses NAV_UTIL or other Oracle dlls, an error is displayed. You can ignore this error.
Installation	When upgrading from version 10.1.3.3, you must use the upgrade option in the installation wizard. Do not uninstall Version 10.1.3.3 and then install the newer version. If you do this, you will lose all data in the Def directory
Installation	You cannot install Oracle Connect version 11.1.1 side-by-side with version 10.1.3.3 and earlier.
MS SQL Server CDC	The MS SQL CDC only supports a single bit Column in tables.
MS SQL Server CDC	Connection errors are returned when working with a CDC solution for MS SQL Server with Windows authentication and no authentication information is entered for the CDC adapter.

16

Human Workflow

This chapter describes issues associated with human workflow. It includes the following topics:

- Section 16.1, "General Issues and Workarounds"
- Section 16.2, "Configuration Issues and Workarounds"

16.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topics:

- Section 16.1.1, "Close the .rule File Before Editing Rulesets for Additional Participants"
- Section 16.1.2, "Using Multibyte Characters in Plain Text/HTML Document Task Attachments"
- Section 16.1.3, "Schema Elements Not Displaying in Expression Builder for Old Projects"
- Section 16.1.4, "HierarchyBuilder and HierarchyPrincipal Not Visible in Expression Builder"
- Section 16.1.5, "FYI Tasks Must Be Claimed Before They Can Be Dismissed"
- Section 16.1.6, "Task Attachments are Automatically Saved"
- Section 16.1.7, "Push Back Action Not Supported If Including the Task History of Another Task"
- Section 16.1.8, "Editing Visibility Rules Invokes a Feedback Dialog with an Exception Error"
- Section 16.1.9, "Approve and Reject Actions in Actions Tab for Admin User Should Be Disabled"
- Section 16.1.10, "Specifying Date From and Date To Values on Notification Management Page"
- Section 16.1.11, "Some Fields Do Not Display After Updating and Saving a ToDo Task in a Portlet"

16.1.1 Close the .rule File Before Editing Rulesets for Additional Participants

If you add a ruleset to a task participant in the Human Task Editor, this automatically opens the Oracle Business Rules Designer and a corresponding `.rule` file for editing.

If you then want to add or remove rulesets for additional participants in the Human Task Editor, ensure that you first close the `.rule` file. This can be done by clicking the **x** icon for the `.rule` file tab above the editor. The `.rule` file cannot be edited (adding or removing rulesets) unless this file is first closed and reopened.

16.1.2 Using Multibyte Characters in Plain Text/HTML Document Task Attachments

If you select **Send task attachments with email notifications** in the **Advanced** tab of the **Notifications** section of the Human Task Editor and add a plain text/HTML document as the task attachment, multibyte characters in the email attached document are replaced with question marks. As a workaround, use a binary document (such as `.doc`) as the task attachment.

16.1.3 Schema Elements Not Displaying in Expression Builder for Old Projects

If you open a human task file from a release prior to 11*g* PS2, schema elements do not display in the Expression Builder. For example, perform the following steps:

1. Open the human task file in Oracle JDeveloper.

2. In the **Assignment** section, double-click the participant type and add a participant using the Expression Builder. Note that the schema elements do not display in the **Schema** section of the Expression Builder dialog. Only the file location is shown.

For 11*g* R1 and PS1 human tasks, there is a workaround:

1. Edit anything, such as adding a space in the **Task Title** field, and select **File** > **Save All**.

2. Close the human task file and reopen it. The Expression Builder correctly displays the schema elements.

Note that this workaround does not apply to 10*g* human task files.

16.1.4 HierarchyBuilder and HierarchyPrincipal Not Visible in Expression Builder

The visibility flags for the **getManager** and **getPrincipal** methods are not enabled in the Oracle Business Rules Editor. This causes the **HierarchyBuilder** and **HierarchyPrincipal** functions to not be visible in the Expression Builder dialog.

To make these functions visible, you must first enable the visibility flags for the **getManager** and **getPrincipal** methods in the Oracle Business Rules Editor.

1. Go to **Facts** > **Java Facts**.

2. Click **HierarchyBuilder**.

3. Click **Edit**.

4. Change the attribute to **Methods**.

5. Check the visibility for the **getManager** and **getPrincipal** methods.

16.1.5 FYI Tasks Must Be Claimed Before They Can Be Dismissed

If an FYI task is sent to multiple users, a user must first select the **Claim** button to claim the task before they can dismiss it.

16.1.6 Task Attachments are Automatically Saved

When you add an attachment to a task in Oracle BPM Worklist, it is automatically saved without you having to explicitly save it.

This can cause a conflict in a scenario in which you added an attachment, forgot to delete it, assumed that it was not saved (because you never performed a save action), and then reassigned, approved, or performed a similar action on the task. As a consequence, the task attachment was sent to the next assignee even though you did not intend to send it.

As a workaround, delete the attachment if it was added inadvertently before routing the task to others.

16.1.7 Push Back Action Not Supported If Including the Task History of Another Task

When you include the task history of another task in a SOA composite application, selecting the push back action in Oracle BPM Worklist is not supported. For example:

1. Create a SOA composite application that includes a BPEL process.

2. In Oracle BPEL Designer, drag a human task into the BPEL process.

3. In the Create Human Task dialog, select the **Add** icon to invoke the Human Task Editor.

4. Create a human task (for example, named `humantask_1`).

5. Add a payload to the task and assign the task to a user (for example, **jcooper**).

6. Save the human task and exit the Human Task Editor.

7. In Oracle BPEL Designer, drag a second human task into the BPEL process.

8. Create a second human task (for example, named `humantask_2`) and add a payload to the task.

9. Assign the second task to another user (for example, **jstein**).

10. Click the **Advanced** tab for the second human task and select the **Include task history from** checkbox.

11. From the dropdown list, select the first task, **human_task1**.

12. Select **Use existing payload**.

13. Save and deploy the SOA composite application.

14. Invoke an instance of the SOA composite application.

15. Log in to Oracle BPM Worklist as the assignee of the first task (**jcooper**), and approve the task for **human_task1**.

    The task is completed.

16. Log in to Oracle BPM Worklist as the assignee of the second task (**jstein**).

    The task for **human_task2** is displayed.

17. From the dropdown box, select **Push back**.

    Although a push back is completed successfully, the task is still assigned to **jstein**.

16.1.8 Editing Visibility Rules Invokes a Feedback Dialog with an Exception Error

If you make changes to the visibility rules in the Access page of the Human Task Editor (for example, set assignees to have no access to task history), save your changes,

switch to **Source** view, and then switch back to **Design** view, a feedback dialog is displayed with an exception error.

Close this dialog. There is no loss of functionality.

16.1.9 Approve and Reject Actions in Actions Tab for Admin User Should Be Disabled

In the **Actions** tab of the Access page of the Human Task Editor, the Admin user is incorrectly assigned the actions Approve and Reject by default. These checkboxes should be disabled. During runtime, if you log in to Oracle BPM Worklist as the Admin user, the actions Approve and Reject are not in the **Actions** dropdown list. This is the expected behavior.

16.1.10 Specifying Date From and Date To Values on Notification Management Page

You must specify values for *both* the **Date From** and **Date To** fields in the **Search** sections on the Notification Management page in Oracle Enterprise Manager Fusion Middleware Control Console to receive the correct search results. These fields do not work independently. Specifying values for only one of these fields does not display the correct search results. To access these fields:

1. Right-click **soa-infra** in the navigation tree, and select **Service Engines** > **Human Workflow** > **Notification Management**.

2. Expand the **Search** icon in the **Outgoing Notifications** section or **Incoming Notifications** section to display the **Date From** and **Date To** fields.

16.1.11 Some Fields Do Not Display After Updating and Saving a ToDo Task in a Portlet

After you update and save a ToDo task or a ToDo subtask for a business task in a Worklist Portlet, the following fields should appear, but do not: **Assignee**, **Status**, and **Search** options.

16.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topic:

- Section 16.2.1, "English Is the Only Language Included in the Default localeList"

16.2.1 English Is the Only Language Included in the Default localeList

For better performance, only the English language is listed for the **LocaleList** property in the System MBean Browser in Oracle Enterprise Manager Fusion Middleware Control Console. If you want to display the task title, category, and subcategory in other languages or add additional languages, you must change the required language locale in the System MBean Browser.

1. Right-click **soa-infra** in the navigator, and select **Administration** > **System MBean Browser**.

2. Expand **Application Defined MBeans** > **oracle.as.soainfra.config** > **Server:** *server_name* > **WorkflowConfig**.

3. Click **human-workflow**.

4. To change the language, perform the following steps:

   a. In the **Name** column, click **LocaleList**.

    b. In the **Value** field, click the value.

    c. In the **Name** column, click **Language**.

    d. In the **Value** field, change **en** to the language value that you want to use.

    e. Click **Apply**.

5. To add additional languages, perform the following steps:

    a. Click the **Operations** tab.

    b. In the **Name** column, click **createLocale**.

    c. In the **Value** field, enter a value. For better performance, ensure that you include only the languages that you need for task title, category, and subcategory.

    d. Click **Invoke**.

17

Oracle B2B

This chapter describes issues associated with Oracle B2B. It includes the following topics:

- Section 17.1, "General Issues and Workarounds"
- Section 17.2, "Configuration Issues and Workarounds"
- Section 17.3, "Documentation Errata"

17.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 17.1.1, "Upgrading from Oracle Integration B2B 10g to Oracle B2B 11g"
- Section 17.1.2, "Using Oracle B2B Online Help"
- Section 17.1.3, "Non-administrator Users Can Perform Certain Administrative Tasks"
- Section 17.1.4, "replyToAppMessageId Incorrectly Set in Ack Notifications"
- Section 17.1.5, "Batch Messages and Batch Schedules"
- Section 17.1.6, "Notification Is Not Available for an Ack Received for an EDI FA"
- Section 17.1.7, "FileNotFoundException Message After Saving an EDI Document Definition"
- Section 17.1.8, "Incorrect User Information for Receipt Notification (AS2 MDN) to AQ"
- Section 17.1.9, "Application Message Report Displays Incorrect Document Type"
- Section 17.1.10, "Generated MDN Incorrectly Uses Name Identifier in Inbound Agreement"
- Section 17.1.11, "Oracle B2B Signs MDN Using the Algorithm Set in the Agreement Delivery Channel"
- Section 17.1.12, "Sending an Unknown AS2 From-Header Is Not Recognized as an Error"
- Section 17.1.13, "Incorrect URL in the Wire Message for a Received Synchronous MDN"
- Section 17.1.14, "Invalid EDI Interchange ID Qualifier or Function Group Identifier Is Not Recognized as an Error"

17.1.1 Upgrading from Oracle Integration B2B 10g to Oracle B2B 11g

See the following for upgrade information:

17.1.2 Using Oracle B2B Online Help

Allow pop-ups (disable the browser pop-up blocker) to use the Oracle B2B online help.

17.1.3 Non-administrator Users Can Perform Certain Administrative Tasks

Although the Save button is not displayed on the Agreement page for remote partner administrators, these users can update and save agreements by editing the agreement name on non-deployed agreements, and then updating and saving the agreements. Oracle B2B does not check the user authorization in this case.

17.1.4 replyToAppMessageId Incorrectly Set in Ack Notifications

Oracle B2B offers a notification of an Ack (AS2-MDN or EDI-FA) that is sent back to a composite or AQ (IP_IN_QUEUE) if configured using the Oracle B2B interface (Administration > Configuration page). The received Ack notification appears similar to the following:

```
<Acknowledgment xmlns="http://integration.oracle.com/B2B/Acknowledgment"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance">
<replyToB2BMessageId>0AB1FE0211FE9335702000000120666E0</replyToB2BMessageId>
<replyToAppMessageId>0AB1FE0211FE9335702000000120666E0</replyToAppMessageId>
<ackB2BMessageId>0AB1FE0211FE9338CB80000012066930-1</ackB2BMessageId>
</Acknowledgment>
```

Note, however, that the `replyToAppMessageId` is always incorrectly set to be the same as the `replyToB2BMessageId`.

17.1.5 Batch Messages and Batch Schedules

Note the following:

- If an exception occurs during an outbound batch, the batch is not cleared from the repository. This is true even if a trigger has been fired. In this case, you must manually delete the scheduled batch entry using the Administration > Manage Batch page in the Oracle B2B interface.

- If you disable a single time invocation batch schedule, any messages set in WAIT_BATCH mode remain in this mode if the schedule is not re-enabled before the expiry time. Furthermore, a new batch schedule created for the same document will not process these messages. The workaround is to resend the message using the resubmit application message option.

17.1.6 Notification Is Not Available for an Ack Received for an EDI FA

Receipt notification does not occur for an Ack (AS2-MDN) received back for an EDI FA document that was sent.

17.1.7 FileNotFoundException Message After Saving an EDI Document Definition

After creating an EDI document definition, accessing and saving the document definition (when no updates have been made to the ecs file) can cause a FileNotFoundException message to be generated.

17.1.8 Incorrect User Information for Receipt Notification (AS2 MDN) to AQ

When delivering a receipt notification (AS2 MDN) to AQ, Oracle B2B incorrectly sets the user information to the document routing ID (if the outbound document has a document routing ID set) instead of b2backuser.

17.1.9 Application Message Report Displays Incorrect Document Type

The application message report in the Oracle B2B interface incorrectly displays document types. Specifically, the application message report displays the following:

- For receipt messages, the displayed document type is for the outbound message. If you want to collect metric data on the number of inbound application messages for a specific document type, the issue can cause queries to report incorrect data.

■ For FA messages, the displayed document type is the same as the FA message type.

17.1.10 Generated MDN Incorrectly Uses Name Identifier in Inbound Agreement

In synchronous AS2 mode, the generated MDN uses the AS2 Identifier set in the inbound agreement. If no AS2 Identifier is defined in the agreement, then the generated MDN incorrectly uses the name identifier. The workaround is to set the expected AS2 Identifier in the inbound agreement.

17.1.11 Oracle B2B Signs MDN Using the Algorithm Set in the Agreement Delivery Channel

In AS2, a request for a signed MDN from the recipient can specify the algorithm to use for signing. Oracle B2B, however, incorrectly signs the MDN with the algorithm set in the agreement delivery channel. This algorithm may be different from the requested algorithm.

17.1.12 Sending an Unknown AS2 From-Header Is Not Recognized as an Error

When receiving an EDI document over an AS2 exchange, if Oracle B2B fails to identify the trading partner using the AS2 From Identifier, Oracle B2B tries to identify the partner using the EDI Interchange and Group ID. The failure to identify the partner by the AS2 Identifier is ignored.

17.1.13 Incorrect URL in the Wire Message for a Received Synchronous MDN

The synchronous MDN received by the host server in response to an AS2 message sent over SSL shows an incorrect URL in the wire message. Specifically, the URL indicates the HTTPS protocol while the port information is for the HTTP listen port.

17.1.14 Invalid EDI Interchange ID Qualifier or Function Group Identifier Is Not Recognized as an Error

Setting an invalid EDI Interchange ID Qualifier or an invalid Function Group Identifier (not part of the default ecs Qualifier Standard Code List_105 or Function Identifier Code Standard Code List_479 respectively) is not signalled as a MSG_ ERROR in the outbound case. Oracle B2B instead delivers the message to the configured endpoint without error.

17.1.15 Oracle Enterprise Manager Shows Incorrect Error Count Following Successful Resubmit

When a B2B channel is configured to retry following an error (such as a transport channel being unavailable) and the message is subsequently successfully delivered, Oracle Enterprise Manager fails to adjust the corresponding error count.

17.1.16 XEngine Is Not Installed on the Second Node in a Clustered Environment

In a clustered environment, the XEngine is not installed on the second node when the node is on another computer. This is because the XEngine extraction occurs only when you run the Configuration Wizard (which is not run automatically on the second node). The workaround is to perform the XEngine extraction manually and then restart the server.

17.1.17 EDI Batching Results in Incorrect Average Message Size on Metrics Page

When Oracle B2B batches multiple messages into a single message, the native message size for each business message is recorded as the size of all messages in the batch. This results in Oracle B2B reporting an incorrect average message size on the Metrics pages of the Oracle B2B interface.

17.1.18 User Deleted Using Oracle WebLogic Console Continues to Appear in Oracle B2B Interface for Several Minutes

After deleting a user using Oracle WebLogic Server Administration Console, the user continues to appear in the Oracle B2B interface for approximately five minutes. This is because the user information remains cached in the managed server (Oracle B2B) for a user-configurable period of time. Performing certain operations, such as provisioning this user, can generate an error.

The workaround is to wait for longer than five minutes after deleting a user using Oracle WebLogic Server Administration Console.

Alternatively, you can specify the following system property in the `setDomain.sh` file to disable the cache:

`-Dweblogic.security.identityAssertionTTL=-1`

17.1.19 Do Not Purge Instance Metadata When Messages Are Being Processed

Do not purge instance metadata (using the Purge Instance Metadata button on the Administration > Purge tab) when messages are being processed. Doing so can result in messages in progress being lost. Instead, use the `b2bpurge` command-line utility, which accepts a date range and message state as arguments. When using the `b2bpurge` command, remove messages in the Completed state only (unless you have a specific reason for doing otherwise).

17.1.20 Test Page for B2BMetadataWSPort Is Not Found

The test page for B2BMetadataWSPort results in a "404 Not Found" error. The workaround is to change the port number in the URL for the link from the managed server port to the admin server port (7001) and try again.

17.1.21 Use the Oracle B2B Interface Instead of Command-Line Utilities in a Clustered Environment

In a clustered environment, do not use the B2B command-line utilities for purging data, importing data, and exporting data. Use the Oracle B2B interface for these functions.

17.1.22 ebMS Negative Acknowledgments for Decryption and Signature Failures

For ebMS documents, negative acknowledgments for decryption and signature failures are sent as security severity errors. For all other negative ebMS acknowledgments, the error is set as UnknownError.

17.1.23 Issues When Resubmitting Messages Using the AS2 Exchange

Under certain circumstances, resubmitting an asynchronous AS2 inbound wire message does not work as expected. For example, change the state of an inbound agreement to inactive. On receiving a message, a negative acknowledgment is

generated and sent back. The sender sees the message state as MSG_ERROR on receipt of the negative acknowledgment. Resolve the issue on the inbound side by changing the agreement state from inactive to active. Now two scenarios for resubmitting the asynchronous message exist:

Scenario A: Resubmit the wire message at the sender's side. Because the message was already processed at the receiver's end, this results in a duplicate error message.

Scenario B: Resubmit the wire message at the receiver's end. This passes at the receiver's end and pushes back a positive acknowledgment message. However, the state of the message on the sender's side is not changed. Although scenario A can be expected, scenario B should have worked. However, because the state of the message is MSG_ERROR, the incoming positive acknowledgment is ignored. This results in inconsistency in reporting at the two ends. The inbound side passes the message to the back-end successfully, whereas the outbound side has the message in the MSG_ ERROR state.

17.1.24 Instance Data Access Java API Is Not Available

The Oracle B2B Instance Data Access Java API is not available in this release. The API will be available in a future release.

17.1.25 XSLTCallout Is Not Available

The predefined callout, XSLTCallout, is not available in this release.

17.1.26 JTA Settings Based on Loads

Based on the database load and the application server load, tune the transaction timeout setting in the Oracle WebLogic Server Administration Console. Select JTA from the home page and increase the default setting of 30 to a higher value.

17.1.27 Settings for Large Payloads When Using Enqueue Scripts

Set the following properties in the enqueue.properties file when enqueuing large payloads:

```
payload=payload_filename_with_absolute_path
eventName=LARGE_PAYLOAD=true
```

Because the full directory path must be provided, use the local computer for this operation.

17.1.28 FTPS Connection Times Out with Implicit SSL Encryption

Implicit SSL encryption is not supported in the transport layer.

17.1.29 %ACTIONNAME% Filename Format Is Not Recognized

The %ACTIONNAME% filename format is not recognized when used with the File, FTP, and SFTP transport protocols.

17.1.30 RosettaNet Message Encoded in UTF-16 Fails at the Receiver's End

Oracle B2B is unable to process an inbound RosettaNet message encoded as UTF-16. A document protocol identification error is returned.

17.1.31 Save Autogenerated Agreements Before Deployment

Save autogenerated agreements at least once before the agreements are deployed. The agreement parameter settings for translation/validation and FA are generated in the agreement only when you save an agreement and not when it is autogenerated. Although the interface may show the default values, they are not captured in the agreement metadata and are ignored at run time; that is, the inbound EDI message may not be translated.

17.1.32 Some Listening Channel Details Are Not Relevant for the Selected Protocol

On the Listening Channel tab, some parameter fields that are displayed in the Channel Details area based on your protocol selection are not relevant to that protocol. Entering a value for these parameters has no effect. Table 17–1 lists the parameter fields that are *not* relevant.

Table 17–1   Fields That Display but Are Not Relevant for the Selected Protocol

If you select this protocol...	Then you can ignore these parameter fields...
AS1-1.0	Subject, Send as attachment, Ack Mode, Response Mode, Retry Count, Retry Interval, all fields on the Security tab
Generic File-1.0	Retry Count, Retry Interval
Generic AQ-1.0	Retry Count, Retry Interval
Generic FTP-1.0	Use Proxy, Retry Count, Retry Interval
Generic SFTP-1.0	Retry Count, Retry Interval
Generic JMS-1.0	Retry Count, Retry Interval
Generic Email-1.0	Subject, Send as attachment, Retry Count, Retry Interval

17.1.33 FTP Listening Channel Does Not Have Proxy Support

The Generic FTP-1.0 protocol for a listening channel does not have proxy support.

17.1.34 b2bpurge Command-Line Utility May Not Terminate Listening Threads for Inactive Channels

When using the `b2bpurge` command-line utility, if inactive channels exist, then those listening threads are not terminated. The workaround is to repeat the `b2bpurge` call two or three times until the listening threads for the inactive channels are terminated.

17.1.35 Exporting Multiple Agreements That Include Agreement Names That Use a Multibyte Character Language

If you select multiple agreements to export (from Administration > Import/Export), and any of those agreement names are in a multibyte character language, then in the export ZIP file, which contains a separate ZIP file for each agreement, the ZIP file names for the agreement names with the multibyte characters are garbled. The ZIP files with the garbled names are corrupted and cannot be successfully imported. However, a single agreement name (or repository name) in a multibyte character language is exported correctly.

17.1.36 ebMS Delivery Channel Is Required for ebMS Inbound Agreements with Asynchronous Ack Mode

For an inbound agreement that uses an ebMS exchange with the Ack Mode parameter set to asynchronous, an ebMS delivery channel is required.

17.1.37 Even with the Log Level Set to Default, Details Are Written to the Log File

Normally the default log level suppresses details in the log file. However, for RosettaNet deployments, log details are not suppressed even with the default log level setting.

17.1.38 Enabling Multibyte Support for EDIFACT and HL7 Documents

For documents using the XEngine, such as EDIFACT and HL7 documents, when you have a payload with multibyte characters that are not in the EDIFACT and HL7 document character set registry, you may see the error, "A data element contains characters not listed in the allowed character set."

To avoid this error, create a custom character set (CS) file in Oracle B2B Document Editor called `user.cs`:

1. In Oracle B2B Document Editor, click **Tools** > **Character Set Registry**.

2. In the Character Set Registry window, select the character set you want to override.

   For example, you may want to override EDIFACT UNOB CS or HL7 CS.

3. Click the **Duplicate** icon.

4. In the Duplicate Character Set Properties window, accept the defaults and add the specific multibyte characters at the end of the Charset blank; then click **OK**.

5. With the duplicated file still selected, click the **Export** icon.

6. Name the file `user.cs` and save it.

7. Copy `user.cs` to

   `ORACLE_HOME/soa/thirdparty/edifecs/Common`

Now documents such as EDIFACT and HL7 will use the `user.cs` file instead of the default CS file to verify the payload file.

17.1.39 Using Document Definition Names with Multibyte Characters in JDeveloper

When working with document definition names with multibyte characters (MBCS-named document definitions) in the B2B Configuration Wizard in JDeveloper, you may see the error " Invalid UTF8 encoding" at the step where the document definitions are loading for you to select the document definition for the service. This occurs when JDeveloper is running in a non-UTF-8 environment (for example, in Windows, using Simplified Chinese Win2k3, or in a native encoding Linux OS, using zh_CN.gb18030). However, in a Linux environment with UTF-8 encoding, such as zh_CN.utf8, MBCS-named document definitions load correctly. After loading, the MBCS-named document definition becomes the name of the document XSD folder in JDeveloper.

To ensure that MBCS-named document definitions load and display correctly in the B2B Configuration Wizard, do the following:

- When using JDeveloper in a Linux environment, first set the `LANG` and `LC_All` environment variables to a locale with the UTF-8 character set. This enables the operating system to process any characters in Unicode. Then start JDeveloper.

- When using JDeveloper in a Windows environment, start JDeveloper using UTF-8 encoding with `jdev -J-Dfile.encoding=utf-8`.

17.1.40 NULL May Be Displayed in the Document Definition Names for Cloned Partners

Exports from an 11*g* R1 SOA - Oracle B2B installation that contain cloned trading partners will show *null* for document definition names for the definitions in the cloned trading partner. (This issue is not seen with partners cloned using the 11*g* PS1 SOA - Oracle B2B installation.) For example, the definition will appear as EDI_X12-4010-850-null.

When this occurs, recreate the document definition as follows:

1. Delete agreements associated with the document definition. (If you do not delete the agreement, trying to delete the definition produces an error.)

2. Delete the document definition.

3. Create the document definition and add it to the trading partner.

4. Create new agreements containing the document definition.

17.1.41 Suppressing Validation Errors on Extra Elements in HL7 Messages

For HL7 messages, set `HL7.AllowExtraData` to false in `XERegistry.xml` to suppress validation errors on extra elements.

The `XERegistry.xml` file is located in the following directory:

`SOA_HOME\thirdparty\edifecs\XEngine\config`

17.1.42 Oracle B2B in High Availability Environments

See Section 6.2.11, "Message Sequencing and MLLP Not Supported in Oracle B2B HA Environments," for more information.

17.1.43 Methods for Recovering Messages in High-Stress Environments

Use the following solutions to recover messages that would otherwise be lost in high-stress environments involving outbound messages with multiple instances of Oracle B2B running, each with multiple threads.

Situation 1: Duplicate File Names

In situations where all message file names, *TPname_timestamp*, are sent to the same directory, the timestamps include milliseconds; thus, in normal situations, all file names are unique. However, in high-stress environments, duplicate file names can occur, resulting in files being overwritten by a later file with the same name.

The solution is to append the unique MSG_ID value to file names. In the B2B interface, go to the Partners link and select a remote trading partner. Go to Channels > Transport Protocol Parameters. For channels where the **Filename format** parameter is applicable, add %MSG_ID% as a filename format macro. All file names will then be unique.

Situation 2: Exhausted Message Redelivery Attempts

If you see the message `java.lang.RuntimeException: AppMessage is null:`*msg_id*, a race condition may be indicated. A race condition occurs when a

JMS event has been enqueued and dequeued for processing, but the corresponding message is not committed in the run-time repository. The B2B engine will retry the transaction, but it may fail if retry occurs immediately. If all retry attempts are exhausted, the event delivery transaction is rolled back and an exception message is sent to the configured exception queue, if an exception queue is configured.

To configure the exception queue and to resubmit exhausted redelivered messages from the exception queue to B2BEventQueue, use Oracle WebLogic Server Administration Console.

Do the following:

1. Create a queue and name it something like B2BEventException.

2. In the console, go to the settings for B2BEventQueue (Home > JMSModules > SOAJMSModule) and click the Configuration > Delivery Failure tab.

3. For Expiration Policy, select Redirect.

4. For Error Destination, select the queue you created in step 1 (for example, B2BEventException).

   The messages that cannot be processed by B2B for the given redelivery count are forwarded to this error destination queue.

5. Move the messages from the configured error destination queue to B2BEventQueue to resubmit the messages for processing.

   See the Oracle Fusion Middleware Oracle WebLogic Server Administration Console Online Help topic, "Manage queue messages," for how to move messages.

17.1.44 Inbound ebMS Messages Checked Irrespective of Duplicate Elimination Setting

According to ebMS standards, Oracle B2B must check for duplicate inbound ebMS messages *only* if the DuplicateElimination tag is present in the ebMS message. However, currently, B2B tries to detect duplicate inbound ebMS messages irrespective of whether the DuplicateElimination tag is present or not in the ebMS message.

17.1.45 Resubmitting Outbound Complete ebMS Message Errors Out When @ Is Present in b2bmsgid

The @ symbol is not supported in Msgid.

17.1.46 SOA Infrastructure Schema Prevents the Use of Edition-Based Redefinition

Edition-based redefinitions are not supported for SOA B2B in the current release.

17.1.47 Transport Callouts Are Not Available for Listening Channels

Transport callouts are not available for listening channels.

17.1.48 B2B User/Role Provisioning

In a multiple-node SOA server domain, the JMX framework propagates local changes to a file-based policy to each run-time environment, so that the data is refreshed based on caching policies and configuration.

In a multiple-node server environment, it is recommended that the domain policy and credential stores be centralized in an LDAP-based store. Otherwise, if they are

file-based, then local changes to user privileges made in the B2B UI will not be properly propagated and can end up in error situations.

See *Oracle Fusion Middleware Security Guide* for more information.

17.1.49 Fault Repair and Resubmission From Oracle Enterprise Manager Facility Is Not Available

In Oracle Enterprise Manager, there is no fault repair for Binding Components such as Oracle B2B. It is only available for service engines such as BPEL and Mediator.

17.1.50 Create Separate Batch Criteria For Document Type With Varying Application References

Different EDIEL document types (DELFOR and MSCONS) having different interchange APPLICATION REFERENCE settings, when batched together within a single interchange, used the setting for APPLICATION REFERENCE field from only the first document to be batched.

To avoid this issue it is suggested that if documents have varying interchange Application References, then users should create separate batching criteria for these documents, that is do not batch them together.

17.1.51 Limitation Using BOM-based XSD Schema in Oracle B2B

XSD with BOM is not fetched from Oracle JDeveloper when modeling an Oracle B2B Composite. The issue is due to the BOM occurring at the start of the file.

17.1.52 Multiple Sender ID Support Required Redeployment After Addition of New ID

The current Oracle B2B implementation to support multiple sender interchange ID requires users to redeploy the agreements after the addition of the new interchange ID. If deployment of agreements is not done, then the interchange IDs that were present at the time of the initial deployment are the only ones that are considered during validation check.

17.1.53 Outbound Average Message Calculation Incorrect

For the message that goes into error, the message count is increased; however, the message size is (of the message in error) is not taken into account. This causes the reported average to be lower the than expected.

17.1.54 FTP Listening Channel Does Not Support Proxy

FTP listening channel does not support proxy.

17.1.55 Clicking on Reports Displays Spurious Warnings in the Managed Server Console Log

Clicking on the Reports tab (defaults to Business Message Report) results in several instances of the following warning in the Managed Server Console log (from where the managed Server is started):

Could not find selected item matching value "" ...

17.1.56 Duplicated GUID in EDI Batched Outbound Messages Causes All to Error

If there are two messages with same GUID value in a set of batched outbound EDI messages, then the XEngine will error out all the messages in that batch. In earlier releases, the behavior was to error out only the duplicate message, the other messages would pass through.

17.2 Configuration Issues and Workarounds

This section describes configuration issues and workarounds. It includes the following topics:

- Section 17.2.1, "Functional Ack Internal Properties Setting Ignored for HL7"
- Section 17.2.2, "Unable To Specify Separate Parameters for Remote Trading Partner Sender and Receiver"
- Section 17.2.3, "Unable To Set Ack Requested Field for Interchange"
- Section 17.2.4, "Overriding Defaults in a Host Document Not Carried to the Remote Trading Partner"
- Section 17.2.5, ""Query Sent to an Unactivated UnitOfWork" Exception"
- Section 17.2.6, "Tablespace Configuration Recommendation for Production Environments"
- Section 17.2.7, "Limitation of b2b.addcorrelatedfainfoinexceptionxml Property"
- Section 17.2.8, "Enable Auto Search Feature Does Not Function"
- Section 17.2.9, "Document Information Extraction Property Does Not Work With JMS Option"

17.2.1 Functional Ack Internal Properties Setting Ignored for HL7

For HL7, setting the Functional Ack internal property (FAInternalProperty) to false using the Administration > Configuration page in the Oracle B2B interface causes Oracle B2B to nevertheless use the payload header FA internal properties instead of the design-time parameters.

When the FAInternalProperty is set to true and there are different payload and design-time parameter values, you may see an error in the Ack message. Therefore, it is recommended that you do not set the FAInternalProperty to true for HL7.

17.2.2 Unable To Specify Separate Parameters for Remote Trading Partner Sender and Receiver

Although the metadata for a remote trading partner stores separate information for the sender and the receiver for the same document definition, you cannot specify these differences using the Oracle B2B interface.

The workaround is to create a new document definition and use the two definitions to specify the parameters for the sender and receiver separately.

17.2.3 Unable To Set Ack Requested Field for Interchange

The Oracle B2B interface does not offer the ability to set the Ack Requested field for Interchange.

17.2.4 Overriding Defaults in a Host Document Not Carried to the Remote Trading Partner

When creating a host document, including specifying the version, type, and definition, Oracle B2B assigns default values to certain fields that can be overridden by the user. If you override one or more nonmandatory fields by making them blank and then add the definition to the remote trading partner, the default values that you intentionally left blank reappear for the remote trading partner.

To resolve this issue, manually make the nonmandatory fields blank again for the remote trading partner.

17.2.5 "Query Sent to an Unactivated UnitOfWork" Exception

When using any document protocol, the following exception appears in the seller's soa.log file:

```
oracle.toplink.exceptions.QueryException
Exception Description: Query sent to an unactivated UnitOfWork.
```

The workaround is to increase the JTA timeout from 30 to a higher value using Oracle WebLogic Server Administration Console.

17.2.6 Tablespace Configuration Recommendation for Production Environments

Increase the default tablespace configuration in production environments to prevent error conditions that can occur when processing a large number of messages.

17.2.7 Limitation of b2b.addcorrelatedfainfoinexceptionxml Property

When enabled, the property `b2b.addCorrelatedFAInfoInExceptionXML` sets exception message with detail of the Correlated FA message that indicated error for the outbound EDI document. This additional information is passed only to the AQ exception message and not to the Fabric exception message.

17.2.8 Enable Auto Search Feature Does Not Function

In the Oracle B2B interface, the Enable Auto Search parameter (on the Administration > Configuration page) does not function in this release.

17.2.9 Document Information Extraction Property Does Not Work With JMS Option

Setting the property b2b.HL7DocIdentification=true in Oracle Enterprise Manager Fusion Middleware Console works for the AQ and composite default options, but this feature does not work with JMS.

See Section 17.3.9, "Use b2b.hl7docidentification To Extract Document Information" for usage.

17.3 Documentation Errata

This section describes documentation errata. It includes the following topics:

- Section 17.3.1, "Oracle Fusion Middleware User's Guide for Oracle B2B Has More Information Than Online Help"

- Section 17.3.2, "Default Value for the b2b.r1ps1 Property Is True"

17.3.1 Oracle Fusion Middleware User's Guide for Oracle B2B Has More Information Than Online Help

See *Oracle Fusion Middleware User's Guide for Oracle B2B* for more complete information than what is available from the **Help** link in Oracle B2B. In particular, the guide includes descriptions of the Active Document Types fields and Active Trading Partners fields (Table 17-1) and the Summary fields (Table 17-2) that are not found in the online help.

17.3.2 Default Value for the b2b.r1ps1 Property Is True

In Figure 30-3, "Configuring B2B Attributes," in *Oracle Fusion Middleware Administrator's Guide for Oracle SOA Suite and Oracle BPM Suite*, the value displayed for the b2b.r1ps1 property in the Element_1 node is incorrect. The default value for this property is true, not false.

17.3.3 B2B Configuration Wizard Tooltip in JDeveloper Incorrectly Refers to OC4J

The descriptive text (tooltip) that pops up when you move the cursor over the **Test B2B** button on the Application Server Connection page of the B2B Configuration Wizard in Oracle JDeveloper incorrectly refers to the SOA OC4J HTTP port. Clicking this button tests the B2B server connection.

17.3.4 Outbound File/FTP/SFTP Changes to Default File Name Format

The outbound File/FTP/SFTP channel has the file name format changed in 11gR1 PS2 as follows,

```
ToParty_YearMonthDay_Hr_Min_Sec_millisec_<Threadhashvalue>_<VMID>.dat
```

For example,

```
GlobalChips_850_4010_2009FEB23_03_22_07_321_238_245 .dat
```

Threadhashvalue - executing threads value.

VMID - virtual machines unique identifier.

Note: the original format is `ToParty_<timestamp>.dat`.

17.3.5 New Section: Monitoring Oracle B2B Faults and Rejected Messages

The Oracle Enterprise Manager Fusion Middleware Control Recent Faults area lists the faults, including details such as the error message, time of the fault, and the associated composite instance ID. Faults can be logged on the incoming messages processed by a service binding component, or on the outgoing messages processed by a reference binding component.

Note that while all errors will appear in the Oracle B2B console, only a subset of faults will appear in Oracle Enterprise Manager Fusion Middleware Control. This subset includes all inbound messages containing an error after trading partner identification in Oracle B2B.

See Chapter 4, "Monitoring the SOA Infrastructure," and Chapter 38, "Monitoring Service and Reference Binding Components," in *Oracle Fusion Middleware Administrator's Guide for Oracle SOA Suite and Oracle BPM Suite* for more information.

Note the following:

1) Oracle B2B faults and rejected messages can be monitored from the composite home or domain home page.

2) Oracle B2B error messages can be seen in the Error Message column, and you can use the error link to see the error details and Oracle B2B message payload (if authorized).

3) Recovery details indicates that these faults are not recoverable from Oracle Enterprise Manager, however you can see the error details and payload (if authorized) to identify the problem. And in the Oracle B2B console, you can resubmit these rejected messages if necessary.

4) Composite instance IDs are not are shown for Oracle B2B faults (Unavailable), because in these cases no SOA composite instance was created.

5) Click on Logs to see the correlated Oracle B2B log messages.

17.3.6 FA for Batched EDIEL Documents With Some Errors Indicates Accepted

In EDIEL, because the UCM segment is not used in the CONTRL messages, the error for individual messages (received as part of a complete batched inbound message) do not get reported back. The interchange level acknowledgment will indicate status as 7, which is the accepted status message.

17.3.7 New Property b2b.addCorrelatedFAInfoInExceptionXML

If the property `b2b.addCorrelatedFAInfoInExceptionXML` is set to `true`, then Oracle B2B will add the Business Message ID of the Functional Ack message which holds error information for the outbound EDI message.

Without this information, because the error contains only information of the outbound message that went to error state, the user is unable to quickly correlate the outbound message to the Functional Ack message.

17.3.8 Additional Fabric Application Interface Parameter Details

In the *Oracle Fusion Middleware User's Guide for Oracle B2B*, Appendix C "Back-End Applications Interface," the following B2B Fabric application interface parameter details are to be added:

In Oracle Fusion Middleware 10g, Oracle B2B utilizes `ACTION_NAME` in `IP_MESSAGE_TYPE` to provide some special and dynamic features for the back end application to communicate with Oracle B2B. In Oracle Fusion Middleware 11g, Oracle B2B users can also use normalized message properties to achieve the same functionality as described in Table 17–2.

Table 17–2   Oracle B2B 10g IP_MESSAGE_TYPE Mappings to Oracle Fusion Middleware 11g SCA/Fabric Normalized Message Properties

Feature	Description	ACTION_NAME (IP_MESSAGE_TYPE)	SCA/Fabric	Protocol
Dynamic IP	Value of IP address to be dynamically overridden.	DYNAMICIP:<IP Address> example: DYNAMICIP:GlobalChips:10.177.255.212:12345	b2b.toDynamicIP example: GlobalChips:10.177.255.212:12345	HL7/MLLP
Dynamic EMail	Email address to be dynamically overridden.	DynamicEmail:<email address> example: DynamicEmail:admin@oracle.com	b2b.toDynamicEmail example: admin@oracle.com	Generic Email
Email Subject	Email subject to be dynamically overridden.	EmailSubject:<subject> example: EmailSubject:PurchaseOrder	b2b.toEmailSubject example: PurchaseOrder	Generic Email
File Name	File Name of the message. This is used typically for File name Preserve.	filename:<file name> example: filename:salesorder.xml	b2b.fileName example: salesorder.xml	AS2
Content Type	Content Type of the message.	contentType:<content type> example: contentType:text/xml	b2b.contentType example: text/xml	AS2
Broadcast	Group Name of the trading partner for which the message to be broadcast.	Grouping:<group name> example: Grouping:InventoryRequest	b2b.toTradingPartnerGroup example: InventoryRequest	-
Sequencing	sequenceTarget associated with the message.	TARGET:<target> example: TARGET:PatientId123	b2b.sequencingTarget example: PatientId123	HL7/MLLP
Large Payload		LARGE_PAYLOAD	payload field in NM	All protocols
Action	EBMS Action name associated with the message.	ACTION:<Action name> example: ACTION:ebMSRequest	b2b.action example: ebMSRequest	EBMS Generic File FTP SFTP
Service	EBMS Service associated with the message.	SERVICE:<Service name> example: SERVICE:FileTransfer	b2b.ebms.Service example: FileTransfer	EBMS
Service Type	EBMS Service Type associated with the message.	SERVICETYPE:<Service Type> example: SERVICETYPE:String	b2b.ebms.ServiceType example: String	EBMS

Table 17–2 (Cont.) Oracle B2B 10g IP_MESSAGE_TYPE Mappings to Oracle Fusion Middleware 11g SCA/Fabric Normalized Message Properties

Feature	Description	ACTION_NAME (IP_MESSAGE_ TYPE)	SCA/Fabric	Protocol
From Role	EBMS From Role associated with the message.	FROMROLE:\<From Role\> example: FROMROLE:Buyer	b2b.ebms.FromRole example: Buyer	EBMS
To Role	EBMS To Role associated with the message.	TOROLE:\<To Role\> example: TOROLE:Seller	b2b.ebms.ToRole example: Seller	EBMS
Overriding ConnectionMode	Connection Mode associated with the message.	CONNMODE:\<ConnectionMode\> example: CONNMODE:Permanent	b2b.connMode example: Permanent	MLLP
Custom Header	CUSTOM HEADER associated with the message.	CUSTOM_HEADER:\<Value\> example: CUSTOM_HEADER: SequenceId	b2b.customHeader example: SequenceId	MLLP

17.3.9 Use b2b.hl7docidentification To Extract Document Information

If you enqueue an HL7 document without specifying a document type name and revision, it should be able to extract that information from the HL7 payload. To retrieve the document type name and version if it is not specified in the out queue by the application, set the following property in Oracle Enterprise Manager Fusion Middleware Console.

```
b2b.HL7DocIdentification=true
```

Note: This property works for the AQ and composite default options, but does not work with JMS. See Section 17.2.9, "Document Information Extraction Property Does Not Work With JMS Option."

17.3.10 New Apps Tab in Document Definition Configuration

The new **Apps** tab is added to the Oracle B2B console to provide a few parameters for Oracle Fusion Applications and AIA integration with Oracle B2B.

17.3.11 Additional Information About Translation Web Service Request Attribute @type

The following information belongs in Table 19-4 "Translation Web Service Request" in *Oracle Fusion Middleware User's Guide for Oracle B2B*.

@type

This attribute is applicable for both `from` and `to`. The value expected for `from` and `to` are the name of the Trading Partner. If you want to use different identifiers instead of `Name` you can supply a value against attribute `@type`.

The following example holds the name of the trading partner:

```
<from>Acme</from>
```

The following example holds the DUNS ID of the trading partner. Note that because the example uses DUNS ID, it is mentioned explicitly against `type`. (This example applies also applies to the `to` element.)

```
<from type="DUNS">11111111</from>
```

17.3.12 Transport Protocol Parameter Timestamp Format Specification

The following information belongs in *Oracle Fusion Middleware User's Guide for Oracle B2B*, Table 5-3 "Transport Protocol Parameters," in the `Filename Format` row.

For outbound and inbound processing using generic exchange, the generated file name contains a time stamp of the default format (that is, `YYYYMMMdd_HH_mm_ss_SSS`).

In 11gR1 PS2, Filename Format provides the ability to provide a different timestamp format in the Transport Protocol Parameter: Filename Format, by entering the desired time stamp format in between square brackets ([]).

For example:

`%FROM_PARTY%_%TIMESTAMP[YYYYMMMdd_HH_mm_ss_SSS]%.dat`

would generate a file name like this:

`Acme_2010MAR20_12_34_231.dat`

17.3.13 Name Identifier Removed at ebMS Run Time; Use b2b.ebmsname=true Property

In PS2, the name identifier that is always present in an ebMS agreement is not sent as part of `PartyId` at runtime. You must add an ebMS Identifier for every ebMS agreement using the property `b2b.ebMSName=true`. This property can be set using the `configmbeanutil` utility.

17.3.14 CPP/CPA Import and Export Performance Optimization

The following information belongs in sections 18.9 "CPP/CPA Import" and 18.10 "CPP/CPA Export" in *Oracle Fusion Middleware User's Guide for Oracle B2B*.

In 11gR1 PS2, the Oracle B2B command line utility for CPP/CPA import and export, a new command line argument was added to optimize performance. The new property is

`-Dstandard=true`

When CPP/CPA import is performed using `-Dstandard=true`, then CPP/CPA export must be performed with `-Dstandard=true`.

For example:

```
 ant -f ant-b2b-util.xml b2bcpaimport -Dpropfile="<property-file>"
-Dstandard=true
 ant -f ant-b2b-util.xml b2bcpaexport -Dpropfile="<property-file>"
-Dstandard=true
```

If CPP/CPA import is performed using the `-Dstandard=true` flag, then for runtime to utilize this you must set `b2b.useCPAid=true`.

Outbound enqueue example:

eventName=ACTION:ebmsaction1;SERVICE:ebmsservice;SERVICETYPE:String;CPAID:myc

paid12343;

Similarly, for the inbound Trading Partner side, set `b2b.useCPAid=true` if CPP/CPA import is performed using `-Dstandard=true`.

17.3.15 System Validates Saved Data

When validating an agreement, Oracle B2B validates the saved data. Oracle B2B does not validate any unsaved changes that you make to an agreement.

17.3.16 Oracle B2B Samples Location on OTN

http://www.oracle.com/technology/sample_
code/products/b2b/index.html

18

Oracle BPEL Process Manager

This chapter describes issues associated with Oracle BPEL Process Manager. It includes the following topics:

- Section 18.1, "General Issues and Workarounds"
- Section 18.2, "Configuration Issues and Workarounds"
- Section 18.3, "Documentation Errata"

18.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topics:

- Section 18.1.1, "Using Domain Value Map Functions in a Switch Activity"
- Section 18.1.2, "Defining a Correlation Set Before Invocation Properties Causes Errors"
- Section 18.1.3, "Audit Trail Details Display in Server Language Instead of Browser Language"
- Section 18.1.4, "Do Not Specify the wsa and bpel Property Prefixes with the bpelx:property"
- Section 18.1.5, "Selecting the Key for an Entity Variable in the Browse Entity Variable Dialog"
- Section 18.1.6, "MIME Type for Voice Notification in BPEL Voice Activity Requires Modification"
- Section 18.1.7, "Client Java API Is Not Backward Compatible"

18.1.1 Using Domain Value Map Functions in a Switch Activity

Using domain value map XPath functions such as `dvm:lookupValue()` in Oracle BPEL Process Manager, specifically in the condition expression for a switch-case activity, causes the functions to fail with an exception error.

As a workaround, perform the following steps:

1. Use an assign activity block to capture the output of the domain value map function in a variable (for example, **dvm_out**).

2. Use the dvm_out variable in a switch activity statement.

18.1.2 Defining a Correlation Set Before Invocation Properties Causes Errors

If a correlation set element appears before the invocation properties inside an invoke activity, errors occur during BPEL process compilation. This is because the correlation set element is placed before the `bpelx:inputProperty` entries.

```
<invoke name="Invoke_850" inputVariable="Invoke_850_send_InputVariable"
            partnerLink="send850" portType="ns2:B2B_send_ptt"
operation="send">
      <correlations>
        <correlation initiate="yes" set="CorrelationSet_1" pattern="out"/>
      </correlations>
      <bpelx:inputProperty name="b2b.documentProtocolVersion"
                              expression="'4010'"/>
      <bpelx:inputProperty name="b2b.documentTypeName" expression="'850'"/>
      <bpelx:inputProperty name="b2b.fromTradingPartnerId"
                              expression="'GlobalChips'"/>
      <bpelx:inputProperty name="b2b.toTradingPartnerId"
                              expression="'AcmeRID'"/>
    </invoke>
```

This can occur if you create a BPEL process with an invoke activity, create a correlation set for the invoke activity, then update several of the invoke activity properties.

As a workaround, open the BPEL process in **Source** view in Oracle JDeveloper and manually move the correlation set element below the invoke properties.

```
<invoke name="Invoke_850" inputVariable="Invoke_850_send_InputVariable"
            partnerLink="send850" portType="ns2:B2B_send_ptt"
operation="send">
      <bpelx:inputProperty name="b2b.documentProtocolVersion"
                              expression="'4010'"/>
      <bpelx:inputProperty name="b2b.documentTypeName" expression="'850'"/>
      <bpelx:inputProperty name="b2b.fromTradingPartnerId"
                              expression="'GlobalChips'"/>
      <bpelx:inputProperty name="b2b.toTradingPartnerId"
                              expression="'AcmeRID'"/>
      <correlations>
        <correlation initiate="yes" set="CorrelationSet_1" pattern="out"/>
      </correlations>
    </invoke>
```

18.1.3 Audit Trail Details Display in Server Language Instead of Browser Language

Audit trail information for a BPEL instance displays in the language of your server instead of the language of your web browser.

18.1.4 Do Not Specify the wsa and bpel Property Prefixes with the bpelx:property

Tables H-1 and H-2 of Appendix H, "Normalized Message Properties" of the *Oracle Fusion Middleware Developer's Guide for Oracle SOA Suite* describe the Oracle BPEL Process Manager and Oracle Web Services Addressing properties. To use these properties correctly with the `bpelx:property` in activities such as a receive activity, ensure that you do *not* include the `wsa.` or `bpel.` prefixes. For example:

```
<receive name="receiveInput" partnerLink="bpelprocessb_client"
portType="client:BPELProcessB" operation="process" variable="inputVariable"
 createInstance="yes">
            <bpelx:property name="action" variable="v1"/>
            <bpelx:property name="messageId" variable="v2"/>
            <bpelx:property name="relatesTo" variable="v3"/>
```

```
                   <bpelx:property name="replyToAddress" variable="v4"/>
                   <bpelx:property name="replyToPortType" variable="v5"/>
                   <bpelx:property name="replyToService" variable="v6"/>
         </receive>
```

18.1.5 Selecting the Key for an Entity Variable in the Browse Entity Variable Dialog

When selecting the local part of an entity key by browsing entity variables, entity icons display in the expanded element tree. These icons are identified by a blue x inside parentheses, and indicate which elements include entity keys. Selecting these elements does not update the **Key Local Part** or **Key Namespace URI** fields in the Specify Key dialog. Instead, you must expand these elements to select the actual key to get the key's local part and namespace. For example:

1. In the Bind Entity dialog, click the **Add** icon to invoke the Specify Key dialog.

2. To the right of the **Key Local Part** field, click the **Browse Entity Variable** icon.

3. Note that a blue x inside parentheses indicates which elements include entity keys. Do *not* select these elements.

4. Expand these elements to display the entity keys available for selection.

5. Select an entity key, and click **OK**.

   The **Key Local Part** and **Key Namespace URI** fields of the Specify Key dialog are populated with information about your selection.

18.1.6 MIME Type for Voice Notification in BPEL Voice Activity Requires Modification

In a BPEL voice activity, the MIME type for message content generated in the source code is in `text/vxml` format. However, the message sent from the composite to the voice XML driver must be in `text/plain` format. This is because the voice XML driver adds the voice XML wrapper to the message before sending it to the destination point.

If the message content sent to the driver is in `text/vxml` format for the MIME type, a message delivery failure occurs. Therefore, manually change the MIME type for the voice payload content to be `text/plain` in **Source** mode in Oracle JDeveloper.

```
<scope name="VoiceApproval">
. . .
. . .
  <copy>
     <from expression="string('text/plain')"/>
     <to variable="varNotificationReq" part="VoicePayload"
     query="/VoicePayload/ns1:Content/ns1:MimeType"/>
  </copy>
. . .
. . .
</scope>
```

18.1.7 Client Java API Is Not Backward Compatible

Custom applications coded with the Oracle BPEL Process Manager 10.1.3 Client Java API cannot currently be upgraded to the 11*g* Release 1 PS2 Client Java API. Programs coded to the Oracle BPEL Process Manager 10.1.3 API must be rewritten. In addition, the current API is not compatible with previous versions of the 11*g* API, although the differences are minimal.

The version of the API in this release has been finalized. It is now fully supported and is backward compatible from this release onwards.

Visit the following URL for details:

http://www.oracle.com/technology/products/soa/bpel/collateral/documentation.html

18.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topic:

- Section 18.2.1, "BPEL XPath Expression Function ora:getAttachmentContent"

18.2.1 BPEL XPath Expression Function ora:getAttachmentContent

The `ora:getAttachmentContent` function reads SOAP attachment content and encodes that data in base64 format in a BPEL process by providing the BPEL variable as an argument, which has an `href` of the SOAP attachment. The following example shows how to use this function:

```
<copy>
   <from expression="ora:getAttachmentContent('input','bin')"/>
   <to variable="initiateTaskInput" part="payload"
    query="/taskservice:initiateTask/task:task/task:attachment/task:content"/>
</copy>
```

This example copies the attachment content, which has its `href` stored in the `"input/bin"` variable, to the `content` variable in base64-encoded format.

18.3 Documentation Errata

This section describes documentation errata. It includes the following topics:

- Section 18.3.1, "Subscribe To Events Template in Create BPEL Process Dialog"
- Section 18.3.2, "Incorrect Syntax for FlowN Activity"

18.3.1 Subscribe To Events Template in Create BPEL Process Dialog

The online help for the Create BPEL Process dialog in Oracle JDeveloper does not include a description of the **Subscribe to Events** option that is available in the **Template** dropdown list.

If you select this option, the dialog is refreshed to display a business events table and **Filter**, **Add**, and **Delete** icons.

- Click the **Add** icon to select an event to which to subscribe. Your selection is then displayed in the event table. You can then select the consistency level and whether or not to publish this event.

- Click the **Filter** icon to create a filter expression for the selected event. This selection launches the Expression Builder dialog.

- Click the **Delete** icon to delete the selected event.

For more information about business events, see Chapter "Using Business Events and the Event Delivery Network" of *Oracle Fusion Middleware Developer's Guide for Oracle SOA Suite*.

18.3.2 Incorrect Syntax for FlowN Activity

Section "What Happens When You Create a FlowN Activity" of Chapter "Using Parallel Flow in a BPEL Process" of the *Oracle Fusion Middleware Developer's Guide for Oracle SOA Suite* shows the following count XPath function syntax in the receive activity that, if used, results in a selection failure:

```
expression="count(bpws:getVariableData('inputVariable','payload','/client:Nflow
HotelsProcessRequest/client:ListOfHotels/client:HotelName'));"/>
```

Instead, use the following syntax.

```
count($InputVariable.payload/client:HotelName)
```

19

Oracle Business Activity Monitoring

This chapter describes issues associated with Oracle Business Activity Monitoring. It includes the following topics:

- Section 19.1, "General Issues and Workarounds"
- Section 19.2, "Documentation Errata"

19.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topics:

- Section 19.1.1, "Oracle BAM Client System Requirements"
- Section 19.1.2, "New Product Features in This Release"
- Section 19.1.3, "Some Product Features Previews Only"
- Section 19.1.4, "Accessibility Compliance Limitation"
- Section 19.1.5, "Oracle BAM Upgrade-Related Issues"
- Section 19.1.7, "Database Must Be Started Before Oracle BAM"
- Section 19.1.8, "Batched Messages Lost on BPEL Server Restart"
- Section 19.1.9, "Limitations With Single EAR and Two Oracle BAM Targets in Oracle Enterprise Manager Fusion Middleware Control"
- Section 19.1.10, "Oracle Enterprise Manager Fusion Middleware Control MBean Browser Does Not Validate Values"
- Section 19.1.11, "Unable To Extend Tablespace"
- Section 19.1.12, "Unable to Create or View Report With User With No Permissions on System Folder"
- Section 19.1.13, "Opening Report on Two Systems Causes Language Mix"
- Section 19.1.14, "Oracle BAM Event Engine Cannot Call WS-Security-Enabled Web Services"
- Section 19.1.15, "Use Single Quotation Marks in ICommand Web Service Export Command"
- Section 19.1.16, "Alert Fires Multiple Times Using COUNTDISTINCT Aggregate"
- Section 19.1.17, "Select Higher Time Groupings in Crosstab Views"
- Section 19.1.18, "Invoking an Oracle Data Integrator Scenario With Date Input From Oracle BAM Alert Rule"

- Section 19.1.19, "Do Not Use Time Dimension For Drilling Down in a Collapsed List"

- Section 19.1.20, "Active Now Fails To Drop Rows When the Time Window Advances"

- Section 19.1.21, "Chart View Displays Text Instead of a Chart When the Window is Not Initially Maximized"

- Section 19.1.22, "Potential Issues with Oracle BAM Order Booking Sample Application"

- Section 19.1.23, "SSL Connection to Oracle BAM Is Not Supported for Monitor Express"

- Section 19.1.24, "Save in Excel 2007 Format Does Not Work"

- Section 19.1.25, "Failure to Send Message to Oracle BAM is Not Reported on Oracle Fusion Middleware Control Console"

- Section 19.1.26, "Tabs Sometimes Missing in Oracle BAM Active Studio"

- Section 19.1.27, "Input of Numbers Is Not Localized As Per Browser Locale"

- Section 19.1.28, "Unique Constraint Error in Oracle Data Integrator After Moving a Data Object"

- Section 19.1.29, "Sun JDK Patch Required"

19.1.1 Oracle BAM Client System Requirements

Platforms:

Microsoft Windows Intel x86-32:

- Microsoft Windows XP Professional, Service Pack 2 or higher

- Microsoft Windows Vista

Web Browsers:

- Microsoft Internet Explorer 7.x

- Microsoft Internet Explorer 8.x

Hardware:

- 1 CPU at 1.2 GHz or faster minimum (a faster processor may be necessary to view complex dashboards)

- 512 MB RAM minimum

- 5 MB of free disk space

Display:

- Oracle BAM Active Studio requires 1024 x 768 minimum resolution

- Oracle BAM Active Viewer requires 800 x 600 or higher resolution

Additional Requirements for Optional Excel View in Oracle BAM Active Viewer or Oracle BAM Active Studio:

The Oracle BAM Excel view type requires that Microsoft Excel version XP, 2003, or 2007 is installed on the client computer.

Notes:

If you are using the Microsoft Windows pop-up blocker, or any other tool that blocks pop-up browser windows, you must configure it to allow pop-up windows while using the Oracle BAM Web applications. Turn off pop-up blockers in Microsoft Internet Explorer for the URL on which the Oracle BAM Web applications are hosted.

The Microsoft Internet Explorer installation on client systems must be a standard version, and it must not include customizations such as add-in tool bars or hot bars for other Web sites.

19.1.2 New Product Features in This Release

The following are new Oracle BAM features in this release:

- Date comparison enhancements for report filters:

  Allows date-only comparisons in filters without considering the time stamp. At this time, you must specify Date and Time for a filter condition on a DateTime type field.

  Provides System Date as the default date in report prompt on DateTime type.

- Unsubscribe option added to Enterprise Message Sources configuration.

- The Crosstab, Summary Crosstab, and SPC Charts are no longer in preview mode; they are fully supported features in Oracle BAM.

- Support for HTTPS Web service invocations from Oracle BAM Alerts.

- Tune the Web services batching parameters independently.

- Performance improvements.

See the Oracle BAM page on the Oracle Technology Network Web site for additional information about this release:

http://www.oracle.com/technology/products/integration/bam

19.1.3 Some Product Features Previews Only

Preview features are for evaluation only.

ICommand Web Service is a preview feature.

Saving reports in MHT format is a preview feature. Save Offline, e-mailing rendered reports, and e-mailing a report in Alerts save the report in the MHT format.

The following report views are preview versions: Columnar, Matrix, Excel, Column Group, and Row Group.

19.1.4 Accessibility Compliance Limitation

This version of Oracle BAM does not comply with accessibility standards provided in other Oracle products. Future versions plan to comply with these standards.

19.1.5 Oracle BAM Upgrade-Related Issues

For a complete list of Oracle BAM upgrade issues, see the following sections:

- Section 3.1.1, "Patches Required to Address Specific Upgrade and Compatibility Requirements", which includes information on an Oracle Database patch that is required before you perform an Oracle BAM schema upgrade.

- [Section 3.1.3, "Oracle BAM Upgrade Issues"](#), which consolidates various known issues and workarounds when upgrading Oracle BAM to 11*g*.

19.1.6 Optional Upgrade Procedure for Oracle BAM Monitor Express Sample

Note that this upgrade is optional. It is not a required step for customers migrating from Oracle BAM 11gR1 PS1 to PS2.

Customers not upgrading from PS1 are not affected.

The existing *FMW_HOME*/AS11gR1SOA/bam/samples/bam/monitorexpress/README.txt file provides instructions on how to reinstall the Monitor Express samples.

Only customers in Oracle BAM 11gR1 PS1 that have manually ran the scripts as described in *FMW_HOME*/AS11gR1SOA/bam/samples/bam/monitorexpress/README.txt (samples are not installed by default during Oracle BAM installation) might want to upgrade those to fix minor user interface issues.

19.1.7 Database Must Be Started Before Oracle BAM

Oracle BAM applications are not functional if the database on which Oracle BAM depends is started few minutes later than Oracle BAM Server.

19.1.8 Batched Messages Lost on BPEL Server Restart

An Oracle BAM sensor action cannot be notified of BPEL events, and the messages sent to Oracle BAM from the BPEL server are only stored in memory; therefore, when the BPEL server restarts, all the messages still on the BPEL side are lost.

This behavior is by design, and there is no workaround.

19.1.9 Limitations With Single EAR and Two Oracle BAM Targets in Oracle Enterprise Manager Fusion Middleware Control

Oracle BAM presents the following limitations because in this release Oracle BAM Web applications and Oracle BAM Server are only deployed in a single EAR, but are represented in Oracle Enterprise Manager Fusion Middleware Control using two separate targets:

- Along with two custom targets, Oracle BAM Server and Oracle BAM Web applications, The Oracle BAM application also appears as a generic J2EE application in the Application Deployments list in Oracle Enterprise Manager Fusion Middleware Control navigation tree, and in the Farm home page. It is recommended that the user only use custom Oracle BAM targets (OracleBAMServer and OracleBAMWeb), the internal application target (oracle-bam) should not be used.

  Additional information about the generic oracle-bam J2EE application target: The generic J2EE application target (oracle-bam) despite being an internal application, still appears under parent Application Deployments and not in the sub-folder Internal Applications of Application Deployments. Moving oracle-bam generic J2EE application target to Internal Applications folder has been deferred.

- The Stop and Start commands in the Oracle BAM Server and Oracle BAM Web applications menus in Oracle Enterprise Manager Fusion Middleware Control pages does not stop or start the corresponding target only, it stops the entire Oracle BAM application (Oracle BAM Server and Oracle BAM Web applications).

- Viewing any J2EE metrics in the context of Oracle BAM Server or Oracle BAM Web applications actually presents the view for entire J2EE application. (From performance page and Oracle WebLogic Server page the user gets access to the J2EE application metric).

- Oracle WebLogic Server (Managed Server) home page shows three deployed applications for each Oracle BAM install (two custom targets and one generic J2EE application target). Corresponding to each target there are few J2EE application metrics shown. Because J2EE metrics correspond to each deployment, the metrics values get repeated for all of the Oracle BAM targets. The workaround is displaying metric values only against one target and the other two showing n/a.

19.1.10 Oracle Enterprise Manager Fusion Middleware Control MBean Browser Does Not Validate Values

The MBean browser in Oracle Enterprise Manager Fusion Middleware Control does not have any validation in place to check whether the entered value is correct or not.

19.1.11 Unable To Extend Tablespace

When you see the `Unable to extend tablespace` error message, you can do the following:

- Increase the tablespace size.

- If you cleared a large amount of data from a data object, and expect the tablespace to have more data, you might still see this error. The table space release is not synchronous, and you must run command `ALTER TABLE table_name SHRINK SPACE`.

19.1.12 Unable to Create or View Report With User With No Permissions on System Folder

A user assigned to a non-Administrator role may be unable to create or view reports, but has the privileges to do so, and gets the following error:

DATAOBJECTPERMISSIONMISSINGEXCEPTION_ACTIVESTUDIO_
REPORTEDITOR_EDITREPORT

Exception Message BAM-01257: Insufficient permission to perform the requested action.

This is due to the user not having at least Read permissions on the /System folder in Oracle BAM Architect.

19.1.13 Opening Report on Two Systems Causes Language Mix

The same user opening a report on two different computers with different language settings causes a language mix in the Oracle BAM user interface.

A single user should not log in simultaneously on different computers with two different language settings.

19.1.14 Oracle BAM Event Engine Cannot Call WS-Security-Enabled Web Services

As part of an Oracle BAM alert action, Oracle BAM Event Engine can call external Web services. However, for secure Web services, Oracle BAM Event Engine supports

calling only HTTP Basic authentication protected Web services. Configuring an alert action to call WS-Security enabled Web services is not supported.

The Web service alert action now supports a couple of basic OWSM security policies namely `oracle/wss_http_token_client_policy` and `oracle/wss_username_token_client_policy`. These policies could be used to invoke Web services which are protected by corresponding server side OWSM policies. By default, all secure Web service invocations (requiring user name and password to be passed) would use `oracle/wss_http_token_client_policy` which essentially makes client to go through BASIC HTTP authentication.

19.1.15 Use Single Quotation Marks in ICommand Web Service Export Command

Using double quotation marks (") around the `file` value in ICommand export does not work.

Use single quotation marks (') instead of double quotation marks to specify the `file` value.

```
<?xml version="1.0" encoding="utf-8"?><IstanteCommands><export name='/Samples/Film
Sales' file='c:\do_with_data.xml' type="dataobject"/></IstanteCommands>
```

19.1.16 Alert Fires Multiple Times Using COUNTDISTINCT Aggregate

When operation COUNTDISTINCT-based aggregate is chosen in Group filters in data object and report based alerts, the user might see the alert firing multiple times, even if the alert criterion was satisfied only once in the data. This behavior is seen when bulk data object operations are performed. That is, if multiple rows are inserted, deleted, updated, or upserted in the data object at one time.

19.1.17 Select Higher Time Groupings in Crosstab Views

Grouping by Week in a Crosstab or Chart view could cause group values for Day of Month or Day of Week to be calculated incorrectly for weeks that include the end of one month and the beginning of another.

Include Day of Year in the grouping along with Day of Month or Day of Week.

19.1.18 Invoking an Oracle Data Integrator Scenario With Date Input From Oracle BAM Alert Rule

When you must pass a date input through an Oracle BAM alert rule invocation to an Oracle Data Integrator scenario, it is recommended that you set up the Oracle Data Integrator scenario to use an `alphanumeric` type variable instead of `date` type. Using a `date` type variable may lead to a parse exception within the Oracle Data Integrator agent which results in a failure to invoke the scenario successfully.

When this `alphanumeric` type variable is used within the definition of the Oracle Data Integrator interface, use the `TO_DATE` function along with the format in which the date is expected. For example, with a project level variable named `alphVariableName`, the function usage would be:

```
TO_DATE('#alphVariableName','YYYY-MM-DD')
```

Within the Oracle BAM alert rule definition (for the **Run an ODI scenario** action), pass the date to be input in the same format.

19.1.19 Do Not Use Time Dimension For Drilling Down in a Collapsed List

Drilling down on a time or date dimension in a collapsed list view causes an exception. Use chart views only to drill down on time or date dimensions.

19.1.20 Active Now Fails To Drop Rows When the Time Window Advances

If a user designs a report view with a combination of Continuous Time Series on a `datetime` or `timestamp` type column, and configures a filter for that column using **is within a time interval** and enabling **Active Now** (this combination is also known as Absolute Active Now), at times, the report might not drop or add the rows as the time window advances. This is due to the time boundary mismatch between Absolute Active Now and Continuous Time Series.

Active Now time is based on seconds, and considers the report opening time as its starting point (for example, the report is opened at 10.30:15 AM), and the end point is relative to the starting point.

However, Continuous Time Series considers the upper boundary at the time unit level chosen by the user (for example, the report is configured to use minutes as the time unit, so the starting time is considered to be 10.30:00 AM).

This mismatch in time units causes the report to not add or drop rows until the row has been dropped or added in terms of seconds according to the Absolute Active Now time period.

19.1.21 Chart View Displays Text Instead of a Chart When the Window is Not Initially Maximized

When report is opened in sub-maximal sized Web browser window, a chart view area may display the message "The view area is too small to represent the current data." When the Web browser window is maximized, the message might not be replaced by the expected chart view.

To work around this issue, always launch Oracle BAM reports in maximized Web browser windows.

19.1.22 Potential Issues with Oracle BAM Order Booking Sample Application

Design-Time Issues

When the sample application archive (*SOA_ORACLE_HOME*/bam/samples/bam/order_booking/jdev_project/OrderBookingWithBAMSensors.zip) is opened in Oracle JDeveloper, it is possible that you may observe design-time issues, such as broken partnerlink associations or valid database connections that cannot connect to a target database when editing the database adapter, and so on.

It is also possible, that you may sometimes experience problems attempting to run tests using the Oracle Enterprise Manager test console after modifying and redeploying this application to the SOA server.

To avoid these issues, it is recommended that you download a more recent version of the sample application from the Oracle Technology Network Web site located at

http://www.oracle.com/technology/sample_code/products/bam

Oracle Enterprise Manager Test Console Issue

There is a known issue with Oracle Enterprise Manager test console when submitting a `datetime` type payload.

If a BPEL process requires a `datetime` type input argument in its payload, and this process is tested using Oracle Enterprise Manager test console, the console drops the time data provided and adds an offset to the date value provided.

For example, an input of `2001-01-01 08:00:00 AM` is modified, and reaches the BPEL process as `2000-12-31-08:00`. This modification happens when the input was provided using Tree View.

This issue is likely to impact attempts to test the BPEL and Oracle BAM integration, such as when testing the OrderBookingWithBAMSensors sample shipped with Oracle BAM.

It is recommended that you provide the input using XML View rather than Tree View, or enter the inputs in Tree View, then toggle to XML View, review the data, and then submit the test request from the XML View.

For your convenience, use the payload sample below to test the sample application. Copy this payload into the XML View in Oracle Enterprise Manager test console for the OrderBookingBAM BPEL process.

```
<soap:Envelope xmlns:soap="http://schemas.xmlsoap.org/soap/envelope/">
   <soap:Body xmlns:ns1="http://www.globalcompany.com/ns/order">
      <ns1:PurchaseOrder>
         <ns1:CustID>10</ns1:CustID>
         <ns1:ID>1</ns1:ID>
         <ns1:ShipTo><ns1:Name/><ns1:Address/></ns1:ShipTo>
         <ns1:BillTo><ns1:Name/><ns1:Address/></ns1:BillTo>
         <ns1:UserContact><ns1:PhoneNumber/><ns1:EmailAddress/></ns1:UserContact>
         <ns1:OrderItems/>
         <ns1:SupplierInfo>
            <ns1:SupplierPrice>10</ns1:SupplierPrice>
            <ns1:SupplierName>SupplierABC</ns1:SupplierName>
         </ns1:SupplierInfo>
         <ns1:OrderInfo>
            <ns1:OrderDate>2001-01-01T15:10:20.000-07:00</ns1:OrderDate>
            <ns1:OrderPrice>25</ns1:OrderPrice>
            <ns1:OrderStatus>open</ns1:OrderStatus>
            <ns1:OrderComments/>
         </ns1:OrderInfo>
      </ns1:PurchaseOrder>
   </soap:Body>
</soap:Envelope>
```

19.1.23 SSL Connection to Oracle BAM Is Not Supported for Monitor Express

Deployment to Oracle BAM Monitor Express data objects through an SSL connection is not supported.

19.1.24 Save in Excel 2007 Format Does Not Work

In Oracle BAM Active Studio, when the user attempts to save an Excel view using Microsoft Excel 97-2003 format, it is possible that a message that reads "Excel 2007 or greater is required to edit this Excel view" will appear. This is a known issue.

19.1.25 Failure to Send Message to Oracle BAM is Not Reported on Oracle Fusion Middleware Control Console

The Oracle BAM-BPEL integration is supported with the use of Oracle BAM Adapter (such as with Oracle BAM sensor actions and BPEL Monitor features). For BPEL processes and other services that attempt to send messages to Oracle BAM, the true status of whether such Oracle BAM invocations succeeded or failed cannot be determined by studying the audit trail for that process instance on the Oracle Enterprise Manager Fusion Middleware Control Console. It is intentionally designed such that a failure to send sensor/monitor data to Oracle BAM should not cause the regular processing of input request (within a BPEL process) to be halted/failed. Accordingly, the console will therefore only report the status for the instance based on the non-Oracle BAM related activities. The Oracle BAM Server invocation failures, if any, will be noticeable in the SOA server diagnostic logs.

19.1.26 Tabs Sometimes Missing in Oracle BAM Active Studio

If you are using Microsoft Internet Explorer 8, and Oracle BAM Active Studio or one of the other Oracle BAM Web Applications does not open properly (for example, some of the main user interface tabs do not appear), try refreshing or reloading Oracle BAM Active Studio.

If that workaround does not resolve the issue, close Oracle BAM Active Studio, clear your Internet Explorer browser cache (via **Tools > Internet Options > Delete**), then reopen Oracle BAM Active Studio.

Alternatively, if the above workarounds do not resolve the issue, add the Oracle BAM Web server to Microsoft Internet Explorer's Trusted sites:

1. Go to **Tools > Internet Options > Security > Trusted sites** and click **Sites**.

2. Uncheck **Require server verification (https:) for all sites in this zone** if necessary (it is necessary unless you have Oracle BAM set up for SSL).

3. Add the Oracle BAM URL to the list:

   ```
   http://<bam_servername>
   ```

19.1.27 Input of Numbers Is Not Localized As Per Browser Locale

Float format (decimal separator) is decided by server locale, rather than the user's local Web browser language setting.

For example, when Oracle BAM Server is running on an operating system whose language is using dot (.) as the decimal separator (such as English, Chinese, or Japanese), and the user's local Web browser is set to a language using a comma (,) decimal separator (such as French, German, or Italian), input of number using a comma separator results in the following message:

```
The value specified is not a valid float
```

Some of the places where the suer can input numbers are:

1. Filter expression in Oracle BAM Active Studio View Editor.

2. Editing data object content in Oracle BAM Architect.

19.1.28 Unique Constraint Error in Oracle Data Integrator After Moving a Data Object

When the underlying schema (structure) of an Oracle BAM data source is changed (for example, by moving a data object from one folder to another), you must: 1) re-reverse

engineer the model which references this data source; 2) manually modify the model so that it accurately reflects the current schema.

If you create a data object in Oracle BAM Architect, and Reverse Engineer it in Oracle Data Integrator Designer, then, in Oracle BAM Architect, create a new folder and move the data object into it, and attempt Reverse Engineer again, the new folder is created in Oracle Data Integrator, but the data object does not move to new location.

In Oracle Data Integrator Operator, the operation fails with the unique constraint error during the Get MetaData step.

19.1.29 Sun JDK Patch Required

Oracle BAM Active Studio requires the Sun JDK patch that fixes JDK bug 6940416.

19.2 Documentation Errata

This section describes documentation errata. It includes the following topics:

- Section 19.2.1, "Null Out Values Using DataObjectOperationsByID Web Service"
- Section 19.2.2, "Active Now Interval Must be Greater Than Active Data Interval"
- Section 19.2.3, "Wildcard in Some Filters on DateTime not Supported on Calculated or Lookup Fields"
- Section 19.2.4, "JDBC Data Source Statement-Cache-Size Must Be Set to Zero For Oracle BAM"
- Section 19.2.5, "Floats Are Indeterminate For Comparisons"

19.2.1 Null Out Values Using DataObjectOperationsByID Web Service

In the XML input to DataObjectOperationsByID Web service:

If an element is empty, for example `<_Sales_Area></_Sales_Area>`, in the payload, then the corresponding column is made null. This is in synch with 10.1.3.x behavior.

19.2.2 Active Now Interval Must be Greater Than Active Data Interval

In filter expressions, do not set the Active Now interval to be less than the Active Data Interval.

19.2.3 Wildcard in Some Filters on DateTime not Supported on Calculated or Lookup Fields

Filters created using the **is like** or **is not like** operation on DateTime type fields can contain the wildcard character (%) in the comparison value in the filter expression. However, use of this wildcard character is not supported when the field used in the filter is a calculated field or lookup filed that evaluates to the DateTime or Timestamp type. This wildcard character is only supported for regular record fields.

Also, **Compare Date Only** is supported for regular DateTime or Timestamp type fields only. It is not supported for Calculated or Lookup fields evaluating to DateTime or Timestamp data type.

19.2.4 JDBC Data Source Statement-Cache-Size Must Be Set to Zero For Oracle BAM

For single instance database installs, the statement cache size will already be set to 0 (zero) by default. Do not change this to a non-zero value.

For installs against a RAC database, the statement cache size must manually be set to 0 for each RAC data source; otherwise, data corruption may occur and the Oracle BAM Active Data Cache may need to be restored from a backup (or reinitialized if no backups are available).

19.2.5 Floats Are Indeterminate For Comparisons

Testing equality on Float type values is indeterminate because Float values are approximations (in general, not just in Oracle BAM), so they should never be used for equality checks in filters (the **is equal to** and **is not equal to** comparisons).

The alternative is to use Decimal or some other data type. However, if the Float data type must be used, the equality test must be bounded by two ANDed filters of **is greater than or equal to** and **is less than**.

This belongs in the documentation as a note in the *Oracle Fusion Middleware User's Guide for Oracle Business Activity Monitoring* "Filtering Data" section, and in the Oracle BAM Troubleshooting Guide.

20

Oracle Business Process Management

This chapter describes issues associated with Oracle Business Process Management (BPM). It includes the following topics:

- Section 20.1, "General Issues and Workarounds"
- Section 20.2, "Configuration Issues and Workarounds"
- Section 20.3, "Documentation Errata"

20.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 20.1.1, "Oracle BPM Studio Issues"
- Section 20.1.2, "Oracle BPM Process Composer Issues"
- Section 20.1.3, "Oracle BPM Workspace and Process Spaces Issues"
- Section 20.1.4, "Oracle BPMN Administration"

20.1.1 Oracle BPM Studio Issues

This section describes issues and workarounds for Oracle BPM Studio. It includes the following topics:

- Section 20.1.1.1, "Do Not Edit the BPMN Process WSDLs directly"
- Section 20.1.1.2, "Dynamic Endpoint Properties Are Not Available"
- Section 20.1.1.3, "Cannot Edit Link Between BPMN Process and Business Rules in composite.xml"
- Section 20.1.1.4, "Deleting Services or References from the SOA Composite Does Not Delete the Customized Service or Reference"
- Section 20.1.1.5, "The XPath Data Association Editor Does Not Validate Expressions"
- Section 20.1.1.6, "Deleting a Reference from the SOA Composite Does Not Remove It from the Human Task Payload Configuration"
- Section 20.1.1.7, "Data Associations for Elements of a Collection Are Not Available"
- Section 20.1.1.8, "Do Not Define Multiple Catch Events for the Same Error or Message"

20.1.1.1 Do Not Edit the BPMN Process WSDLs directly

You must always use the Process Editor to edit a BPMN process. Do not edit the BPMN process WSDLs directly. Doing so does not allow you to save the changes and causes multiple error messages.

20.1.1.2 Dynamic Endpoint Properties Are Not Available

Dynamic endpoint properties are not available in BPM for this release.

To set endpoint properties to an SOA component used in Oracle BPM, use a BPEL process to invoke the SOA component and invoke the BPEL process from Oracle BPM.

20.1.1.3 Cannot Edit Link Between BPMN Process and Business Rules in composite.xml

The business rules task is used to incorporate Oracle Business Rules within a BPMN process. You can specify the business rule used as part of the configuration properties for the business rules task.

However, you cannot edit this property in composite.xml. Use the Oracle BPM Studio user interface to edit or remove the reference to the business rule.

20.1.1.4 Deleting Services or References from the SOA Composite Does Not Delete the Customized Service or Reference

When you delete a customized service or a reference from the SOA Composite, Oracle BPM Studio does not delete the customized component from the business catalog. Before building the BPM project you must manually delete the customized component from the business catalog.

20.1.1.5 The XPath Data Association Editor Does Not Validate Expressions

The XPath Data Association Editor does not validate the expressions you use to assign values to arguments and data objects. You must ensure that the XPath expressions you use in an XPath data association are valid. Using invalid XPath expressions causes errors at run time.

20.1.1.6 Deleting a Reference from the SOA Composite Does Not Remove It from the Human Task Payload Configuration

Deleting a reference from the SOA Composite does not delete the reference from the payload of the Human Tasks that use the reference.

After you delete a reference, you must remove the deleted reference from the Human Tasks using it.

20.1.1.7 Data Associations for Elements of a Collection Are Not Available

Data associations for elements of a collection are not available in this release. To assign a value to an element of a collection, use XLS transformations.

20.1.1.8 Do Not Define Multiple Catch Events for the Same Error or Message

Do not define multiple catch events for the same error or message. Only the first catch event fires; the remaining catch events are ignored.

20.1.1.9 Changes to a Deployed Organizational Unit Not Supported

When a BPM Project is deployed, any organizational units that do not exist are created. However, when redeploying a project, if any existing organizational units are changed, the changes will not be updated.

These changes must be made by a business administrator using Oracle BPM Workspace as described in *Oracle Fusion Middleware User's Guide for Oracle Business Process Management*.

20.1.1.10 enableAutoClaim Property Is Set to True in Human Tasks Created Using Oracle BPM Suite

When you create a Human Task using Oracle BPM Suite, the enableAutoClaim property is set to true by default.

20.1.1.11 Configuring Data Associations for XML Schema Elements Based on Simple Data Types

When configuring data associations for a flow object, you can map simple XML elements based on simple types to compatible basic data objects.

20.1.1.12 The Initiator Node List Shows the Names of the Possible Initiator Flow Objects

In the implementation properties of message events and send and receive tasks, the Initiator Node list shows the name of the initiator flow object. A BPMN process might contain multiple flow objects with the same name. It is a good practice to use a different name for all of the flow objects in the process. Not doing so causes the Initiator Node list to contain multiple items with the same name, making it difficult to identify the one you want to select.

20.1.1.13 The Pushback Task Operation Is Not Supported In an Aggregation Context

The Approval Management pushback task operation is not supported in an aggregation context. Use the request for information task operation instead.

20.1.1.14 Must Assign Application Roles from the OracleBPMProcessRolesApp Context

Using Oracle BPM Studio, you can map the roles defined in your process to application roles defined by Oracle WebLogic Server.

However, you must ensure that the application roles you use are defined as part of the OracleBPMProcessRolesApp application context. Only application roles defined in OracleBPMProcessRolesApp are used at run time.

20.1.1.15 You Must Configure the Implementation of BPMN Flow Objects in a BPM Project Created from a BPA Project

You must configure the implementation of certain BPMN flow objects, such as gateways, business rules, and human tasks, in a BPM project created from a BPA project. Not doing so causes errors when building the BPM Project.

20.1.1.16 Some List Builders Do Not Work If You Do Not Configure the Hierarchy Provider Plug-In

If you do not configure the hierarchy provider plug-in, then the following list builders do not work:

- Job Level
- Position

The Supervisory list builder uses the LDAP management chain if you do not configure the hierarchy plug-in.

20.1.1.17 Adding Counter Marks to Subprocesses is Not Available

Adding counter marks to subprocesses is not available for this release.

The available workaround is to add the counter mark to add an activity immediately after the start event in the subprocess and add a counter mark to this activity.

20.1.1.18 You Must Manually Remove Additional Slashes from the XSD file When Defining Human Tasks Assignments Based on Business Rules

In BPM Suite if you define a human task assignments based on Business Rules, then you must edit the XSD of the decision service to remove the additional slashes from the import statements.

For example, you must replace the following statement:

```
schemaLocation="oramds:///soa/shared/workflow/TaskEvidenceServic
e.xsd"
```

with the following import statement:

```
schemaLocation="oramds:/soa/shared/workflow/TaskEvidenceService.
xsd"
```

20.1.1.19 The Number of Business Indicators Per Project is Limited

You must not define more than twenty business indicators per project. The average length of the name of the business indicator must be 15 characters.

20.1.2 Oracle BPM Process Composer Issues

This section describes issues and workarounds for Oracle BPM Process Composer. It includes the following topics:

- Section 20.1.2.1, "Deploy Option Not Available in Approval WorkFlow Browser"
- Section 20.1.2.2, "Chinese, Korean, and Character Input Problems in Flow Object Labels"

20.1.2.1 Deploy Option Not Available in Approval WorkFlow Browser

When you specify an approver who also has deployment permissions, the user will not initially see the deployment option. To be able to deploy the Oracle BPM project, the user must first select approve. Once the approval workflow is complete, the option to deploy the project is available.

20.1.2.2 Chinese, Korean, and Character Input Problems in Flow Object Labels

The Adobe Flash Player has a bug related to input for Chinese, Korean, and Japanese characters. This causes problems in Oracle Business Process Composer when editing flow object labels within the process editor.

For more information see: http://bugs.adobe.com/jira/browse/FP-501.

To resolve this issue, use Microsoft Internet Explorer version 7.

20.1.3 Oracle BPM Workspace and Process Spaces Issues

This section describes issues and workarounds for Oracle BPM Workspace and Process Spaces. It includes the following topics:

- Section 20.1.3.1, "When Documentation Server is Down, Launching a Group Space for an Instance Causes Error "Instance 'null' is not available""
- Section 20.1.3.2, "File Size Limit for Process Attachment Is 2 MB"
- Section 20.1.3.3, "Drilled Down Graphs Will not Honor the Filter Criterion From the Source"
- Section 20.1.3.4, "Display of Changes to Organizational Unit Membership Requires Logging Back in Again"
- Section 20.1.3.5, "Role Members Are not Removed During Process Re-Deployment"
- Section 20.1.3.6, "For Large Number of Users Set Timeout to 5 Minutes Maximum"
- Section 20.1.3.7, "Possible Mixed Translation Issue when Displaying BPM Audit Trail"
- Section 20.1.3.8, "Task URL Attachment from Process Tracking Page Is not Supported"

20.1.3.1 When Documentation Server is Down, Launching a Group Space for an Instance Causes Error "Instance 'null' is not available"

If you have a Process Spaces group space open and you bring down the documentation service, then, when you launch instance group space for an instance, you see that an instance group space is created. However, when you open the instance group space, you receive the error message "Instance 'null' is not available". This happens because the newly created group space does not have the custom attribute `instanceId`.

For the workaround, the administrator should do the following:

1. Navigate to Settings in the process instance group space.

2. Navigate to custom attributes.

3. Create the custom attribute `instanceId` and associate the process instance identifier as the value.

20.1.3.2 File Size Limit for Process Attachment Is 2 MB

If you attach a file to a process, the file must be no larger than two megabytes.

20.1.3.3 Drilled Down Graphs Will not Honor the Filter Criterion From the Source

In a dashboard, when you are drilling down from one widget to another, the filter conditions may not all be honored.

20.1.3.4 Display of Changes to Organizational Unit Membership Requires Logging Back in Again

If you are logged into Oracle Business Process Management Workspace, and changes are made to your organizational membership, you will not see these changes reflected in the interface until you log out and log back in again. This is because, for better performance, the organizational unit information is cached when you log into Process Workspace.

20.1.3.5 Role Members Are not Removed During Process Re-Deployment

If, during design time, you update a process by removing a member from a role and then re-deploy the process, the member you removed is still listed as a member of that role. This is because permission to remove members from roles is limited to administrators during runtime.

To remove the member from the role, the administrator must use Oracle Business Process Management Workspace as described in *Oracle Fusion Middleware User's Guide for Oracle Business Process Management*.

20.1.3.6 For Large Number of Users Set Timeout to 5 Minutes Maximum

If you have a large number of users, set the timeout to no more than 5 minutes. To do this, expand the BPM Workspace `.ear` file, open the `web.xml` file, and update the timeout parameter.

20.1.3.7 Possible Mixed Translation Issue when Displaying BPM Audit Trail

In BPM Workspace, when displaying the audit trail, the fallback mechanism for the BPMN flow element labels is incorrect.

When there is no label for the browser language, an element's first label—that is, the first label in the list of localized labels—is used. This can cause the translation to be mixed because the first locale for each activity is not always the same.

To work around this issue, make the first locale the same for all activities.

20.1.3.8 Task URL Attachment from Process Tracking Page Is not Supported

You cannot access the task URL attachment from Process Tracking page.

20.1.4 Oracle BPMN Administration

This section describes issues and workarounds for Oracle BPMN Administration. This section contains the following:

- Section 20.1.4.1, "ORA-00001: unique constraint (SH_SOAINFRA.BPM_AUDIT_ QUERY_PK) violated when exceeding the Quota"

20.1.4.1 ORA-00001: unique constraint (SH_SOAINFRA.BPM_AUDIT_QUERY_PK) violated when exceeding the Quota

If you encounter the following error in the log file:

```
java.sql.SQLIntegrityConstraintViolationException: ORA-00001:
unique constraint (SH_SOAINFRA.BPM_AUDIT_QUERY_PK) violated when
exceeding the Quota
```

then increase the quota by doing the following:

1. Run the following SQL command:

   ```
   update BPM_AUDIT_SEQUENCE set seq_count = ( select max(query_
   id) from bpm_audit_query) +1 where seq_name = 'AUDIT_QUERY_
   SEQ';
   ```

2. Restart the server.

20.2 Configuration Issues and Workarounds

There are no known configuration issues or workarounds for Oracle Business Process Management at this time.

20.3 Documentation Errata

There are no known documentation errata for Oracle Business Process Management at this time.

21

Oracle Business Rules

This chapter describes issues associated with Oracle Business Rules. It includes the following topics:

- Section 21.1, "General Issues and Workarounds"
- Section 21.2, "Configuration Issues and Workarounds"

21.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 21.1.1, "Migration of Common Java Classes with Aliases Applied"
- Section 21.1.2, "Alias and Visibility Settings Not Always Applied to Migrated Dictionary"
- Section 21.1.3, "Manual Updates Required for Release 10.1.3.x Migrated Dictionaries"
- Section 21.1.4, "Migrator Does not Migrate Certain Java Fact Type Properties"
- Section 21.1.5, "Migrator Throws a RUL-05003 Warning in Some Cases"
- Section 21.1.6, "Hiding Certain Properties When Using Classes with Misbehaving Methods"
- Section 21.1.8, "Oracle Business Rules Expressions: New Options and Built-in Functions"
- Section 21.1.9, "Audit Trail for Upgraded AS11 Rules Components Shows Only Basic Information"
- Section 21.1.10, "SOA Composer Provides Only a Subset of Rules Designer Functionality"
- Section 21.1.11, "Split and Merge Selected Cells Operations Do Not Workin SOA Composer"
- Section 21.1.12, "SOA Composer Does Not Support Localized Number Formatting"
- Section 21.1.13, "In SOA Composer, Collapsed Rules Do Not Show or Highlight Errors"
- Section 21.1.14, "Conflicting Display of Editor Buttons in SOA Composer Decision Table Toolbar"

21.1.1 Migration of Common Java Classes with Aliases Applied

In Oracle Fusion Middleware 11g Release 1 (11.1.1), there is the concept of the "built-in" dictionary which is linked to by all other dictionaries. The built-in dictionary includes fact types for several common Java classes, including: `Object`, `String`, `BigInteger`, `BigDecimal`, `Calendar`, `XMLGregorianCalendar`, `List`, and `JAXBElement`.

There is a limitation when you are migrating a Release 10.1.3.x dictionary to Oracle Fusion Middleware 11g Release 1 (11.1.1). In Oracle Business Rules Release 10.1.3.x, all classes had to be imported into each dictionary, including `Object` which was imported by default. Thus, a user could import the common Java class fact types and change the aliases for properties, methods, and fields. In Oracle Fusion Middleware 11g Release 1 (11.1.1), for such classes users cannot specify custom aliases and these fact types are not migrated from a Release 10.1.3.x dictionary that is being migrated to Oracle Fusion Middleware 11g Release 1 (11.1.1). Thus, if an alias is applied for a common Java class that is part of the built-in dictionary, in Oracle Fusion Middleware 11g Release 1 (11.1.1) these aliases are discarded and the aliases are not available to use in rules.

Workaround:

There is no workaround for this issue.

21.1.2 Alias and Visibility Settings Not Always Applied to Migrated Dictionary

During dictionary migration from Oracle Business Rules Release 10.1.3.x, Java classes are imported into the new Oracle Fusion Middleware 11g Release 1 (11.1.1) dictionary and then aliases and visibility settings are applied. A bug in the migration prevents the identification of some methods so that alias and visibility settings can be applied.

Workaround:

In such cases, the alias and visibility settings that applied for the Oracle Business Rules Release 10.1.3.x dictionary must be manually applied to the destination Oracle Fusion Middleware 11g Release 1 (11.1.1) dictionary.

21.1.3 Manual Updates Required for Release 10.1.3.x Migrated Dictionaries

Restricted Simple Types

Oracle Business Rules Release 10.1.3.x uses JAXB 1.0. In JAXB 1.0 restricted simple types do not have any special support in the generated Java classes, and are mapped to a property with the same type as the simple type. Oracle Business Rules for Oracle Fusion Middleware 11g Release 1 (11.1.1) uses JAXB 2.0. In JAXB 2.0, restricted simple types of string type are transformed into Java `enum` values. Because of this difference, after migrating a Release 10.1.3.x dictionary, places in the dictionary that previously used raw strings to represent the restricted values must be manually updated to use the Java enum values.

xsd:dateTime in Migrated Dictionaries

Oracle Business Rules Release 10.1.3.x uses JAXB 1.0. In JAXB 1.0, `xsd:dateTime` types are mapped to `java.util.Calendar`. Oracle Business Rules for Oracle Fusion Middleware 11g Release 1 (11.1.1) uses JAXB 2.0. In JAXB 2.0, `xsd:dateTime` types are mapped to `XMLGregorianCalendar`, which more accurately contains the values of an `xsd:dateTime` element. Thus, in a dictionary migrated from Release 10.1.3.x, comparisons between properties may no longer function correctly because `Calendar` implements a method `compareTo` and `XMLGregorianCalendar` implements a

method `compare`. Manual changes are required in the dictionary to change the comparisons. Alternatively, in Oracle Fusion Middleware 11g Release 1 (11.1.1) you can use a `Duration` to compare most common date and time formats. Making this change in a migrated dictionary requires manual changes to the data model and to the rules that use the imported fact types.

Invalid Expressions in Migrated Dictionary

Oracle Business Rules for Oracle Fusion Middleware 11g Release 1 (11.1.1) supports rich type-checking that invalidates some expressions migrated from Release 10.1.3.x. For example, if an instance of `Integer` is referenced to call the `intValue()` method, this may produce a validation warning if `Integer` has not been imported into the data model. The solution to this issue is to import `Integer` into the data model.

Index-based or Iterator-based Iteration in Collections with RL Functions

In Release 10.1.3.x, it was necessary in functions and RL actions to use index-based or iterator-based iteration over collections with raw RL. In Oracle Fusion Middleware 11g Release 1 (11.1.1), the pre-defined action type "for" implements the for-each iteration loop construct and can replace most uses of these older iteration constructs.

Calling Functions to Return New Variable Instances

In Release 10.1.3.x, it was not possible to invoke a constructor in the initialization expression for a variable. In Oracle Fusion Middleware 11g Release 1 (11.1.1) variables are called globals. Due to this Release 10.1.3.x limitation, in some Release 10.1.3.x dictionaries, there are function calls to initialize expressions and to invoke the constructor and return the new instance. In Oracle Fusion Middleware 11g Release 1 (11.1.1), you can use the `new` operator in initialization expressions.

21.1.4 Migrator Does not Migrate Certain Java Fact Type Properties

In Release 10.1.3.x, a property was created for a fact type if the fact type had either a setter or getter. In Oracle Fusion Middleware 11g Release 1 (11.1.1), a property is created only if there is both a setter and a getter for the property.

21.1.5 Migrator Throws a RUL-05003 Warning in Some Cases

In Oracle Fusion Middleware 11g Release 1 (11.1.1), there is a requirement that Java and XML fact types in a dictionary have a single-inheritance chain as determined by visible fact types. This limitation prevents multiple-inheritance chains, including interfaces, from causing runtime exceptions in the engine. The user must specify a single-inheritance chain by marking classes which should not be considered in an inheritance chain as non-visible. When a multiple-inheritance chain is detected during validation, the follow warning is returned:

```
RUL-05003: The visible fact type "Foo" should only inherit from one visible fact
type, but inherits from visible fact types "Bar" and "Baz".
```

In this case, marking either `Bar` or `Baz` as non-visible will fix this warning.

21.1.6 Hiding Certain Properties When Using Classes with Misbehaving Methods

When asserting instances of some classes exceptions may be thrown because of misbehaving methods. When a fact is asserted, the fact is "shadowed" inside the rules engine. This shadowing requires the rules engine to invoke the accessors for all properties with the **Visible** checkbox selected (for all visible properties). If an accessor

throws an exception when it is invoked, this exception propagates out of the rules engine.

A specific example of this limitation is the `java.sql.Date` class. This class includes several deprecated methods, for example `getYears` and `setYears`. These methods always throw an `IllegalArgumentException` when they are invoked. In Oracle Business Rules, if an instance of the `Date` class is asserted, an exception is thrown. This exception is due to the `getYears` method being called when the fact instances are shadowed inside the rules engine.

When using Oracle Business Rules, the `Date` class should not be asserted, but this assert may be out of the control of the user. For example the `Date` class is asserted when a large object graph contains a list of `Date` instances and you are using assert tree on the object graph.

Workaround:

You must mark all properties that include misbehaving methods as non visible. To do this you must deselect the **Visible** checkbox for the properties that cause an exception. For example, in the `java.sql.Date` class., the workaround is to deselect the **Visible** checkbox for the properties "years", "hours", and "minutes" for the `java.sql.Date` fact type in the datamodel.

21.1.7 Length of Rules Repository Path Should be Less Than 70 Characters

While configuring the rules repository path, it is recommended to limit the length of the path to 70 characters. If the length exceeds 70 characters, you would encounter problems after any DT/RT changes from SOA Composer.

So, as a best practice, after you design the rules, ensure that the repository path length is less than 70 characters.The following path taken from a sample rule.decs file fails after DT/RT changes at run time:

```
<path>OrderBookingComposite/oracle/rules/com/example/globalcompa
ny/orderbooking/approvalrule/RequiresApprovalRule.rules</path>
```

21.1.8 Oracle Business Rules Expressions: New Options and Built-in Functions

Oracle Business Rules expressions used in Rules Designer and Oracle SOA Composer support the following:

1. Expressions support the new RL syntax. For example,

   ```
   (assign new) Driver d = new Driver(name: "Tom", age: 45)
   ```

2. Expressions support the `instanceof` keyword: For example,

   ```
   if (vehicle instanceof Car) {
     (assign new) Car car = (Car)vehicle;
   }
   else if (vehicle instanceof Truck) {
     (assign new) Truck truck = (Truck)vehicle;
   }
   ```

3. Expressions support the list type built-in functions, including the following:

   ```
   RL.list.intersect
   RL.list.reverse
   RL.list.insertBefore
   RL.list.concatenate
   RL.list.union
   RL.list.append
   ```

```
RL.list.except
RL.list.distinctValues
RL.list.remove
RL.list.indexOf
RL.list.create
```

For more information, see the descriptions in `oracle.rules.rl.extensions.RL`, in Oracle Fusion Middleware Java API Reference for Oracle Business Rules Javadoc.

4. Expressions can support a variable number of arguments. As in the Java Language, when the last parameter to a function or method is an array, then an expression can call the function or method with a variable number of arguments. For example, using the built-in `RL.list.create` function in an expression:

```
RL.list.create(Object[] items) returns List
```

The built-in `RL.list.create()` can be called as follows:

```
(assign new) List myList = RL.list.create(1, 2.0, "three")
```

In this example, the `myList` result contains three Objects: an Integer, a Double, and a String.

21.1.9 Audit Trail for Upgraded AS11 Rules Components Shows Only Basic Information

After you upgrade AS11 Oracle Business Rules components to AS11 PS2, the audit trail for the composite instances created before upgrade shows only basic information. The decision trace includes only the name of the Decision Function invoked and the timestamp.

Workaround:

You can view other details of the trace, such as the values of input and output facts by using the BPELProcess Audit Trail.

21.1.10 SOA Composer Provides Only a Subset of Rules Designer Functionality

SOA Composer provides only a subset of the functionality available in Rules Designer. Some of the features/tabs in Rules Designer are currently not available in SOA Composer. For example, the **Functions** tab functionality is missing, the **Links** tab functionality is missing, and you cannot add new rulesets with SOA Composer.

21.1.11 Split and Merge Selected Cells Operations Do Not Workin SOA Composer

Using SOA Composer with a Decision Table, the split and merge selected cells operations do not work.

There is no workaround for this issue.

21.1.12 SOA Composer Does Not Support Localized Number Formatting

SOA Composer does not support any number formatting. For example, you are using SOA Composer with U.S. English as the browser language. You enter a floating-point data, such as *34533223.2345*, as a value. However, when you change the browser

language to French, the value is still displayed as *34533223.2345*. In French, the value should have been displayed as *34533223,2345*.

Workaround:

Irrespective of the browser language, you need to enter any numeric value in the U.S. English language without any number separator such as ",".

21.1.13 In SOA Composer, Collapsed Rules Do Not Show or Highlight Errors

In SOA Composer, in the case of a rule in a collapsed state, when you double-click an error in the Validation Panel, the UI does not display a window with the error messages.However, in the case of a rule in an expanded state, when you double-click an error message in the Validation Panel, the UI opens a window with the error message, and also highlights erroneous areas.

There is no workaround for this issue.

21.1.14 Conflicting Display of Editor Buttons in SOA Composer Decision Table Toolbar

In a SOA Composer Decision Table, when a row is selected, the Bucketset Editor, the Condition Browser, and the Action Editor buttons are displayed on the Decision Table toolbar.

However, when the rows and columns are switched, all these buttons are displayed on the column header.

There is no workaround for this issue.

21.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 21.2.1, "Too Many Open Files Message When Deploying a Business Rules Project"

21.2.1 Too Many Open Files Message When Deploying a Business Rules Project

If you see the error "Too Many Open Files" while deploying an Oracle Business Rules Decision Component, you might need to increase the file descriptor limit.

The "Too many open files" issue is due to JDK6 bugs. These bugs could occur at runtime or at compile time, depending on the number of JAR files used and a few other variations around the use of file descriptors by the JDK/JRE.

Workaround for this issue is to increase the limit of file descriptors. Per-process, per-user file descriptor limit can be preconfigured by default to the value 1024. If you increase this limit to 4096 or larger, the new value should resolve this issue.

These are the potentially relevant JDK6 bugs,

http://bugs.sun.com/bugdatabase/view_bug.do?bug_id=6533291

http://bugs.sun.com/bugdatabase/view_bug.do?bug_id=6485027

http://bugs.sun.com/bugdatabase/view_bug.do?bug_id=6400872

http://bugs.sun.com/bugdatabase/view_bug.do?bug_id=6456960

http://bugs.sun.com/bugdatabase/view_bug.do?bug_id=6206485

http://bugs.sun.com/bugdatabase/view_bug.do?bug_id=6446657

And a blog entry describes this issue at

http://coldfused.blogspot.com/2007/02/mystery-of-too-many-open-files.html

The command to increase per-process, per-user file descriptor differs across Operating Systems and shells. It is typically done with `ulimit` on UNIX platforms so consult the man pages for `ulimit` for your Operating System and shell.

For example:

```
$ ulimit -n 4096
```

22

Oracle Enterprise Repository

The chapter describes the new and changed functionality in Oracle Enterprise Repository 11g Release 1 (11.1.1.3).

This chapter contains the following sections:

22.1 What's New in Oracle Enterprise Repository 11g Release 1 (11.1.1.3)

This section describes the new features and functionalities in Oracle Enterprise Repository 11g Release 1 (11.1.1.3):

Closed Loop Governance for Oracle Service Bus 11g Release 1 (11.1.1.3)

Oracle Service Bus (OSB) can now consume SOA Suite Business Services through Oracle Enterprise Repository from the Eclipse environment. When OSB generates proxy services, the proxy services are harvested into Oracle Enterprise Repository. Oracle Enterprise Repository promotes the proxy services to the Oracle Service Registry, and Enterprise Manager provides runtime performance metrics for the proxy service to the Enterprise Repository.

Change in Oracle JDeveloper 11*g* Release 1(11.1.1.3) Connection to Oracle Enterprise Repository

In Oracle JDeveloper 11*g* Release 1(11.1.1.2) release, the Oracle Enterprise Repository adapter and the SOA adapter were bundled together. When you installed SOA, you automatically received the Oracle Enterprise Repository adapter.

In the Oracle JDeveloper 11*g* Release 1(11.1.1.3) release, there are three separate plugins:

- a plugin for the SOA extensions
- a plugin for Oracle Enterprise Repository that provides Oracle Enterprise Repository search capability
- an Oracle Enterprise Repository harvester plugin

To obtain the Oracle Enterprise Repository plugins for Oracle JDeveloper:

1. In Oracle JDeveloper, click **Help**, **Check for Updates**.

2. In the Check for Updates wizard, select the **Internal Automatic Updates** option and click **Next** to install the updates.

> **Note:** The Oracle Enterprise Repository adapters work with the Oracle Enterprise Repository 11*g* Release 1 (11.1.1.2) Oracle Enterprise Repository server.

Basic Visibility for OWSM and WLS Policies

When Oracle Enterprise Repository harvests assets with OWSM or WLS policy attachments, the relationship between the assets and the policies is reflected in the Oracle Enterprise Repository metadata.

Critical Bug Fixes for Customer Escalations

The bug fixes and workarounds are identified in Section 22.2, "General Issues and Workarounds".

Support for 11g Release 1 (11.1.1.3) Components and Platforms

The Oracle Enterprise Repository 11g Release 1 (11.1.1.3) list of Supported Platforms is available from the Oracle Enterprise Repository OTN page:

http://www.oracle.com/technology/products/soa/repository/index.html

Certify with Enterprise Manager 11g Release 1 (11.1.1) Grid Control

Oracle Enterprise Repository has also been certified with Enterprise Manager (EM) 11g Release 1 (11.1.1) Grid Control, ensuring that runtime performance metrics monitored by EM are provided to Oracle Enterprise Repository.

22.2 General Issues and Workarounds

This section describes the general issues and workarounds in Oracle Enterprise Repository 11g Release 1 (11.1.1.3). It includes the following topics:

- Section 22.2.1, "Oracle Enterprise Repository"
- Section 22.2.2, "Asset Editor"
- Section 22.2.3, "Harvester"
- Section 22.2.4, "Exchange Utility"
- Section 22.2.5, "Repository Extensibility Framework (REX)"

22.2.1 Oracle Enterprise Repository

This section describes the issues and workarounds found in Oracle Enterprise Repository.

22.2.1.1 Improved Project Search

When you select the Edit button in the Edit Project dialog, the Add/Remove Users dialog is displayed. In earlier Oracle Enterprise Repository releases, the Search utility in the Add/Remove Users dialog was ignoring the criteria and returning all users, and thus was not working. This is fixed in Oracle Enterprise Repository 11g Release 1 (11.1.1.3).

22.2.1.2 Configurable Path for Workflow Shell Scripts

In Oracle Enterprise Repository 11g Release 1 (11.1.1), all the Workflow shell scripts were hardcoded with the JDK path. This is modified in Oracle Enterprise Repository 11g Release 1 (11.1.1.3) to accept the JAVA_HOME parameter set by you.

22.2.1.3 Admin Level Privileges Recognized with Container Managed Authentication

When Oracle Enterprise Repository is installed using the Container Managed Authentication with Role synchronization enabled, the Oracle Enterprise Repository Admin role is not recognized by the container.

Workaround:

Prior to enabling the Oracle Enterprise Repository Container Managed Authentication process, you need to create a role that at least one user will be a member of within the container's user directory, for example, LDAP/DB/XML File, etc. Then, set the enterprise.security.roletype.admin value to this new 'group/role' name just prior to resetting the authentication properties and then, restart the Oracle Enterprise Repository application.

When the container is prompted, since the value of the enterprise.security.roletype.admin property contains the name of a 'real' roletype, it is then assigned to the user's account and thus allowed the 'admin' level privileges within the Oracle Enterprise Repository application.

22.2.1.4 Possible Performance Issues on the Oracle Enterprise Repository Homepage

Oracle Enterprise Repository performance testing revealed high transaction response times and Database CPU utilization times on the Oracle Enterprise Repository homepage. This may be observed with a large number of concurrent users and more than 30,000 assets. This issue is caused by the five search queries included in the Oracle Enterprise Repository home page.

Workaround

Customize the Oracle Enterprise Repository homepage and remove some or all of the queries.

22.2.1.5 Updated Workflow Scripts

The Linux environment setup script, setenv.sh, file found in the OBPM_SetupScripts folder was out of sync with its .bat version. The setenv.sh file was missing variables and included incorrect paths. This script file has been updated to be in sync with the Windows environment setup script, setenv.bat.

22.2.1.6 Asset Navigator Diagram Window Does Not Resize

If the JRE of the browser is set to a version higher than JRE 1.6.0_10 and when the browser window for navigator is maximised to monitor screen, then the asset navigator diagram is not redrawn to the new window size.

Workaround

Click the graph icon in the Asset Description pane of the window. This redraws the asset diagram to the new window size.

22.2.2 Asset Editor

This section describes the issues and workarounds found in the Oracle Enterprise Repository Asset Editor:

22.2.2.1 Navigator Fails to Launch in WebLogic

When the automatic login using cookies were disabled (`enterprise.security.cookielogin.allow`) in WebLogic, then the navigator fails to launch.

22.2.2.2 Asset Names Truncated when Too Long

If the asset name is greater than 123 characters, then Oracle Enterprise Repository truncates the character count to 123 and adds "v???". This problem only occurs when importing assets that already exist in Oracle Enterprise Repository. This does not occur when new assets are imported into Oracle Enterprise Repository.

22.2.3 Harvester

This section describes the issues and workarounds found in Oracle Enterprise Repository Harvester:

22.2.3.1 Harvesting Policies from Oracle Service Bus Projects

When harvesting Oracle Service Bus projects, the assets are no longer created for policies. Instead, a harvester property is added to the service called Runtime Policies.

22.2.3.2 Harvesting Files with MBCS

Harvested files with multi-byte characters (MBCS) are not being saved properly.

22.2.3.3 Harvesting a Remote SOA Composite with a SOA Direct Transport

In Oracle Enterprise Repository 11g Release 1 (11.1.1), when harvesting a remote SOA composite that has a SOA Direct transport, the endpoint asset is created. However, the endpoint properties are incomplete as they are missing the endpoint URIs. In addition, the harvester was not recognizing the direct binding service. Thus, the endpoint was related to a wrong service. These issues are fixed in Oracle Enterprise Repository 11g Release 1 (11.1.1.3).

22.2.3.4 Duplicate Endpoints in WSDL References

In Oracle Enterprise Repository 11g Release 1 (11.1.1), the SOA Suite harvester was introspecting WSDL References in a composite. This caused duplicate endpoints to be created. This is fixed in Oracle Enterprise Repository 11g Release 1 (11.1.1.3), by not introspecting references in a composite.

22.2.3.5 Missing Endpoint URI

When harvesting a WSDL, the Endpoint URI is obtained from the Address element that is a child of the Port element. However, if the Port element contained multiple child elements and the Address element was not the first one in the list, it would fail to retrieve the address. This is fixed in Oracle Enterprise Repository 11g Release 1 (11.1.1.3).

22.2.3.6 Harvesting SOA Composites

When harvesting SOA composites, if a promoted service has a direct binding, then the Transport type harvester property is set to **soa-direct**.

22.2.3.7 BPMN Support Limitation by Harvester

When you Harvest a JDeveloper project of BPM process with Component Type:BPMN process, then Harvester ignores the component and harvests successfully. This leads to composite model with missing BPMN component.

22.2.4 Exchange Utility

This section describes the issues and workarounds that are found in Oracle Enterprise Repository Exchange Utility(XU):

22.2.4.1 XU Fails When Publishing and Receiving

In Oracle Enterprise Repository 11g Release 1 (11.1.1), if the XU installation directory name had spaces, then the Exchange Utility publishing and receiving fails. This is fixed in Oracle Enterprise Repository 11g Release 1 (11.1.1.3).

22.2.4.2 Exchange Utility Supports SOAP, HTTP, and JMS Protocols

Exchange Utility publishes only Web services that support SOAP, HTTP, and JMS protocols. EJB and Java services are not published to Oracle Service Registry.

22.2.4.3 Modified XU Configuration File

The out-of-the-box XU configuration file now supports publishing of proxy services to Oracle Service Registry.

22.2.4.4 Path to the Default Configuration File

Exchange Utility (XU) comes with a default configuration file called the orrxu.xml file. You can define your own configuration file and place it under any directory. When you run XU, you must ensure that you point to that file. However, there are sections in XU that still point to the out-of-the-box configuration file. This is fixed in Oracle Enterprise Repository 11g Release 1 (11.1.1.3).

22.2.5 Repository Extensibility Framework (REX)

This section describes the issues and workarounds that are found in Oracle Enterprise Repository Extensibility Framework:

22.2.5.1 Asset Type Records Marked as Inactive

In earlier releases of REX, when the `assetDelete` method was called, it would delete the asset type records from the database. However, in Oracle Enterprise Repository 11g Release 1 (11.1.1.3), the asset type records are not deleted from database, instead they are just marked as inactive.

22.2.5.2 Method to Delete Submitted Files

In Oracle Enterprise Repository 11g Release 1 (11.1.1.3), a new method is added to REX that allows you to delete the Submission files. The method name that is added is `assetDeleteFiles`.

22.3 Enhancements in Oracle Enterprise Repository

There are no enhancements in Oracle Enterprise Repository 11g Release 1 (11.1.1.3).

22.4 Deprecated Features

This section describes the deprecated features for Oracle Enterprise Repository 11g Release 1 (11.1.1.3). This section contains the following topics:

Deprecating Support for Tomcat

In Oracle Enterprise Repository 11g Release 1 (11.1.1.3), the support for tomcat is deprecated. If you need to install Oracle Enterprise Repository 11g Release 1 (11.1.1.3) on Tomcat, then contact the Oracle Support team.

23

Oracle Mediator

This chapter describes issues associated with Oracle Mediator. It includes the following topics:

- Section 23.1, "General Issues and Workarounds"
- Section 23.2, "Configuration Issues and Workarounds"
- Section 23.3, "Documentation Errata"

23.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topics:

- Section 23.1.1, "Multi-lingual Support Depends on Database Character Set"
- Section 23.1.2, "SOAP Web Service With Attachments is Not Supported"
- Section 23.1.3, "Oracle Mediator - BPEL Process Manager Callback Processing"
- Section 23.1.4, "Mediator Components May Cause SOA Suite Server to Run Out of Memory"
- Section 23.1.5, "Mediator Advanced Functions Do Not Work in Design Time"
- Section 23.1.6, "endpointURI Property Is Not Displayed in the Assign Dialog"
- Section 23.1.7, "Recoverable Instances for the Resequencer Are Tracked Incorrectly"
- Section 23.1.8, "Errors Occur When Multiple Users Edit the Same Document"
- Section 23.1.9, "WSDL Generated From Schema Cannot Be Updated"

23.1.1 Multi-lingual Support Depends on Database Character Set

If you want to use multi-language support feature for some functions in Oracle Mediator, then, to avoid any unexpected results, you must ensure that these characters are supported by Database character set. For example, for Unit Test function, if the initial message payload in Unit Test includes characters that are not supported by Database character set, then you will see that the characters fail to display correctly in Unit Test part of the Oracle Enterprise Manager Fusion Middleware Control Console. This issue does not occur for a Database that supports Unicode characters.

23.1.2 SOAP Web Service With Attachments is Not Supported

In Oracle Mediator, when you call a SOAP Web Service with attachments you will not be able to perform a payload manipulation using the Assign or Transform functions. It fails with an exception because SOAP with attachments is not supported in Oracle Mediator if you use the Assign or Transform functions.

Workaround

When calling a SOAP Web Service with attachments, use Oracle Service Bus instead of Oracle Mediator.

23.1.3 Oracle Mediator - BPEL Process Manager Callback Processing

If Oracle Mediator calls a BPEL Process with callback processing and timeout, it is a best practice to explicitly handle the Callback exceptions returned from Oracle Mediator, in BPEL process. This is to ensure that the global transaction associated with Callback processing gets committed and is not rolled back. This way, the timeout handler configured in Oracle Mediator will not kick in even if the Callback handling in Oracle Mediator fails.

23.1.4 Mediator Components May Cause SOA Suite Server to Run Out of Memory

Mediator applications may run out of memory sometimes. For example, if the rate of incoming messages to Mediator is faster than the rate of callback messages, then memory accumulation occurs in the Mediator cache.

To fix this issue, change the cache size through the Oracle Enterprise Manager Fusion Middleware Control Console by adding the following property in the `Parameters` attribute of the Mediator configuration properties:

```
mediator.runtime_cache.limit=<value>
```

For example, if you set the value of the `mediator.runtime_cache.limit` property to 100, then the size of the cache will be limited to 100. The cache size refers to the number of objects that can be stored in the cache. You can switch off caching completely by setting this property to zero.

23.1.5 Mediator Advanced Functions Do Not Work in Design Time

Mediator advanced functions like `mhdr:getCompositeName()`, `mhdr:getHeader` require a runtime context to execute. So, if these functions are run using the Mapper Test functionality during design time, then the target XML file is not generated and the following error is thrown:

```
XML-22044: (Error) Extension function error: Error invoking 'getComponentName':'
java.lang.IndexOutOfBoundsException: Index: 0, Size: 0'
```

These functions work fine in runtime environment.

23.1.6 endpointURI Property Is Not Displayed in the Assign Dialog

The outbound property `$out.property.endpointURI` is not listed as an available property in the Assign Value dialog for Mediator assign task, while specifying a routing rule.

If you want to assign value to this property, then you can type in the property as `endpointURI` in the Property field of the To section in the Assign Dialog.

23.1.7 Recoverable Instances for the Resequencer Are Tracked Incorrectly

In the Enterprise Manager, the number of recoverable instances shown for the Mediator resequencer equals the number of retries made to that instance rather than the number of actual recoverable instances. This information is for tracking purposes only, and does not result in duplicate messages being sent out.

23.1.8 Errors Occur When Multiple Users Edit the Same Document

If multiple users open and edit the same document in the SOA Composer, the following "Unexpected Error" occurs when one of the users tries to save their changes:

```
Unable to create document in the metadata repository; a document with the same
name or GUID already exists.
```

23.1.9 WSDL Generated From Schema Cannot Be Updated

When you generate a WSDL file for a Mediator from a schema, you cannot update the Reply message from the Create WSDL window.

If you need to edit the Reply message, you can update the WSDL file directly after you create the file from the Create WSDL window.

23.2 Configuration Issues and Workarounds

This section describes configuration issue and workarounds. It includes the following topic:

- Section 23.2.1, "A Null Pointer Exception Occurs When There Are No Routing Rules"

23.2.1 A Null Pointer Exception Occurs When There Are No Routing Rules

In order to be a valid Mediator configuration, each Mediator component must include routing rules. If a component has no routing rules, Mediator does nothing at run-time and a null pointer exception occurs at mediator.dispatch.CaseExecutionPlan.getEffectiveExecutableCases.

23.3 Documentation Errata

There are no documentation errata for Oracle Mediator.

24

Oracle Service Bus

This chapter describes issues associated with Oracle Service Bus. It includes the following topics:

-

24.1 What's New in Oracle Service Bus 11.1.1.3.0

This section describes new features and enhancements in Oracle Service Bus 11*g* Release 1 Patch Set 2 (11.1.1.3.0).

24.1.1 Installation and Deployment

Oracle Service Bus installation is now similar to other Oracle SOA products. The installer is the Oracle Unified Installer, and Oracle Service Bus installation occurs separately, after you install Oracle WebLogic Server 10.3.3 with a different installer.

After installation in a production environment, you create database schemas using the Repository Creation Utility (RCU).

In this release you can install Oracle Service Bus and Oracle SOA Suite in the same Middleware Home (MW_HOME), and Oracle Service Bus and Oracle SOA Suite can coexist in the same domain.

For more information, see the *Oracle Fusion Middleware Installation Guide for Oracle Service Bus*.

24.1.2 Service Result Cache with Coherence

Oracle Service Bus now supports service result caching for business services with Coherence. Oracle Coherence is an in-memory data grid solution that lets organizations predictably scale mission-critical applications by providing fast access to frequently used data.

Service result caching allows caching the response from a business service. This can dramatically improve performance if the response from the business service is relatively static. Oracle Service Bus uses a single cache for all business services. Only valid/correct results from business services are cached.

For more information, see "Improving Performance by Caching Business Service Results" in the *Oracle Fusion Middleware Administrator's Guide for Oracle Service Bus*.

For information on configuring this new feature, see "Message Handling Configuration Page" for business services.

24.1.3 Message Flow Transaction

With Oracle Service Bus, you can configure a proxy service to start and execute its message flow in the context of a JTA global transaction for non-transactional inbound transports (such as HTTP and JMS with a non-XA connection factory). In prior releases, the proxy service message flow executed in the context of a JTA global transaction only when the inbound transport started/propagated a global transaction (such as JMS/XA or SB with the transaction propagated).

With Oracle Service Bus, it is possible to execute both the request and the response pipelines in the context of the same JTA global transaction for non-synchronous inbound endpoints as well.

For information on configuring this feature, see "Message Handling Page" for proxy services in the *Oracle Fusion Middleware Administrator's Guide for Oracle Service Bus*.

24.1.4 Native Java EJB Transport

The JEJB (inbound) transport allows exposing a proxy service as a stateless session bean (SLSB), along with receiving POJO method arguments directly in the message flow. The POJO arguments can be manipulated using Java Callouts. POJO arguments can be directly sent as arguments to SLSBs invoked by the JEJB outbound transport.

For more information, see "JEJB Transport" in the *Oracle Fusion Middleware Developer's Guide for Oracle Service Bus*.

24.1.5 JMS Object Message

In Oracle Service Bus, the JMS transport is enhanced to receive and send Java Objects to and from JMS queues/topics. The support is enabled by configuring a proxy or business service to have the Service Type Messaging:Java.

24.1.6 Custom XPath Functions

Oracle Service Bus provides a framework to wrap utility Java code into custom XPath functions, which can be reused across inline XQuery expressions and XQuery Mapper transformations used in message flows and Split-Joins. The custom XPath functions are available in the design tooling (Console and IDE). For more information, see "Creating and Using Custom XPath Functions" in the *Oracle Fusion Middleware Developer's Guide for Oracle Service Bus*.

24.1.7 JCA Adapters

Oracle Service Bus provides support for Oracle SOA Suite 11g Release1 Patch Set 2 (11.1.1.3.0) JCA adapter artifacts. New Oracle Service Bus resource types for JCA Bindings and TopLink/EclipseLink mapping XML files are now available, as is support for normalized message properties in the transport headers. Upgrade for Oracle Service Bus 10*g* Release 3 JCA artifacts is seamless.

Certification for File and BAM adapters has also been added. Automatic upgrade of Oracle Service Bus 10*g* Release 3 services using JCA adapter artifacts based on Oracle SOA Suite/JDeveloper 10*g* Release 3 is provided.

For more information, see "JCA Transport" in the *Oracle Fusion Middleware Developer's Guide for Oracle Service Bus* and "JCA Bindings" in the *Oracle Fusion Middleware Administrator's Guide for Oracle Service Bus*.

24.1.8 SOA-Direct Transport

Oracle Service Bus provides the SOA-DIRECT transport for use with Oracle SOA Suite 11*g* and later. The SOA-DIRECT transport provides transaction and security context propagation from Oracle Service Bus to Oracle SOA Suite.

The SOA-DIRECT transport provides native connectivity between Oracle Service Bus and Oracle SOA Suite service components. Oracle SOA Suite provides a "direct binding" framework that lets you expose Oracle SOA Suite service components in a composite application, and the Oracle Service Bus SOA-DIRECT transport interacts with those exposed services through the SOA direct binding framework, letting those service components interact in the service bus layer and leverage the capabilities and features of Oracle Service Bus.

SOA Suite can invoke Oracle Service Bus proxy services with an SB transport binding, including the transaction and security context using the direct binding reference.

For more information, see "Oracle SOA Suite Transport (SOA-DIRECT)" in the *Oracle Fusion Middleware Developer's Guide for Oracle Service Bus*. The BPEL Process Manager transport (bpel-10g in the user interface) is for messaging with only Oracle SOA Suite 10g Release 3 only and is still available in Oracle Service Bus.

24.1.9 End to End Life Cycle Governance

Oracle Service Bus lets you browse and consume SOAP/XML over HTTP services, along with retaining Oracle Service Registry information for the service, directly from Oracle Enterprise Repository. The Oracle Service Registry information is used to synchronize business services in Oracle Service Bus with Oracle Service Registry. Oracle Service Bus also lets you harvest Oracle Service Bus proxy services to Oracle Enterprise Repository and specify the service key for the service. The service key is used by Oracle Enterprise Repository when publishing the service to different Oracle Service Registries, helping preserve service keys across life cycle stages and providing the capability to uniquely identify services across different life cycle stages.

24.1.10 OWSM Policy

Oracle Service Bus supports using rich set of Oracle Web Services Manager security policies on SOAP-based proxy/business services in addition to legacy BEA WLS 9.2 proprietary security policies. Oracle Web Services Manager authorization policies are not currently supported. For more information, see "Securing Oracle Service Bus with Oracle Web Services Manager" in the *Oracle Fusion Middleware Developer's Guide for Oracle Service Bus*.

24.1.11 Other Enhancements

Other product enhancements include:

24.1.11.1 EJB 3.0

In Oracle Service Bus, the newly introduced JEJB transport and the existing (XML) EJB Transport support invoking version 3.0 EJBs. In addition, the JEJB transport supports exposing a proxy service as an EJB 3.0 stateless session bean.

24.1.11.2 WSIL 1.1 Support

Oracle Service Bus lets you discover WSDL-based proxy services using Web Services Inspection Language (WSIL) 1.1. This enables a WSIL browser, like the one provided in Oracle JDeveloper, to discover Oracle Service Bus proxy services and download the artifacts in a standards-compliant manner.

24.1.11.3 Enhanced Scalability of Alert Logging

Oracle Service Bus provides better scalability of alerts by logging alerts in a distributed manner. Alert Logging can now be turned on and off on an Alert Destination. Alert Logging console pages are enhanced to scale well to large numbers of alerts.

24.1.11.4 Split-Join Enhancements

Split-Join enhancements include:

- **Transaction Support** – Split-Joins can execute within the context of a JTA global transaction.

- **Wait** – Split-Join supports a Wait action to halt execution of a branch for a specified duration.

24.1.11.5 UDDI Enhancements

Oracle Service Bus lets you rename business services created by import from UDDI. Enhanced support has also been added to import and establish automatic subscription to UDDI services containing multiple binding templates.

24.1.11.6 Other Transport Enhancements

Other transport enhancements include:

- **MQ Dynamic and Alias Queues** – Oracle Service Bus provides support for response correlation in MQ request/response business services based on MQ Dynamic (response) Queues, which are created dynamically based on a Model Queue. Support has also been added for receiving messages in the inbound MQ transport from MQ Alias Queues.

- **JMS Failover for Request/Response Pairs** – For both CorrelationID and MessageID patterns, Oracle Service Bus provides enhanced high availability by letting you specify a response URI (and service account) for each request URI in request/response JMS business services.

- **Email Load Balancing** – Oracle Service Bus lets you specify multiple endpoint URLs (mailto addresses) for load balancing.

24.2 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topic:

- Section 24.2.1, "Installer Fails to Open Using the Sun JDK 1.6.0_03"

- Section 24.2.2, "Error Starting the IDE After Installation"

- Section 24.2.3, "Email Business Service Throws an Exception when the Message Body is Empty"

- Section 24.2.4, "Copying a Project to Another Configuration Project Does Not Work as Expected"

24.2.1 Installer Fails to Open Using the Sun JDK 1.6.0_03

When installing Oracle Service Bus, the installer user interface does not appear when you reference Sun JVM 1.6.0_03 at the beginning of the installation process. Sun JVM 1.6.0_03 is missing the required JAXP 2.1 API JARs.

To work around this issue, use Sun "jdk 160_18" instead.

24.2.2 Error Starting the IDE After Installation

After installation, when trying to start the IDE (Oracle Enterprise Pack for Eclipse), the IDE fails to launch with a "Plug-in '*plug-in_name*' was unable to instantiate class" error.

To address this issue, you must install Oracle WebLogic Server with the default directory name (wlserver_10.3) in the default location under the Oracle Fusion Middleware home directory.

24.2.3 Email Business Service Throws an Exception when the Message Body is Empty

An Email business service with Service Type='Any XML' throws an IOException when it receives a message from a proxy service containing an empty body, such as <soap-env:Body></soap-env:Body>. A patch for this issue will be provided in the future. Please contact Oracle Support.

24.2.4 Copying a Project to Another Configuration Project Does Not Work as Expected

In Eclipse Project Explorer view, when you use copy an Oracle Service Bus project and paste it to another Oracle Service Bus configuration project, the pasted project appears at the top of the Project Explorer view as a stand-alone node.

To move the copied project to the desired Oracle Service Bus configuration project, drag the copied project to the desired configuration project.

24.2.5 Extended Alert History Chart Shows Alert Numbers in Server Locale Format

When viewing the Extended Alert History bar chart for SLA or Pipeline alerts in the Oracle Service Bus Console, the number of alerts shown above each bar is in the format of the server locale, not the browser locale. This issue is a jFreeChart limitation.

24.2.6 Summary of Split-Joins Page Shows Extra Space in Internet Explorer 8

When viewing the Summary of Split-Joins page in the Oracle Service Bus Console in Internet Explorer 8, extra empty space appears to the right of the page.

To fix this issue, use the Internet Explorer 8 Compatibility View settings. Click the **Compatibility View** icon in the Internet Explorer 8 toolbar to open the Compatibility View Settings window. Add the current URL to the list of URLs to be viewed in Compatibility View, or select one of the Display options at the bottom of the window, such as "Display all websites in Compatibility View."

24.2.7 UDDI Import in IDE Fails When Dependency Resource Has No File Extension

In Eclipse, when importing a service from a UDDI repository that has a dependent resource (such as a schema for a WSDL-based service), and the dependent resource does not have a file extension (such as .xsd), the import fails.

To work around this issue, manually add the extension to the dependent resource and modify the parent resource (such as the WSDL) to ensure the dependent resource name contains the extension.

24.2.8 Domain Command Window Closes on Error

When starting an Oracle WebLogic Server domain with the startWebLogic.cmd/.sh script, the command window abruptly closes when an error is encountered, not allowing you to view the cause of the error.

The recommended fix for this issue is to edit the domain's setDomainEnv.cmd/.sh script so that `doExitFlag=false`.

Alternatively, you can use a `noExit` parameter when running the startWebLogic script. For example: `startWebLogic.cmd noExit`.

24.2.9 Oracle Service Bus Console Online Help Search Shows Only English Results

When performing a search in the Oracle Service Bus Console online help, only English language results are returned, even if you are viewing non-English help content.

This issue will be addressed in future releases of Oracle Service Bus.

24.3 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 24.3.1, "Logical Delete Using Inbound Database Adapter Shows Twice the Alerts"

- Section 24.3.2, "JNDI Provider Does Not Accept IPv6 IP Addresses for Cluster URLs"

- Section 24.3.3, "Server Startup and URL Access Failures when Listen Port is IPv6"

- Section 24.3.4, "Extending an Oracle Service Bus Domain in a Cluster Using WLST Results in Configuration Errors"

- Section 24.3.5, "JDBC Limitation when Using Oracle Service Bus 11g with Oracle Database Express Edition 10g"

- Section 24.3.6, "Oracle BAM Adapter Uses Different Logging Mechanism than Other JCA Adapters"

- Section 24.3.7, "No Database Adapter Debug Logging on Business Service Invocation"

- Section 24.3.8, "Import/Export of Encrypted Resources with AIX"

■ Section 24.3.9, "Unable to Find Namespace for Prefix 'tns' Error on WSDL Services"

24.3.1 Logical Delete Using Inbound Database Adapter Shows Twice the Alerts

When using an Oracle Service Bus JCA proxy service with the Oracle JCA Adapter for Database, logical delete pipeline alerts appear twice.

To prevent this behavior from happening, use the following guidelines for logical delete operations:

■ Do not perform inbound logical delete operations on the primary key column.

■ Performing logical delete for inbound operations that use the MarkReservedValue column show additional alerts if the reserved value also appears in rows. You should use the reserved value only for distributed polling.

24.3.2 JNDI Provider Does Not Accept IPv6 IP Addresses for Cluster URLs

When entering a cluster endpoint URI for an Oracle Service Bus service using an IPv6 hexadecimal format, you receive a validation error. For example:

t3://[0db8::ffff:ffff:ffff:ffff%4]:7001,[0db8::ffff:ffff:ffff:ffff%4]:7002

or

t3://[0db8::ffff:ffff:ffff:ffff]:7001,[0db8::ffff:ffff:ffff:ffff]:7002

To work around this issue, use an IPv6 machine hostname instead of the hexadecimal format.

24.3.3 Server Startup and URL Access Failures when Listen Port is IPv6

When using an IPv6 format for a server's listen port or for URL access, omitting %4 from the end of the address (to specify IPv4 compatibility) results in server startup failure or URL access failure in certain situations.

To prevent this issue, use the following patterns:

■ Windows

– <listen-address>0db8::ffff:ffff:ffff:ffff**%4**</listen-address>

– http://[0db8::ffff:ffff:ffff:ffff**%4**]:7001/sbconsole

■ Linux

– <listen-address>0db8::ffff:ffff:ffff:ffff</listen-address>

– http://[0db8::ffff:ffff:ffff:ffff**%4**]:7001/sbconsole

The Linux listen-address is the only scenario that does not require %4 at the end.

24.3.4 Extending an Oracle Service Bus Domain in a Cluster Using WLST Results in Configuration Errors

Using the Oracle Fusion Middleware WebLogic Scripting Tool (WLST) to extend an existing domain where Oracle Service Bus is deployed to a cluster results in improper domain configuration.

To avoid this issue, use the Oracle Fusion Middleware Configuration Wizard to extend a domain where Oracle Service Bus is deployed to a cluster.

You can, however, use WLST to create a new Oracle Service Bus domain that is deployed to a cluster. But you should not extend that domain using WLST.

24.3.5 JDBC Limitation when Using Oracle Service Bus 11*g* with Oracle Database Express Edition 10*g*

When using Oracle Service Bus 11*g* with Oracle Database Express Edition 10*g*, errors occur when you use the ojdbc5.jar or ojdbc6.jar resources. Use the ojdbc14.jar resource.

24.3.6 Oracle BAM Adapter Uses Different Logging Mechanism than Other JCA Adapters

The Oracle BAM Adapter (Business Activity Monitoring) does not use the JCA framework logging interface that the other JCA adapters use. Oracle BAM Adapter log messages go to *server*.diagnostics.log file instead of *server*.log file. Changing alsb-transports-debug or alsb-jca-framework-adapter-debug flags in alsbdebug.xml may have no effect on Oracle BAM Adapter logging.

24.3.7 No Database Adapter Debug Logging on Business Service Invocation

The Oracle JCA Adapter for Database does not generate debug logs when a corresponding JCA business service is invoked in Oracle Service Bus. Oracle will provide a patch for this issue.

24.3.8 Import/Export of Encrypted Resources with AIX

There are differences in the various JDK implementations of the Password-Based Encryption algorithms used by Oracle Service Bus to protect resources with sensitive data. These differences cause import to fail when an encrypted resource created with the Sun or JRockit JDK is imported into the IBM JDK, or vice versa.

To work around this issue, export the resources without a passphrase by deselecting the "Protect Sensitive Data" flag when going across different JDKs.

> **Caution:** When using this workaround, the resources file may contain passwords that are in the clear text.

For information about the encryption algorithms, see http://java.sun.com/j2se/1.5.0/docs/guide/security/jce/JCERefGuide.html#PBE. There is no problem in exporting and importing encrypted resources with the same JDK.

24.3.9 Unable to Find Namespace for Prefix 'tns' Error on WSDL Services

You receive an "Unable to find namespace for prefix 'tns'" error for a WSDL-based service when activating a session, generating an effective WSDL, or performing a similar activation task.

The error likely occurs because the WSDL contains a partnerLink paragraph that contains a namespace that was not automatically renamed to match the run-time representation of the WSDL.

Use one of the following options to work around this issue:

■ Comment out the partnerLink paragraph in the WSDL.

or

- If you want to retain the partnerLink information, add an empty <wsdl:types xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/"/> element after the </plnk:partnerLinkType> closing element.

24.4 Documentation Errata

This section describes documentation errata. It includes the following topics:

- Section 24.4.1, "Importing/Exporting Using Scripts"
- Section 24.4.2, "Business Service Endpoint Property for Database Adapter"
- Section 24.4.3, "Incorrect Escape Character Format in Format Builder Help"
- Section 24.4.4, "Command Line and Script Updates for Export"

24.4.1 Importing/Exporting Using Scripts

When importing or exporting Oracle Service Bus configurations using WLST, Ant, or the command line:

- Be sure to include the following in your classpath:
  - *OSB_ORACLE_HOME*/lib/sb-kernel-api.jar
  - *OSB_ORACLE_HOME*/lib/sb-kernel-impl.jar
  - *OSB_ORACLE_HOME*/modules/com.bea.common.configfwk_*version*
- Be sure the resource JAR names in your scripts contain the correct version numbers.

24.4.2 Business Service Endpoint Property for Database Adapter

Oracle Service Bus implicitly sets the value of the cacheConnections endpoint property to "true" for business services that connect to the Oracle JCA Adapter for Database. With this property value set to true, outbound connections to the database adapter are cached. If you change the default and set this property to false, a connection open and close occurs for every outbound invocation.

24.4.3 Incorrect Escape Character Format in Format Builder Help

The Format Builder help shows an incorrect escape character when creating a delimiter match rule, which prevents you from saving the MFL. Instead of a single backslash for an escape character ("\"), the escape character should be two backslash characters ("\\"). The accompanying graphic also shows the escape character incorrectly. The documentation should read:

"Specify an escape character that precedes the delimiter character occurring as part of the field data. The escape character value can be obtained via a reference field and by specifying the value in the **Esc Char** field. For example, if the **Esc Char** is \\, then the data appears as A\\;B;."

The graphic should also show two backslash characters.

24.4.4 Command Line and Script Updates for Export

Options have changed for exporting an Oracle Service Bus configuration from the command line or with a script. Use the following information instead of what appears in "Using the Command Line or a Script to Export an Oracle Service Bus

Configuration" in the *Oracle Fusion Middleware Developer's Guide for Oracle Service Bus* at http://www.oracle.com/pls/as111130/lookup?id=OSBDV123.

24.4.4.1 Before You Begin

Refer to the following prerequisites and guidance before you begin.

- Be sure *OSB_ORACLE_HOME*/lib/sb-kernel-api.jar is in your classpath.

- Be sure the resource JAR names in your scripts contain the correct version numbers.

- Java 1.6 is required.

- Oracle Service Bus 10gR3 MP1 or later and Eclipse must be installed.

- You may see exception stack traces in the output or the workspace log file if workspace files are read-only.

- An exit value of 0 means the export succeeded.

24.4.4.2 Exporting a Configuration Using the Command Line

Oracle Service Bus provides a ConfigExport class that you can configure and launch using the following command line arguments. Command line export is for more advanced users who need more flexibility.

Exporting from the command line generates an Oracle Service Bus configuration JAR from the Eclipse workspace.

```
java -Xms384m -Xmx768m
-Dosgi.bundlefile.limit=500
-Dosgi.nl=en_US
-Dosb.home=OSB_ORACLE_HOME
-Dweblogic.home=WEBLOGIC_HOME
-Dharvester.home=${osb.home}/HARVESTER_HOME
-Dsun.lang.ClassLoader.allowArraySyntax=true
-jar ECLIPSE_HOME/eclipse/plugins/org.eclipse.equinox.launcher_launcher_
version.jar
-data WORKSPACE_DIR
-application com.bea.alsb.core.ConfigExport
-configProject PROJECT_NAME
-configJar config_filename.jar
-configSubProjects projects_to_export
-includeDependencies true/false
```

where

- *OSB_ORACLE_HOME* is the top-level Oracle Service Bus directory in the Oracle Fusion Middleware home.

- *WEBLOGIC_HOME* is the location of the installed Oracle WebLogic Server.

- *HARVESTER_HOME* is the location of Harvester, an Oracle Enterprise Repository tool that lets you harvest enterprise artifacts into Oracle Enterprise Repository from multiple sources, including Oracle Service Bus. An Oracle Service Bus installation includes Harvester.

- *ECLIPSE_HOME* is the location of the installed Eclipse that is linked to the Oracle Service Bus IDE plug-ins.

- *launcher_version* is the version of the Eclipse launcher JAR.

- *WORKSPACE_DIR* is the location that contains Oracle Service Bus artifacts to be exported. For example, c:/oracle/user_projects/workspaces/default. If this location contains an Eclipse workspace, the workspace is used and the configuration jar is exported from the workspace projects. If this location does not contain a workspace, but instead contains only Eclipse Oracle Service Bus projects, the utility imports the projects into a temporary workspace for the configuration JAR export.

- *PROJECT_NAME* is the name of the Oracle Service Bus Configuration project to be exported. For example, "OSB Configuration." If you do not specify this argument, the first Oracle Service Bus Configuration Project found in the workspace is exported.

- *config_filename.jar* is the name and location of the Oracle Service Bus Configuration JAR to be exported. For example, c:/sbconfig.jar.

- configSubProjects *projects_to_export* is one or more specific projects within a configuration to export. If you do not specify configSubProjects, all projects in the configuration are exported.

- includeDependencies *true/false* determines whether configuration-level dependencies such as JNDI Providers and Proxy Servers are included in the export.

Following is an example of exporting an Oracle Service Bus Configuration from the command line.

> **Note:** Following is a sample command line operation. If you use this sample, be sure to check paths and file names against your current installation for accuracy.

```
java -Xms384m -Xmx768m
-Dosgi.bundlefile.limit=500
-Dosgi.nl=en_US
-Dosb.home=D:/oracle/Oracle_OSB1
-Dweblogic.home=D:/oracle/wlserver_10.3
-Dharvester.home=${osb.home}/harvester
-Dsun.lang.ClassLoader.allowArraySyntax=true
-jar D:/oracle/oepe_11gR1PS1/eclipse/plugins/org.eclipse.equinox.launcher_
1.0.201.R35x_v20090715.jar
-data D:/oracle/user_projects/myWorkspace
-application com.bea.alsb.core.ConfigExport
-configProject config
-configJar sbconfig.jar
-configSubProjects OSB Project 1,OSB Project 2
-includeDependencies true
```

24.4.4.3 Exporting a Configuration Using Ant

You can export an Oracle Service Bus configuration using an Apache Ant buildfile. Exporting with Ant generates an Oracle Service Bus configuration JAR from the Eclipse workspace.

Following is a sample Ant buildfile with an accompanying properties file.

> **Note:** Following is a sample script. If you use this sample script, be sure to check paths and file names against your current installation for accuracy.

Ant Buildfile Example

```
<project name="ConfigExport">
    <property file="./build.properties"/>
    <property name="eclipse.home" value="${oracle.home}/oepe_11gR1PS2"/>
    <property name="weblogic.home" value= "${oracle.home}/wlserver_10.3"/>
    <property name="metadata.dir" value="${workspace.dir}/.metadata"/>
    <target name="export">
        <available file="${metadata.dir}" type="dir"
         property="metadata.dir.exists"/>
        <java dir="${eclipse.home}"
jar="${eclipse.home}/plugins/org.eclipse.equinox.launcher_1.0.201.R35x_
v20090715.jar"
          fork="true"
          failonerror="true"
          maxmemory="768m">
          <arg line="-data ${workspace.dir}"/>
          <arg line="-application com.bea.alsb.core.ConfigExport"/>
          <arg line="-configProject ${config.project}"/>
          <arg line="-configJar ${config.jar}"/>
          <arg line="-configSubProjects ${config.subprojects}"/>
          <arg line="-includeDependencies ${config.includeDependencies}"/>
          <sysproperty key="weblogic.home" value="${weblogic.home}"/>
          <sysproperty key="osb.home" value="${osb.home}"/>
          <sysproperty key="osgi.bundlefile.limit" value="500"/>
          <sysproperty key="harvester.home" value="${osb.home}/harvester"/>
          <sysproperty key="osgi.nl" value="en_US"/>
          <sysproperty key="sun.lang.ClassLoader.allowArraySyntax" value="true"/>
        </java>
<antcall target="deleteMetadata"/>
    </target>
<target name="deleteMetadata" unless="metadata.dir.exists">
        <delete failonerror="false" includeemptydirs="true"
         dir="${metadata.dir}"/>
</target>
</project>
```

build.properties Example

```
oracle.home=c:/oracle
workspace.dir=c:/oracle/user_projects/workspaces/default
config.project="OSB Configuration"
config.jar=c:/sbconfig.jar
config.subprojects="OSB Project 1,OSB Project 2"
config.includeDependencies=true
```

Running "ant export" (after you run the setDomainEnv script) results in exporting the project "OSB Configuration" from the default workspace to c:\sbconfig.jar.

25

Oracle SOA Suite and Oracle BPM Suite Common Functionality

This chapter describes runtime and common functionality issues associated with Oracle SOA Suite and Oracle Business Process Management (BPM) Suite. It includes the following topics:

- Section 25.1, "General Issues and Workarounds"
- Section 25.2, "Configuration Issues and Workarounds"
- Section 25.3, "Documentation Errata"

25.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topics:

- Section 25.1.1, "Making the OSSO Identity Assertion Provider Available for Selection"
- Section 25.1.2, "Releasing Locks to Resolve ADF Task Form EAR File Deployment Errors"
- Section 25.1.3, "Ignore the REST Enabled Property When Using the HTTP Binding Service"
- Section 25.1.4, "Deployment Error with Nondefault Project Version in Customization Role"
- Section 25.1.5, "Executing Multiple Test Cases in a Single Test Run Shows Multiple Flow Traces"
- Section 25.1.6, "Flow Trace Link Is Enabled When the Composite State Is Off for Oracle Mediator"
- Section 25.1.7, "Reference Binding Components Not Displaying on Dashboard Page"
- Section 25.1.8, "SOA Infrastructure State in Oracle WebLogic Server Administration Console"
- Section 25.1.9, "Oracle JDeveloper Issues with SSL-enabled Oracle WebLogic Server"
- Section 25.1.10, "Importing Shared Schema from MDS Does Not Copy the Schema Imports"
- Section 25.1.11, "Use of Microsoft SQL Server Causes Conflicts with Cross References Page"

25.1.1 Making the OSSO Identity Assertion Provider Available for Selection

The **OSSOIdentityAsserter** authentication provider does not display by default for selection in the **Type** list of the Create a New Authentication Provider pane in Oracle WebLogic Server Administration Console.

To make this provider available for selection, perform the following steps:

1. Open the *FMW_Home*/user_projects/domains/*soainfra*/bin/setDomainEnv.sh file on Linux operating systems.

    where *FMW_Home* is the Oracle Fusion Middleware home and *soainfra* is the domain name.

2. Find the setting for -Dweblogic.alternateTypesDir.

    ORACLE_HOME points to SOA_HOME and the modules subdirectory does not include the providers. This must be set to JRF_HOME (oracle_common home).

3. Change the following:

    ```
    ALT_TYPES_DIR="${ORACLE_HOME}/modules/oracle.ossoiap_11.1.1,${ORACLE_HOME}
     /modules/oracle.oamprovider_11.1.1"
    ```

to the following:

```
ALT_TYPES_DIR="${COMMON_COMPONENTS_HOME}/modules/oracle.ossoiap_11.1.1,$
{COMMON_COMPONENTS _HOME}/modules/oracle.oamprovider_11.1.1"
```

4. Save and close the file.

5. Restart the servers

6. Log in to Oracle WebLogic Server Administration Console.

7. Select **Security Realms** > **myrealm** > **Providers**.

8. In the Authentication Providers pane, click the **New** tab to add a new provider.

   Note that **OSSOIdentityAsserter** now displays in the **Type** list.

25.1.2 Releasing Locks to Resolve ADF Task Form EAR File Deployment Errors

If you deploy a SOA composite application JAR file and ADF task form EAR file, and the SOA JAR file is deployed successfully, but while deploying the EAR file, the following errors are displayed:

```
[wldeploy] weblogic.management.ManagementException: [Deployer:149163]The
domain edit lock is owned by another session in non-exclusive mode - this
deployment operation requires exclusive access to the edit lock and hence
cannot proceed. If you are using "Automatically Aquire Lock and Activate
Changes" in the console, then the lock will expire shortly so retry this
operation.
```

This means you must first release the lock from Oracle WebLogic Server Administration Console to successfully deploy the EAR file.

1. Log in to the Oracle WebLogic Server Administration Console.

2. Below the console banner at the top of the page, click **Preferences** > **User Preferences**.

3. Deselect **Automatically Acquire Lock and Activate Changes**.

4. Click **Save** and note that buttons such as **Lock and Edit** and **Release Configuration** are visible.

   Note the following description that is displayed in the Oracle WebLogic Server Administration Console:

```
Automatically acquire the lock that enables configuration editing and
automatically activate changes as the user modifies, adds and deletes items
 (for example, when the user clicks the 'Save' button). This feature is not
  available in production mode.
```

Note that this error can occur regardless of the deployment method you are using (for example, deploying through Oracle JDeveloper or through `ant` scripts).

25.1.3 Ignore the REST Enabled Property When Using the HTTP Binding Service

If you use the new HTTP binding service in a SOA composite application, ignore and do not change the **REST Enabled** property setting for this service in the **Properties** tab in Oracle Enterprise Manager Fusion Middleware Control Console.

Do not confuse the HTTP binding service with the existing web service binding component. Both of these binding components have a **REST Enabled** property. However, web services are *different* from the HTTP binding services. For web services, you can change the **REST Enabled** property.

The **Properties** tab is accessible by right-clicking **soa-infra** in the navigator, and selecting **Services and References**.

For more information about configuring binding components, see Chapter "Configuring Service and Reference Binding Components" of *Oracle Fusion Middleware Administrator's Guide for Oracle SOA Suite and Oracle BPM Suite*.

25.1.4 Deployment Error with Nondefault Project Version in Customization Role

When running Oracle JDeveloper in the customization mode, you receive an error when you deploy a BPEL project that is not the default version.

As a workaround, redeploy the same version from Oracle JDeveloper again; this time, the project deploys successfully.

25.1.5 Executing Multiple Test Cases in a Single Test Run Shows Multiple Flow Traces

If you execute multiple test cases in a single test run in the **Unit Tests** tab of Oracle Enterprise Manager Fusion Middleware Control Console, instances are created for each one of the test cases. If you open the flow trace for any of the test instances, the flow traces for all the instances created as part of the test run are shown as part of the flow trace.

This happens only when multiple test cases are executed as part of a single test run.

25.1.6 Flow Trace Link Is Enabled When the Composite State Is Off for Oracle Mediator

The flow trace link for the Oracle Mediator service component is enabled when the composite state is off. This is the opposite behavior of the Oracle BPEL Process Manager service component.

For example, perform the following steps for a deployed SOA composite application that includes Oracle Mediator.

1. Set the audit level to the following values:

   ■ Set to **Off** at the SOA Infrastructure level.

   ■ Set to **Production** at the Oracle Mediator service engine level.

   ■ Set to **Inherit** at the SOA composite application level.

2. Invoke an instance of the composite.

   Since the SOA Infrastructure level is set to **Off**, the SOA composite application ID is not generated; only the service component instance ID is generated.

3. Go to the Oracle Mediator service component page.

4. Click the service component ID, which displays the audit trail page.

   Note that the **Flow Trace** link in the upper left part of the page is enabled for Oracle Mediator. If you click this link, you receive a `java.lang.IllegalArgumentException`.

25.1.7 Reference Binding Components Not Displaying on Dashboard Page

Reference binding components included in a SOA composite application do not display in the **References** subsection of the **Routing Statistics** section of the Dashboard page of Oracle BPEL Process Manager and Oracle Mediator service components.

25.1.8 SOA Infrastructure State in Oracle WebLogic Server Administration Console

The state of the SOA Infrastructure application displays as *Warning* in the Oracle WebLogic Server Administration Console. However, there is no loss of functionality because of this state being displayed.

25.1.9 Oracle JDeveloper Issues with SSL-enabled Oracle WebLogic Server

If your Oracle WebLogic Server is configured to use SSL, you cannot perform the following tasks from Oracle JDeveloper:

- Browse SOA artifacts on the SSL-enabled Oracle WebLogic Server.
- Deploy SOA archives to the SSL-enabled Oracle WebLogic Server.

As a workaround, perform these tasks with the following tools:

- For browsing, use Oracle Enterprise Manager Fusion Middleware Control Console to obtain the information needed.
- For deployment, use the `ant-sca-deploy.xml` build file to deploy SOA archives to an SSL-enabled server.

25.1.10 Importing Shared Schema from MDS Does Not Copy the Schema Imports

If you import shared schema from MDS (with schema imports within), only the base schema is copied and the schema imports are ignored.

As a workaround, manually localize the schema.

25.1.11 Use of Microsoft SQL Server Causes Conflicts with Cross References Page

If you are using Microsoft SQL Server as your repository database, then navigating to the Cross References page in Oracle Enterprise Manager Fusion Middleware Control Console by right-clicking **soa-infra** and selecting **SOA Administration** > **Cross References**, or performing any action on the Cross References page causes an exception error to be displayed.

If you want to purge the cross reference tables, then directly log in to the database and delete the data.

25.1.12 Setting the SOA Infrastructure Audit Level on Microsoft SQL Server

If you are using Microsoft SQL Server as your repository database, it is recommended that you not set the **Audit Level** to **Development** on the SOA Infrastructure Common Properties page in Oracle Enterprise Manager Fusion Middleware Control Console. Otherwise, you may encounter a `Web Invocation failed` error with the following exception:

```
java.lang.Exception:
oracle.sysman.emSDK.webservices.wsdlapi.SoapTestException:
```

As a workaround, set the **Audit Level** to **Production** on the SOA Infrastructure Common Properties page and the **Composite Audit Level** to **Development** on the home page of the SOA composite application.

25.1.13 Composites Calling Other Composites with Concrete WSDL Files

If you use concrete WSDL files, be aware that the order of startup for SOA composite applications is not guaranteed.

For example, if one SOA composite application calls a second SOA composite application with a concrete WSDL file, and the first SOA composite application gets started before the second SOA composite application, an error occurs. This is because the first SOA composite application cannot load the second SOA composite application's WSDL file.

25.1.14 XPath Value in the Task Parameters Dialog of the Create Human Task Dialog

In the Task Parameters dialog that you access from the **Task Parameter** table of the Create Human Task dialog, the XPath selection only displays in the **XPath** field when you select the leaf node. For example, perform the following steps.

1. Create a SOA composite application with a human task.

2. Wire the human task with a service binding component, such as a web service.

3. In the **Data** section of the Human Task Editor, create a task parameter for the payload.

4. Create a BPEL process in the SOA composite application.

5. Double-click the BPEL process to display the Oracle BPEL Designer.

6. Drag a **Human Task** icon into the process. The Create Human Task dialog appears.

7. In the **Task Definition** dropdown list, select the human task. The dialog refreshes to display additional fields.

8. Click the **Browse** icon for the payload in the **Task Parameter** table. The Task Parameters dialog appears.

   Note that you can select a leaf node, but selecting anything above the leaf node does not cause that selection to display in the **XPath** field at the bottom of the dialog.

   As a workaround, perform the following steps.

   a. Select the leaf node to display the entire path in the **XPath** field (for example, **/client:processResponse/client:result**).

   b. In the **XPath** field, edit the path to remove unnecessary information (for example, remove **/client:result** from **/client:processResponse**).

   c. Click **OK**.

25.1.15 Composite-to-Composite Calls Through an EJB Reference Binding Component

If you have a SOA composite application that calls a second SOA composite application through an EJB reference binding component, the EJB reference is bound to the default revision of the second SOA composite application. If the default revision of the second SOA composite application changes (for example, a new revision of the second SOA composite application is deployed as the default), the first SOA composite application still calls the original revision of the second SOA composite application to which the EJB reference is bound.

As a workaround, restart the SOA server. This action binds the EJB reference to the new default revision.

25.1.16 Instance States of Service Components and SOA Composite Applications

Assume you have a SOA composite application with multiple service components (for example, two BPEL process service components). If these service components are marked with the following instance states:

- Instance state of one BPEL process is marked as completed.

- Instance state of the other BPEL process is marked as faulted.

This results in the overall composite instance state being marked as faulted. This behavior differs from Release 11*g* PS1, in which the same scenario resulted in the overall composite instance state being marked as completed.

Assume you have a parent SOA composite application that calls a child SOA composite application, and a fault occurs in the child composite (and is handled by the parent composite). This results in the following instance states:

- The instance state of the child composite is marked as faulted.

- The instance state of the parent composite is marked as completed.

25.1.17 Composites with Large While Loop Cases Cause Time Outs and Memory Errors

If your SOA composite application includes large while loop cases, you can receive time outs and out-of-memory errors due to large numbers of audit events accumulating. To support these environments, you can decouple the audit trail from the BPEL process service engine transaction by tuning the following properties at the BPEL process service engine level:

- **auditFlushEventThreshold**: Controls how often the service engine flushes the audit events. When the audit event limit is reached, the service engine triggers a store call. Tune this size based on the application. The default value is `300` audit events.

- **auditFlushByteThreshold**: Controls the approximate size of the batch. After each event, the size is calculated, including the details size. If the sum of the batch byte size exceeds the value of this property, a flush is triggered. The default value is `2` MB.

To set this property at the BPEL process service engine level:

1. Right-click **soa-infra** and select **SOA Administration** > **BPEL Properties**.

2. Click **More BPEL Configuration Properties**.

3. Click the properties described above.

4. In the **Value** field, specify an appropriate value and click **Apply**.

> **Note:** These properties only impact the BPEL process audit trail. Human workflow, business rules, and Oracle Mediator are not affected by these settings.

25.1.18 Extra Business Event with Oracle Database 11.2.0.1 and One and Only One Level

If you subscribe to a business event with an Oracle Mediator, select a consistency level of **one and only one**, and use a release 11.2.0.1 Oracle database for the SOA Infrastructure schema, the first event published produces two business events.

For example, if 20 messages are published, the subscriber receives 21messages.

This issue occurs only with release 11.2.0.1 of the Oracle database and only one time after a restart of both the SOA Infrastructure database and the SOA Server. After that, the correct number of business events are inserted.

25.1.19 Inconsistent States for SOA Composite Application Instances in Recovery

When a SOA composite application instance is being recovered, callback messages and activities are displayed as **Running**, but invocation messages are displayed as **Faulted** in the **State** column of the **Dashboard** tab of a SOA composite application.

25.1.20 Manual Recovery of Wait and OnAlarm Branch of Pick Activities Is Unsupported

You cannot manually recover wait activities or the OnAlarm branch of pick activities from the **Recovery** tab of the BPEL process service engine in Oracle Enterprise Manager Fusion Middleware Control Console. There is nothing restricting you from retrieving these pending activities and then attempting a recovery. However, recovery is not successful.

Instead, these pending activities are automatically scheduled and retried by the BPEL process service engine as part of the daily auto recovery or by restarting the SOA server.

25.1.21 Recovery of Callback Messages in Both Resolved and Undelivered States

You can recover callback messages that are in both resolved and undelivered states. This is the expected behavior.

These messages can display for recovery when you execute a search criteria in which you select **Callback** from the **Type** list and select either **Resolved** or **Undelivered** from the **Message State** list on the **Recovery** tab of the BPEL process service engine in Oracle Enterprise Manager Fusion Middleware Control Console.

When a callback message first enters the BPEL process service engine, its state is undelivered. When the callback message is resolved to the target BPEL process instance either through matching a conversation ID or through a correlation, the state is switched to resolved. In both of these states, the messages have not yet been consumed. Messages in these two states can be recovered (redelivered into the BPEL process service engine for consumption).

In other situations, the callback messages can become stranded in both of these states. Messages in these states can also be recovered. However, there is no guarantee that stranded callback messages always remain in a state of undelivered.

25.1.22 Last Modified Date Not Displaying for Invoked, Undelivered Recovery Messages

If you select **Invoke** from the **Type** list and **Undelivered** from the **Message State** list, and then click **Recovery** on the **Recovery** tab of the BPEL process service engine in Oracle Enterprise Manager Fusion Middleware Control Console, a recovery is performed. However, the **Last Modified Date** column remains empty for this instance on the Dashboard page of the Oracle BPEL Process Manager service component or service engine.

This is the expected behavior. The last modified date does not display because the initial Oracle BPEL Process Manager instance (for example, **bpel:70004**) is created by the first invocation (that is, it is created, but has not yet been modified). The recovery

of the undelivered invocation message always creates a *new* instance (for example, **bpel:70005**). The previously created instance (bpel:70004) is not used and remains permanently in the same status (the **Last Modified Date** column is empty). This information is provided for auditing purposes only.

25.1.23 Recovery Error Message Displayed in the Audit Trail

The following error message appears when a transaction is displayed as rolled back in the **Audit Trail** tab of Oracle Enterprise Manager Fusion Middleware Control Console.

```
The transaction was rolled back. The work performed for bpel instance "instance_
number" was rolled back to the previous dehydration point, but the audit trail has
been saved. You can recover the instance from the recovery console by
resubmitting the callback message or activity for execution
```

This message does not specifically state whether recovery should happen on either the activity or the callback. This is the intended behavior. Oracle recommends that you do not recover each instance through the audit messages. Instead, set up automatic recovery to recover these instances.

25.1.24 Activity Faults Not Shown for Oracle BPEL Process Manager and Oracle BPM

If a fault occurs when processing activities, the activity location of the fault is not shown in most cases in the **Activity** column of the **Faults** tab of the Instance of *service_ component_name* page in Oracle Enterprise Manager Fusion Middleware Control Console.

- For Oracle BPEL Process Manager, this column only shows a receive activity that has timed out. In all other cases, this column is empty.

- For Oracle BPM, this column is always empty.

This is the expected behavior.

25.1.25 Problem Accessing Web-based Applications

Logins to Web-based applications may fail when using Oracle Internet Directory (OID) authentication. This is caused when the Oracle WebLogic Server configuration is set to use the OID authentication before default authentication.

This may produce the following error:

```
"@ User "weblogic" is not found in configuration "jazn.com" Check if the user
 exists in the repository specified by the configurations. Check the error stack
 and fix the cause of the error. Contact oracle support if error is not fixable."
```

The order of the security providers should be:

1. Default authentication

2. OID/LDAP authentication

25.1.26 SOAP 1.2 <stackTrace> Fault Element is Not Returned to the Caller

A fault from a SOAP 1.2 Web service contains a `<stackTrace>` element as part of the `<exception>` element. The `<stackTrace>` element provides debug information and assistance in understanding a fault. If you invoke a Web service directly from a client and a fault occurs, the `<stackTrace>` element is provided.

However, if a SOA composite application invokes a Web service (for example, through a BPEL process or an Oracle Mediator) and a fault occurs, the `<stackTrace>` element is not passed back to the caller.

This is the expected behavior.

25.1.27 Outbound HTTP Binding Cannot Access Multibyte URLs on Non-UTF8 Servers

The following table describes different verb, payload type, and operation name configurations for an inbound HTTP binding service of a SOA composite application, deployment issues with the use of multibyte names with this service, and workarounds.

Verb	Payload Type	Operation Name	Deployment Environment	Workaround

`post`	`url-encoded`	`Request-Response`	The service uses a multibyte service name, and the project is deployed on a non-UTF-8-encoding server.
			
			When the outbound HTTP binding with the same verb, payload type, and operation name configuration on the UTF-8-encoding server invokes the inbound HTTP binding service, the invocation receives the following error:
			
			`javax.xml.ws.WebServiceException:`
			`javax.xml.soap.SOAPException: Bad`
			`response: 503 Service Unavailable`
			`from url`
				Use the English service name.

`get`	`url-encoded`	`Request-Response`	The service uses a multibyte service name, multibyte operation name, or multibyte schema element name, and the project is deployed on a non-UTF-8-encoding server. When the outbound HTTP binding with the same verb, payload type, and operation name configuration on a UTF-8-encoding server invokes the inbound HTTP binding service, the invocation receives the following error: `Bad response: 404`	Use the English service name, English operation name, or English schema element name.
`get`	`url-encoded`	`Request-Response`	The service uses a multibyte service name, multibyte operation name, or multibyte schema element name, and the project is deployed on a UTF-8-encoding server. When the outbound HTTP binding with the same verb, payload type, and operation name configuration on a non-UTF-8-encoding server invokes the inbound HTTP binding service, the invocation receives the following error: `Bad response: 404`	Use the English service name, English operation name, and schema element name.

Verb	Payload Type	Operation Name	Deployment Environment	Workaround
post	xml	Request-Response	The service uses the multibyte service name, and the project is deployed on a non-UTF-8-encoding server.	Use the English service name.
			When the outbound HTTP binding with the same verb, payload type, and operation name configuration on the UTF-8-encoding server invokes the inbound HTTP binding service, the invocation receives the following error:	
			`javax.xml.soap.SOAPException: Bad response: 503 Service Unavailable from url`	

25.1.28 Multibyte Character Issues with Microsoft SQL Server and Cross References

If you are using Microsoft SQL Server as your repository database and define a custom database table to optimize cross references (XREFs), the DDL generated by the `CREATE TABLE` command on Microsoft SQL Server has problems with multibyte characters.

As a workaround, perform the following steps to change the original SQL script:

1. Change the data type from `TIMESTAMP` to `DATETIME`.

2. Change the data type from `VARCHAR` to `NVARCHAR`.

3. Change the table and column names to uppercase.

   For example, changing the following syntax:

   ```
   CREATE TABLE xref_untitled1 (
       ROW_ID VARCHAR(48) NOT NULL,
       system1 VARCHAR(100),
       system2 VARCHAR(100),
       LAST_MODIFIED TIMESTAMP NOT NULL

   );

   CREATE INDEX ROW_ID_IDX ON xref_untitled1(ROW_ID);
   CREATE INDEX system1_idx ON xref_untitled1(system1);
   CREATE INDEX system2_idx ON xref_untitled1(system2);
   ```

   To this syntax, eliminates these problems:

   ```
   CREATE TABLE XREF_UNTITLED1 (
       ROW_ID NVARCHAR(48) NOT NULL,
       SYSTEM1 NVARCHAR(100),
       SYSTEM2 NVARCHAR(100),
       LAST_MODIFIED DATETIME NOT NULL
   );

   CREATE INDEX ROW_ID_IDX ON XREF_UNTITLED1(ROW_ID);
   CREATE INDEX SYSTEM1_IDX ON XREF_UNTITLED1(SYSTEM1);
   CREATE INDEX SYSTEM2_IDX ON XREF_UNTITLED1(SYSTEM2);
   ```

For more information about cross references and custom database tables, see Section "Creating Custom Database Tables" of the *Oracle Fusion Middleware Developer's Guide for Oracle SOA Suite*.

25.1.29 Setting an Identity for J2SE Clients Invoking Direct Binding

J2SE clients can set an identity while invoking direct binding, as shown in the following example:

```
public static void main(String[] args) throws Exception {
        Invoker invoker = new Invoker();
        String payloadXML="<ns1:process
xmlns:ns1=\"http://xmlns.oracle.com/DirectBinding_jws/EchoBPEL/BPELProcess1\">
" +"\n" +
             "<ns1:input>wew</ns1:input>" + "\n"+
              "</ns1:process>" ;

     String serviceAddress = "soadirect:/default/EchoBPEL!1.0/DService1";
    System.out.println("***** test Sync ****");
     DirectConnectionFactory factory =
JNDIDirectConnectionFactory.newInstance();

     Message<Element> m = getAsyncRequest(payloadXML);
     Map<String, Object> props = new HashMap<String, Object>();
     props.put(Context.INITIAL_CONTEXT_FACTORY,
"weblogic.jndi.WLInitialContextFactory");
     props.put(Context.PROVIDER_URL, "t3://" + hostname + ':' + portname);
    props.put(Context.SECURITY_PRINCIPAL,"xtest-soa1-user");
 props.put(Context.SECURITY_CREDENTIALS,"welcome1");

     DirectConnection conn = factory.createConnection(serviceAddress,
props);

     DirectConnection conn = getConnection(serviceAddress);
     Document doc = DirectBindingXMLUtil.getDocumentFromString(payloadXML);
          Element element = doc.getDocumentElement();
          Map<String, Element> payload = new HashMap<String, Element>();
          payload.put("payload", element);

     Message<Element> m =
XMLMessageFactory.getInstance().createMessage(payload);
     List<Element> headers =
createWSAHeaders("payload:BPELSyncTest:msgID:1234567");
     for( Element e : headers)
         m.addHeader(e);

try {
             ctx = new InitialContext(props);
             conn.request("process", m);
         }
         finally
         {
             if (null != ctx) ctx.close();
         }

    //System.out.println(ret);

    }
```

The key points in the above example are as follows:

- The creation of an `InitialContext` with the security principal/principal credentials before invoking the direct connection; this achieves a login.
- The close of the `InitialContext`; this achieves the log out.

```
                    try {
                             ctx = new InitialContext(props);
                             conn.request("process", m);
                    }
                    finally
                    {
                        if (null != ctx) ctx.close();
                    }
```

For more information about direct binding, see Chapter "Using the Direct Binding Invocation API" of the *Oracle Fusion Middleware Developer's Guide for Oracle SOA Suite*.

25.1.30 URL Files Attached in Oracle BPM Worklist Not Sent as E-mail Attachments

If you attach a URL file in Oracle BPM Worklist (for example,
`http://www.oracle.com/technology/products/oem/management_`
`partners/snmpwp6.gif`), it is not sent as an e-mail attachment. Instead, it appears as a hyperlink in the task details of the e-mail notification. However, if a desktop file is attached, it can be seen as a separate attachment in the task notification.

25.1.31 Faulted Instances Waiting for Manual Recovery are Shown as Running

Faulted instances that are waiting for manual recovery are shown when you search for running instances. For example, if you go to the Instances page of the SOA composite application and specify a search criteria to find running instances, the faulted instances waiting for manual recovery are shown.

25.1.32 Invocation of Composite with Spring Component Fails with ant Deployment

A SOA composite application that includes a spring context service component can fail during invocation when deployed using the `ant` deployment script. You can receive the following `NullPointerException` error:

```
<oracle.integration.platform.blocks.java> <SOA-31701> <Failed to convert Java
payload to XML.  Exception follows.  [Interface=myservice.EchoPortType
Method=echoText]>
<Feb 26, 2010 4:02:29 PM PST> <Warning>
<oracle.integration.platform.blocks.java> <BEA-000000> <Detail:
java.lang.NullPointerException
       at
weblogic.wsee.databinding.spi.util.WsRuntimeWrapper.init(WsRuntimeWrapper.java
:32)
. . .
. . .
```

This error occurs because the JAXB classes are not being compiled in the SAR file.

As a workaround, touch the `package-info.java` file before compilation:

```
<target name="composite-compile"  if="spring.deployment" >
  <echo message="compiling ${my.project}/${compositeName}/src" />
 <!--    CHANGE THAT CAUSES TEST TO SUCCEED -->
  <touch>
<fileset dir="${my.project}/${compositeName}/src/myservice"
includes="**/package-info.java"/>
</touch>
  <javac destdir="${my.project}/${compositeName}/SCA-INF/classes"
    fork="yes" debug="on" compiler="javac1.6"  >
```

```
                    <src path="${my.project}/${compositeName}/src/myservice" />
                    <src path="${my.project}/${compositeName}/src/springws" />
      .
     </javac>
```

25.1.33 Transactional Adapter Status Displays as Complete Even If Rollback Occurs

If a transaction rollback occurs because of a business fault or exception, the instance trial for a transactional adapter does not indicate whether or not there was a rollback.

For example, assume you have an asynchronous BPEL process invoking a database adapter service. An assert expression is defined in the invoke activity. If the assert expression returns false, then all transactional invocations should roll back. However, the flow trace shows a status of completed for the database adapter service.

25.1.34 Flow Diagram Does Not Display The First Time on Some Lower End Hosts

The flow diagram for an instance ID of a deployed SOA composite application in Oracle Enterprise Manager Fusion Middleware Control Console may not display the first time on some lower end hosts. Instead, you receive a `failed to load resource` message.

As a workaround, close the flow trace page and click the instance ID to return to the flow trace page.

25.1.35 Limitation on Using the Safari Browser to View WSDL File Content

If you are using the Safari browser, note the following limitation and workaround for viewing WSDL file contents in Oracle Enterprise Manager Fusion Middleware Control Console. Note also that Mozilla Firefox works correctly and does not require this workaround.

1. Go to the home page for a SOA composite application.

2. Click the **Show WSDL and endpoint URI** link at the top of the page.

3. Click the WSDL link that is displayed.

    This opens a blank page that does *not* display the contents of the selected WSDL. As a workaround, perform the following additional steps.

4. In the upper right corner of this page, click the **Display a menu for the current page** icon.

5. Select **View Source** from the menu that is displayed.

    This displays the contents of the selected WSDL in another page.

25.1.36 Limitations on Programmatic, Bulk Deployments of Composites

If you deploy multiple SOA composite applications programmatically in bulk using `oracle.integration.platform.blocks.deploy.servlet.CompositeDeployerClient`, after the successful deployment of approximately 85 composites, out-of-memory errors are displayed in the SOA server log files for the remaining composite deployments, and the SOA server hangs.

25.1.37 Accessing Components from SSO-Enabled Oracle Enterprise Manager

If you log in to an SSO-enabled Oracle Enterprise Manager Fusion Middleware Control Console and click the links to the following components, you are directed to non-SSO URLs for these components, and prompted to log in again.

- Oracle BPM Worklist

- Oracle B2B

- Oracle BAM

- SOA Composer

25.1.38 Composite State Not Updated After BPEL Recovery Of Faulted Instance

The state of a failed SOA composite application instance is not updated after you successfully perform a recovery from the Recovery page of the BPEL service engine. For example, assume you perform the following steps.

1. Enable payload validation on the SOA Infrastructure Common Properties page in Oracle Enterprise Manager Fusion Middleware Control Console.

2. Invoke an instance of a SOA composite application. If payload validation fails (for example, because required elements in the schema are missing), a failure occurs at the BPEL service component level during execution of an invoke activity.

   The instance is displayed as faulted in the Dashboard and Instances pages of the composite.

3. Go to the Recovery page of the BPEL service engine and note that the same instance is pending recovery.

4. Disable payload validation on the SOA Infrastructure Common Properties page.

5. From the Recovery page of the BPEL service engine, select the instance and click **Recover**. This recovers the instance.

6. View the completed instance in the flow trace. However, note that the instance state is not updated and is still shown as faulted, whereas the instance has actually recovered and completed successfully.

   This is the expected behavior. BPEL recovery created a new BPEL instance, which completed successfully. However, the previous BPEL instance (the one that failed schema validation) is still shown as faulted. The overall composite instance is counted as faulted, since one of its two component instances (the previous BPEL instance) is faulted.

25.1.39 Saving Physical Directory Property Changes in the System MBean Browser

Changing the physical directory property for the file or FTP adapter in the System MBean Browser does not take effect until you select the **save** attribute under the **Operations** tab, as described in Steps 8 and 9. Ensure that you perform all of the following steps.

1. In the navigator, right-click **soa-infra** and select **Administration** > **System MBean Browser**.

2. Navigate to **Application Defined MBeans** > **oracle.soa.config** > **Server:** *server_name* > **SCAComposite** > *deployed_SOA_composite_application_name* > **SCAComposite.SCAReference.SCABinding** > **AdapterBinding**.

3. Click the **Attributes** tab.

4. Click **Properties**.

5. Expand the **element_*number*** folders that include the correct adapter endpoint values (for example, **element0**, **element_1**, and **element_2**).

6. Change the physical directory value in each, and click **Apply**.

7. Click **Return**.

8. Click the **Operations** tab.

9. Click **save**. This action persists the changes.

25.1.40 Removing Extra Set Text Dialog Characters

Adding `&` to the **Text** field of the Edit Text dialog in Oracle JDeveloper adds extra characters to the XSL file. For example, perform the following steps:

1. In the XSLT Mapper, right-click a string element in the target pane.

2. Select **Set Text** > **Enter Text**.

3. In the Edit Text dialog, enter `&` in the **Text** field, and click **OK**.

4. Go to the **Source** view of the XSL file, and see that an extra `amp;` is appended.

```
<xsl:text disable-output-escaping="no">&amp;amp;</xsl:text>
```

As a workaround, in **Source** view of the XSL file, remove the extra character `amp;` that was appended in the previous steps. The source view now looks as follows:

```
<xsl:text disable-output-escaping="no">&amp;</xsl:text>
```

25.1.41 Failure to Add and Update WSDL Binding After Migration

When you open Oracle JDeveloper and attempt to migrate a 10.1.3 application that includes WSIF binding information to version 11*g*, migration creates a web service reference with no WSDL binding information (`binding.wsif`) in the `composite.xml` file. When you then attempt to update the reference with the same WSDL in Oracle JDeveloper, the binding information is not saved, and you receive a compilation error.

This is because Oracle JDeveloper is handling the typical migration use case in which the reference is updated with a new WSDL location (same WSDL, but in a different location). Therefore, when you do not change the WSDL location, nothing happens.

As a workaround, perform either of the following steps:

1. Delete the reference and create a new one using the same WSDL.

2. (Easiest) Copy the WSDL to a different file name, but do not change its contents. Then, update the reference using this WSDL copy. This changes the location of the WSDL and correctly creates the `binding.ws`.

25.1.42 Storing Artifacts in Source Control and Deploying Them with the ant Utility

If you store application artifacts in a source control system that you later want to reuse for deployment with `ant`, the following changes are required if the application has metadata service (MDS)-based references.

Assume the original Oracle JDeveloper application has file-based MDS references, such as the following:

```
<metadata-store-usage id="mstore-usage_1">
```

```
                        <metadata-store
class-name="oracle.mds.persistence.stores.file.FileMetadataStore">
                  <property value="${oracle.home}/integration"
                          name="metadata-path"/>
                  <property value="seed" name="partition-name"/>
              </metadata-store>
```

Modify this code to use database-based MDS references in the *Application_Directory*/.adf/META-INF/adf-config.xml file, as shown below:

```
<metadata-store-usage id="mstore-usage_1">
              <metadata-store
class-name="oracle.mds.persistence.stores.db.DBMetadataStore">
                  <property name="jdbc-userid" value="${mdsuser}"/>
 <property name="jdbc-password" value="${mdspassword}"/>
                  <property name="jdbc-url"
value="jdbc:oracle:thin:@${db.host.name}:${db.host.port}:${db.sid}"/>
                   <property name="partition-name" value="soa-infra"/>
              </metadata-store>
```

Check the modified application with these adf-config.xml entries into a source control system. The following concrete example of a modified adf-config.xml file is provided.

```
 <metadata-store-usage id="mstore-usage_1">
              <metadata-store
class-name="oracle.mds.persistence.stores.db.DBMetadataStore">
                  <property name="jdbc-userid" value="soainfra_mds"/>
                  <property name="jdbc-password" value="soainfra_mds"/>
                  <property name="jdbc-url"
value="jdbc:oracle:thin:@myhost56.us.oracle.com:15739:db2825"/>
                  <property name="partition-name" value="soa-infra"/>
              </metadata-store>
```

You can use a variable for the user ID and password and replace the values prior to ant deployment in the application.

If the MDS database has a JNDI name, then use the following entries in adf-config.xml:

```
<metadata-store
  class-name="oracle.mds.persistence.stores.db.DBMetadataStore">
     <property name="jndi-datasource" value="${db.jndi.name}"/>
     <property name="partition-name" value="soa-infra"/>
</metadata-store>
```

25.1.43 Understanding BPEL Global Transaction and Adapter Local Transaction Issues

BPEL processes run in global transactions, while other Oracle SOA Suite components, such as adapters, run in local transactions. This can cause inconsistencies with the information displayed in Oracle Enterprise Manager Fusion Middleware Control Console.

For example, assume you have a main synchronous BPEL process that invokes an asynchronous BPEL process. There is one database adapter insert in the main synchronous BPEL process before the invocation of the asynchronous BPEL process. There is a second database adapter insert in the asynchronous BPEL process, at which point a fault is expected to be thrown.

The expected behavior is as follows:

- An initial insert into the database is performed from the main process that completes successfully as expected.

- The second insert also executes in the asynchronous process, but after encountering the fault, the BPEL process rolls back the initial insert.

However, in Oracle Enterprise Manager Fusion Middleware Control Console, the second database insert also shows as having completed successfully, instead of the having faulted.

This is because the database adapter invocation is logged (instance tracked) in a local transaction that is not part of the global BPEL JTA transaction. Therefore, the database adapter invocation completes successfully, but the subsequent BPEL process incurs a global rollback.

```
<invoke name="Invoke_1" inputVariable="Invoke_1_insert_InputVariable"
   partnerLink="db" portType="ns1:db_ptt" operation="insert"/>
. . .
. . .
   <throw name="Throw_2" faultName="bpelx:rollback"/>
```

At that point, instance tracking has already recorded the outbound invocation as successful (in a local transaction). If the adapter throws an exception, instance tracking logs this as a fault. Also note that some partner links may invoke a file adapter, which cannot be rolled back, even if the BPEL process later throws a `bpelx:rollback`.

25.1.44 Descriptions for Data Source JNDI Fields are Interchanged

In the SOA Infrastructure Common Properties page of Oracle Enterprise Manager Fusion Middleware Control Console, the descriptions for **Server Data Source JNDI** and **Server Transaction Data Source JNDI** are interchanged. However, the **Configure** links go to the correct locations.

25.1.45 Granting the Same Role to the Same User Twice Causes Unclear WLST Message

1. Create a domain with Oracle WebCache and extend it with Oracle SOA Suite.

2. Associate the Oracle WebCache application with LDAP and grant the admin role to a user (for example, user name `test`) in Oracle Internet Directory using the WebLogic Scripting Tool (WLST).

3. Grant the same role (admin role) to the same user again (`test`).

   You expect to see a WLST error message such as the following:

   ```
   This particular user already has admin role to access your application
   ```

   Instead, you receive the following message, which is inaccurate:

   ```
   Command FAILED, Reason: Cannot add principal to application role
   ```

25.1.46 Fault Policy Retry Action May Not Execute with Multiple Faults in Same Flow

The fault policy retry action may not execute with multiple faults in the same flow. This may be because the retry count has already been reached for any of the previous faults.

For example, assume you define a fault policy with two fault conditions: `fault1` and `fault2`. For both fault conditions, the retry action is specified with a retry count of three. Assume `fault1` occurs and the retry action executes three times. You correct

the problem for `fault1` by modifying the payload, but ensure that `fault2` is to be raised when the instance is resubmitted. You then resubmit the faulted instance using Oracle Enterprise Manager Fusion Middleware Control Console. You expect the second fault condition, `fault2`, to retry three times as per the fault policy specification. However, this does not occur because the maximum number of retries was already executed for the previous `fault1` fault condition.

25.1.47 Mediator Instances Can Display as Running After Transaction Completion

A mediator service component relies on a successful commit of a local transaction to know whether an instance is recoverable. Even if a graceful shutdown is correctly implemented, and all transactions are allowed to complete (within the given time out window), there can still be a local transaction that is denied because it fails to occur within the time out window. For example, assume the following:

1. A database adapter posts a message.

2. A mediator service component receives the message, sets its state to running, and invokes a BPEL process service component, whose state is also set to running.

3. A JMS adapter is invoked, and encounters and throws an exception. The reference fault tables are updated.

4. The BPEL process receives the exception, marks its state as completed with a fault, and rethrows the exception to the mediator.

5. The BPEL process triggers an asynchronous persistence of its audit information as the global transaction is rolled back.

6. The mediator receives the exception and persists the fault information in its error tables (in a separate local transaction).

7. The mediator sets its state to faulted.

If the server is shut down before the transaction can complete (for example, between Steps 5 through 7), the mediator instance can remain in a running state. The corresponding composite instance whose state is inferred from the components also displays as running. As the global transaction is rolled back, the message can be retried and reprocessed by the inbound adapter. Note that in this scenario, no mediator instances are lost.

25.1.48 Handling Business and Remote Faults in the Calling BPEL Processes

Oracle recommends that you handle both business and remote faults in BPEL processes during design time. If remote exceptions are not handled in the calling BPEL process, you can see discrepancies in the overall SOA composite application instance state and the server component instance states associated with the composite. For example, a situation may occur in which the composite instance is in a faulted state, while the service component instances are in a completed state. If the caller handles the remote exceptions, then the states of composite and component instances are accurate.

25.1.49 SOA Project Audit Information Is in English on Enterprise Manager

The SOA project audit information is in English on the Enterprise Manager page.

This issue has no workaround.

25.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

25.2.1 Explicitly Defining the ora-java Option in the Fault Policies File

Assume you invoke a SOA composite application with a fault policy/binding defined and see a recoverable fault in Oracle Enterprise Manager Fusion Middleware Control Console. After you perform a successful fault recovery retry, note that there is no **ora-java** option available for selection by default in the **After Successful Retry** list of the **Faults** tab of the Instance of *process_name* page.

This is the expected behavior. For the **ora-java** option to display, you must explicitly define it in the `fault-policies.xml` file during design-time. For example, perform the following steps.

1. Create a `fault-policies.xml` file in which you explicitly add `retrySuccessAction ref="ora-java"/>` to the `fault-policies.xml` file.

```
<Action id="ora-retry">
   <Retry>
      <retryCount>3</retryCount>
      <retryInterval>2</retryInterval>
      <exponentialBackoff/>
      <retryFailureAction ref="ora-java"/>
      <retrySuccessAction ref="ora-java"/>
   </Retry>
```

```
                        </Action>
```

2. Deploy the composite and create an instance.

3. Click the composite instance to invoke the instance trace of the composite.Click the component in which there is a recoverable fault (for example, Oracle BPEL Process Manager, Oracle Mediator, or Oracle BPM).Go to the **Faults** tab.

4. Select the **Retry** option to successfully retry the fault.

   If fault recovery is successful, the **After Successful Retry** list is displayed.

5. Select the list and note that the **ora-java** option is now listed.

25.2.2 Resolving Database Connection Pool Timeout Errors

If you deploy a SOA composite application and create multiple instances that use multiple connection threads (for example, numerous threads for worklist approvals in Oracle BPM Worklist), you may receive many connection pool timeout errors, such as the following.

```
[EL Warning]: 2009-05-02 21:27:08.101--UnitOfWork(58549762)--Exception
[EclipseLink-4002] (Eclipse Persistence Services - 1.1.1.v20090407-r3867):
org.eclipse.persistence.exceptions.DatabaseException
Internal Exception: java.sql.SQLException: Internal error: Cannot obtain
@ XAConnection weblogic.common.resourcepool.ResourceDeadException:
@ 0:weblogic.common.ResourceException: Got minus one from a read call
Error Code: 0
Query:
InsertObjectQuery(com.collaxa.cube.persistence.dto.DeliveryDocumentRef@8cf1b90
)
```

When these errors occur, the database terminates its connection.

As a workaround, set the `oracle.net.CONNECT_TIMEOUT` property that is defined for `SOADataSource` to a larger value (for example, `20000` milliseconds) in the data source file.

```
<property>
  <name>oracle.net.CONNECT_TIMEOUT</name>
  <value>20000</value>
</property>
```

25.2.3 Encryption and Decryption in Oracle Fusion Middleware 11*g*

There are no equivalent properties for encryption and decryption in Oracle Fusion Middleware release 11*g* that are similar to those provided in Oracle BPEL Process Manager release 10.1.3.5. Instead, encryption and decryption can be achieved by attaching Oracle Web Services Manager (OWSM) policies. OSWM is included in Oracle SOA Suite release 11*g*.

For more information about policies, see the following documentation:

- *Oracle Fusion Middleware Security and Administrator's Guide for Web Services*

- *Oracle Fusion Middleware Administrator's Guide for Oracle SOA Suite and Oracle BPM Suite*

- Chapter "Enabling Security with Policies" of *Oracle Fusion Middleware Developer's Guide for Oracle SOA Suite*

25.2.4 Publishing a WSDL Service Deployed to Different Partitions to OSR

Follow these steps to publish the same WSDL service deployed to different partitions to the Oracle Service Registry (OSR):

1. Log in to the OSR Web Console.

2. Publish the WSDL of the first partition.

3. Rename the above-mentioned service name to a unique name.

4. Publish the WSDL of the second partition.

   This creates two separate services in OSR.

25.2.5 Stopping and Starting the Managed Server Instead of the SOA Infrastructure

As a best practice, stop and start the managed server of Oracle SOA Suite instead of stopping and starting the SOA Infrastructure application. Stopping and starting the SOA Infrastructure application can cause problems with Oracle Enterprise Manager Fusion Middleware Control Console correctly loading.

25.2.6 WS-AT Transactions are Not Supported When Optimization is Enabled

You can configure a web service binding component as either a service or reference to support WS-AT transactions from the **Transaction Participation** dropdown list of the Create Web Service dialog. WS-AT transactions are supported in composite-to-web service environments, or vice-versa, with the `oracle.webservices.local.optimization` property set to `false`.

WS-AT transactions are not supported in composite-to-composite calls, even with the `oracle.webservices.local.optimization` property set to `false`.

For more information about the `oracle.webservices.local.optimization` property, see *Oracle Fusion Middleware Administrator's Guide for Oracle SOA Suite and Oracle BPM Suite*.

25.2.7 Querying the Status of Bulk Fault Recovery Jobs

You can query the status of bulk fault recovery jobs (for example, scheduled, in-progress, failed, results recorded, and so on) through log messages by configuring the `oracle.soa.management.util.async.AsynchronousJobScheduler` logger.

1. Within the Oracle WebLogic Server Administration Server domain home, open `$DOMAIN_HOME/config/fmwconfig/servers/AdminServer/logging.xml`.

   where `$DOMAIN_HOME` is the directory path to your domain.

2. Add the `oracle.soa.management.util.async.AsynchronousJobScheduler` logger.

3. Set the log level to `TRACE:1` to output job status updates.

   The syntax looks as follows:

   ```
   <loggers>
       ...
       <logger name='oracle.soa.management.util.async.AsynchronousJobScheduler'
    level="TRACE:1" />
   </loggers>
   ```

4. Restart the Oracle WebLogic Server Administration Server for the changes to take effect.

Logging output similar to the following is generated:

```
[2010-04-21T16:32:30.128-07:00] [AdminServer] [TRACE] []
 [oracle.soa.management.util.async.AsynchronousJobScheduler] [tid: SOA Fabric
 Asynchronous Job Processor] [userId: weblogic] [ecid: 0000IWYhmvq1FgB_
JXc9yf1BnsUK00002B,1:28285] [SRC_CLASS:
 oracle.soa.management.util.async.AsynchronousJobScheduler] [APP: em] [dcid:
 63062c26f939c426:-245c1ca7:12822aa19a3:-8000-00000000000000ee] [SRC_METHOD:
 processJob] Processing asynchronous BulkFaultRecovery job
 105ab343-7fbd-4a82-a167-7d794f0801e4
[2010-04-21T16:32:30.131-07:00] [AdminServer] [TRACE] []
 [oracle.soa.management.util.async.AsynchronousJobScheduler] [tid: SOA Fabric
 Asynchronous Job Processor] [userId: weblogic] [ecid: 0000IWYhmvq1FgB_
JXc9yf1BnsUK00002B,1:28285] [SRC_CLASS:
 oracle.soa.management.util.async.AsynchronousJobScheduler] [APP: em] [dcid:
 63062c26f939c426:-245c1ca7:12822aa19a3:-8000-00000000000000ee] [SRC_METHOD:
 updateJobStatus] Updated status for asynchronous job
 105ab343-7fbd-4a82-a167-7d794f0801e4 : incomplete

[2010-04-21T16:32:39.790-07:00] [AdminServer] [TRACE] []
 [oracle.soa.management.util.async.AsynchronousJobScheduler] [tid: SOA Fabric
 Asynchronous Job Processor] [userId: weblogic] [ecid: 0000IWYhmvq1FgB_
JXc9yf1BnsUK00002B,1:28285] [SRC_CLASS:
 oracle.soa.management.util.async.AsynchronousJobScheduler] [APP: em] [dcid:
 63062c26f939c426:-245c1ca7:12822aa19a3:-8000-00000000000000ee] [SRC_METHOD:
 updateJobStatus] Updated status for asynchronous job
 105ab343-7fbd-4a82-a167-7d794f0801e4 : complete
```

25.2.8 Automatic Recovery Configuration for Oracle BPEL Process Manager

Oracle SOA Suite provides an automatic recovery feature in Oracle Enterprise Manager Fusion Middleware Control Console that enables you to configure and recover:

- All activities (for example, wait activities and OnAlarm branches of pick activities) that have an associated expiration date and are scheduled with the SOA Infrastructure to be rescheduled

- All activities that are not complete over a provided threshold time

- All invoke and callback messages that are unresolved

Follow these instructions to configure automatic recovery.

1. In the navigator, right-click **soa-infra** and select **SOA Administration** > **BPEL Properties**.

2. Click **More BPEL Configuration Properties**.

3. In the **Name** column, click **RecoveryConfig**.

4. Expand **RecurringScheduleConfig**.

This section enables you to configure recurring recovery attempts.

5. Set the following properties to values appropriate to your environment, and click **Apply**.

Property	Description
maxMessageRaiseSize	The maximum number of messages to submit for each recurring recovery attempt. Use this property to limit the impact of recovery on the server. Note that this value specifies the maximum number of messages to filter from activity, invoke, and callback queries; that is, 50 messages from each of the activity, invoke, and callback tables.
	The default value is 50. A negative value causes all messages selected from the database to be submitted for recovery. A 0 value causes no messages to be selected from the database (effectively disabling recovery).
startWindowTime	The start time for the daily recovery window, specified in a 24-hour notation. Therefore, 2:00 pm is specified as 14:00. The leading zero does not need to be specified for single digit hour values (1:00-9:00).
	The default value is midnight (00:00). Any invalid parsed time value is defaulted to midnight.
stopWindowTime	The stop time for the daily recovery window, specified in a 24-hour notation. Therefore, 2:00 pm is specified as 14:00. The leading zero does not need to be specified for single digit hour values (1:00-9:00).
	If you do not want daily recovery, set the start and stop window times to be the same value. If the stop window time is earlier than the start window time, both the start and stop window times are changed to their respective default values.
	The default value is midnight (04:00), effectively setting recurring recovery to run until 04:00.
	Any invalid parsed time values default to 00:00.
subsequentTriggerDelay	The number of seconds between recovery attempts during daily recurring startup recovery periods. If the next recovery trigger falls outside of the current recovery period, that trigger is not scheduled until the next recurring recovery period (tomorrow).
	The default value is 300 (five minutes). A negative value causes the default to be selected.
threshHoldTimeInMinutes	This is the threshold time in minutes to ignore for automatic recovery processing. For automatic invoke and callback recovery, this value is used for picking messages with a received date less than the threshhold time.
	For automatic activities recovery, this value is used for picking activities with a modification date less than the threshhold time.
	The default value is 10 minutes. A negative value causes the default to be selected.

6. Expand **StartupScheduleConfig**.

   This section enables you to configure server startup recovery attempts.

7. Set the following properties to values appropriate to your environment, and click **Apply**.

Property	Description
maxMessageRaiseSize	The maximum number of messages to submit for each startup recovery attempt. Use this property to limit the impact of recovery on the server. Note that this value specifies the maximum number of messages to filter from activity, invoke, and callback queries; that is, 50 messages from each of the activity, invoke, and callback tables.
	The default value is 50. A negative value causes all messages selected from the database to be submitted for recovery. A zero value causes no messages to be selected from the database (effectively disabling recovery).
startupRecoveryDuration	Specifies the number of seconds that the startup recovery period lasts. After the server starts up, it goes into a startup recovery period. During this period, pending activities and undelivered callback and invocation messages are resubmitted for processing.
	The default value is 600 (ten minutes). A negative or zero value disables startup recovery.
subsequentTriggerDelay	The number of seconds between recovery attempts during the server startup recovery period. If the next recovery trigger falls outside the server startup period, that trigger is not scheduled and the server moves into the recurring recovery period.
	The default value is 300 (five minutes). A negative value causes the default to be selected.

> **Note:** In a cluster, it is possible for different nodes to concurrently attempt an automatic recovery of the same items. The first node to lock the item attempts the recovery, while other nodes may raise an exception that can be safely ignored.

25.2.9 NLS Issues with Oracle BPM Suite Flow Traces

Note the following localization activity label issues that exist with Oracle BPM Suite in Oracle Enterprise Manager Fusion Middleware Control Console:

- Under **Flow Trace** > **Instance of** *Process* > **Flow**

  The localization activity label cannot be correctly loaded according to the browser language. If there is a localized label for English available, the English label is loaded for all languages. If there is no localized label for English available, the default language's label is loaded for all languages.

- Under **Flow Trace** > **Instance of** *Process* > **Audit Trail**

  The localization label can be correctly loaded according to the browser locale. However, if the corresponding localization label does not exist, the first label in the list of localized labels is used. There is a potential problem with translation, because the first locale for each activity is not always the same.

25.2.10 Enabling and Disabling Measurements for Oracle BPM Suite

Measurements enable you to measure a business indicator at a certain point in the process or in a section of the process.

You can enable or disable measurements for Oracle BPM Suite at both the service engine and individual composite levels in Oracle Enterprise Manager Fusion

Middleware Control Console. The service engine level setting takes precedence over the composite level setting; this means that when measurements are disabled at the BPMN service engine level, all measurements at all levels are disabled. If you enable measurements at the service engine level, the measurement setting at the individual composite level is taken into account. This property is similar in functionality to the property for enabling or disabling BPEL process sensors.

To set this property at the BPMN service engine level:

1. Right-click **soa-infra** and select **SOA Administration** > **BPMN Properties**.

2. Click **More BPMN Configuration Properties**.

3. In the **Name** column, click **disableSensors**.

4. From the **Value** list, select an appropriate value and click **Apply**. The default value is **false**. Setting this value to **true** disables all calls to sensors at all levels.

To set this property at the individual composite level:

1. Right-click **soa-infra** in the navigator, and select **Administration** > **System MBean Browser**.

2. Expand **Application Defined MBeans** > **oracle.soa.config** > **Server:** *server_name* > **SCAComposite** > *composite_name*.

3. In the **Name** column, click **Properties**.

4. Expand **Properties** > **Element_0**.

   Information for the **disableProcessSensors** property is displayed.

5. In the **many** list, select an appropriate value and click **Apply**. The default value is **false**. Setting this value to **true** disables all calls to sensors for this individual composite.

   If this property does not exist, you can create it here and select an appropriate value.

   For more information about measurements, see *Oracle Fusion Middleware Modeling and Implementation Guide for Oracle Business Process Management*.

25.2.11 Resolving SUN JVM Crashes

Generating 300,000 BPEL instances through the Java test client using the following parameters causes the Sun Java Virtual Machine (JVM) to crash after three hours and a core dump to be created:

■ Number of threads: 100

■ Think time: 100 (ms)

Instead, use Sun JVM build 6u18-b09 to successfully run the test.

25.2.12 Demo Certificate Reference Removal When Using Your Own SSL Certificates

If you use your own certificates for SSL, you must remove references to the demo certificates by removing the following line from the `setDomainEnv` file for your version of the operating system.

```
-Djavax.net.ssl.trustStore=${WL_HOME}/server/lib/DemoTrust.jks
```

Otherwise, Oracle BPEL Process Manager cannot access the external SOAP endpoint.

25.2.13 Specifying a Nondefault XA Transaction Timeout Value for XA Data Sources

The default XA transaction timeout value for XA data sources is 0 seconds. You can change the default value in the Oracle WebLogic Server Administration Console. Follow these steps.

1. Log in to Oracle WebLogic Server Administration Console.

2. Under **Domain Structure** on the left side of the page, select **Services** > **JDBC** > **Data Sources**.

3. In the **Name** column of the **Data Sources** table, select EDNDataSource (for event delivery network transactions) or **SOADataSource** (for all other types of transactions).

4. Under the **Configuration** tab at the top, click the **Transaction** subtab.

5. In the **XA Transaction Timeout** field, enter a value in seconds.

6. Select the **Set XA Transaction Timeout** checkbox. You *must* select this checkbox for the new XA transaction timeout value to take effect.

7. Click **Save**.

25.2.14 Increasing the XA Transaction Timeout Value

If you send notifications for parallel task assignments in human workflow, you can see the transaction close, SQL exceptions appear, and notification processing take a long time at runtime. If this occurs, increase the XA transaction timeout for an XA data source in Oracle WebLogic Server Administration Console. When set, this value overrides the value of the global transaction timeout.

1. Click **Lock and Edit**.

2. Choose **Services** > **Data Sources**.

3. Click the specific data source.

4. Click the **Transaction** tab.

5. Select **Set XA Transaction Timeout**.

6. In the **XA Transaction Timeout** field, specify the value of the transaction timeout.

7. Click **Save**.

8. Log into SQL*Plus.

9. Set the `distributed_lock_timeout` value.

   ```
   SQL> alter system set distributed_lock_timeout=value scope=spfile;
   ```

   Oracle recommends that you set `distributed_lock_timeout` to a value greater than or equal to that set in Step 6.

10. Shut down and restart your database after running this command.

11. Verify that the setting has changed.

    ```
    SQL> show parameter distributed_lock_timeout;
    ```

12. Set this parameter to the same value for all instances in an Oracle Real Application Cluster.

25.2.15 PermGen Space Out-of-Memory Error

If you get Permgen Space Out-of-Memory errors in the SOA managed server, perform these steps:

1. Open the `$DOMAIN_HOME/bin/setSOADomainEnv.sh` file.

2. Increase the following values:

```
if [ "${JAVA_VENDOR}" != "Oracle" ] ; then
  DEFAULT_MEM_ARGS="${DEFAULT_MEM_ARGS} -XX:PermSize=128m
-XX:MaxPermSize=256m"
  PORT_MEM_ARGS="${PORT_MEM_ARGS} -XX:PermSize=256m -XX:MaxPermSize=512m"
fi
```

to these values:

```
if [ "${JAVA_VENDOR}" != "Oracle" ] ; then
  DEFAULT_MEM_ARGS="${DEFAULT_MEM_ARGS} -XX:PermSize=512m
-XX:MaxPermSize=1024m"
  PORT_MEM_ARGS="${PORT_MEM_ARGS} -XX:PermSize=512m -XX:MaxPermSize=1024m"
fi
```

25.3 Documentation Errata

This section describes documentation errata. It includes the following topic:

- Section 25.3.1, "Copying Details to the Clipboard in the Activity Audit Trail in Mozilla Firefox"

- Section 25.3.2, "Online Help for the Project Source Paths: SOA Content Dialog"

25.3.1 Copying Details to the Clipboard in the Activity Audit Trail in Mozilla Firefox

The note in Step 10 of Section "Viewing the Audit Trail and Process Flow of a BPEL Process Service Component" of *Oracle Fusion Middleware Administrator's Guide for Oracle SOA Suite and Oracle BPM Suite* states the following:

> **Note:** If using Internet Explorer, you can click **Copy details to clipboard** to copy the activity details to the clipboard. If using Mozilla Firefox, this link does not appear. Instead, you must manually select the text and copy and paste it to a file.

If you use Mozilla Firefox, the **Copy details to clipboard** link is now displayed. However, if you click the link, Mozilla Firefox displays a security warning.

25.3.2 Online Help for the Project Source Paths: SOA Content Dialog

The Project Source Paths: SOA Content dialog does not include context-sensitive help.

This dialog is available in Oracle JDeveloper by right-clicking a project in the Application Navigator and selecting **Project Properties** > **Project Source Paths** > **SOA Content**.

Use this dialog to change the SOA project directory.

Changing the SOA project directory does not cause project files to be saved in a different directory. All project files are still saved in the original directory location. The change occurs with how SOA project files display in the Application Navigator:

- If you click **Browse** to change this directory, the current project files are no longer visible in the Application Navigator.

- If you select **Use Custom Settings** and click **Customize Settings** to change this directory in the Customize SOA Content Settings dialog, the current project files are no longer visible in the Application Navigator for the current session of Oracle JDeveloper. When you exit Oracle JDeveloper, the settings revert and the project files display again in the Application Navigator.

This dialog includes the following buttons and fields:

- **Use Custom Settings** radio button: Select to change the SOA project directory.

- **Use Project Settings** radio button: Select to use the default SOA project directory in which to save files. This is the default selection.

- **Customize Settings** button: Click to change the directory path location for SOA project files.

- **SOA Directory Name** field: Displays the current directory path for the SOA project.

26

Oracle Technology Adapters

This chapter describes issues associated with Oracle Technology Adapters and the *Oracle Fusion Middleware User's Guide for Technology Adapters*. It includes the following topics:

- Section 26.1, "General Issues and Workarounds"
- Section 26.2, "Configuration Issues and Workarounds"
- Section 26.3, "Documentation Errata"

26.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 26.1.1, "Oracle JCA Adapters Issues and Workarounds"
- Section 26.1.2, "Oracle JCA Adapter for Files/FTP Issues and Workarounds"
- Section 26.1.3, "Oracle JCA Adapter for AQ Issues and Workarounds"
- Section 26.1.4, "Oracle JCA Adapter for JMS Issues and Workarounds"
- Section 26.1.5, "Oracle JCA Adapter for Database Issues and Workarounds"
- Section 26.1.6, "Oracle JCA Adapter for MQ Series Issues and Workarounds"
- Section 26.1.7, "Oracle JCA Adapter for Socket Issues and Workarounds"
- Section 26.1.8, "Native Format Builder Issues and Workarounds"

26.1.1 Oracle JCA Adapters Issues and Workarounds

This section describes issues and workarounds that are applicable to all adapters: Oracle AQ Adapter, Oracle JMS Adapter, Oracle Files/FTP Adapter, Oracle MQ Series Adapter, Oracle Database Adapter, and Oracle Socket Adapter.

This section includes the following issue:

- Section 26.1.1.1, "ECID Propagation Is Not Supported by Oracle Technology Adapters"
- Section 26.1.1.2, "Outbound Adapter Does Not Perform an Outbound Retry If the Outbound Adapter Throws an Exception with GLOBAL_RETRY"
- Section 26.1.1.3, "JCA Binding Component Error Messages During Forceful Shutdown"

- Section 26.1.1.4, "Manual Edits to WSDL Lost When Re-running the Adapter Configuration Wizard"

- Section 26.1.1.5, "Setting the Payload Threshold in MBean for DB Adapter Outbound Operations"

- Section 26.1.1.6, "Value for MBean in Enterprise Manager is Not Consistent with Expected Behavior"

26.1.1.1 ECID Propagation Is Not Supported by Oracle Technology Adapters

ECID (Execution Context Identifier) propagation is not supported by Oracle Technology adapters. The ECID is used to keep track of message flow in Oracle Enterprise Manager, and hence this feature is not available in Oracle Technology adapters.

26.1.1.2 Outbound Adapter Does Not Perform an Outbound Retry If the Outbound Adapter Throws an Exception with GLOBAL_RETRY

If an outbound adapter throws an exception with GLOBAL_RETRY, then the retry configured at the outbound adapter level will not take effect. The retry falls back to the caller which could be a BPEL process. It is observed that the retry happens from the inbound to the BPEL process (caller of BPEL process) in either of the following transaction semantics in Oracle BPEL process:

Scenario 1:
```
<property name="bpel.config.transaction">requiresNew</property>
<property name="bpel.config.oneWayDeliveryPolicy">sync</property>
```

Scenario 2:
```
<property  name="bpel.config.transaction">required</property>
<property name="bpel.config.oneWayDeliveryPolicy">sync</property>
```

If the adapter throws a LOCAL_RETRY, then the retry configured at the outbound adapter level will take effect.

Note that for the inbound retry to work, Oracle BPEL process must not have any dehydration points.

26.1.1.3 JCA Binding Component Error Messages During Forceful Shutdown

During forceful shutdown of Oracle WebLogic Server, if the severs are processing data, then you may see JCA Binding Component error messages. These messages are benign.

26.1.1.4 Manual Edits to WSDL Lost When Re-running the Adapter Configuration Wizard

Every time you use the Adapter Configuration Wizard to edit an adapter, the wizard uses the data you enter to recreate the adapter WSDL. If you made manual edits to the WSDL before, the Adapter Configuration Wizard will discard those changes the next time you edit the adapter.

The workaround for this issue is to make the same manual edits each time you use the Adapter Configuration Wizard.

26.1.1.5 Setting the Payload Threshold in MBean for DB Adapter Outbound Operations

You can set the payload threshold in MBeans for DB Adapter Outbound operations such as Select, Pure SQL, and the Stored Procedure Adapter's Select Operations. However, values you set in the MBean might not take effect dynamically; when you change the value in the Mbean, you need to redeploy the SOA composite.

You can use the following procedure to set the payload threshold in Mbeans:

1. Deploy a composite with a threshold value in the composite.xml file.This value in the composite.xml overrides the value in MBean defined in EM Console..

2. If the value in the Mbean is changed, and if that value is the value that is to take effect, you must redeploy the composite application.

26.1.1.6 Value for MBean in Enterprise Manager is Not Consistent with Expected Behavior

When configuring a DataBase Adapter Inbound operation, do not provide a value in the SOA composite application. Provide a data size of about 70 bytes for the DB Inbound Adapter.

Refer to the following scenario for setting the value in the Enterprise Manager for `DefaultPayloadSizeThreshold`:

1. Change the default value for the threshold from -1 to 2 bytes. Data is rejected (this is expected behavior).

2. Change the default value for the threshold from 2 bytes to -1 bytes. Data is rejected (this is not expected behavior).

3. Change the default value for the threshold from -1 byte to 50000 bytes. Data is processed (this is expected behavior).

4. Change the default value for the threshold from 50000 bytes to -1 byte. Data is processed (this is expected behavior).

The results in Steps 2 and 4 should be the same, but are currently not so.

The exception that occurs when you perform a step similar to Step 2 with a sequence of steps; the exception is displayed as a message that the adapter framework is treating the -1 value as `restricted value` and not as `any value`.

26.1.2 Oracle JCA Adapter for Files/FTP Issues and Workarounds

This section describes the following issues and workarounds related to Oracle File and FTP Adapters:

It includes the following sections:

- Section 26.1.2.1, "Files Lost During an SOA Server Failover"

- Section 26.1.2.2, "DOM Parsing Exception at Run Time"

- Section 26.1.2.3, "Rejection Handling Not Working Properly for XML-Debatching Scenarios"

- Section 26.1.2.4, "JCA Property Updates from Enterprise Manager Console Are Not Applied If a Logical Directory Is Used"

- Section 26.1.2.5, "Prerequisite for Oracle FTP Adapter Debatching Scenarios on FTPS"

- Section 26.1.2.6, "Chunked Read Feature Not Supported for Secure FTP"
- Section 26.1.2.7, "Editable Append Property With Dynamic File Name"
- Section 26.1.2.8, "Data Lost During Read Operation from an Input File with Errors"
- Section 26.1.2.9, "Attachments and Payload Validation are Incompatible"

26.1.2.1 Files Lost During an SOA Server Failover

The Oracle File Adapter picks up a file from an inbound directory, processes the file, and sends the processed file to an output directory. However, during this process if a failover occurs in an SOA managed server, then the file may be lost because of the nontransactional nature of Oracle File Adapter. As a result, some files read by the inbound adapter may not be sent to the output directory. You must configure the Oracle File Adapter for high availability, to ensure that files are not lost during a failover.

26.1.2.2 DOM Parsing Exception at Run Time

When Oracle File and FTP Adapters read a Unicode XML file with byte order mark (BOM), a DOM parsing exception is thrown at runtime. If the Unicode XML file does not use BOM, then an exception is not thrown.

26.1.2.3 Rejection Handling Not Working Properly for XML-Debatching Scenarios

In case of debatching scenarios with XML payloads that have errors such as extra tags and spurious data, output files are created along with the rejected messages.

26.1.2.4 JCA Property Updates from Enterprise Manager Console Are Not Applied If a Logical Directory Is Used

If Oracle File and FTP Adapters use logical directories for inbound or outbound operations, then JCA property updates from Oracle Enterprise Manager Console are not applied.

26.1.2.5 Prerequisite for Oracle FTP Adapter Debatching Scenarios on FTPS

You must use a synchronous process in case of Oracle FTP Adapter debatching scenarios on FTP over SSL (FTPS) for large payloads. If a synchronous process is not used, then the FTP server throws the error code, 421.

26.1.2.6 Chunked Read Feature Not Supported for Secure FTP

The Chunked Read feature of Oracle FTP Adapter is not supported for SFTP (Secure FTP) using SSH transport.

26.1.2.7 Editable Append Property With Dynamic File Name

When a dynamic file name is specified for an output file, the `Append` property must not be edited. However, the Oracle Enterprise Manager Fusion Middleware Control Console allows you to edit the `Append` property even when you specify a dynamic file name for an output file. Ensure that you do not edit the `Append` property when you specify a dynamic file name for an output file.

When using a dynamic file name the value of the `Append` property must be `false`. By default, the value of the `Append` property is `false` and this must not be edited while using a dynamic file name.

26.1.2.8 Data Lost During Read Operation from an Input File with Errors

When an Oracle File Adapter processes a file with some invalid records, the invalid records are sent to the rejected messages directory, whereas, the valid records are lost. To ensure that no data is lost, input files with invalid data must be sent to the error archive queue. You must set the following properties in the WSDL file for the Read file operation to ensure that input files with errors are sent to the error archive queue:

```
PhysicalErrorArchiveDirectory="physical_directory_ path"
LogicalErrorArchiveDirectory="logical_directory_path"
```

26.1.2.9 Attachments and Payload Validation are Incompatible

If you enable payload validation when using attachments, the Oracle FTP Adapter fails with a `java.lang.NullPointerException` and logs an error like: "FtpIn FtpInAdapter Service FtpIn was unable to perform delivery of inbound message to the composite".

When using attachments, disable payload validation. For Attachments, payload validation is unnecessary.

26.1.3 Oracle JCA Adapter for AQ Issues and Workarounds

This section describes the following issue and workaround related to Oracle JCA Adapter for AQ:

It includes the following section:

- Section 26.1.3.1, "Oracle JCA Adapter for AQ Reading Field from Object Type Depends on Server Locale Encoding"

- Section 26.1.3.2, "Oracle JCA Adapter for AQ Does Not Dequeue Messages from Queues in Oracle E-Business Suite Applications"

- Section 26.1.3.3, "AQ_INVALID_PAYLOAD_HEADERS_OUTBOUND Error When Payload Field is Selected"

- Section 26.1.3.4, "Enabling Payload Validation Using XSD"

26.1.3.1 Oracle JCA Adapter for AQ Reading Field from Object Type Depends on Server Locale Encoding

In an SOA project that contains outbound Oracle JCA Adapter for AQ, Mediator or BPEL, and an inbound Oracle JCA Adapter for AQ, when you select the business payload option as **Field within the Object**, the national characters are garbled. This issue depends on server locale encoding and exists only on native locale. However, when the server is running on UTF-8 encoding, this issue does not exist.

26.1.3.2 Oracle JCA Adapter for AQ Does Not Dequeue Messages from Queues in Oracle E-Business Suite Applications

It is recommended that you use Oracle Adapter for Oracle Applications to dequeue from queues in E-Business Suite Applications and *not* Oracle JCA Adapter for AQ.

26.1.3.3 AQ_INVALID_PAYLOAD_HEADERS_OUTBOUND Error When Payload Field is Selected

When using the Adapter Configuration Wizard to configure the object payload, you may configure the Business Payload as either:

- Whole Object

- Field within the Object

If you select **Field within the Object**, and you do not check the **Access to non-payload fields also needed** option, your composite may fail at run time with an `AQ_INVALID_PAYLOAD_HEADERS_OUTBOUND` error.

The workaround for this issue is to always select the **Access to non-payload fields also needed** option when you configure the Business Payload by selecting the **Field within the Object** option.

For more information, see "The Adapter Configuration Wizard Object Payload Page" in the *Oracle Fusion Middleware User's Guide for Technology Adapters*.

26.1.3.4 Enabling Payload Validation Using XSD

If you use Oracle Enterprise Manager Console to enable payload validation at the `SOA-INFRA` level, then for inbound Oracle JCA Adapter for AQ (including B2B adapters or Oracle Adapter for Oracle Applications (Oracle E-Business Suite Adapter) that use Oracle JCA Adapter for AQ), then Oracle recommends that you use the following block in your payload XSD:

```
xmlns:nxsd="http://xmlns.oracle.com/pcbpel/nxsd"
nxsd:validation="true"
```

26.1.4 Oracle JCA Adapter for JMS Issues and Workarounds

This section describes the following issues and workarounds related to Oracle JMS Adapter:

- Section 26.1.4.1, "Example of Flow Control Settings for Oracle JMS Adapter"
- Section 26.1.4.2, "Oracle JMS Adapter Re-entrant Wizard Displays a Warning Message When the Destination and JNDI Names Are Invalid"
- Section 26.1.4.3, "Distributed Topic in Clustered Environment Creates Extra Messages"
- Section 26.1.4.4, "Old Queue is Still Polled After Changing Queue Name"

26.1.4.1 Example of Flow Control Settings for Oracle JMS Adapter

Anytime the exception weblogic.messaging.kernel.QuotaException: Quota blocking time exceeded and no quota available is encountered, WLS JMS provider allows flow control settings that you can tweak to control the number of messages that are produced/consumed.

For more information about tweaking the control settings, see

(http://download.oracle.com/docs/cd/E13222_01/wls/docs90/ConsoleHelp/pagehelp/JMSjmsconnectionjmsconnectionfactoryconfigflowcontroltitle.html)

The following is an example of the flow control settings used and the various thresholds for a message carrying a payload size of 5k:

```
Config JMSServer:
    Message Buffer Size:5000

Config JMSConnectionFactory:
    Flow Control:
    Flow Maximum: 30
    Flow Minimum: 1
    Flow Interval: 10
```

```
    Flow Step: 10

check Flow Control Enabled
    Default Delivery: Send Timeout: 3000000

Config JMS Destinations:
      Bytes Threshold High: 50000
      Bytes Threshold Low:  50
      Messages Threshold High: 100
      Messages Threshold Low: 1
      Set Quota
```

26.1.4.2 Oracle JMS Adapter Re-entrant Wizard Displays a Warning Message When the Destination and JNDI Names Are Invalid

While migrating a project from one environment to another, Oracle JMS Adapter Wizard populates the Destination and JNDI name fields in edit mode in the following pages:

- Consume Operation Parameters page

- Produce Operation Parameters page

- Request Operation Parameters page

- Reply Operation Parameters page

- Request/Reply Operation Parameters page

However, if you click **Next**, the Adapter Configuration Wizard validates whether this is a valid destination, and accordingly, displays a warning message if found to be invalid. You have the option to proceed or enter a valid destination.

26.1.4.3 Distributed Topic in Clustered Environment Creates Extra Messages

When you use Oracle JMS adapter with a distributed topic deployed in a cluster, the scenario would result in more messages processed than the actual number of messages passed to the topic.

Each subscriber to the topic is handed a copy of the message to be processed by WLS JMS. So, the number of processed messages will be equal to the number of active subscribers on the distributed topic. This is a known behavior of Oracle WebLogic JMS in Oracle WebLogic Application Server 10.3.

26.1.4.4 Old Queue is Still Polled After Changing Queue Name

When using the Oracle JMS Adapter in an Enqueue-Dequeue Request-Reply scenario, if you change the Queue name (Inbound Queue and Reply Queue) to a new value, the old queue is still polled.

The workaround for this issue is to configure the new Queue name and redeploy the composite.

26.1.5 Oracle JCA Adapter for Database Issues and Workarounds

This section describes the following issues and workarounds related to Oracle Database Adapter:

- Section 26.1.5.1, "The Value Of the Active Unit Of Work Property Is Not Saved for Outbound SELECT Operation"

- Section 26.1.5.2, "The Binding Fault Retries During Remote Fault Is Not Captured in the Oracle Enterprise Manager Console"

- Section 26.1.5.3, "Invalid Datatype Exception After Re-Creating Schema Object"

- Section 26.1.5.4, "Distributed Polling Using MarkReservedValue Disabled by Default"

- Section 26.1.5.5, "Stored Procedure Limitations in SQL Server 2008"

26.1.5.1 The Value Of the Active Unit Of Work Property Is Not Saved for Outbound SELECT Operation

While configuring an outbound Oracle Database Adapter to perform a SELECT operation, if you select **Get Active Unit of Work** in the Adapter Configuration Wizard - Advanced Option page, then the value of the GetActiveUnitofWork property is not saved in the .jca file.

The workaround for this issue is to manually add this property in the .jca file of the Oracle Database Adapter, as shown in the following example:

```
<property name="GetActiveUnitOfWork" value="true"/>
```

26.1.5.2 The Binding Fault Retries During Remote Fault Is Not Captured in the Oracle Enterprise Manager Console

Consider a scenario in which the Oracle Database Adapter retries the transaction at remote fault (that is, when the database is down) in a condition where the binding fault retry is specified in the composite.xml file, and there is no fault policy defined. In such a scenario, the binding fault retry performed by the Oracle Database Adapter is not captured in the Audit Trail in the Oracle Enterprise Manager Console.

26.1.5.3 Invalid Datatype Exception After Re-Creating Schema Object

If you re-create an Oracle Database PL/SQL statement or other schema object (such as a data type), or recompile a package body, and re-deploy a SOA composite that uses the Oracle Database Adapter, then the Oracle Database Adapter runtime will throw an ORA-00902: invalid datatype exception.

The workaround for this issue is to set the following Oracle WebLogic Server properties:

- Data Source:

  - Initial Capacity: 0

  - Statement Cache Size: 0

- Adapter Connection Pool:

  - Initial Capacity: 0

If your SOA composite is incompatible with these property settings, the workaround for this issue is to stop and start the Oracle WebLogic Server.

For more information, see:

- "Configuring JDBC Data Sources" in the *Oracle Fusion Middleware Configuring and Managing JDBC for Oracle WebLogic Server*

- "Connection Management" in the *Oracle Fusion Middleware Programming Resource Adapters for Oracle WebLogic Server*.

26.1.5.4 Distributed Polling Using MarkReservedValue Disabled by Default

In this release, Oracle recommends that you use the new distributed polling approach based on skip locking. When editing an Oracle Database Adapter service which has a `MarkReservedValue` set, that value will be removed to enable the new best practice.

To use the old distributed polling approach based on a reserved value, select the value from the drop down menu.

26.1.5.5 Stored Procedure Limitations in SQL Server 2008

The Oracle Database Adapter stored procedure interface does not support the following data types in SQL Server 2008:

- `TIME`
- `DATE`
- `DATETIME`
- `DATETIME2`
- `DATETIMEOFFSET`

26.1.6 Oracle JCA Adapter for MQ Series Issues and Workarounds

This section describes the following issues and workarounds related to Oracle MQ Series Adapter:

- Section 26.1.6.1, "Oracle MQ Series Adapter Does Not Support Asynchronous Request-Response Pattern for Mediator"
- Section 26.1.6.2, "Oracle MQ Series Adapter Does Not Perform an Outbound Retry If the Outbound Resource Is XA"
- Section 26.1.6.3, "Oracle MQ Series Hangs If the Channel Is Brought Down in a Cluster Environment"
- Section 26.1.6.4, "Adding Additional Encoding Not Supported"
- Section 26.1.6.5, "Using MQ Series version 7.0.0.2 and XA Transactions"
- Section 26.1.6.6, "Old Queue is Still Polled After Changing Queue Name"
- Section 26.1.6.7, "Oracle MQ Series Adapter Reconnect Failure After Forceful Queue Manager Shutdown"

26.1.6.1 Oracle MQ Series Adapter Does Not Support Asynchronous Request-Response Pattern for Mediator

Oracle MQ Series Adapter does not support asynchronous request-response pattern (where Mediator is the server).

26.1.6.2 Oracle MQ Series Adapter Does Not Perform an Outbound Retry If the Outbound Resource Is XA

If you select the outbound resource as XA, then the Oracle MQ Series Adapter throws an exception and does not retry because it does not support an outbound retry with outbound resource as XA. On the other hand, if the outbound resource is non-XA, then the retry happens correctly.

26.1.6.3 Oracle MQ Series Hangs If the Channel Is Brought Down in a Cluster Environment

When working with more than one managed server, if you try to bring down the channel, then Oracle MQ Series hangs. This occurs in both Windows and UNIX operating systems.

26.1.6.4 Adding Additional Encoding Not Supported

Standard Java encodings and their mappings are provided with the MQ Series Adapter but the Adapter Configuration Wizard does not support addition of additional Java encodings that you may require.

To add support for the standard Java encodings that are not provided in the list, you can perform the following steps:

1. Extract the `MQSeriesAdapter.jar` file from the `MQSeriesAdapter.rar` file.

2. Extract the `mq.properties` file from the MQSeriesAdapter.jar file.

3. Add the entry in the `mq.properties` file. This file has two entries for a mapping between MQ Series encoding and Java encoding. For each new encoding that you require, you must make two entries to the `mq.properties` file. Make an entry for the MQ Series encoding to the corresponding Java encoding and the other entry for the Java encoding to the corresponding MQ Series encoding.

26.1.6.5 Using MQ Series version 7.0.0.2 and XA Transactions

Oracle JCA Adapter for MQ Series is certified with MQ Series version 7.0.0.2. If you are using XA transactions, then you must configure the server connection channel with a level of conversation sharing set to 0.

26.1.6.6 Old Queue is Still Polled After Changing Queue Name

When using the Oracle MQ Series Adapter in an Enqueue-Dequeue Request-Reply or Dequeue-Enqueue Request-Reply scenario, if you change the Queue name (Inbound Queue and Reply Queue) to a new value, the old queue is still polled.

The workaround for this issue is to configure the new Queue name and redeploy the composite.

26.1.6.7 Oracle MQ Series Adapter Reconnect Failure After Forceful Queue Manager Shutdown

If you forcefully shutdown the Inbound Queue Manger using the `-i` option (such as `endmqm -i QUEUE-MANAGER`), and then bring it up again, the Oracle MQ Series Adapter does not reconnect properly:

- The Open Input count of the Inbound Queue is reduced from the default value 2 to 1 and the Inbound message is delivered to the Outbound Queue and then put back to the Inbound queue. The Oracle MQ Series Adapter repeats this infinitely.

- In some cases, the Open Input count is reduced from the default value 2 to 1 and the messages are just delivered to the Outbound Queue.

The workarounds for this issue are:

- Configure the SOA instances in non-blocking mode.

- Restart the inbound partner link.

- Stop and start the managed instance.

26.1.7 Oracle JCA Adapter for Socket Issues and Workarounds

This section describes the following issue and workaround related to Oracle Socket Adapter:

- Section 26.1.7.1, "Oracle Socket Adapter Not Supported On a Cluster-Based Environment"

- Section 26.1.7.2, "Inbound Operation Hostname Should Be an IP Address for a Multiple-NIC Host"

- Section 26.1.7.3, "Workaround for Exception with EncByteOrderCheckBox"

26.1.7.1 Oracle Socket Adapter Not Supported On a Cluster-Based Environment

Oracle Socket Adapter is not supported on a cluster-based environment. If you try to deploy an inbound Oracle Socket Adapter in a clustered environment, then one of the managed servers throws an error message that the server's port is already in use.

26.1.7.2 Inbound Operation Hostname Should Be an IP Address for a Multiple-NIC Host

When configuring the Oracle Socket Adapter using the Adapter Configuration Wizard, at step 4 of 7, if you select either of:

- **Inbound Synchronous Request/Reply**

- **Inbound Receive**

Then, at Adapter Configuration Wizard step 5 of 7, note the following:

- If you want to override the default port for the given socket connection JNDI name, check **Specify Host and Port**.

- If you check **Specify Host and Port**, you must enter a value for **Host Name**. Note the following:

  - If your host is associated with only one IP address, that is, if it has only one Network Interface Card (NIC), enter `localhost`.

  - If your host is associated with more than one IP address, that is, has more than one NIC, enter the one IP address you want the Oracle Socket Adapter to listen on.

    The Oracle Socket Adapter can listen on only one specific IP address. The Oracle Socket Adapter cannot listen on multiple IP addresses.

26.1.7.3 Workaround for Exception with EncByteOrderCheckBox

When you design a Socket adapter project (both Inbound and Outbound) or edit an save the existing project, the following property is added to the JCA file:

```
<property name="EncByteOrderCheckBox" value="false"/>
```

This property, `EncByteOrderCheckBox` will not be recognized by the adapter and throws the following exception:

```
Error while performing
Endpoint Activation: BINDING.JCA-12532
Cannot set JCA WSDL Property
roperty setEncByteOrderCheckBox is not defined for
oracle.tip.adapter.socket.SocketActivationSpec
```

There is a workaround: remove the `EncByteOrderCheckBox` from the `.jca` file. That is, remove the following property from the .jca file as the property itself is not recognized by the Adapter.

```
<property name="EncByteOrderCheckBox" value="false"/>
```

26.1.8 Native Format Builder Issues and Workarounds

This section describes the following issue and workaround related to Native Format Builder:

- Section 26.1.8.1, "Delimited by White Space Option Not Supported in NXSD"
- Section 26.1.8.2, "Payload Validation Fails for Payloads Greater Than 10 MB in Size"

26.1.8.1 Delimited by White Space Option Not Supported in NXSD

In the Specify Delimiter's page of the Native Format Builder wizard, the `White space (any number of tab, space)` option in the Delimited by list is not supported.

26.1.8.2 Payload Validation Fails for Payloads Greater Than 10 MB in Size

When payload validation is enabled, it may fail with a `java.lang.ClassCastException` for payloads greater than 10 MB in size.

For more information, see "Payload Validation" in the *Oracle Fusion Middleware User's Guide for Technology Adapters*.

26.2 Configuration Issues and Workarounds

There are no known configuration issues at this time.

26.3 Documentation Errata

This section describes documentation errata for *Oracle Fusion Middleware User's Guide for Technology Adapters*. It includes the following topics:

- Section 26.3.1, "The DBActivationSpec Property Undying Is Always True in 11g"
- Section 26.3.2, "Online Help for Third Party Adapter Does Not Define JCA File Attribute"
- Section 26.3.3, "Online Help for JMS Adapter Does Not Define the Payload Attribute"
- Section 26.3.4, "Online Help for JMS Adapter Does Not Define the As Attachment Attribute"
- Section 26.3.5, "Specifying a TCP Port in a Configuration Plan For an Oracle Socket Adapter"
- Section 26.3.6, "Oracle Database Adapter Certification"

26.3.1 The DBActivationSpec Property Undying Is Always True in 11*g*

Section 9.3.6.2, "Undying" in Chapter Oracle JCA Adapter for Database states that the new Undying property is supported. Instead, Undying is now always *true*, so the configuration property has been removed.

26.3.2 Online Help for Third Party Adapter Does Not Define JCA File Attribute

When you drag and drop **Third Party Adapter** from the Service Adapters list to the Exposed components swim lane in the `composite.xml` page and click the Help button, the online help does not define the JCA File attribute.

The definition should read: The JCA file provides adapter configuration information for the service.

The title of this help topic should read: Third Party Adapter.

The bread crumbs for this help topic should read: Component Palette for SOA Composite Editor > Adapter Services > Third Party Adapter > Adapter Configuration Wizard.

26.3.3 Online Help for JMS Adapter Does Not Define the Payload Attribute

In the Adapter Configuration Wizard for an Oracle JMS Adapter, when Message Body Type is MapMessage, the online help for the Consume Operation Parameters page does not define the Payload attribute.

The definition should read: Optionally specify the name of the `MapMessage` entry you want to designate as the payload. All other `MapMessage` entries are converted to adapter properties identified by `jca.jms.Map.xxxx`, where `xxxx` is name of the `MapMessage` entry. If you do not configure the Payload attribute, then the entire `MapMessage` is converted to XML and the XML file is transferred as the payload.

26.3.4 Online Help for JMS Adapter Does Not Define the As Attachment Attribute

In the Adapter Configuration Wizard for an Oracle JMS Adapter, when Message Body Type is MapMessage, the online help for the Consume Operation Parameters page does not define the As Attachment attribute.

The definition should read: Check this option to instruct the Oracle JMS Adapter to opaquely copy the payload as an attachment. This allows you to transfer a large amount (of often binary) data efficiently, without processing its contents within the composite application.

26.3.5 Specifying a TCP Port in a Configuration Plan For an Oracle Socket Adapter

In the *Oracle Fusion Middleware User's Guide for Technology Adapters*, the Oracle Socket Adapter chapter is missing a topic on how to specify a TCP port in a configuration plan for an Oracle Socket Adapter.

To do so, perform the following steps:

1. Add the following code to your configuration plan XML file:

```
<service name="Receive">
    <property name="Port">
          <replace>2222</replace>
    </property>
    <binding type="jca"/>
</service>
```

2. Add a port property to your `.jca` file as follows:

```
<property name="Port" value="Port"/>
```

3. Add the port property to your `composite.xml` file under the service element and specify a default value (in this example, 1111):

```
<service name="Receive" ui:wsdlLocation="Receive.wsdl">
    <interface.wsdl interface="..." />
    <binding.jca config="Receive_tcp.jca"/>
    <property name="Port" type="xs:string" many="false"
override="may">1111</property>
</service>
```

4. Deploy your composite with the configuration plan.

When deployed, the Oracle Socket Adapter will listen on port 2222, as given in the configuration plan.

If you deploy the composite without a configuration plan or if the configuration plan does not override the Port property, then the Oracle Socket Adapter will listen on the socket that the composite.xml file's default Port property specifies (in this example, port 1111).

26.3.6 Oracle Database Adapter Certification

The beginning of Section 9.6, "JDBC Driver and Database Connection Configuration" in the *Oracle Fusion Middleware User's Guide for Technology Adapters* reads as follows:

"In this release, Oracle JCA Adapters are certified against the following third-party databases using Oracle WebLogic Server Type 4 JDBC drivers:

- Microsoft SQL Server 2008
- Sybase 15
- Informix 11.5"

It should read as follows:

"In this release, Oracle Database Adapter is certified against the following third-party databases using Oracle WebLogic Server Type 4 JDBC drivers:

- Microsoft SQL Server 2005, 2008
- Sybase 15
- Informix 11.5
- MySQL 5.x+
- DB2/UDB 9.5 and later FixPaks"

27

Oracle WebLogic Communication Services

This chapter describes issues associated with Oracle WebLogic Communication Services (OWLCS). It includes the following topics:

- Section 27.1, "General Issues and Workarounds"
- Section 27.2, "Configuration Issues and Workarounds"
- Section 27.3, "Documentation Errata"

27.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topics:

- Section 27.1.1, "Active SIP Session and APP Session Count Show as -1 in Clustered Configuration"
- Section 27.1.2, "Oracle WebLogic Server Pack/Unpack Tool Does Not Function in OWLCS"
- Section 27.1.3, "Oracle WebLogic Server Cloning Tool Does Not Function in OWLCS"
- Section 27.1.4, "Messages Metrics Rendered as Unavailable in the Performance Page for User Messaging Server"

27.1.1 Active SIP Session and APP Session Count Show as -1 in Clustered Configuration

In the Administration Console, the **Monitoring -> General** tab displays *Undefined* for the Active SIP Session Count and Active Application Session Count attributes when monitoring a replicated WebLogic SIP Server deployment. There is currently no workaround for this problem.

27.1.2 Oracle WebLogic Server Pack/Unpack Tool Does Not Function in OWLCS

The Pack/Unpack tool in Oracle WebLogic Server does not work in this OWLCS release. There is no workaround currently available.

27.1.3 Oracle WebLogic Server Cloning Tool Does Not Function in OWLCS

The Cloning tool in Oracle WebLogic Server does not work in this OWLCS release. There is no workaround currently available.

27.1.4 Messages Metrics Rendered as Unavailable in the Performance Page for User Messaging Server

When no metric data is found, for example when no messages have been sent or received after server setup, the Metrics Performance page will display *Unavailable*. This is not a problem with the software, and the Performance reporting is operating properly. As soon as *Send* and *Receive* traffic exists, the Performance page will display results normally.

27.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 27.2.1, "Launch_sash Option Error"
- Section 27.2.2, "Same User Who Installed WLS/WLSS Product Must Perform Uninstall"
- Section 27.2.3, "Uppercase Usernames Cause Reregistration and Presence Subscription Failures"
- Section 27.2.4, "Running the uninstall.sh Script in Text Mode Does Not Uninstall the Product"
- Section 27.2.5, "SIP Monitor in F5 Networks BigIP Does Not Work in UDP Mode"
- Section 27.2.6, "SIP Container Does Not Bind to IPV6 Interfaces for Listening on Windows"
- Section 27.2.7, "JAWS Unable to Read Some Install Screens"
- Section 27.2.8, "Configure VoiceXML Driver Receive URLs Correctly"

27.2.1 Launch_sash Option Error

An error has been reported when using the `launch_sash` command with the `-e` option. For example:

```
MW_HOME/user_projects/domains/base_domain/bin/launch_sash.sh -p
8001 -n weblogic -w welcome1 -a presenceapplication -e "xcap
appusage list"
```

does not properly process the `xcap appusage list` argument because the double quote (") is mishandled.

To work around this problem, issue the command at the `sash` prompt directly.

27.2.2 Same User Who Installed WLS/WLSS Product Must Perform Uninstall

In order to perform a clean uninstall, ensure that the same user (privileges) who accomplished the install also accomplishes the uninstall.

27.2.3 Uppercase Usernames Cause Reregistration and Presence Subscription Failures

When a user is created with an uppercase username, then the following occurs:

- Initial registration progresses normally, resulting in successful registration with Oracle Communicator.

- Presence subscriptions fails.

- After a few minutes, Oracle Communicator displays `Server Refused Registration (403)`.

- User's account is locked and sign-in is blocked for 30 minutes.

To work around this issue, set *Trusted Authentication Hosts* for the SIP Container by doing the following (from the Administration Console):

1. Click **SipServer** in the left pane.

2. Click the **SIP Security** tab.

3. In Trusted Authentication Hosts, add the IP address of your server (that is running OWLCS).

4. Save and restart OWLCS.

> **Note:** Using this workaround, presence functionality will fail for clients running on the same machine as the OWLCS server. Such cases (both Oracle Communicator and server running on the same machine) are mostly for demonstration and development environments. For these cases, ensure you create users with lowercase usernames.

Reregistration and presence subscription failures can also occur when users are created with `privateId` being different than the username part of the `publicId`.

For example, if privateId is *test.user1* and publicId is *sip:test.user1@example.com*, everything works because *test.user1* is the username part of the publicId *sip:test.user1@example.com*.

But if privateId is *tuser1* and publicId is *sip:test.user1@example.com*, the username part of the publicId is not the same as privateId. In this case, the first registration succeeds with Oracle Communicator, but reregistrations and presence subscriptions fail. Apply the same workaround (configure trusted host as described above) to resolve this issue.

27.2.4 Running the uninstall.sh Script in Text Mode Does Not Uninstall the Product

Perform uninstallation using the Administration Console to ensure that all components are uninstalled. Ensure that you use the same user privilege as when you installed.

27.2.5 SIP Monitor in F5 Networks BigIP Does Not Work in UDP Mode

When using the F5 Networks BigIP load balancer for a cluster of SIP engines and the SIP monitor in BigIP is used for failure detection, it must be configured to operate (sending OPTIONS requests) over TCP and not UDP. UDP mode will not work (the pool will indicate that the servers are down).

27.2.6 SIP Container Does Not Bind to IPV6 Interfaces for Listening on Windows

Due to limitations in the Windows IPv6 stack, the SIP Container cannot bind to IPv6 sockets for listening.

27.2.7 JAWS Unable to Read Some Install Screens

Due to an issue with the OWLCS Core Platform CIE-based installer, the JAWS tool cannot correctly read the installation screens. To work around this issue, you must run

the installer in silent mode. For information on Silent Mode installation, see *Oracle WebLogic Communication Services Installation Guide*.

27.2.8 Configure VoiceXML Driver Receive URLs Correctly

In a clustered (high-availability) environment with Oracle HTTP Server (OHS) configured, do not use the OHS port to configure the VoiceXML Driver Receive URLs. Using the OHS port to configure the VoiceXML Driver Receive URLs will cause a conflict with the drivers.

Each Voice XML Driver must be configured with its own WLS server's port (as described in the parameters' documentation).

27.3 Documentation Errata

This section details changes to the documentation since the last release. Topics include:

- Section 27.3.1, "Create a Basic SIP Domain"
- Section 27.3.2, "Create a Custom AUID with OCP (Presence)"
- Section 27.3.3, "Cannot Create a SIP Server Domain Using Default WebLogic Platform Components"

27.3.1 Create a Basic SIP Domain

Directions for creating a basic SIP Domain have changed slightly in this release. Please ensure that you follow these steps:

1. Start the configuration wizard located at `WLS_HOME/wlserver_10.3/common/bin/config.sh`. This location has changed since the last release.

2. Select *Create a New WebLogic Domain*, and click **Next**.

3. Select *Basic WebLogic SIP Server Domain*, and click **Next**.

   The rest of the process remains the same as before when creating a WLS Domain.

27.3.2 Create a Custom AUID with OCP (Presence)

Follow these steps to create custom AUIDs:

1. View the XML file for presence rules (`presrules_au.xml`). It is found in one of the following locations, depending on your installation:

   ```
   $ORACLE_HOME/j2ee/ocms/config/sdp/xcap
   $ORACLE_HOME/j2ee/home/config/sdp/xcap
   ```

   The file contains the following:

   - Name of the application (pres-rules)
   - Mime type
   - User Quota
   - List of schemas associated with the application's XML files

2. Create a similar file for the new application usage

3. For all the XSD files listed in the XML file above, create the XSD files and copy them to the XCAP config location mentioned in Step 1 above.

4. `cd $ORACLE_HOME/sdp/bin`

5. `./launch_sash.sh -a presenceapplication`

6. Provide admin credentials. At the sash prompt enter:

```
xcap appusage create applicationUsage=<new application usage name>
configurationFilename=<name of application usage XML file>
```

For instance, this command was run to create the pres-rules application usage:

```
xcap appusage create applicationUsage=pres-rules
configurationFilename=presrules_au.xml
```

7. To provision users for the new application usage, at the sash prompt enter:

```
xcap user add userName=<string> applicationUsage=<new application usage name>
.
<string> is of the form username@example.com (replace example.com with domain
for the deployment)
```

27.3.3 Cannot Create a SIP Server Domain Using Default WebLogic Platform Components

When running `config.sh` for SIP Server domain configuration, you can choose whether to use *WebLogic Platform Components* or a *Custom Template*. The default for Select Domain Source is to use *WebLogic Platform Components*. In previous releases, this selection worked, but does not in this release. You must select *Custom Template* in order to create a SIP Server domain.

28

Web Services Security and Administration

This chapter describes issues associated with Web services security and administration, including Oracle Web Services Manager. It includes the following topics:

- Section 28.18, "Patching of Patch Set 1 WebLogic Server Web Services Attached to Custom Polices With Patch Set 2 Oracle WSM Policy Manager"
- Section 28.19, "Custom Policy Fails When an Empty Subject Is Passed"
- Section 28.20, "Possible Issue When Using a csf-key When EJB Security Is Enabled"
- Section 28.21, "Best Practice For UDDI Publication"
- Section 28.22, "Possible Limitation When Using Custom Exactly-one Policies"

> **Note:** See also Section 11.33, "Upgrade Issues and Workarounds."

28.1 Using Multibyte User Credentials with wss_http_token_* Policy

In this release, multibyte user credentials are not supported for the wss_http_token_* policies. If multibyte user credentials are required, use a different policy, such as wss_username_token_* policy. For more information about the available policies, see "Predefined Policies" in the *Oracle Fusion Middleware Security and Administrator's Guide for Web Services*.

28.2 Importing Custom Policies Before Attaching and Deploying to a Service Application

It is recommended that you import custom policies before attaching and deploying them to a service application.

If you deploy an application with policies that do not exist in the Metadata Store (MDS), and subsequently import the policies, you need to restart the server for the policy attachment count to be updated.

28.3 Performing a Bulk Upload of Policies

When performing a bulk import of policies to the MDS repository, if the operation does not succeed initially, retry the operation until the bulk import succeeds.

For the most part, this can occur for an Oracle RAC database when the database is switched during the metadata upload. If there are *n* databases in the Oracle RAC database, then you may need to retry this operation *n* times.

For more information about bulk import of policies, see "Migrating Policies" in the *Oracle Fusion Middleware Security and Administrator's Guide for Web Services*.

28.4 Reviewing Policy Configuration Override Values After Detaching a Client Policy

If you attach a policy to a client, override policy configuration values, and subsequently detach the policy, the policy configuration override values are not deleted. When attaching new policies to this client, ensure that you review the policy configuration override values and update them appropriately.

28.5 Removing Post-deployment Customizations

When the connections.xml file is changed after deployment using the AdfConnection MBean, the complete connection is saved as a customization. This means that changes to the connection in a redeployed application are overwritten by the customization.

When you use Fusion Middleware Control to make changes to an application's connections.xml file after deployment, a new connections.xml file is created as a customization and stored in the MDS repository. This customization persists for the life of the application. Therefore, if you redeploy the application, the customized connections.xml file continues to be applied as a customization on the application.

To allow the redeployed application's connections.xml file to be applied without the prior customization (from Fusion Middleware Control), you must explicitly remove the `connections.xml` customizations from the MDS repository.

For example, if you deploy an application with a Web services data control, then use Fusion Middleware Control to attach the 'username token client policy', and subsequently detach the policy. Then, you return to JDeveloper to edit the application and attach the 'http token client policy', and redeploy the application. When you view the application using Fusion Middleware Control, you see that it is not using the 'http token client policy' that you attached. That is because it is using the customized connections.xml file that you previously created using Fusion Middleware Control.

If you remove the connections.xml customizations from the MDS repository, the application will use the its own connections.xml file.

28.6 Reviewing Localization Limitations

The following information is supported in **English only** in this release of Oracle Enterprise Manager:

- All fields in the policy and assertion template except the `orawsp:displayName` field.

- If using the `?orawsdl` browser address, the `orawsp:description` field.

- In the System MBean browser, the **Description** field in the `oracle.wsm.upgrade` Mbean.

28.7 When Using WLST to Import a Security Policy, the Same Policy May Be Repeatedly Imported

When WLST is used to import a security policy, be aware that the same policy may be repeatedly imported.

28.8 Identity in WSDLs Is Not Used for Enforcement with ADF DC Applications

For ADF DC applications, the identity extension in a WSDL (for example, the certificate published in the WSDL), cannot be used as a recipient certificate for message protection policies. Instead, either the recipient key alias (declarative configuration override) or the default recipient key alias specified in the policy are used.

28.9 JVM limitation for Kerberos Token Policy with Message Protection Policy

Within a JVM, the Kerberos acquire key works fine when there is only a single Web service principal. If there are additional Web service principals within the same JVM, the acquire key returns null. When a Web service and client exist in different JVMs, this is no longer an issue.

28.10 Fusion Middleware Control Does Not List Policies When Two Servers Are SSL Enabled (Two-way SSL)

When a Managed Server is Two-way enabled SSL (for example, a SOA server hosting Oracle WSM Policy Manager over Two-way SSL) and the Administration Server hosting Fusion Middleware Control is correctly configured to access the Two-way SSL-enabled Managed Server, Fusion Middleware Control still does not list the Oracle WSM policies.

28.11 Web Service Test Page Cannot Test Input Arguments Bound to SOAP Headers

For Web services that have any input arguments bound to SOAP headers, the Test Web Service page in the Fusion Middleware Control console cannot show the message. Therefore, such operations cannot be tested with the **Test Web Service** page.

For example, if the input for a multi-part WSDL is viewed through Fusion Middleware Control, and one input argument is bound to a SOAP header, the composite instance fails with the following exception because the other part of the message was missing in the input:

```
ORAMED-01203:[No Part]No part exist with name "request1" in source message
```

To resolve such an issue, select XML View for Input Arguments and edit the payload to pass input for both parts of the WSDL.

28.12 Possible Build Label Version and Date Discrepancy On the Policy Validator Page

The build label and date information on the Policy Manager Validation page represent the repository information and the version of the Policy Manager. The build label represents the Policy Manager build that populated the repository and the date is the date that the repository was last refreshed. If the repository is not refreshed during a sparse installation of Oracle Fusion Middleware 11gR1 PS2, the information will not change. Note that a typical installation of Oracle Fusion Middleware 11gR1 PS2 does not refresh the repository either.

28.13 Inconsistencies In Policy Usage Count For SOA Composites

As described in "Analyzing Policy Usage" in the *Oracle Fusion Middleware Security and Administrator's Guide for Web Services*, the policy usage counts displayed on the Usage Analysis page in the Fusion Middleware Control console include both enabled *and* disabled policy references. For SOA composites, however, the disabled policy references are not included in the usage count.

28.14 For WebLogic Server Web Services Endpoints, Policy Attachments Will Fail When Policies Have Spaces In the Policy Name

When using the Fusion Middleware Control console, you can create policies that have spaces in the policy name. However, such policies will fail when you attempt to attach them to WebLogic Server Web service endpoints. To resolve this issue, do not use spaces in your policy names.

28.15 WS-Atomic Transaction Headers Should Be Signed To Avoid Security Violation Errors

If the WS-Atomic Transaction client policy with an Oracle WSM message protection policy, such as `owsm wss11_message_protection`, is applied on the client side, then at runtime, the WS-Atomic Transaction interceptor adds a header `<CoordinationContext>` to SOAP messages. Also, the `CoordinationContext` element contains a sub-element that has an addressing namespace. The attached client policy specifies that addressing headers need to be signed; however, the client policy does not sign those sub-elements.

Oracle WSM policy compliance on the service-side requires that all header descendants must be signed. If Oracle WSM finds that not all headers are signed, it reports a security violation.

This issue can be avoided by adding the following namespace to the signed header list `http://schemas.xmlsoap.org/ws/2004/10/wscoor`. (This is similar to addressing headers that Oracle WSM policies already have.)

Oracle recommends always signing WS-Atomic Transaction headers to ensure integrity due to the nature of the contents.

28.16 Prefix of "policy:" In Oracle WSM Policies Attached to WebLogic Server Web Services From the WebLogic Server Administration Console

Oracle WSM policies that are attached to WebLogic Server Web services from the WebLogic Server Administration Console in 11*g* R1 or 11*g* R1 Patch Set 1 will show up with a `policy:` prefix, both in WLST and Fusion Middleware Control. As a result, there might some duplicates and inconsistencies.

For example, if `policy:oracle/wss_username_token_service_policy` was attached to a WebLogic Server Web Service using the WebLogic Server Administration Console console and is being viewed from Fusion Middleware Control, it will display as `policy:oracle/wss_username_token_service_policy`. And if you then attempt to attach the `oracle/wss_username_token_service_policy` policy, it will be deemed a duplicate.

Oracle recommends always using Fusion Middleware Control for Oracle WSM policy attachments and detachments.

28.17 When Adding SAML Issuer From Fusion Middleware Control the jps-config.xml File Is Incorrectly Updated

In release 11*g* R1 (11.1.1.1.0), when you try to add or edit a trusted issuer from the Fusion Middleware Control console, then the `jps-config.xml` file is incorrectly updated. As a workaround for this issue, Oracle recommends upgrading to 11*g* R1 Patch Set 2 (11.1.1.3.0).

28.18 Patching of Patch Set 1 WebLogic Server Web Services Attached to Custom Polices With Patch Set 2 Oracle WSM Policy Manager

Due to a new feature in 11*g* R1 Patch Set 2 (11.1.1.3.0), the "Shared policy store for Oracle Infrastructure Web services and WebLogic Server Web services", Weblogic Server Web services now utilize the Policy Manager by default to retrieve policies from the MDS repository. In Patch Set 1, Weblogic Server Web services used classpath mode by default.

After patching your Oracle Fusion Middleware 11*g* R1 software installation to Patch Set 2, if you have attached a *custom* Oracle WSM policy to a WebLogic Server Web service, you need to make sure your custom policy is stored in the MDS repository. Note that only custom policies in use need to be migrated. All seed policies will be available in the MDS repository out-of-the-box.

To migrate policies to the Metadata Services (MDS) repository, see "Maintaining the MDS Repository" in the *Security and Administrator's Guide for Web Services*.

28.19 Custom Policy Fails When an Empty Subject Is Passed

If an empty subject is passed to a custom policy, it fails with a generic error. To work around this issue, you can create and set an `anonymousSubject` inside the execute method of the custom step. For example:

```
javax.security.auth.Subject subject =
oracle.security.jps.util.SubjectUtil.getAnonymousSubject();
context.setProperty(oracle.wsm.common.sdk.IMessageContext.SECURITY_
SUBJECT,subject)
```

Note that in this example the context is of Type
`oracle.wsm.common.sdk.IContext`

28.20 Possible Issue When Using a csf-key When EJB Security Is Enabled

If a csf-key is provided for specifying the username and credentials on the Platform Policy Configuration tab in Fusion Middleware Control, the policy access point will not work correctly. The alternative is not to specify a csf-key.

The csf-key property name in the Platform Policy Configuration -> Policy Accessor Properties page is `jndi.lookup.csf.key`.

28.21 Best Practice For UDDI Publication

If your Web services are already in Oracle Enterprise Repository (OER), then you should use the OER Exchange Utility to publish those Web services to the Oracle Service Registry.

28.22 Possible Limitation When Using Custom Exactly-one Policies

In some cases, there can be a limitation when using custom Exactly-one policies. For a set of assertions within the exactly-one policy, if a request message satisfies the first assertion, then the first assertion gets executed and a response is sent accordingly. However, this may not be the desired behavior in some cases because the request may be intended for the subsequent assertions.

For example, you may have a client policy that has `Timestamp=ON` and a service exactly-one policy that has a `wss11 username token` with message protection assertions: the first has `Timestamp=OFF`; the second has `Timestamp=ON`. Therefore, the first assertion in the service exactly-one policy is not expecting the Timestamp in the request, yet the second assertion does expect it. In this case, the first assertion gets executed and the response is sent with no Timestamp. However, the client-side processing then fails because it expects the Timestamp that was sent in the request.

This limitation can exist with any cases where a client policy expects a greater number of elements to be signed and a service policy does not.

Part VII

Communication Services

Part VII contains the following chapters:

29

Oracle Complex Event Processing

This chapter describes issues associated with Oracle Complex Event Processing (Oracle CEP). It includes the following topics:

29.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

29.1.1 Deprecated API and Schemas

Table 29–1 lists Java API deprecated in 11g Release 1 (11.1.1) and the replacement API, if any.

Table 29–1   Deprecated Java API

Deprecated API	Replacement API
`com.bea.wlevs.ede.api.Stream`	`com.bea.wlevs.ede.api.EventChannel`
`com.bea.wlevs.ede.api.EventSender`	`com.bea.wlevs.ede.api.RelationSender`
	`com.bea.wlevs.ede.api.StreamSender`

Table 29–1   (Cont.) Deprecated Java API

Deprecated API	Replacement API
`com.bea.wlevs.ede.api.EventSink`	`com.bea.wlevs.ede.api.RelationSink` `com.bea.wlevs.ede.api.StreamSink`
`com.bea.wlevs.ede.api.EventSource`	`com.bea.wlevs.ede.api.RelationSource` `com.bea.wlevs.ede.api.StreamSource`

`com.bea.wlevs.management.configuration.StageMBean` methods relating to event record and playback	`com.bea.wlevs.management.configuration.RecordPlaybackMBean`
	
	`com.bea.wlevs.management.configuration.StageMBean` method `getRecordPlaybackMBean` returning `RecordPlaybackMBean`

Table 29–2 lists Oracle CEP schema deprecated in 11g Release 1 (11.1.1) and the replacement schema, if any.

Table 29–2   Deprecated Oracle CEP Schema

Deprecated Schema	Deprecated in Assembly File?	Deprecated in Component Configuration File?	Replacement Schema
`wlevs:stream`	Yes	Yes	`wlevs:channel`
`wlevs:metadata`	Yes	N/A	`wlevs:property`
`wlevs:function` attribute `epl-name`	Yes	N/A	`wlevs:function` attribute `function-name`
`wlevs:adapter` attribute `manageable`	Yes	N/A	None.
`wlevs:channel` attribute `manageable`	Yes	N/A	None.
`wlevs:adapter` attribute `monitoring`	N/A	Yes	None.
`wlevs:channel` attribute `monitoring`	N/A	Yes	None.
`wlevs:processor` attribute `monitoring`	N/A	Yes	None.

29.1.2 Adapter Changes

The programming model for adapters has changed as follows:

- Outbound Adapters
- Lifecycle Callback Methods for Adapters
- Runnable Adapters
- Adapter Factories
- Publishing Adapter Providers
- StockTick Event Type Replaced by OracleStockTick

Outbound Adapters

Adapters can now also be outbound; previously they were only inbound.

Lifecycle Callback Methods for Adapters

Spring tags for adapters now include attributes for setting lifecycle callback methods via the EPN assembly file.

Runnable Adapters

For adapters that want to run in a thread, their Java class should now implement
`com.bea.wlevs.ede.api.RunnableBean`.

Adapter Factories

Programmers are no longer required to create an adapter factory when creating
adapters. You only need to create an adapter factory if you want to share adapters
among applications.

Publishing Adapter Providers

Adapter providers are factories for adapters that are published through the OSGi
service registry.

Previously, the only way of advertising adapter providers was to use Spring-DM only,
like this:

```
<osgi:service interface="com.bea.wlevs.ede.api.AdapterFactory" ref="myBean">
    <osgi:service-properties>
        <entry key="type" value="SocketAdapterType"/>
    </osgi:service-properties>
</osgi:service>
```

However, Spring-DM does not support exporting and importing an OSGi service in
the same application so the above approach is deprecated.

Now, you should declare providers with the `wlevs:factory` tag like this:

```
<wlevs:factory provider-name="SocketAdapterType" ref="myBean">
```

This will work whether the adapters are in the same application or not.

Note that if your adapters and providers are collocated (both in the same application)
using a provider is optional; you could just instantiate the adapter directly.

Failure to make this change may result in an application that fails to start and
eventually times out.

StockTick Event Type Replaced by OracleStockTick

When using the loadgen adapter, note that the `StockTick` event is now named
`OracleStockTick`.

29.1.3 New and Deprecated Options in the Deployer Tool

The Deployer tool includes the following changes in this release:

- Section 29.1.3.1, "Suspend and Resume Commands"
- Section 29.1.3.2, "Start and Stop Commands are Deprecated"
- Section 29.1.3.3, "Password Argument Deprecated"

For more information, see "Deployer Command-Line Reference" in the *Oracle CEP
Administrator's Guide*.

29.1.3.1 Suspend and Resume Commands

The Deployer tool has two new options: `-suspend` and `-resume`. Users should use
`-suspend` to suspend a currently running application, and `-resume` for it to resume
running.

29.1.3.2 Start and Stop Commands are Deprecated

The `-start` and `-stop` commands of the Deployer tool have been deprecated.

When using the `-install` command to install an application, Oracle CEP automatically starts it after all internal initialization tasks have completed. Subsequently, if you stop and start the Oracle CEP server instance, the application is automatically stopped and started, respectively.

29.1.3.3 Password Argument Deprecated

The `-password` argument is deprecated and may be removed in a later release. Oracle recommends that you not use this argument.

29.1.4 Changes in Management, Monitoring, and JMX

The management framework of Oracle CEP has been overhauled in this release.

Oracle CEP no longer supports the JRMP protocol. Instead, JMX clients must use the more secure MSA protocol for both local and remote access to the Oracle CEP JMX server. When you connect to the Oracle CEP JMX server that is running on `localhost` or on a remote host, you must always use the JMX URL `service:jmx:msarmi://HOST-NAME:PORT/jndi/jmxconnector` so that you are always using the MSA connector (where *HOST-NAME* is either `localhost` or the name of the remote host and *PORT* is the Oracle CEP server JNDI port).

For more information, see:

- "Accessing the Oracle CEP JMX Server" in the *Oracle CEP Administrator's Guide*
- "Configuring JMX" in the *Oracle CEP Administrator's Guide*

29.1.5 Using stopwlevs.sh With Multiple Servers on the Same Host

Consider a scenario where you start two servers on the same host, for example, with server 1 listening on port 9002 and server 2 listening on port 9022. If you then use `stopwlevs.sh` in the server 1 domain directory, the server listening on port 9002 is stopped. If you then use `stopwlevs.sh` in the server 2 domain directory, the stop operation fails due to connection reset error.

Workaround: use the `stopwlevs.sh` command line argument `-url` or `-listenPort` to specify a port other than 9002.

29.1.6 Underestimated Latency For Application-Timestamped Channels

The monitor service may underestimate the latency time of events that are being processed through the CQL processor when application-timestamped channels are being used and is-totally-ordered is not enabled.

29.1.7 JConsole Connection may Throw Benign Null Pointer Exceptions

When you connect to Oracle CEP server using JConsole (with or without the `wlevsjconsole.sh` script), JConsole may throw a `java.lang.NullPointerException`.

Workaround: click **OK** in the exception dialog box and proceed. The exception does not affect the JMX connection or Oracle CEP server.

29.1.8 Variable Duration Non-Event Detection is not Supported

Fixed duration non-event pattern detection *is* supported in 11g Release 1 (11.1.1). When you create a query for fixed duration non-event detection, you may use the `DURATION` clause with constant value and time unit, such as `DURATION 5 SECONDS`, or just a constant value such as `DURATION 5`.

Variable duration non-event pattern detection is *not* supported in 11g Release 1 (11.1.1). That is, you may *not* use the `DURATION` clause with an arbitrary arithmetic expression, such as `DURATION c1+4`.

Recurring non-event pattern detection *is* supported in 11g Release 1 (11.1.1) but only for the fixed duration case. That is, you may use a `DURATION` clause with a `MULTIPLES OF` clause but only for a duration that is a constant value.

29.1.9 JMSAdapterMBean Methods for New Connection, User, and Password

The following methods have been added to `com.bea.wlevs.management.configuration.JMSAdapterMBean`:

- `getConnectionUser`
- `getConnectionPassword`
- `getConnectionEncryptedPassword`

The following attributes have been added to the `wlevs_application_config.xsd` element `jms-adapter`:

- `connection-user`
- `connection-password`
- `connection-encrypted-password`

When Oracle CEP acquires the JNDI `InitialContext`, it uses the `user` and `password` (or `encrypted-password`) settings.

When Oracle CEP calls the `createConnection` method on the `javax.jms.ConnectionFactory` to create a connection to the JMS destination (JMS queue or topic), it uses the `connection-user` and `connection-password` (or `connection-encrypted-password`) settings, if configured. Otherwise, Oracle CEP uses the `user` and `password` (or `encrypted-password`) settings.

You can use the `connection-user` and `connection-password` (or `connection-encrypted-password`) settings in applications where one security provider is used for JNDI access and a separate security provider is used for JMS access.

29.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 29.2.6, "Exceptions Thrown When Using Oracle CEP Visualizer with FireFox"

- Section 29.2.7, "Multi-Byte Characters are not Supported by loadgen"

- Section 29.2.8, "Oracle CEP Server Cannot Start if Keystore and Private Key Passwords are Different"

- Section 29.2.9, "Configuring Oracle CEP Server to use the Sun JVM"

- Section 29.2.10, "Oracle CEP Applications as Web Service Provider Requires JDK 1.6.0_14 or Higher"

- Section 29.2.11, "Configuration Wizard Fails to Create Domain on Alternate Mount Points"

- Section 29.2.12, "Suspending and Resuming the Oracle CEP Server is not Supported by Oracle High Availability"

- Section 29.2.13, "Simultaneous Secondary Failure May Result in Deadlock Using Oracle High Availability"

- Section 29.2.14, "Set Production Oracle CEP Servers to Log Levels Higher Than NOTICE Only"

- Section 29.2.15, "Change Default User Name and Password After Installation."

- Section 29.2.16, "Oracle CEP Visualizer com.bea.wlevs.visualizer.help Bundle Startup Fails"

- Section 29.2.17, "Oracle CQL Sample Built With build.xml File Fails to Deploy"

- Section 29.2.18, "Cannot Start Server With Security Disabled in a User-Configured Domain."

- Section 29.2.19, "Do Not Terminate the Full Pathname of a New Domain With a Slash."

- Section 29.2.20, "Enabling and Disabling Configuration History Management"

- Section 29.2.21, "Manually Refresh Oracle CEP Visualizer Panels After Upgrade or Adding Oracle CQL Queries"

- Section 29.2.22, "Simultaneous Updates From Multiple Servers in a Cluster are not Supported"

29.2.1 Accessing Signal Generation Dashboard With Firefox Version 3.0

When accessing the signal generation example dashboard (at URL `http://localhost:9002/signalgeneration/dashboard.html`) using the Firefox browser version 3.0 on Windows, you will get an error when you click **Start**.

Workaround: use Internet Explorer version 7 to access the signal generation example dashboard.

29.2.2 VPN Software and Multicast Traffic

Active VPN software is known to have unpredictable behavior on multicast traffic. Additionally, having both Cisco VPN and Nortel VPN installed breaks multicast traffic.

29.2.3 Starting Oracle CEP Visualizer With Firefox

When using Oracle CEP Visualizer with the Firefox browser (version 3.0, SSL, and JDK 1.6), the first time you access a Oracle CEP Visualizer page it will render slowly, sometimes up to 30 seconds.

29.2.4 Uploading Files Using Oracle CEP Visualizer, Firefox, and SSL

When using Oracle CEP Visualizer, you may get an error if you try to upload a file using the Firefox browser and SSL.

This is a known problem (`http://bugs.adobe.com/jira/browse/FP-226`) with Adobe Flex that affects Oracle CEP Visualizer.

29.2.5 Foreign Stage Channels Cannot be Connected to an Oracle CQL Processor

If a channel is connected to an Oracle CQL processor, it cannot be a foreign stage.

29.2.6 Exceptions Thrown When Using Oracle CEP Visualizer with FireFox

When using Oracle CEP Visualizer with FireFox:

- Do not set the Jetty scratch directory to a path with a space in it. Doing so will cause `FileNotFoundException`.

- Ignore `EOFException` thrown on the server side; these exceptions will not cause client side failure.

29.2.7 Multi-Byte Characters are not Supported by loadgen

The loadgen utility supports only ASCII characters. It does not support multi-byte character sets.

29.2.8 Oracle CEP Server Cannot Start if Keystore and Private Key Passwords are Different

The passwords for the keystore and the alias for the SSL private key must be the same. If they are not, the Oracle CEP Server will not start.

29.2.9 Configuring Oracle CEP Server to use the Sun JVM

Typically, when you install Oracle CEP server, you configure Oracle CEP server to use the bundled JRockit SDK 1.6.0_05. Alternatively, you can configure Oracle CEP server to use a supported Sun Microsystems JDK.

How to configure Oracle CEP Server for use with the Sun JVM:

1. Install the appropriate Sun JDK.

   For more information, see:

   - `http://www.oracle.com/technology/software/products/ias/files/oracle%20fusion%20middleware%2011gr1%20%2811%201%201%201%200%29%20certification%20matrix.xls`

   - `http://java.sun.com/javase/downloads/index.jsp`.

2. Using the editor of your choice, open the `setDomainEnv.sh` or `setDomainEnv.cmd` script for the affected Oracle CEP sever.

This script is located in the server directory under the main domain directory. For example, the default server directory of the `HelloWorld` domain is located in `ORACLE_CEP_HOME`/ocep_11.1/samples/domains/helloworld_domain/defaultserver, where `ORACLE_CEP_HOME` refers to the main Oracle CEP installation directory, such as `/oracle_cep`.

3. Edit this script to set the `JAVA_HOME` variable to your JDK 1.6.0_11 installation:

   ```
   JAVA_HOME=/scratch/jdk/jdk_1.6.0_11
   ```

4. Save and close the script.

5. Using the editor of your choice, open the `startwlevs.sh` or `startwlevs.cmd` script for the affected Oracle CEP sever.

   This server start script is located in the server directory under the main domain directory. For example, the default server directory of the `HelloWorld` domain is located in `ORACLE_CEP_HOME`/ocep_11.1/samples/domains/helloworld_domain/defaultserver, where `ORACLE_CEP_HOME` refers to the main Oracle CEP installation directory, such as `/oracle_cep`.

6. Edit this script to add the following properties to the `JVM_ARGS` variable:

   ```
   ...
   JVM_ARGS=-XX:+UnlockDiagnosticVMOptions -XX:+UnsyncloadClass -Xms512m
   ...
   ```

7. Save and close the script.

8. Start the affected Oracle CEP server using the modified `startwlevs.sh` or `startwlevs.cmd` script.

29.2.10 Oracle CEP Applications as Web Service Provider Requires JDK 1.6.0_14 or Higher

To configure an Oracle CEP application as a Web service provider, you must use JDK 1.6.0_14 or above.

29.2.11 Configuration Wizard Fails to Create Domain on Alternate Mount Points

If you install Oracle CEP on one mount point, such as `/opt`, and you run the `ORACLE_CEP_HOME`/ocep_11.1/common/bin/config.sh to create a domain and you specify some other mount point, such as `/dev` (where `/dev` and `/opt` represent two different hard disks), when you enter the name of the new domain and the full pathname of its domain location, the configuration wizard will fail to create the domain with a `ConfigGeneratorException`.

In this release, you may only create domains on the same mount point as the one on which you installed Oracle CEP.

29.2.12 Suspending and Resuming the Oracle CEP Server is not Supported by Oracle High Availability

In this release, you may not suspend or resume an Oracle CEP server with an Oracle high availability-enabled application. That is, you may not use the commands:

```
kill -s STOP CEP_SERVER_PID
kill -s CONT CEP_SERVER_PID
```

Where `CEP_SERVER_PID` is the process ID of the Oracle CEP server.

29.2.13 Simultaneous Secondary Failure May Result in Deadlock Using Oracle High Availability

In the rare case that two secondary servers fail simultaneously, there is a possibility that Oracle Coherence will encounter a deadlock and Oracle high availability failover will not succeed.

Workaround:

1. Shutdown all the servers in the Oracle high-availability deployment group.

   This will also shutdown Oracle Coherence.

2. Restart all the servers in the Oracle high-availability deployment group.

   This will also restart Oracle Coherence.

29.2.14 Set Production Oracle CEP Servers to Log Levels Higher Than NOTICE Only

In a production system, ensure that the log level is set to `NOTICE` or higher (that is `NOTICE`, `WARNING`, `ERROR`, `CRITICAL`, `ALERT`, or `EMERGENCY`) for both security and performance reasons.

For more information, see "Using Log Severity Levels" in the *Oracle CEP Administrator's Guide*.

29.2.15 Change Default User Name and Password After Installation

As part of the installation process, the installer creates a default domain named `ocep_domain` under `ORACLE_CEP_HOME/user_projects/domains`. Oracle recommends that you to change the default user name and password for this domain after installation is completed.

For more information, see "How to Change the Password of a User" in the *Oracle CEP Visualizer User's Guide*.

29.2.16 Oracle CEP Visualizer com.bea.wlevs.visualizer.help Bundle Startup Fails

When you first start up the Oracle CEP server, under some conditions, deployment of the Oracle CEP Visualizer `com.bea.wlevs.visualizer.help` bundle may timeout and fail with a server log error like:

```
Critical error in OHW configuration. Config URL: null
```

Workaround:

1. Stop the Oracle CEP server.

2. Delete the *ORACLE_CEP_HOME*`/user_projects/domains/ocep_domain/`*SERVER_NAME*`/Jetty` directory and its contents.

3. Start the Oracle CEP server.

29.2.17 Oracle CQL Sample Built With build.xml File Fails to Deploy

If you build the Oracle CQL sample using the *ORACLE_CEP_HOME*`\ocep_11.1\samples\source\applications\cql\build.xml` file and try to deploy the *ORACLE_CEP_HOME*`\ocep_11.1\samples\source\applications\cql\dist\com.bea.wlevs.example.cql_11.1.1.1_0.jar` file, the deployment will fail.

Workaround: edit the *ORACLE_CEP_HOME*\ocep_ 11.1\samples\source\applications\cql\build.xml file and in target copyfiles, change the includes attribute on line 61 to read includes="**/*" as Example 29–1 shows:

Example 29–1   Oracle CQL Sample build.xml

```
...
    <target name="copyfiles">
        <mkdir dir="${output.dir}/META-INF/spring" />
        <copy todir="${output.dir}/META-INF/spring">
            <fileset dir="META-INF/spring" includes="*" />
        </copy>
        <mkdir dir="${output.dir}/META-INF/wlevs" />
        <copy todir="${output.dir}/META-INF/wlevs">
            <fileset dir="META-INF/wlevs/" includes="**/*" />
        </copy>
    </target>
...
```

29.2.18 Cannot Start Server With Security Disabled in a User-Configured Domain

If you use the configuration wizard to create your own domain (such as *ORACLE_ CEP_HOME*/my_projects/my_domains/mydomain/myserver), you cannot start the Oracle CEP server with security disabled by adding -disablesecurity to the server startup command line.

Workaround: to start the server with security disabled, edit the startwlevs.sh file to add the -disablesecurity argument as Example 29–2 shows:

Example 29–2   Adding the -disablesecurity Argument to the startwlevs.sh File

```
"$JAVA_HOME/bin/java" $JVM_ARGS $DEBUG_ARGS -Dwlevs.home="$USER_INSTALL_DIR"
-Dbea.home="$BEA_HOME"  -jar "${USER_INSTALL_DIR}/bin/wlevs.jar" -disablesecurity
$ARGS
```

For more information, see "Creating an Oracle CEP Standalone-Server Domain Using the Configuration Wizard in Graphical Mode" in the *Oracle CEP Administrator's Guide*.

29.2.19 Do Not Terminate the Full Pathname of a New Domain With a Slash

When using the Configuration Wizard to create a new domain, when prompted for the full pathname to the new domain, do not terminate the pathname with a Linux file separator character (/).

For example, enter this:

```
/cep/user_projects/domains
```

Do not enter this:

```
/cep/user_projects/domains/
```

29.2.20 Enabling and Disabling Configuration History Management

By default, Oracle CEP provides resource and application configuration history management.

Optionally, you can disable this feature by editing the *ORACLE-CEP-HOME*/user_ projects/domains/ocep_domain/*SERVER*/startwlevs.sh file and adding the com.oracle.ocep.config.version.enabled system property to the last line:

```
"$JAVA_HOME/bin/java" $JVM_ARGS $DEBUG_ARGS -Dwlevs.home="$USER_INSTALL_DIR"
-Dcom.oracle.ocep.config.version.enabled=false -Dbea.home="$BEA_HOME"  -jar
"${USER_INSTALL_DIR}/bin/wlevs.jar" $ARGS
```

If you disable this feature, Oracle CEP cannot propagate rules amongst the Oracle CEP servers in a multi-server domain. In this case, to propagate rule changes, you must manually update the rules in all the servers of a multi-server domain.

If you disable this feature and then wish to re-enable it, you must do so as follows:

1. Undeploy your Oracle CEP application.

2. Shutdown the Oracle CEP server.

3. Edit the startwlevs.sh file to either remove the -Dcom.oracle.ocep.config.version.enabled system property or set it to true.

4. Start the Oracle CEP server.

5. Deploy your Oracle CEP application.

Failure to do so may cause rule propagation to fail in a multi-server domain and may prevent the Oracle CEP Visualizer from maintaining a consistent view of the Oracle CEP servers in a multi-server domain.

29.2.21 Manually Refresh Oracle CEP Visualizer Panels After Upgrade or Adding Oracle CQL Queries

Before upgrading an Oracle CEP application, be sure to close all open panels. Failure to do so may leave some panels in a disabled state.

When using the Oracle CEP Visualizer to add or remove Oracle CQL queries or views in an Oracle CEP application that is deployed in a multi-server domain, before you can see the change in the Oracle CEP Visualizer Oracle CQL Rules Tab, you must click either of the **View** or **Query** radio buttons and then click the **All Rules** radio button.

29.2.22 Simultaneous Updates From Multiple Servers in a Cluster are not Supported

In a multi-server domain, you may not issue updates from more than one Oracle CEP server at a time.

For example, you cannot modify Oracle CQL rules on one server at the same time as modifying Oracle CQL rules on another server.

This applies to any configuration management operation such as rules, high-availability adatper changes, and so on.

29.3 Documentation Errata

This section describes documentation errata. It includes the following topics:

- Section 29.3.1, "Oracle CQL Example Uses orderData.prop not data-aggre.prop"

- Section 29.3.2, "Event Record and Playback Example Uses Default Berkeley Database"

- Section 29.3.3, "Deployment to a Group is Supported Only in a Multi-Server Domain"

- Section 29.3.4, "Oracle CEP Java Types [C and [B Should be char[] and byte[]"

- Section 29.3.5, "Oracle CEP Support for IPv4 and IPv6"

- Section 29.3.6, "Configuring an EventPartitioner on a Channel"

- Section 29.3.7, "Event Processing Network Editor Screen Captures Show Unsupported Event Types Tab"

- Section 29.3.8, "Oracle Spatial Data Cartridge Namespace Configuration"

29.3.1 Oracle CQL Example Uses orderData.prop not data-aggre.prop

In section "To test the missing event query" in the *Oracle CEP Getting Started*, step 3 should read:

1. ...

2. ...

3. Run the load generator using the `orderData.prop` properties file:

    a. On Windows:

        ```
        prompt> runloadgen.cmd orderData.prop
        ```

    b. On UNIX:

        ```
        prompt> runloadgen.sh orderData.prop
        ```

29.3.2 Event Record and Playback Example Uses Default Berkeley Database

The first paragraph in "Event Record and Playback Example" in the *Oracle CEP Getting Started* should read as follows:

"The record and playback example shows how to configure a component to record events to an event store and then configure another component in the network to playback events from the store. The example uses the Oracle CEP-provided default Berkeley database to store the events. The example also shows how to configure a publishing HTTP pub-sub adapter as a node in the event processing network."

Example 3-11 "recplay Application Configuration File config.xml: adapter Element" in the *Oracle CEP Getting Started* should read as follows:

```
<adapter>
     <name>simpleEventSource</name>
     <record-parameters>
       <dataset-name>recplay_sample</dataset-name>
       <event-type-list>
           <event-type>SimpleEvent</event-type>
       </event-type-list>
       <batch-size>1</batch-size>
       <batch-time-out>10</batch-time-out>
     </record-parameters>
</adapter>
```

The following paragraph and Example 3-12 "recplay Oracle CEP Server Configuration File config.xml: data-source and rdbms-event-store-provider Elements" in the *Oracle CEP Getting Started* should be omitted:

"The **Provider Name** contains the value of the `rdbms-event-store-provider` child element `name` which corresponds to the `data-source` child element `name` as Example 3-12 shows."

The `provider-name` element is optional: by omitting this element, Oracle CEP uses the default Berkeley Database configuration that Oracle CEP provides. Oracle recommends that you use this default Berkeley Database configuration.

29.3.3 Deployment to a Group is Supported Only in a Multi-Server Domain

You may only deploy to a group if the target Oracle CEP server is part of a multi-server domain (that is, if clustering is enabled). You may not deploy to a group if the target Oracle CEP server is part of a standalone-server domain (that is, if clustering is disabled). For more information, see "Overview of Oracle CEP Multi-Server Domain Administration" in the *Oracle CEP Administrator's Guide*.

The following documentation should note this group deployment restriction:

- Table B-3, "Deployment Commands" in the *Oracle CEP Administrator's Guide*.
- "To deploy an Oracle CEP application using the Deployer utility" in the *Oracle CEP Developer's Guide for Eclipse*, step 5.
- "Deploying an Application in a Standalone-Server Domain" in the *Oracle CEP Visualizer User's Guide*.
- "Deploying an Application in a Multi-Server Domain" in the *Oracle CEP Visualizer User's Guide*.

29.3.4 Oracle CEP Java Types [C and [B Should be char[] and byte[]

Example 9-9 "EPN Assembly File event-type element for a Table" in the *Oracle CEP Developer's Guide for Eclipse* should read:

```
<wlevs:event-type-repository>
    ...
    <wlevs:event-type type-name="StockEvent">
        <wlevs:properties>
            <wlevs:property name="symbol" type="char[]" length="16" />
            <wlevs:property name="exchange" type="char[]" length="16" />
        </wlevs:properties>
    </wlevs:event-type>
    ...
</wlevs:event-type-repository>
```

In Table 9-2 "EPN Assembly File event-type Element Property Attributes" in the *Oracle CEP Developer's Guide for Eclipse*, the row for attribute `type` should read:

"The Oracle CEP Java type from Table 10–3 that corresponds to the column's SQL data type.In Example 10–4, the type value for column symbol is char[]."

In Table 9-3 "SQL Column Types and Oracle CEP Type Equivalents" in the *Oracle CEP Developer's Guide for Eclipse*:

- All occurrences of `[C` should read `char[]`
- All occurrences of `[B` should read `byte[]`

29.3.5 Oracle CEP Support for IPv4 and IPv6

The *Oracle CEP Administrator's Guide* does not indicate that Oracle CEP does not support IPv6. It should read as follows:

29.3.5.1 IPv4 and IPv6 Support

Oracle CEP server is certified for use with IPv4 only or IPv4/IPv6 dual-stack.

Oracle CEP does not support IPv6.

For more information about IPv6, see RFC 2460: Internet Protocol, Version 6 (IPv6) Specification (`http://www.ietf.org/rfc/rfc2460.txt`).

29.3.6 Configuring an EventPartitioner on a Channel

In "Event Partitioner Channel" in the *Oracle CEP Developer's Guide for Eclipse*, paragraphs two and three should read as follows:

"When you configure a channel to use the default `EventPartitioner`, you specify the name of an event property by which the channel partitions events. The default `EventPartitioner` calculates a hash key using the event property value's `Object.hashCode()` as input to an internal hash function. The `hashkey % number-of-listeners` is used to calculate which listener will receive the event. This algorithm is based on the same algorithm used by `HashMap` to calculate in which bucket to place a new item. In practice, this means events with the same event property value are sent to the same listener.

> **Note:** The default event property-based `EventPartitioner` does not dispatch in Round Robin fashion.

When using an event partitioner channel, if you want to perform load balancing, then each listener must be identical.

Otherwise, listeners need not be identical."

In "How to Configure Scalability With an Event Partitioner Channel" in the *Oracle CEP Developer's Guide for Eclipse*, Step 4 should read as follows:

"Edit the EPN assembly file to add a `partitionByEventProperty` instance property to the channel element.

The `value` of this `instance-property` is the name of the event property by which the channel partitions events.

In this example, the channel partitions events by event property `symbol`."

And Example 19-2, "Channel eventPartiner Instance Property" should read as follows:

```
...
    <wlevs:channel id="EventPartitionerChannel" event-type="PriceEvent">
        <wlevs:instance-property name="partitionByEventProperty" value="symbol" />
        <wlevs:listener ref="processor1" />
        <wlevs:listener ref="processor2" />
        <wlevs:listener ref="processor3" />
        <wlevs:source ref="inbound" />
    </wlevs:channel>
...
```

29.3.7 Event Processing Network Editor Screen Captures Show Unsupported Event Types Tab

In screen captures of the Event Processing Network (EPN) editor, an Event Types tab is shown. This tab is not supported in this release and does not appear in the actual Oracle CEP IDE for Eclipse.

29.3.8 Oracle Spatial Data Cartridge Namespace Configuration

In "How to Configure Oracle Spatial Data Cartridge Application Context" in the *Oracle CEP Developer's Guide for Eclipse*, the step after step 2 should read as follows:

"Edit the EPN file to add the required namespace and schema location entries as the following example shows:

```
<?xml version="1.0" encoding="UTF-8"?>
<beans xmlns="http://www.springframework.org/schema/beans"
       xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
       xmlns:osgi="http://www.springframework.org/schema/osgi"
       xmlns:wlevs="http://www.bea.com/ns/wlevs/spring"
       xmlns:spatial="http://www.oracle.com/ns/ocep/spatial"
       xsi:schemaLocation="
  http://www.springframework.org/schema/beans
  http://www.springframework.org/schema/beans/spring-beans.xsd
  http://www.springframework.org/schema/osgi
  http://www.springframework.org/schema/osgi/spring-osgi.xsd
  http://www.bea.com/ns/wlevs/spring
  http://www.bea.com/ns/wlevs/spring/spring-wlevs-v11_1_1_3.xsd"
  http://www.oracle.com/ns/ocep/spatial
  http://www.oracle.com/ns/ocep/spatial/ocep-spatial.xsd">
```

"

In "Oracle Spatial Data Cartridge Application Context" in the *Oracle CEP CQL Language Reference*, paragraph one should read as foolws:

"You can define an application context for an instance of an Oracle Spatial data cartridge and propagate this application context at runtime. This allows you to associate specific Oracle Spatial application defaults (such as an SDO_SRID) with a particular Oracle Spatial data cartridge instance.

Before you can define an Oracle Spatial data cartridge application context, edit your Oracle CEP application EPN assembly file to add the required namespace and schema location entries as the following example shows:

```
<?xml version="1.0" encoding="UTF-8"?>
<beans xmlns="http://www.springframework.org/schema/beans"
       xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
       xmlns:osgi="http://www.springframework.org/schema/osgi"
       xmlns:wlevs="http://www.bea.com/ns/wlevs/spring"
       xmlns:spatial="http://www.oracle.com/ns/ocep/spatial"
       xsi:schemaLocation="
  http://www.springframework.org/schema/beans
  http://www.springframework.org/schema/beans/spring-beans.xsd
  http://www.springframework.org/schema/osgi
  http://www.springframework.org/schema/osgi/spring-osgi.xsd
  http://www.bea.com/ns/wlevs/spring
  http://www.bea.com/ns/wlevs/spring/spring-wlevs-v11_1_1_3.xsd"
  http://www.oracle.com/ns/ocep/spatial
  http://www.oracle.com/ns/ocep/spatial/ocep-spatial.xsd">
```

"

30

Oracle User Messaging Service

This chapter describes issues associated with Oracle User Messaging Service. It includes the following topics:

- Section 30.1, "General Issues and Workarounds"
- Section 30.2, "Configuration Issues and Workarounds"

30.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topic:

- Section 30.1.1, "Permission Grants for Upgraded Domains"
- Section 30.1.2, "XML File Handle Left Open after Upload Fails"
- Section 30.1.3, "Messages Metrics Rendered as Unavailable in the Performance Page for User Messaging Server"
- Section 30.1.4, "User Messaging Service URLs Unavailable After Restart"
- Section 30.1.5, "User Preferences User Interface Renders Improperly"

30.1.1 Permission Grants for Upgraded Domains

In order for Oracle User Messaging Service to run as a specific user, a code-based permission grant is required. This grant is pre-seeded in WebLogic domains that are created *after* the Fusion Middleware 11gR1 Patch Set 2 upgrade.

If you created a WebLogic domain prior to the Patch Set 2 upgrade, you must manually add this grant by running the following Oracle Platform Security Services (OPSS) WLST commands in online (connected) mode:

```
 wls:/mydomain/serverConfig>
grantPermission(codeBaseURL="file:${ums.oracle.home}/communications/modules/oracle.sdp.client_
11.1.1/-",
permClass="oracle.security.jps.JpsPermission",permTarget="IdentityAssertion",
permActions="execute")

 wls:/mydomain/serverConfig>
grantPermission(codeBaseURL="file:${ums.oracle.home}/communications/modules/oracle.sdp.messaging_
11.1.1/-",
permClass="oracle.security.jps.JpsPermission",permTarget="IdentityAssertion",
permActions="execute")
```

See *Oracle WebLogic Fusion Middleware Scripting Tool Command Reference* for information regarding `grantPermission`

30.1.2 XML File Handle Left Open after Upload Fails

If an error occurs when uploading a user messaging preferences XML file using the WLST `manageUserMessagingPrefs` command, the XML file handle is left open. On the Microsoft Windows platform, this file cannot be deleted until you exit the WLST shell.

30.1.3 Messages Metrics Rendered as Unavailable in the Performance Page for User Messaging Server

When no metric data is found, for example when no messages have been sent or received after server setup, the Metrics Performance page will display *Unavailable*. This is not a problem with the software, and the Performance reporting is operating properly. As soon as *Send* and *Receive* traffic exists, the Performance page will display results normally.

30.1.4 User Messaging Service URLs Unavailable After Restart

Upon restarting the User Messaging Service server (*usermessagingserver*) from Oracle Enterprise Manager Fusion Middleware Control or through Oracle WebLogic Console, you may get an error: `Error 503--Service Unavailable` when attempting to access any URLs served by the User Messaging Service server, such as the User Preferences UI (*/sdpmessaging/userprefs-ui*) or the various Web Services endpoints. This error occurs intermittently in cases when the Oracle WebLogic Server is heavily loaded (such as with a SOA instance). To work around this issue:

- Restart the User Messaging Service server again (two or more restarts may be required).

- If multiple User Messaging Service server restarts are not sufficient, then restart the entire Oracle WebLogic Server instance.

30.1.5 User Preferences User Interface Renders Improperly

Intermittent UI rendering errors have been reported in some languages, due to the generation of a corrupted .css file. If you experience problems, follow these steps to work around the issue:

1. Delete the cached, auto-generated .css file for the affected locale (or simply, all locales) on the server located at `DOMAIN_HOME/servers/<server_name>/tmp/_WL_user/usermessagingserver/<random_name>/public/adf/styles/cache` and restart the *usermessagingserver* application using Oracle Enterprise Manager Fusion Middleware Control. Have all users clear their browser caches.

   The next time the UI is accessed from a browser, a new .css file will be generated for the desired locale, and it is very likely that it will be a valid .css file. If not, repeat this process a couple of times.

2. If the previous solution does not work, disable content compression in the `web.xml` file of the User Preferences Web Module located at `DOMAIN_HOME/servers/<server_name>/tmp/_WL_user/usermessagingserver/<random_name>/sdpmessaginguserprefs-ui-web.war`. In particular, extract `web.xml`, add the following `<context-param/>` to it:

```
<context-param>
  <param-name>org.apache.myfaces.trinidad.DISABLE_CONTENT_
COMPRESSION</param-name>
```

```
      <param-value>true</param-value>
</context-param>
```

Then, re-archive it to the war module.

Finally, restart the *usermessagingserver* application using Oracle Enterprise Manager Fusion Middleware Control.

30.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 30.2.1, "Reconfigure Drivers After PS2 Patch"
- Section 30.2.2, "Migrate Custom Business Terms After PS2 Patch"
- Section 30.2.3, "Use Correct SSL Trust Store When Configuring Drivers"
- Section 30.2.4, "User Messaging Service Driver Configuration Changes Not Immediately Effective"
- Section 30.2.5, "Email Notifications Sent Even if You Do Not Change Default Parameters in driverconfig.xml"

30.2.1 Reconfigure Drivers After PS2 Patch

After installing the PS2 patch, you must manually reconfigure your drivers, using Oracle Enterprise Manager Fusion Middleware Control. You can retrieve a backup file of your previous driver configuration at: `$DOMAIN_HOME/config/fmwconfig/servers/<ServerName>/applications/<DriverName>/configuration/driverconfig.xml.bak`

Restart your servers after making any changes!

30.2.2 Migrate Custom Business Terms After PS2 Patch

After installing the PS2 patch, you must re-create any custom-built business terms using Oracle Enterprise Manager Fusion Middleware Control. A copy of the custom-built business terms is available at: `$DOMAIN_HOME/config/fmwconfig/servers/<ServerName>/applications/usermessagingserver/configuration/businessterms.xml.bak`

Restart your servers after making any changes!

> **Note:** New, pre-seeded business terms have been introduced in this release. Do not overwrite the upgraded (PS2) file with a PS1 backup (the new terms will be lost, otherwise).

30.2.3 Use Correct SSL Trust Store When Configuring Drivers

Before configuring any User Messaging Service Driver (such as the Email Driver) to connect to a remote gateway using SSL, ensure that the correct SSL Trust Store is used:

Update the value of the JVM system property (*javax.net.ssl.trustStore*) set in `$DOMAIN_HOME/bin/setDomainEnv.sh` (or Windows equivalent).

30.2.4 User Messaging Service Driver Configuration Changes Not Immediately Effective

When you change a driver's configuration and then restart the driver, the changes will not take effect until all managed connections in the pool are destroyed (900 seconds [15 minutes] by default). Take one of these actions to ensure that the connections are destroyed:

- When performing driver configuration changes, stop the driver application and wait for 15 minutes. Then re-start the driver application.

    > **Note:** If you follow this recommendation and the wait time of 900 seconds (15 minutes) is too long, you can reduce the time using the Oracle WebLogic Server Administration Console as follows:
    >
    > 1. Click **Deployments**.
    > 2. Select the desired User Messaging Service Driver deployment.
    > 3. Click the **Resource Adapter Type** module.
    > 4. Click **Configuration > Outbound Connection Pools**.
    > 5. Click the **DriverConnectionFactory** group.
    > 6. Click **Connection Pool**.
    > 7. Edit the value of *Shrink Frequency Seconds* (for example, set to *120 seconds*).
    > 8. Click **Save**, and save the changes to a deployment plan file when prompted.
    > 9. Restart the User Messaging Service driver deployment to include the new plan.
    >
    > Remember that if *Shrink Frequency* is reduced to a short interval, it may eventually have a negative impact on the performance of the driver as idle connections will be recycled frequently.

    OR

- Restart the entire Oracle WebLogic Server after performing driver configuration changes. The new changes will take effect immediately upon server re-start.

30.2.5 Email Notifications Sent Even if You Do Not Change Default Parameters in driverconfig.xml

Instructions for notification configuration include setting your outgoing server parameters. Please note that if you do not change the parameters (that is, if you leave the default setting unchanged), notifications may still be sent. This is expected behavior, but you should not rely on the default settings without verifying them. You should set your parameters to ensure that they are correct.

Part VIII

Oracle Identity Management

Part VIII contains the following chapters:

31

Oracle Access Manager

This chapter describes issues associated with Oracle Access Manager. It includes the following topics:

- Section 31.1, "General Issues and Workarounds"
- Section 31.2, "Configuration Issues and Workarounds"
- Section 31.3, "Documentation Errata"

31.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topic:

- Section 31.1.1, "Incorrect SSO Agent Date/Time Shown to User"
- Section 31.1.2, "Oamreg.sh Missing Execute Permission After Configuring"
- Section 31.1.3, "Initial Messages After WebGate Registration Are Not Shown in the User's Locale"
- Section 31.1.4, "Error While Browsing Resources Table in the ResourceType Tab"
- Section 31.1.5, "Single Click to Open Child Node is Not Supported in Navigation Tree"
- Section 31.1.6, "User Credential for OAM Registration Tool Does Not Support Non-ASCII Characters on Native Server Locale"
- Section 31.1.7, "Turkish and Greek Character Issues on OAM Authentication Page"
- Section 31.1.8, "OAM Authentication Does Not Support Non-ASCII Passwords on Locales other than UTF8"
- Section 31.1.9, "Error Message of Create Agent Shows as Server Locale"
- Section 31.1.10, "Support for Referrals in LDAP Searches"
- Section 31.1.11, "Diagnostic Information Is Not Being Displayed on the Administration Console"
- Section 31.1.12, "Non-ASCII Resources Require OHS To Restart To Make Protection Take Effect"
- Section 31.1.13, "Non-ASCII Characters On Success/Failure URL Results in Garbled Redirect URL"
- Section 31.1.14, "Resource with Non-ASCII Characters Cannot Be Protected by an OSSO Agent"
- Section 31.1.15, "Translation Packages Use "Agents" Term instead of "WebGates""

- Section 31.1.16, "Error in Administration Server Log from Console Logins"
- Section 31.1.17, "Special Character Limitations in Response Attribute Names"
- Section 31.1.18, "Error in the "Evaluate Single Sign-On Requirements" Help Topic"
- Section 31.1.19, "EDITWEBGATEAGENT Command Should Give An Error If Invalid Value is Entered"
- Section 31.1.20, "WLST Command DISPLAYWEBGATE11GAGENT In Offline Mode Displays the WebGate Agent Entry Twice"
- Section 31.1.21, "Message Logged at Error Level Instead of at INFO When Servers in Cluster Start"
- Section 31.1.22, "Help Is Not Available for WLST Command REGISTEROIFDAPPARTNER"
- Section 31.1.23, "User Must Click Continue to Advance in Authentication Flow"
- Section 31.1.24, "Plain Text Credentials Exposed in Diagnostic Logs when Creating an ID Store"
- Section 31.1.25, "OCSP-Related Fields are Not Mandatory"
- Section 31.1.26, "Database Node is Non-Function in the System Console"
- Section 31.1.27, "Online Help Provided Might Not Be Up To Date"
- Section 31.1.28, "Custom Resource Types Should Not be Created"
- Section 31.1.29, "Use of a Non-ASCII Name for an Agent May Impact SSO Redirection Flows"

31.1.1 Incorrect SSO Agent Date/Time Shown to User

The default start date on the Create OAM Agent page is based on the Oracle Access Manager server date/time. The date/time shown to the end user is based on the Oracle Access Manager server timezone rather than on the user's machine.

31.1.2 Oamreg.sh Missing Execute Permission After Configuring

Out of the box, execute permissions are not set for the `oamreg.sh` and `oamreg.bat` files in the OAM shiphome location. Hence, before you perform remote registration (`rreg`), you need to set the execute permissions on the scripts by using the following commands:

```
chmod +x oamreg.sh   OR   chmod +x oamreg.bat
```

Then you can proceed with the regular remote registration steps.

31.1.3 Initial Messages After WebGate Registration Are Not Shown in the User's Locale

After OAM Web Gate registration, the description fields in the initial messages for related components are not shown in the user's locale. The description field does not support Multilingual Support (MLS).

31.1.4 Error While Browsing Resources Table in the ResourceType Tab

While browsing across the the Resources table in the ResourceType tab, the following error message is displayed:

```
<Error> <oracle.adfinternal.view.faces.model.binding.CurrencyRowKeySet>
```

```
<BEA-000000> <ADFv: Rowkey does not have any primary key attributes. Rowkey:
oracle.jbo.Key[], table: model.ResTypeVOImpl@620289.>
```

This message is harmless and does not hinder any functionality.

31.1.5 Single Click to Open Child Node is Not Supported in Navigation Tree

Single-click to open a child node in the navigation tree is not supported, but double-click is supported.

31.1.6 User Credential for OAM Registration Tool Does Not Support Non-ASCII Characters on Native Server Locale

The user credential for the OAM registration tool `oamreg.sh/oamreg.bat` does not support non-ASCII characters on the Linux Non-UTF8 server locale and the Windows native server.

31.1.7 Turkish and Greek Character Issues on OAM Authentication Page

In some cases if a user has Turkish, German, or Greek special characters in the user name and the login name only differs in the special characters, he might pass authentication because of case mappings and case-insensitivity.

Some internationalization characters should have special capitalization rule so that characters do not convert back to the lower case.

For example, there is the case with SS and ß in German, where ß only exists as a lower case character. When performing "to Upper" against ß, ß will be changed to SS. And if the upper case text is then converted back to lower case, the SS becomes ss and not the original ß.

31.1.8 OAM Authentication Does Not Support Non-ASCII Passwords on Locales other than UTF8

When the server locale is not UTF-8 and using WebLogic Server embedded LDAP as an identity store, the SSO Authentication page does not support Non-ASCII passwords.

31.1.9 Error Message of Create Agent Shows as Server Locale

When an administrator creates an agent with the same name as one that already exists, the language of the error message displayed is based on the server locale rather than on the browser locale.

31.1.10 Support for Referrals in LDAP Searches

OAM 11g Release 1 (11.1.1) cannot operate directly with LDAP servers returning referrals.

The workaround is to use Oracle Virtual Directory.

31.1.11 Diagnostic Information Is Not Being Displayed on the Administration Console

Diagnostic information is not displayed in the Oracle Access Manager Administration Console for monitoring Agents when one or more nodes of the cluster are down.

This information can be retrieved using the Oracle Dynamic Monitoring Service (DMS). The steps are as follows:

1. Using WebLogic credentials, log in to the DMS application, `http://<adminserver-host>:<adminserver-port>/dms`

2. On the navigation tree, click **OAMS.OAM_Server.OAM_Agents** under the **DMS Metrics** node.

31.1.12 Non-ASCII Resources Require OHS To Restart To Make Protection Take Effect

When you add a resource with a non-ASCII name to the protected authentication policy, it will require the OHS 11g server to restart to make the protection take effect, whereas in adding resources with English characters, protection takes effect in real time without restarting the OHS 11g server.

31.1.13 Non-ASCII Characters On Success/Failure URL Results in Garbled Redirect URL

If an on success or on failure URL configured for an authentication policy contains non-ASCII characters in the URL specified, then the URL specified will be garbled when it is used during a user authentication. This will happen only when the authentication scheme is Basic Authentication and the end user's browser is the Simplified Chinese version of IE8 running on the Chinese version of Windows.

31.1.14 Resource with Non-ASCII Characters Cannot Be Protected by an OSSO Agent

When trying to protect a resource, `mod_sso` only converts unicode character in the URL, whereas WebGate is able to convert the entire resource URL to UTF-8 format. If you need this capability, use the `mod_webgate` instead of `mod_osso`.

31.1.15 Translation Packages Use "Agents" Term instead of "WebGates"

The term "Agents" has been changed to "WebGates." Because of this late change, the translation packages cannot be updated for this. The packages will continue to use "Agents" instead of the preferred term, "WebGates."

31.1.16 Error in Administration Server Log from Console Logins

If you log in to the OAM Administration Console as an administrator and then log in to the Console as an administrator in a new tab, the following error appears in the administration logs:

```
-----------------------------------------------------------
<May 20, 2010 10:12:47 AM PDT> <Error>
<oracle.adfinternal.view.page.editor.utils.ReflectionUtility> <WCS-16178>
<Error instantiating class -
oracle.adfdtinternal.view.faces.portlet.PortletDefinitionDTFactory>
-----------------------------------------------------------
```

The error message does not impact functionality.

31.1.17 Special Character Limitations in Response Attribute Names

The ":" special character should not be used in response attribute names.

For example, "`name=STAT_:HEADER1.`"

This is not supported in 11g Release 1 (11.1.1).

31.1.18 Error in the "Evaluate Single Sign-On Requirements" Help Topic

In the help topic, "Evaluate Single Sign-On Requirements," "Configuring Single Logout for 10g WebGate with OAM 11g Servers" was listed twice under "Review steps to configure single sign-off."

The English version has been corrected to read:

"Step 7   Review steps to configure single sign-off

- Configuring Single Logout for 10g WebGate with OAM 11g Servers. More.

- Configuring Single Logout for 11g WebGate with OAM 11g Servers. More.

- Configuring Single Logout for Oracle ADF Applications. More

The translated version will be fixed in a future release.

31.1.19 EDITWEBGATEAGENT Command Should Give An Error If Invalid Value is Entered

The WLST command `editWebgateAgent` does not give an error when a invalid value is entered for the **state** field in both online and offline mode. The OAM Administration Console does show the **state** field value as neither **enabled** nor **disabled**, though it is a mandatory field.

31.1.20 WLST Command DISPLAYWEBGATE11GAGENT In Offline Mode Displays the WebGate Agent Entry Twice

In the offline mode, the WLST command, `displayWebgate11gAgent`, displays the 11*g* WebGate Agent entry in the System Configuration tab twice.

31.1.21 Message Logged at Error Level Instead of at INFO When Servers in Cluster Start

When starting Oracle Access Manager servers in a cluster, the following message is displayed:

```
<Jun 22, 2010 3:59:41 AM PDT> <Error> <oracle.jps.authorization.provider.pd>
<JPS-10774> <arme can not find state.chk file.>
```

The correct level of the message is `INFO`, rather than `Error`.

31.1.22 Help Is Not Available for WLST Command REGISTEROIFDAPPARTNER

The Help command is not available for the WLST command, `registeroifdappartner`.

The online and offline command registers Oracle Identity Federation as a Delegated Authentication Protocol (DAP) Partner.

For information, refer to "registerOIFDAPPartner" in the *Oracle Fusion Middleware WebLogic Scripting Tool Command Reference*.

Syntax

```
registerOIFDAPPartner(keystoreLocation="/scratch/keystore"
logoutURL="http://<oifhost>:<oifport>/fed/user/sploosso?doneURL=
```

```
http://<oamhost>:< oam port>/ngam/server/pages/logout.jsp",
rolloverTime="526")
```

Parameter Name	Definition
keystoreLocation	Location of the Keystore file. The file generated at the OIF Server. (mandatory)
logoutURL	The OIF Server's logout URL. <mandatory>
rolloverInterval	The Rollover Interval for the keys used to enc/decrypt SASSO Tokens (optional)

Example

The following invocation illustrates use of all parameters.

```
registerOIFDAPPartner(keystoreLocation="/scratch/keystore",
logoutURL="http://<oifhost>:<oifport>/fed/user/sploosso?doneURL=http://<oamhost>:
<oam port>/ngam/server/pages/logout.jsp", rolloverTime="526")
```

31.1.23 User Must Click Continue to Advance in Authentication Flow

In a native integration with Oracle Adaptive Access Manager, the resource is protected by an Oracle Access Manager policy that uses the Basic Oracle Adaptive Access Manager authentication scheme.

When a user tries to access a resource, he is presented with the username page.

After he enters his username, he must click **Continue** before he can proceed to the password page. He is not taken to this page automatically.

The workaround is for the user to click **Continue**, which might allow him to proceed to the password page.

31.1.24 Plain Text Credentials Exposed in Diagnostic Logs when Creating an ID Store

To work around this issue:

1. Go to **My Oracle Support** at

   http://support.oracle.com

2. Click the **Patches & Updates** tab, and search for **bug 9824531**.Download the associated patch and install it by following the instructions in the README file included with the patch.

3. On the **Patches & Updates** tab, search for **bug 9882205**. Download the associated patch and install it by following the instructions in the README file included with the patch.

31.1.25 OCSP-Related Fields are Not Mandatory

In the X509 authentication modules, the following OCSP-related fields are no longer mandatory:

- OCSP Server Alias

- OCSP Responder URL

- OCSP Responder Timeout

If OCSP is enabled

The OCSP-related fields should be filled in by the administrator. If they are not filled, there will not be an error from the Console side.

It is the responsibility of the administrator to provide these values.

If OCSP is not enabled

The OCSP-related fields need not be filled in this case. If there are values for these fields, they will be of no consequence/significance, as OCSP itself is not enabled.

In the default out of the box configuration, the OCSP responder URL is `http://ocspresponderhost:port`. If you make changes to other fields and leave this as is, you will see a validation error, since this value is still submitted to the back end and at the Console, the layer port should be a numeric field. You can either modify the field, with the port being a numeric field or delete the entire value.

31.1.26 Database Node is Non-Function in the System Console

The **Databases** node available in OAM System Configuration under **System Configuration** > **DataSources** > **Databases** is not functional. It does not create datasource entries that are consumed by the OAM Runtime.

The OAM Data Source needs to be managed using the WebLogic Server Administration Console. Oracle Access Manager 11g includes a data source named **oamDS** which is configured against the database instance extended with the OAM Schema. To navigate to **oamDS** in the WebLogic Server Administration Console, go to **<domain_name>** > **Services** > **JDBC** > **DataSources** in the navigation tree.

31.1.27 Online Help Provided Might Not Be Up To Date

Online help is available in the console, but you should check OTN to ensure you have the latest information.

31.1.28 Custom Resource Types Should Not be Created

For OAM 11g, creating custom resource types should not be attempted even though the button to create/edit/delete resource types is not disabled.

31.1.29 Use of a Non-ASCII Name for an Agent May Impact SSO Redirection Flows

When using the OAM 11g server with WebGates and when the WebGate ID is registered with a non-ASCII name, the OAM server may reject that authentication redirect as an invalid request. The workaround is to utilize an ASCII name for the WebGate.

31.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 31.2.6, "Incompatible Msvcirt.dll Files"

- Section 31.2.7, "IPv6 Support"

- Section 31.2.8, "IPV6:Failed to Log In to WebLogic Administration Console When OAM Server Is Running"

- Section 31.2.9, "What to Avoid or Note in OAM Configuration"

- Section 31.2.10, "Install Guides Do Not Include Centralized Logout Configuration Steps"

31.2.1 For mod-osso Value for RedirectMethod Should be "POST"

For agents to be capable of supporting long URLS, the following code sample was added under `oam-config.xml`:

```
<Setting Name="AgentConfig" Type="htf:map">
   <Setting Name="OSSO" Type="htf:map">
        <Setting Name="RedirectMethod"Type="xsd:string">GET</Setting>
        <Setting Name="Delimiter" Type="xsd:string">AND</Setting>
   </Setting>
```

For `mod-osso`, the value for `RedirectMethod` should be `POST`, however, the values shipped out of the box is `GET`. Follow these steps to perform the modification, as this change needs to be performed manually and there is no user interface or WLST commands available to do so.

1. Stop the OAM Administration Server and managed servers.

2. Enter cd `DOMAIN_HOME/config/fmwconfig`

3. Enter vi `oam-config.xml`

4. Go to the following line in `oam-config.xml`:

    ```
    <Setting Name="AgentConfig" Type="htf:map">
       <Setting Name="OSSO" Type="htf:map">
            <Setting Name="RedirectMethod"Type="xsd:string">GET</Setting>
    ```

    Modify `GET` to `POST` as follows:

    ```
    <Setting Name="RedirectMethod"Type="xsd:string">POST</Setting>
    ```

5. Save the changes and start the OAM Administration and managed servers.

31.2.2 java.lang.NullPointerException: Cannot Set Value to Null at javax.naming.ldap.Rdn.<init>(Rdn.java:178)

If you encounter a `java.lang.NullPointerException: Cannot set value to null at javax.naming.ldap.Rdn.<init>(Rdn.java:178)` error in your WebLogic Administration Console or managed server logs, it is mostly likely caused by JRockit.

In certain cases involving try-catch-clauses, JRockit will apply an incorrect optimization such that a null check always returns false. To avoid this issue, ensure that you are running JVM version R28.0.1 or later.

R28.0.1 is available as patch 9847606, which you can download from My Oracle Support at:

http://support.oracle.com

31.2.3 User Wrongly Directed to the Self-User Login after Logging Out of the Oracle Identity Manager Administration Console

The user is directed to the self-user login after logging out of the Oracle Identity Manager Administration Console.

To be redirected correctly, the logout must work properly.

The workaround for logout with 10g WebGate is to:

1. Copy `logout.html` (for example, from `Oracle_IDM1/oam/server/oamsso/logout.html`) to `webgate_install_dir/oamsso`.

2. Update logout URL in the file to `http://oam_server:oam_server/ngam/server/logout`.

3. If redirection to specific page has to occur after logout, change the logout URL to `http://oam_server:oam_server/ngam/server/logout?doneURL=http://host:port/specifipage.html`.

31.2.4 Auditing Does Not Capture the Information Related to Authentication Failures if a Resource is Protected Using Basic Authentication Scheme

Although a resource can be protected using the BASIC scheme, the WebLogic server has a feature by which it first authenticates the user and then sends it to the server.

If you add the following flag under `<security-configuration>` in `config.xml` and restart the server, you will be able to bypass WebLogic server's authentication `<enforce-valid-basic-auth-credentials>false</enforce-valid-basic-auth-credentials>`. Once the credentials are submitted back to the OAM server, it will be audited.

The WebLogic Administration Console does not display or log the `enforce-valid-basic-auth-credentials` setting. However, you can use WLST to check the value in a running server. You must modify this value by setting this in `config.xml`.

To do so, refer to the following documentation:

"Developing Secure Web Applications" at:

http://download.oracle.com/docs/cd/E13222_01/wls/docs103/security/thin_client.html#wp1037337

31.2.5 WNA Authentication Does Not Function on Windows 2008

The default Kerberos encryption supported by Windows 2008 Server and Windows 2007 machines are "AES256-CTS-HMAC-SHA1-96", "AES128-CTS-HMAC-SHA1-96" and "RC4-HMAC".

If the clients are configured to use DES only encryption, users will not be able to access protected resources with Kerberos authentication. The error message, "An incorrect username and password was specified" might be displayed.

Because the initial Kerberos tokens are not present, the browser sends NTLM tokens, which the OAM 11g server does not recognize; therefore, the user authentication fails.

The workaround is to enable the encryption mechanisms, and follow the procedure mentioned in:

http://technet.microsoft.com/en-us/library/dd560670%28WS.10%29.a
spx

31.2.6 Incompatible Msvcirt.dll Files

When you install the Oracle Access Manager 10g WebGate, do not replace the current version of msvcirt.dll with a newer version when prompted. If you do so, there may be incompatibility issues. Later, when you try to install OSSO 10g (10.1.4.3), the opmn.exe command might fail to start and the OracleCSService might time out because the required .dll file is missing.

31.2.7 IPv6 Support

The supported topology for OAM 11g is shown below.

Topology 1

- Oracle Database on IPv4 protocol host

- OAM Administration Console on dual-stack host

- Clients on IPv4 protocol host

- Clients on IPv6 protocol host

OAM Administration Console on IPv4/IPv6 dual-stack can be accessed from both IPv4 and IPv6 client.

Topology 2

- WebGate 10g or WebGate 11g on IPv4 protocol host

- OAM Server in IPv4 on dual-stack host

WebGate 10g and WebGate 11g on IPv4 can work with OAM server on IPv4/IPv6 dual-stack.

Topology 3

- WebGate10g or WebGate 11g +protected applications on IPv4 protocol host

- OHS reverse proxy on dual-stack host

- Client on IPv6 protocol host

IPv6 client can access WebGate10g or WebGate11g through OHS reverse proxy.

31.2.8 IPV6:Failed to Log In to WebLogic Administration Console When OAM Server Is Running

When the OAM server is not running, login to WebLogic Administration Console is successful, but when OAM server is running, login to the WebLogic Administration Console is redirected to the OAM server and authentication fails because the Identity Store fails to initialize.

IPV6 for IDSTORE will be supported in a later release.

31.2.9 What to Avoid or Note in OAM Configuration

This section contains scenarios and items to note in OAM Configuration

31.2.9.1 Unsupported Operations for WLST Scripts

WLST scripts for OAM 10g and OAM 11g WebGates do not support changing Agent security modes.

31.2.9.2 Unsupported Operations for OAM Administration Console and WLST

Unsupported operations for the OAM Administration Console and WLST are described in the following subsections.

31.2.9.2.1   OAM Server

Use Case: Concurrent Deletion and Updating
Description

1. Open an OAM Server instance in edit mode in Browser 1.

2. Using the OAM Administration Console in another browser (Browser 2) or using a WLST script, delete this server instance.

3. Return to Browser 1 where the server instance is opened in edit mode.

4. In Browser 1, click the **Apply** button.

Current Behavior

The OAM Administration Console displays the message, "Server instance *server_name* might be in use, are you sure you want to edit it?" along with the confirmation that the update succeeded.

This server instance node is removed from navigation tree.

The behavior is incorrect.

Use Case: Two OAM Server Instances with Same Host Cannot have the Same Proxy Port.
Description

For this use case, there are two instances of the OAM Server: oam_server1 and oam_server2.

1. Open oam_server1 in edit mode and specify a host and OAM proxy port.

2. Now open oam_server2 in edit mode and specify the same host and proxy port as oam_server1.

The changes are saved without any error message.

Current Behavior

The OAM Administration Console does not display any error and allows the update.

The behavior is incorrect.

Use Case: Log Statements Detailing the Server Instance Creation, Update and Delete are not Present on the OAM Administration Console
Description

If you create, edit, or delete an OAM Server instance from the OAM Administration Console, the log statements corresponding to create, edit and delete are not displayed by the Console.

31.2.9.2.2   LDAP Authentication Module:

Use Case: Concurrent Deletion/Creation of User Identity Store does not Reflect in the Dropdown of Identity Stores in the LDAP Authentication Module Create and Edit

Description

1. Open create/ edit for the LDAP authentication module.

   A dropdown list displays the identity stores present in the system.

2. Now create a user identity store using another tab.

3. Return to the create/edit tab for the LDAP authentication module and check the dropdown list for user identity stores.

Current Behavior

The newly added user identity store entry is not added to the dropdown list.

The entry of the user identity store that was deleted appears on the list.

An error message is not displayed when you select the deleted user identity store in the dropdown list and click **Apply**.

The OAM Administration Console does not change and the configuration is not updated in back end.

31.2.9.2.3 LDAP, Kerberos and X509 Authentication Module

Use Case: Concurrent deletion and updating

Description

1. Open an LDAP/Kerberos/X509 authentication module in edit mode in OAM Administration Console in Browser 1.

2. Using OAM Administration Console in another browser (Browser 2) or using a WLST script, delete this authentication module.

3. Now return to Browser 1 where the authentication module is opened in edit mode.

4. Click the **Apply** button.

Current Behavior

The OAM Administration Console updates this authentication module configuration and writes it to back end.

The behavior is incorrect.

Use Case: Log Statements Detailing the Server Instance Creation, Update and Delete are Not present on OAM Administration Console side.

Description

When you create, edit or delete an authentication module from OAM Administration Console, the log statements corresponding to create, edit and delete are not written by the Console.

31.2.9.2.4 OAM 11G WebGate

Use Case: Concurrent Deletion and Update

Description

1. Open an OAM 11g WebGate instance in edit mode in OAM Administration Console in Browser 1.

2. Using the OAM Administration Console in another browser (Browser 2) or using a WLST script, delete this OAM 11g WebGate.

3. Now return to the Browser1 where the server instance is opened in edit mode.

4. Click on the **Apply** button.

Current Behavior

The OAM Administration Console for edit OAM11g WebGate does not change and the tab does not close.

A OAM11g WebGate configuration not found error dialog is displayed by the OAM Administration Console.

However, the navigation tree is blank and attempts to perform any operation results in a javax.faces.model.NoRowAvailableException".

The behavior is incorrect.

31.2.9.2.5   OSSO Agent

Use Case: Concurrent Deletion and Update
Description

1. Open an OSSO Agent instance in edit mode in the OAM Administration Console in Browser 1.

2. Using the OAM Administration Console in another browser (Browser 2) or using a WLST script, delete this OSSO Agent.

3. Now return to the Browser 1 where the OSSO Agent instance is opened in edit mode.

4. Click on **Apply** button.

Current Behavior

Editing the OSSO Agent in the OAM Administration Console results in a null pointer exception.

The behavior is incorrect.

31.2.10 Install Guides Do Not Include Centralized Logout Configuration Steps

Single-Sign On is enabled after Oracle Access Manager is installed; to complete configuration of Single-Sign On out of the box, centralized log out must be configured post-install. Configure centralized log out by following direction from these sections:

- Configuring Centralized Logout for ADF-Coded Applications with OAM 11g

  http://fmwdocs.us.oracle.com/doclibs/fmw/E15482_
  01/doc.1111/e15478/logout.htm#CIHFDDGF

- Configuring Centralized Logout for the IDM Domain Agent

  http://fmwdocs.us.oracle.com/doclibs/fmw/E15482_
  01/doc.1111/e15478/logout.htm#CIHDEIGJ

31.3 Documentation Errata

Update instructions are provided in this section.

31.3.1 Update Instructions for OAM_REG_HOME in OAMREG.BAT In Administrator's Guide

In the "Provisioning a 10g WebGate for Use with OAM 11g" section in the *Oracle Fusion Middleware Administrator's Guide for Oracle Access Manager*, the following information must be added for Windows specific environments:

In Windows environment, you must update the file:

<MiddlewareHome>\Oracle_IDM1\oam\server\rreg/oamreg.bat

Update the line for setting OAM_REG_HOME

```
set OAM_REG_HOME="D:\Remote Registration\RREG client kit\rreg"
```

by replacing the value with

```
set OAM_REG_HOME=<MiddlewareHome>\Oracle_IDM1\oam\server\rreg
```

> **Note:** Ensure the two " (quotes) are removed.

32

Oracle Adaptive Access Manager

This chapter describes issues associated with Oracle Adaptive Access Manager. It includes the following topics:

- Section 32.1, "General Issues and Workarounds"
- Section 32.2, "Configuration Issues and Workarounds"
- Section 32.3, "Documentation Errata"

32.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 32.1.1, "General User Interface"
- Section 32.1.2, "Policy Management"
- Section 32.1.3, "Knowledge-Base Authentication"
- Section 32.1.4, "Transactions"
- Section 32.1.5, "Import, Export, and Snapshot"
- Section 32.1.6, "Audit, Logs, and Performance"
- Section 32.1.7, "Globalization"

32.1.1 General User Interface

This section describes general user interface issues.

32.1.1.1 Browser Back Button May Clear Tabs

In the OAAM Fraud Prevention Page, navigation using the browser's **Back** button and then the **Forward** button might cause all open tabs to close.

Avoid using the browser's **Back** button for navigation.

32.1.1.2 Add Condition Menus Do Not Render Properly

The dropdown lists in the **Add Condition** dialog box do not render properly in Internet Explorer 7 (IE7), but they are still usable

32.1.2 Policy Management

This section describes issues with policy, rule, and group features.

32.1.2.1 Error Message Not Displayed Creating Group with Existing Group Name

An error message is not displayed when you try to create a group with an existing group name. The group with the duplicate name is not created, but you will not see an error message.

32.1.2.2 Add Button in the Group Add Members Dialog is Disabled for Specific Scenarios

The **Add** button in the **Add Members** dialog box becomes disabled for the following scenario:

1. Open an existing group.

2. In the **Members** tab, click the **Add** button.

   The **Add Members** dialog box appears and the **Search Results** table is empty.

3. In the **Add Members** dialog box, choose the option to search and select from the existing elements.

4. Click the **Search** button.

   A list of elements appear in the **Search Results** table.

5. From **Search Results** table, select the first element and then click the **Add** button.

6. To delete the member you just added, select the member in the **Members** tab and then click **Delete**.

7. Repeat Steps 2 through 4.

   When the list of elements appears in the **Search Results** table, the element you deleted previously is already selected and the **Add** button is disabled.

   To enable the **Add** button, you will have to select another element and then go back and select the original element.

   If only one element exists to choose from, you will not be able to enable the **Add** button and add that element to the group.

As a workaround, if there is only one element to choose from:

1. Select the **Create New** option in the **Add Members** dialog box. The **Search Results** table disappears.

2. Now, choose the option to search and select. When the **Search Results** table reappears, the **Add** button is enabled. You will be able to select the element and Add it to the group.

As a workaround, if there are more than one element to choose from, click another element and then go back to the original and then add it.

32.1.2.3 Pattern Attribute Cannot Be Used if Set to Deleted

If you set the status of an attribute to **Deleted** in a pattern, the attribute will not appear in the user interface and you will not be able to reuse it.

If you do not want to use the attribute, set the status to **Inactive** instead of **Deleted**.

32.1.2.4 Instructions are Incorrect in the Add User Name to Group Dialog Box

Although the instructions on the **Add User name to group** dialog box state that "You can either create new User name or search and select existing User name to add to the group," only **Add** is supported.

32.1.3 Knowledge-Base Authentication

This section describes a Knowledge-Based Authentication feature issue.

32.1.3.1 Duplicate Name for KBA Categories Can Be Given When Editing the Category

Care should be exercised when editing the name of a category. There is no validation to prevent the user from entering a KBA category name that already exists.

32.1.4 Transactions

This section describes a Transaction issue.

32.1.4.1 Cannot Delete Transaction Data in Certain Scenarios

For the Transaction Definition, in the **Transaction** tab, if you try to delete a row, but click **Cancel** in the **Delete Row** confirmation dialog in the **Source** or **Data** tabs, you will not be able to delete that row again.

The warning message, "No Data Elements are selected for delete," is shown even if you select the row.

32.1.5 Import, Export, and Snapshot

This section describes issues dealing with import, export, and snapshots.

32.1.5.1 Import Dialog Box is Unusable if Incorrect Path Entered

If you type in an incorrect file path for any import file dialog box in Internet Explorer 7 (IE7), the import file dialog box becomes unusable and you cannot close it.

As a workaround, log out of the application and log back in.

32.1.5.2 Validation Check Occurs in Snapshot Restore Even If User Does Not Want to Take Current Snapshot

When you are restoring a snapshot from a file, a validation check is run when you click **Continue**. You are then asked to enter a name and notes even if you do not want to take a current snapshot.

As a workaround, you should select **Back Up Current System**, enter your name and notes, deselect **Back Up Current System**, and click **Continue** to bypass the validation check.

32.1.5.3 Import of Existing Property in Java Format Fails

When you try to import an existing property with the same value in Java format, the following error occurs:

```
Failed to Import Properties.Imported file is empty or invalid.
```

32.1.6 Audit, Logs, and Performance

This section describes issues pertaining to audit, log, and performance.

32.1.6.1 Execution and Processing Terms Used in Oracle Enterprise Manager are Different from the Ones Used in the Oracle Adaptive Access Manager Dashboard

The execution and processing labels used in Oracle Enterprise Manager are different from the ones used in the Oracle Adaptive Access Manager Dashboard.

The mappings are as follows:

Report	Fusion Middleware Control	Oracle Adaptive Access Manager Dashboard
Policy Execution Summary	Average Execution Time	Average Policy Process Time
Rules Execution Summary	Average Execution Time	Average Rule Process time
Rules Processing Summary	Average Execution Time	RulesAPI.processRules

32.1.6.2 Audit Record Uses the Term Override and Not Trigger Combination

The **Add**, **Update**, **Delete Overrides** audit events use the deprecated term "Override" instead of "Trigger Combination." The audit events are also not captured in the audit.log.

32.1.6.3 Performance Issues Exist When Performing Bulk Actions

The response time is slow for **Select All** and **Bulk** actions in tables. This occurs mainly for KBA and group elements.

For example, response time is slow for activating all KBA questions or deleting all group members.

32.1.6.4 Extra Audit Events are Generated for All Subcomponents When Another Subcomponent is Changed

The **Update Rule Param Value** audit event is triggered:

- Whenever a condition is selected and the condition details are displayed. The rule condition value in the rule has not changed.

- When a user make changes to rules (for example, rule name)

When you make a change to the rule and click the **Apply** button, the **Update Rule Param Value** audit event is triggered. Even though there had been only one modification, the following three audit events are also triggered:

- UpdateRuleInPolicy

- UpdateRulesOrderInPolicy

- UpdateRuleParamValuesInPolicy

The extra events are triggered because **Apply** and **Revert** are global actions; therefore the entire state is saved. On the other hand, **Save** and **Cancel** are detail level actions.

32.1.6.5 Error and Warning Messages When No Issues

Certain error and warning messages appear in log files even when there are no issues with the user interface. Table 32–1 lists error/warnings that can be ignored.

'....' indicates additional contextual text

Table 32–1   Oracle Adaptive Access Manager Messages to Ignore

#	Error Message	Description / Comments
1	Couldn't load properties file bharosauio_client.properties	This message may occur during server startup when an attempt is made to load the file. The file is not a requirement; therefore this message can be ignored.
2	The DocumentChange is not configured to be allowed for the component:	This message is from the ADF Filtered Change Persistence Manager. It can be ignored.
3	shadow[some text]: No shadow row found for	The message is generated when a history row is not found in the database for some server artifacts, when the row is inserted for the first time for that artifact. Since the history rows are rebuilt if they are not found, this message can be ignored.
4	Element for value= -1 not found for enum	This message is generated when the default value of the enumeration is used to convey an unused or unselected item from the enumerated lists in the server or user interface. Since the (-1) is interpreted as an unused value, this message can be ignored.
5	Could not find selected item matching value "0" in RichSelectOneChoice	The message is generated from the user interface classes when attempts are made to match selected values with choices. In some cases, the selected value of 0 may not have attached a choice and that is when this message is generated. This message can be ignored.
6	DocumentChange will not be persisted because the target component of DocumentChange is a stamped component or is in the subtree of a stamped component. Target component reference....	The message is informational and from the ADF MDS Filtered Change Persistence Manager. It can be ignored.
7	Error instantiating class - oracle.adfdtinternal.view.faces.portlet.PortletDefinitionDTFactory	The message is generated by the user interface code when attempts are made to upload portlets. Since the Oracle Adaptive Access Manager implementation does not use this class, this message can be ignored.
8	Could not find saved view state for token	This message is from the ADF view layer and occurs if the user cut and pasted the OAAM Admin URL.
9	ADFv: Unable to find matching JSP Document Node for:	This message is from ADF view layer.

32.1.7 Globalization

This section describes globalization issues.

32.1.7.1 Timestamp Criteria Input Field Has a Fixed Format

In any of the search panels, the timestamp criteria input field uses a fixed format rather than a format based per the locale.

As a workaround, use the date-picker to select the timestamp instead of manually entering it.

32.1.7.2 Command-Line Interface Tools Are Not Globalized

Command-Line Interface tools are not globalized for Oracle Adaptive Access Manager 11*g* Release 1 (11.1.1).

32.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 32.2.1, "High Availability: JBOSERIALIZATIONEXCEPTION Results When Switch Dynamic Tab Failover Occurs"

- Section 32.2.3, "Oracle Adaptive Access Manager Servers Can Run on IPv6 Enabled Dual Stack Machines"

- Section 32.2.2, "Unused Rule.Action.Enum Actions are Disabled Out of the Box."

32.2.1 High Availability: JBOSERIALIZATIONEXCEPTION Results When Switch Dynamic Tab Failover Occurs

When you install Oracle Adaptive Access Manager 11*g*, you must install the patches for bugs 9824531 and 9817469.

The patches are not optional but critical for running the OAAM Admin Console in the only supported deployment mode which is the high availability clustered environment.

To apply the patches:

1. Go to **My Oracle Support** at

   http://support.oracle.com

2. Click the **Patches & Updates** tab, and search for **bug 9824531**.Download the associated patch and install it by following the instructions in the README file included with the patch.

3. On the **Patches & Updates** tab, search for **bug 9817469**. Download the associated patch and install it by following the instructions in the README file included with the patch.

32.2.2 Unused Rule.Action.Enum Actions are Disabled Out of the Box.

The values for the `Rule.Action.Enum` Action fields like **ChallengeSMSTextPad**, **ChallengeSMSPinPad**, and others, are not specified for the **From Action** and **To Action** fields in the Policy Set.

The workaround is to set the value of these properties to true using the Properties Editor:

```
rule.action.enum.ChallengeSMSTextPad.enabled
rule.action.enum.ChallengeSMSPinPad.enabled
rule.action.enum.ChallengeEmailTextPad.enabled
rule.action.enum.ChallengeEmailPinPad.enabled
rule.action.enum.SmsChallenge.enabled
rule.action.enum.EmailChallenge.enabled
rule.action.enum.NextQuestion.enabled
rule.action.enum.RegisterImageTextPad.enabled
rule.action.enum.RegisterImagePinPad.enabled
rule.action.enum.RegisterImageKeyPadFull.enabled
rule.action.enum.RegisterImageKeyPadAlpha.enabled
rule.action.enum.RegisterImageKeyPadAlphaTurk.enabled
rule.action.enum.RegisterImageQuestionPad.enabled
rule.action.enum.Token.enabled
rule.action.enum.OTPChallengeEmail.enabled
rule.action.enum.OTPChallengeSMS.enabled
```

```
rule.action.enum.OTPRegister.enabled
rule.action.enum.OTPBlock.enabled
```

32.2.3 Oracle Adaptive Access Manager Servers Can Run on IPv6 Enabled Dual Stack Machines

The OAAM Servers function on IPv6 enabled dual stack servers with reduced functionality. End user IP addresses in IPv4 format are used in fraud policies and rules management. This may not be an issue as IPv4 format is used across networks and OAAM Server obtains IPv4 based IP address. When end user IP addresses are in IPv6 form, rules evaluating user, device, application data (transactions/events) and other contextual data will function as expected. However, location rules will evaluate against a private dummy IP (127.0.0.99) in place of the actual v6 form IP. The OAAM Admin console will display private dummy IP (127.0.0.99) in place of the actual v6 form IP. To support location-based rules a change in database schema and an application change to support Groups, Ranges, Listing and Details pages are required. In addition, IPv6 support from geolocation data vendors is needed for advanced location rules-based on geolocation, velocity, connection settings, and others.

32.3 Documentation Errata

This section describes documentation errata. It includes the following topic:

- Section 32.3.1, "Documentation to Customize Abbreviation and Equivalences is Incorrect"
- Section 32.3.2, "The Pattern Statuses are Incorrectly Documented in the Administrator's Guide"
- Section 32.3.3, "Name and Location of Purging Scripts Package Not Provided in Documentation"
- Section 32.3.4, "Corrections and Additions to Appendix F, Globalization Support"

32.3.1 Documentation to Customize Abbreviation and Equivalences is Incorrect

The following sections on customizing abbreviations and equivalences are incorrect in the *Oracle Fusion Middleware Administrator's Guide for Oracle Adaptive Access Manager*.

- 6.9.2.1 Common Abbreviations

  "The list can be customized by adding or updating properties file, `client_resource_<locale>.properties`, created by the administrator."

- F.8 Adding to the Abbreviation File

  "Add as many abbreviations and equivalences as you want to `client_resource_<locale>.properties`."

A revised section is provided in the Release Notes.

Customizing English Abbreviations and Equivalences

Answer Logic checks if the answer provided by the user matches closely to the ones provided during registration.

Answer Logic, in part, relies on pre-configured sets of word equivalents, commonly known as abbreviations.

Although there are several thousand English abbreviations and equivalences in the English version of Oracle Adaptive Access Manager, customers can perform customizations per their business requirements.

For example, the customer might want the following to be considered a match.

Registered Answer	Given Answer
nineteen hundred ninety nine	1999

The out of the box English abbreviations and equivalences are in a file named, `bharosa_auth_abbreviation_config.properties`. Changes cannot be made to this file.

To customize abbreviations, a new file must be created with a new set of abbreviations. This file takes precedence over the original file and all abbreviations in the original file are ignored.

To customize abbreviations:

1. Create a new abbreviation file, `custom_auth_abbreviation_config.properties`, and save it in the *IDM_ORACLE_HOME*/oaam/conf directory.

   If the `conf` folder does not exist, create one.

2. Add abbreviations and equivalences to `custom_auth_abbreviation_config.properties`.

   There are two different formats to use:

   ```
   Word=equivalent1
   Word=equivalent2
   ```

   or

   ```
   Word=equivalent1,equivalent2, equivalent3
   ```

   For example, in English, some equivalence for James are:

   ```
   Jim=James,\Jamie,\Jimmy
   ```

   With the addition of the equivalences, if a user were to enter a response as `Jim`, but had originally entered `James`, `Jim` would be accepted.

   Another example is that `St` may be equivalent to `Street`.

   > **Note:** Retrieval of abbreviation values is not based on the browser language; values are retrieved from the properties files.

3. Using the Properties Editor, change the property, `bharosa.authenticator.AbbreviationFileName`, to point to the complete path to `custom_auth_abbreviation_config.properties`.

   The default value for the property `bharosa.authenticator.AbbreviationFileName` is `bharosa_auth_abbreviation_config.properties`.

   Create the `bharosa.authenticator.AbbreviationFileName` property if it does not already exist.

Restarting the system is not necessary for the change to take effect.

For information on using the Properties Editor, refer to "Using the Properties Editor" in the *Oracle Fusion Middleware Administrator's Guide for Oracle Adaptive Access Manager*.

4. Configure the Answer Logic by following the instructions in "Configuring the Answer Logic" in the *Oracle Fusion Middleware Administrator's Guide for Oracle Adaptive Access Manager*.

If you want to revert to the original out of the box abbreviations, set `bharosa.authenticator.AbbreviationFileName` back to `bharosa_auth_abbreviation_config.properties`.

Customizing Abbreviations and Equivalences for Locales

Translated files are shipped for different locales. These files are named `bharosa_auth_abbreviation_config_<locale>.properties` where `<locale>` is the locale string. For example, the Spanish version of the file is `bharosa_auth_abbreviation_config_es.properties`.

If you want to localize for one locale (for example, for Japanese only) you can create one file and set the value of property `bharosa.authenticator.AbbreviationFileName` to that file's absolute path.

If you want customize for multiple locales you need to perform the following steps:

1. Create the files specific to those locales with the same prefix.

For example,

`/mydrive/IDM_ORACLE_HOME/oaam/conf/Abbreviations_es.properties` for Spanish

`/mydrive/IDM_ORACLE_HOME/oaam/conf/Abbreviations_ja.properties` for Japanese

2. Set the property `bharosa.authenticator.AbbreviationFileName` to `/mydrive/IDM_ORACLE_HOME/oaam/conf/Abbreviations.properties`.

Note that the locale prefix is absent in the value of the property.

Oracle Adaptive Access Manager uses the locale specific suffixes to the base file name and calculates the file name for that locale at runtime. You only have to specify the base name of the file, independent of locale, as the property value, and Oracle Adaptive Access Manager calculates the locale specific value automatically at runtime based on that property value.

32.3.2 The Pattern Statuses are Incorrectly Documented in the Administrator's Guide

The *Oracle Fusion Middleware Administrator's Guide for Oracle Adaptive Access Manager* states that there are three states for the pattern, but lists five in Table 14.1 and four in Section 14.9.5, "Changing the Status of the Pattern."

The statuses to choose from are:

- Active

  If data must be collected, the pattern must be in the **Active** state.

- Inactive

  If the pattern definition is complete, but you do not want to collect data, select **Inactive**.

- Incomplete

  If pattern creation has started, but you need to save it for completion later, select **Incomplete**. Data is not collected for this state.

- Invalid

  If there is a problem with the pattern, you can mark the pattern as **Invalid** to signal other operators. No autolearning data analysis will performed for a pattern in this state.

- Deleted

  The pattern has been deleted, but the system must keep this record to maintain data integrity. No autolearning data analysis will be performed for pattern in this state.

32.3.3 Name and Location of Purging Scripts Package Not Provided in Documentation

The name and location of the purging scripts package is not provided in Appendix G, "Setting Up Archive and Purge Procedures" of the *Oracle Fusion Middleware Administrator's Guide for Oracle Adaptive Access Manager*.

The Oracle Adaptive Access Manager-related purging scripts are in the `oaam_db_ purging_scripts.zip` file located under *IDM_ORACLE_HOME*/oaam/oaam_db_ scripts.

32.3.4 Corrections and Additions to Appendix F, Globalization Support

Additions and corrections to Appendix F, "Globalization Support," in the Oracle Fusion Middleware Administrator's Guide for Oracle Adaptive Access Manager are listed in this section.

Section F.3, "Configuring Language Defaults for Oracle Adaptive Access Manager should include the following note:

> **Note:** The only locales supported are the ones listed in enums.

Section F.7, "Adding Registration Questions,"Step 4, states that "By default, the **Locale** menu displays English and 26 other default locale languages." This is incorrect. It should say, "By default, the **Locale** menu displays English and 27 other default locale languages."

Section F.8, "Adding to the Abbreviation File" has been updated in the Release Notes. For updated information, refer to Section 32.3.1.

33

Oracle Authentication Services for Operating Systems

This chapter describes issues associated with Oracle Product. It includes the following topics:

-
-

33.1 What is New with Oracle Authentication Services for Operating Systems 11.1.1.3 ?

Oracle Fusion Middleware Release 11g R1 patchset 2 (11.1.1.3) is the first 11*g* release to include Oracle Authentication Services for Operating Systems. This product is also available as a download from `http://www.oracle.com/technology/`.

The following features and capabilities have been added to Oracle Authentication Services for Operating Systems since the 10*g* release:

- Full integration with Fusion Middleware Release 11g R1 patchset 2 (11.1.1.3). OAS4OS was not available with FMW 11g R1 or FMW 11g R1 patchset 1.

- Extended client platform support. For a full list see:
  `http://www.oracle.com/technology/software/products/ias/files/fusion_certification.html`.

- New configuration scripts to enable PAM proxy user-based access to Oracle Internet Directory for enhanced security.

- Easy configuration of Oracle Internet Directory SSL using customer provided certificates for production deployments, or use of self signed certificates to test OID SSL connections.

- Restricting client access based on IP address.

- Easy reset of client configuration to support testing.

33.2 General Issues and Workarounds

For up-to-date information about product bugs and updates, see Note 1064891.1: Oracle Authentication Services for Operating Systems Documentation Addendum (11.1.1.3). This document is available on My Oracle Support at `https://support.oracle.com/`.

34

Oracle Directory Integration Platform

This chapter describes issues associated with Oracle Directory Integration Platform. It includes the following topics:

- Section 34.1, "General Issues and Workarounds"
- Section 34.2, "Configuration Issues and Workarounds"
- Section 34.3, "Documentation Errata"

34.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Some Changes May Not Get Synchronized Due to Race Condition in Heavily-Loaded Source Directory
- Inconsistent Levels of Information Appear in the Oracle Directory Integration Platform Application's Logs
- Synchronization Continues After Stopping Oracle Directory Integration Platform
- syncProfileBootstrap Not Supported for SSL Mode 2 Server-Only Authentication
- Default Value for SearchTimeDeltaInSeconds Synchronization Profile Parameter
- DIP Tester Utility Not Currently Supported for 11g Release 1 (11.1.1)

34.1.1 Some Changes May Not Get Synchronized Due to Race Condition in Heavily-Loaded Source Directory

If the source directory is heavily-loaded, a race condition may occur where database commits cannot keep pace with updates to the lastchangenumber. If this race condition occurs, Oracle Directory Integration Platform may not be able to synchronize some of the changes.

To work around this issue, perform the following steps to enable database commits to keep pace with the lastchangenumber:

1. Increase the value of the synchronization profile's Scheduling Interval.

2. Control the number of times the search is performed on the source directory during a synchronization cycle by setting the searchDeltaSize parameter in the profile. Oracle suggests starting with a value of 10, then adjusting the value as needed.

34.1.2 Inconsistent Levels of Information Appear in the Oracle Directory Integration Platform Application's Logs

When a synchronization profile is initialized, the debugging log level for the Oracle Directory Integration Platform application is set to the debugging log level configured for that synchronization profile. If you have synchronization profiles configured with different debugging log levels, you may see various levels of information in the Oracle Directory Integration Platform application's logs.

To work around this issue, set the debugging log level in all synchronization profiles to the same level.

34.1.3 Synchronization Continues After Stopping Oracle Directory Integration Platform

If you stop the Oracle Directory Integration Platform application during synchronization, the synchronization process that the Quartz scheduler started will continue to run.

To work around this issue, restart the Oracle WebLogic Managed Server hosting Oracle Directory Integration Platform or redeploy the Oracle Directory Integration Platform application.

34.1.4 syncProfileBootstrap Not Supported for SSL Mode 2 Server-Only Authentication

The `syncProfileBootstrap` utility, which performs the initial migration of data between a connected target directory and Oracle Internet Directory based on a synchronization profile or LDIF file, is *not* supported for SSL mode 2 (Server-Only Authentication).

The `syncProfileBootstrap` utility is supported only for SSL mode 0 (No SSL) and SSL mode 1 (No Authentication).

34.1.5 Default Value for SearchTimeDeltaInSeconds Synchronization Profile Parameter

The default value for the SearchTimeDeltaInSeconds synchronization profile configuration parameter is 3600 seconds, or one hour. This default value may be too high for certain configurations. Oracle suggests starting with a value of 60 seconds, then adjusting the value as needed.

34.1.6 DIP Tester Utility Not Currently Supported for 11g Release 1 (11.1.1)

At the time of publication of these Release Notes, the DIP Tester utility is not supported for Oracle Directory Integration Platform 11g Release 1 (11.1.1).

Monitor My Oracle Support (formerly MetaLink) for updates regarding DIP Tester support for Oracle Directory Integration Platform 11g Release 1 (11.1.1). You can access My Oracle Support at http://support.oracle.com.

While the DIP Tester utility is not currently supported for Oracle Directory Integration Platform 11g Release 1 (11.1.1), you can use the manageSyncProfiles command and its testProfile operation to test a disabled synchronization profile to ensure it will successfully perform synchronization. Refer to the "Managing Synchronization Profiles Using manageSyncProfiles" section in the *Oracle Fusion Middleware Integration Guide for Oracle Identity Management* for more information about the testProfile operation.

34.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Do Not Use localhost as Oracle Internet Directory Hostname When Configuring Oracle Directory Integration Platform

34.2.1 Do Not Use localhost as Oracle Internet Directory Hostname When Configuring Oracle Directory Integration Platform

When configuring Oracle Directory Integration Platform against an existing Oracle Internet Directory—using either the installer's Install and Configure installation option or the Oracle Identity Management 11g Release 1 (11.1.1) Configuration Wizard—you must specify the hostname for Oracle Internet Directory using only its fully qualified domain name (such as myhost.example.com). *Do not* use `localhost` as the Oracle Internet Directory hostname even if Oracle Directory Integration Platform and Oracle Internet Directory are collocated on the same host.

If you use `localhost` as the Oracle Internet Directory hostname, you will not be able to start the Oracle WebLogic Managed Server hosting Oracle Directory Integration Platform.

34.3 Documentation Errata

There are no known documentation issues at this time.

35

Oracle Identity Federation

This chapter describes issues associated with Oracle Identity Federation. It includes the following topics:

- Section 35.1, "General Issues and Workarounds"
- Section 35.2, "Configuration Issues and Workarounds"
- Section 35.3, "Documentation Errata"

35.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 35.1.1, "Database Table for Authentication Engine must be in Base64 Format"
- Section 35.1.2, "Considerations for Oracle Identity Federation HA in SSL mode"

35.1.1 Database Table for Authentication Engine must be in Base64 Format

When using a database table as the authentication engine, and the password is stored hashed as either MD5 or SHA, it must be in base64 format.

The hashed password can be either in the base64-encoded format or with a prefix of {SHA} or {MD5}. For example:

```
{SHA}qUqP5cyxm6YcTAhz05Hph5gvu9M=
```

35.1.2 Considerations for Oracle Identity Federation HA in SSL mode

In a high availability environment with two (or more) Oracle Identity Federation servers mirroring one another and a load balancer at the front-end, there are two ways to set up SSL:

- Configure SSL on the load balancer, so that the SSL connection is between the user and the load balancer. In that case, the keystore/certificate used by the load balancer has a CN referencing the address of the load balancer.

  The communication between the load balancer and the WLS/Oracle Identity Federation can be clear or SSL (and in the latter case, Oracle WebLogic Server can use any keystore/certificates, as long as these are trusted by the load balancer).

- SSL is configured on the Oracle Identity Federation servers, so that the SSL connection is between the user and the Oracle Identity Federation server. In this case, the CN of the keystore/certificate from the Oracle WebLogic Server/Oracle

Identity Federation installation needs to reference the address of the load balancer, as the user will connect using the hostname of the load balancer, and the Certificate CN needs to match the load balancer's address.

In short, the keystore/certificate of the SSL endpoint connected to the user (load balancer or Oracle WebLogic Server/Oracle Identity Federation) needs to have its CN set to the hostname of the load balancer, since it is the address that the user will use to connect to Oracle Identity Federation.

35.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

35.2.1 WLST Environment Setup when SOA and OIF are in Same Domain

If your site contains Oracle SOA Suite and Oracle Identity Federation in the same domain, the `WLST` setup instructions in the *Oracle Fusion Middleware Administrator's Guide for Oracle Identity Federation* are insufficient for `WLST` to correctly execute Oracle Identity Federation commands.

This can happen if you install an IdM domain, then extend it with an Oracle SOA install; the SOA installer changes the `ORACLE_HOME` environment variable. This breaks the Oracle Identity Federation `WLST` environment, as it relies on the IdM value for `ORACLE_HOME`.

Take these steps to enable the use of `WLST` commands:

1. Execute the instructions described in Section 9.1.1, Setting up the WLST Environment, in the *Oracle Fusion Middleware Administrator's Guide for Oracle Identity Federation*.

2. Copy `OIF-ORACLE_HOME/fed/script/*.py` to `WL_HOME/common/wlst`.

3. Append the `CLASSPATH` environment variable with `OIF-ORACLE_HOME/fed/scripts`.

35.2.2 Oracle Virtual Directory Requires LSA Adapter

To use Oracle Virtual Directory as an Oracle Identity Federation user store or an authentication engine, you must configure a Local Storage Adapter, and the context root must be created as required at installation or post-install configuration time.

For details about this task, see the chapter Creating and Configuring Oracle Virtual Directory Adapters in the *Oracle Fusion Middleware Administrator's Guide for Oracle Virtual Directory*.

35.2.3 Settings for Remote WS-Fed SP Must be Changed Dynamically

On the Edit Federations page, the Oracle Identity Federation (OIF) settings for remote WS-Fed service provider contain a property called **SSO Token Type**; you can choose to either inherit the value from the IdP Common Settings page or override it here. The number of properties shown in 'OIF Settings' depends on the value of **SSO Token Type**.

If you choose to override **SSO Token Type** with a different value (for example, by changing from SAML2.0 to SAML1.1), the number of properties shown in 'OIF Settings' does not change until you click the **Apply** button.

Also, if you have overridden the value for **Default NameID Format** to 'Persistent Identifier' or 'Transient/One-Time Identifier', then changed the **SSO Token Type** value from 'SAML2.0' to 'SAML1.1' or 'SAML1.0', you will notice that the value for **Default NameID Format** is now blank. To proceed, you must reset this property to a valid value from the list.

35.2.4 Required Property when Creating a WS-Fed Trusted Service Provider

When you create a WS-Fed Trusted Service Provider, you must set the value for the 'Use Microsoft Web Browser Federated Sign-On' property with these steps:

1. In Fusion Middleware Control, navigate to **Federations**, then **Edit Federations**.

2. Choose the newly create WS-Fed Trusted Service Provider and click **Edit**.

3. In the 'Trusted Provider Settings' section, set the value for Use Microsoft Web Browser Federated Sign-On by checking or unchecking the check-box.

4. Click **Apply**.

35.2.5 Federated Identities Table not Refreshed After Record Deletion

When the federation store is XML-based, a record continues to be displayed in the federated identities table after it is deleted.

The following scenario illustrates the issue:

1. The federation data store is XML.

2. Perform federated SSO, using "map user via federated identity".

3. In Fusion Middleware Control, locate the Oracle Identity Federation instance, and navigate to **Administration**, then **Identities**, then **Federated Identities**.

4. Click on the created federation record and delete it.

After deletion, the federated record is still in the table. Further attempts at deleting the record result in an error.

The workaround is to manually refresh the table by clicking **Search**.

35.2.6 Default Authentication Scheme is not Saved

Problem

This problem is seen when you configure Oracle Access Manager in Fusion Middleware Control as a Service Provider Integration Module. It is not possible to set a default authentication scheme since the default is set to a certain scheme (say `OIF-password-protected`) but the radio button is disabled.

Solution

Take these steps to set the preferred default authentication scheme:

1. Check the **Create** check-box for the scheme that is currently set as the default but disabled.

2. Check the **Create** check-box(es) for the authentication scheme(s) that you would like to create.

3. Click the radio button of the scheme that you wish to set as the default.

4. Uncheck the **Create** check-box of the scheme in Step 1 only if you do not want to create the scheme.

5. Provide all the required properties in the page.

6. Click the **Configure Oracle Access Manager** button to apply the changes.

The default authentication scheme is now set to the one that you selected.

> **Note:** In addition, when trying to remove any authentication scheme, ensure that you do not remove the default scheme; if you must remove the scheme, change the default to another authentication scheme before you remove the scheme.

35.2.7 Configuring 10g to Work with 11g Oracle Identity Federation using Artifact Profile

In the SAML 1.x protocol, for a 10g Oracle Identity Federation server to work with an 11g Oracle Identity Federation server using the Artifact profile, you need to set up either basic authentication or client cert authentication between the two servers.

For instructions, see:

- Section 6.9 Protecting the SOAP Endpoint, in the *Oracle Fusion Middleware Administrator's Guide for Oracle Identity Federation*, 11g Release 1 (11.1.1)

- Section 6.5.13.2 When Oracle Identity Federation is an SP, in the *Oracle Identity Federation Administrator's Guide*, 10g (10.1.4.0.1)

35.3 Documentation Errata

This section describes documentation errata for the *Oracle Fusion Middleware Administrator's Guide for Oracle Identity Federation*, part number E13400-01. It includes the following topics:

- Section 35.3.1, "Different Passwords for Keystore and Private Key not Supported"

- Section 35.3.2, "Documentation Erratum for Deploying Oracle Identity Federation"

- Section 35.3.3, "Documentation Erratum for Configuring Security and Trust"

- Section 35.3.4, "Additional Steps for SSL Configuration"
- Section 35.3.5, "ParseException Message in Diagnostic Log"

35.3.1 Different Passwords for Keystore and Private Key not Supported

Oracle Identity Federation only supports configuring one password for signing and encryption keystores, and uses that password to open both the keystore and the private key. This means that if a keystore is configured with different store password and key password, an error will occur when Oracle Identity Federation tries to access the private key.

To avoid this error, ensure that the private key password for the configured key alias is the same as the keystore password.

> **Note:** In Oracle Identity Federation 11g Release 1 (11.1.1), if you change the key password to match the keystore password, you must remove the old keystore/wallet from the configuration.

35.3.2 Documentation Erratum for Deploying Oracle Identity Federation

In Section 3.2.2.2, "Integrate Oracle Single Sign-On with OHS", replace the following set of instructions:

Copy `$AS_INST/config/OHS/$OHS_NAME/disabled/mod_osso.conf` to `$AS_INST/config/OHS/$OHS_NAME/moduleconf`. All files in the `moduleconf` directory are read when OHS is started.

Open the `$AS_INST/config/OHS/$OHS_NAME/moduleconf/mod_osso.conf` file and set the `OssoConfigFile` directive to reference the Oracle Single Sign-On configuration file that was created and then copied to the OHS `config` directory:

```
OssoConfigFile ${ORACLE_INSTANCE}/config/${COMPONENT_TYPE}/${COMPONENT_
NAME}/oif.server.com.osso.conf
```

with the following text:

Copy `$AS_INST/config/OHS/$OHS_NAME/disabled/mod_osso.conf` to `$AS_INST/config/OHS/$OHS_NAME/moduleconf`. All files in the `moduleconf` directory are read when OHS is started.

Open the `$AS_INST/config/OHS/$OHS_NAME/moduleconf/mod_osso.conf` file. Set the `OssoConfigFile` directive to reference the Oracle Single Sign-On configuration file that was created and then copied to the OHS `config` directory:

```
OssoConfigFile ${ORACLE_INSTANCE}/config/${COMPONENT_TYPE}/ ${COMPONENT_
NAME}/oif.server.com.osso.conf
```

Add the `/fed/user/authnosso` URL to be protected by Oracle SSO Server, through the `Location` element.

Then the `mod_osso.conf` example would look like this:

```
LoadModule osso_module ${ORACLE_HOME}/ohs/modules/mod_osso.so

<IfModule mod_osso.c>
    OssoIpCheck off
    OssoIdleTimeout off
    OssoConfigFile ${ORACLE_INSTANCE}/config/${COMPONENT_TYPE}/
    ${COMPONENT_NAME}/oif.server.com.osso.conf
```

```
                <Location /fed/user/authnosso>
                   require valid-user
                   AuthType Osso
                </Location>
            </IfModule>
```

35.3.3 Documentation Erratum for Configuring Security and Trust

In Section 5.10.3, "Security and Trust - Trusted CAs and CRLs", change the following sentence:

"When the certificate validation store is enabled, Oracle Identity Federation uses it to validate the certificates needed to verify the signatures on incoming messages."

to read:

"When the certificate validation store is enabled, Oracle Identity Federation uses it to validate the certificates needed to verify the signatures on incoming SAML/WS-Federation messages."

35.3.4 Additional Steps for SSL Configuration

In Section 8.2.2, "Configuring Oracle Identity Federation as an SSL Client," add the following subsection, which shows the steps needed to ensure that Fusion Middleware Control can continue to manage the Oracle Identity Federation server after SSL is enabled for the Admin server and the managed server hosting Oracle Identity Federation:

Ensuring that Fusion Middleware Control can Manage an Oracle Identity Federation Target

Take these steps:

1. Locate $INSTANCE_HOME/EMAGENT/EMAGENT/sysman/emd/targets.xml.

    Change the protocol for the 'serviceURL' property to the correct protocol. If you have more than one Oracle Identity Federation target (besides host and oracle_emd), you need to modify the 'serviceURL' for each target.

2. Locate $INSTANCE_HOME/EMAGENT/EMAGENT/sysman/config/emd.properties.

    If necessary, update the protocol for 'REPOSITORY_URL' to the correct protocol. The EM Agent uses this property to connect to Fusion Middleware Control.

3. Stop the EM Agent using the command:

    ```
    $INSTANCE_HOME/bin/opmnctl stopproc ias-component=EMAGNET
    ```

4. Secure the EM Agent using the command:

    ```
    $INSTANCE_HOME/EMAGENT/EMAGENT/bin/emctl secure fmagent -admin_host
    <host> -admin_port <port> -admin_user <username> [-admin_pwd <pwd>]
    ```

5. Restart the EM Agent using the command:

    ```
    $INSTANCE_HOME/bin/opmnctl startproc ias-component=EMAGNET
    ```

35.3.5 ParseException Message in Diagnostic Log

After installation, a configuration assistant performs a number of configuration updates to the Oracle Identity Federation server using MBeans. Another task periodically checks to see if the configuration files were changed so that the server can be notified.

A parsing error during this procedure can result in the following type of message in the diagnostic log file:

```
$DOMAIN_HOME/servers/wls_oif1/logs/wls_oif1-diagnostic.log
.
[org.xml.sax.SAXParseException: XML document structures must start and end
within the same entity.]
at
javax.xml.bind.helpers.AbstractUnmarshallerImpl.createUnmarshalExcept
ion(AbstractUnmarshallerImpl.java:315)
at
com.sun.xml.bind.v2.runtime.unmarshaller.UnmarshallerImpl.createUnmar
shalException(UnmarshallerImpl.java:514)
at
com.sun.xml.bind.v2.runtime.unmarshaller.UnmarshallerImpl.unmarshal0(
UnmarshallerImpl.java:215)
at
com.sun.xml.bind.v2.runtime.unmarshaller.UnmarshallerImpl.unmarshal(U
nmarshallerImpl.java:184)
at
javax.xml.bind.helpers.AbstractUnmarshallerImpl.unmarshal(AbstractUnm
arshallerImpl.java:137)
at
javax.xml.bind.helpers.AbstractUnmarshallerImpl.unmarshal(AbstractUnm
arshallerImpl.java:184)
at
oracle.as.config.persistence.jaxb.JAXBXmlPersistenceManagerImpl.load(
JAXBXmlPersistenceManagerImpl.java:156)
... 10 more
Caused by: org.xml.sax.SAXParseException: XML document structures must start
and
 end within the same entity.
at
com.sun.org.apache.xerces.internal.util.ErrorHandlerWrapper.createSAX
ParseException(ErrorHandlerWrapper.java:195)
at
com.sun.org.apache.xerces.internal.util.ErrorHandlerWrapper.fatalErro
r(ErrorHandlerWrapper.java:174)
.
```

Provided that the Oracle Identity Federation server is up and running (/fed/idp/metadata can be accessed without any errors), the message is harmless and has no effect on the stability of the server. The configuration change occurs as intended, and all the servers are notified of the change.

36

Oracle Identity Manager

This chapter describes issues associated with Oracle Identity Manager. It includes the following topics:

36.1 Patch Requirements for Oracle Database 11*g* (11.1.0.7)

The following patches are required for Oracle Identity Manager 11g Release 1 (11.1.1) configurations that use Oracle Database 11*g* (11.1.0.7). Before you configure Oracle Identity Manager 11*g*, be sure to apply the patches described in Table 36–1 to your Oracle Database 11g (11.1.0.7) database.

> **Note:** On Windows, rather than applying the individual patches listed in Table 36–1, you can apply only Patch 8689199 to resolve all issues. The description of patch 8689199 on My Oracle Support is "ORACLE 11G 11.1.0.7 PATCH 16 BUG FOR WINDOWS (64-BIT AMD64 AND INTEL EM64T)."

Table 36–1 Required Patches for Oracle Database 11g (11.1.0.7)

Patch Number on My Oracle Support	Description and Purpose
7614692	The description of this patch on My Oracle Support is "BULK FEATURE WITH 'SAVE EXCEPTIONS' DOES NOT WORK IN ORACLE 11G".
	The equivalent patch for the Windows platform is 8416539.
7000281	The description of this patch on My Oracle Support is "DIFFERENCE IN FORALL STATEMENT BEAHVIOUR IN 11G."
	The equivalent patch for the Windows platform is 7375105.
8327137	The description of this patch on My Oracle Support is "WRONG RESULTS WITH INLINE VIEW AND AGGREGATION FUNCTION."
	The equivalent patch for the Windows platform is 8451592.

Table 36–1 (Cont.) Required Patches for Oracle Database 11g (11.1.0.7)

Patch Number on My Oracle Support	Description and Purpose
8617824	The description of this patch on My Oracle Support is "MERGE LABEL REQUEST ON TOP OF 11.1.0.7 FOR BUGS 7628358 7598314." This patch includes patches 7598314 and 7628358, which were previously required for an Oracle Identity Manager database.

36.1.1 Obtaining Patches and Support Documents From My Oracle Support (Formerly OracleMetaLink)

To obtain a patch, log in to My Oracle Support (formerly OracleMetaLink) using the following URL, click Patches and Updates, and search for the patch number:

http://metalink.oracle.com/

To obtain a support note or document, log in to My Oracle Support and enter the support note number in the Quick Find search field at the top of the My Oracle Support window and search the Knowledge Base for the note number.

36.2 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Browser Timezone Not Displayed

- Date Format Change in the SoD Timestamp Field Not Supported

- Bulk Loading CSV Files with UTF-8 BOM Encoding Not Supported

- Date Type Attributes are Not Supported for the Default Scheduler Job, "Job History Archival"

- Default Object Administrators Are Not Available for Imported Resource Objects

- How to Generate an Audit Snapshot after Bulk-Loading Users or Accounts

- Low File Limits Prevent Adapters from Compiling

- Reconciliation Engine Requires Matching Rules

- SPML Requests Do Not Report When Any Date is Specified in Wrong Format

- Logs Populated with SoD Exceptions When the SoD Message Fails and Gets Stuck in the Queue

- SoD Check Field Values Do Not Get Mapped from Request Dataset to Process Form in SAP UM

- Underscore Character Cannot Be Used When Searching for Resources

- Assign to Administrator Action Rule is Not Supported by Reconciliation

- Some Buttons on Attestation Screens Do Not Work in Firefox

- The maxloginattempts System Property Causes Autologin to Fail When User Tries to Unlock

- "<User not found>" Error Message Appears in AdminServer Console While Setting-Up an Oracle Identity Manager-Oracle Access Manager Integration

- Using a Single Quote in Request Matching Rule Causes Reconciliation to Fail

- Do Not Use Roles with Special Characters in JDev
- SoD Check During Request Provisioning Fails While Using SAML Token Client Policy When Default SoD Composite is Used

36.2.1 Browser Timezone Not Displayed

Due to an ADF limitation, the browser timezone is currently not accessible to Oracle Identity Manager. Oracle Identity Manager bases the timezone information in all date values on the server's timezone. Consequently, end users will see timezone information in the date values, but the timezone value will display the server's timezone.

36.2.2 Date Format Change in the SoD Timestamp Field Not Supported

The date-time value that end users see in the Segregation of Duties (SoD) Check Timestamp field on the SoD Check page will always display as "YYYY-MM-DD hh:mm:ss" and this format cannot be localized.

To work around this localization issue, perform the following steps:

1. Open the "Oracle_eBusiness_User_Management_ 9.1.0.1.0/xml/Oracle-eBusinessSuite-TCA-Main-ConnectorConfig.xml" file.

2. In the EBS Connector import xml, locate the SoDCheckTimeStamp field for the Process Form. Change <SDC_FIELD_TYPE> to 'DateFieldDlg' and change <SDC_ VARIANT_TYPE> to 'Date' as shown in the following example:

```
<FormField name = "UD_EBST_USR_SODCHECKTIMESTAMP">
            <SDC_UPDATE>!Do not change this field!</SDC_UPDATE>
            <SDC_LABEL>SoDCheckTimestamp</SDC_LABEL>
            <SDC_VERSION>1</SDC_VERSION>
            <SDC_ORDER>23</SDC_ORDER>
            <SDC_FIELD_TYPE>DateFieldDlg</SDC_FIELD_TYPE>
            <SDC_DEFAULT>0</SDC_DEFAULT>
            <SDC_ENCRYPTED>0</SDC_ENCRYPTED>
            <!--SDC_SQL_LENGTH>50</SDC_SQL_LENGTH-->
            <SDC_VARIANT_TYPE>Date</SDC_VARIANT_TYPE>
        </FormField>
```

3. Import the Connector.

4. Enable SoD Check.

5. Provision the EBS Resource with entitlements to trigger an SoD Check.

6. Check the SoDCheckTimeStamp field in Process Form to confirm it is localized like the other date fields in the form.

36.2.3 Bulk Loading CSV Files with UTF-8 BOM Encoding Not Supported

Bulk loading a CSV file for which UTF-8 BOM (byte order mark) encoding is specified causes an error. However, bulk-loading UTF-8 encoded CSV files works as expected if you specify "no BOM" encoding.

To work around this issue,

- If you want to load non-ASCII data, you must change your CSV file encoding to "UTF-8 no BOM" before loading the CSV file.

- If your data is stored in CSV files with "UTF-8 BOM" encoding, you must change them to "UTF-8 no BOM" encoding before running the bulkload script.

36.2.4 Date Type Attributes are Not Supported for the Default Scheduler Job, "Job History Archival"

The default Scheduler job, "Job History Archival," does not support date type attributes.

The "Archival Date" attribute parameter in "Job History Archival" only accepts string patterns such as "ddMMyyyy" and "MMM DD, yyyy."

When you run a Scheduler job, the code checks the date format. If you enter the wrong format, an error similar to the following example, displays in the execution status list and in the log console:

<IAM-1020063> <Incorrect format of Archival Date parameter. Archival Date is expected in DDMMYYYY or UI Date format.>

The job cannot run successfully until you input the correct Archival Date information.

36.2.5 Default Object Administrators Are Not Available for Imported Resource Objects

When you create a resource using the Design Console, Oracle Identity Manager adds approximately 23 default roles as "Administrators." However, when you import a resource, only the default "System Administrator" role is available.

Oracle Identity Manager only associates imported resources with the "System Administrator" role, so just the one relationship with the "System Administrator" role is imported with the resource.

To work around this issue, you (or a Resource Administrator) must manually add the additional roles based on your requirements.

36.2.6 How to Generate an Audit Snapshot after Bulk-Loading Users or Accounts

The GenerateSnapshot.[sh | bat] option does not work correctly when invoked from the Bulkload utility.

To work around this issue and generate a snapshot of the initial audit after bulk loading users or accounts, you must run GenerateSnapshot.[sh | bat] from the $*OIM_HOME*/bin/ directory.

36.2.7 Low File Limits Prevent Adapters from Compiling

On machines where the file limits are set too low, trying to create and compile an entity adapter causes a "Too many open files" error and the adapter will not compile.

To work around this issue, change the file limits on your machine to the following (located in /etc/security/limits.conf) and then restart the machine:

- ```
  softnofile 4096
  ```

- ```
  hardnofile 4096
  ```

36.2.8 Reconciliation Engine Requires Matching Rules

Currently, Oracle Identity Manager's Reconciliation Engine in 11g Release 1 (11.1.1) requires you to define a matching rule to identify the users for every connector in reconciliation. Errors will occur during reconciliation if you do not define a matching rule to identify users.

36.2.9 SPML Requests Do Not Report When Any Date is Specified in Wrong Format

When any date, such as activeStartDate, hireDate, and so on, is specified in an incorrect format, the Web server does not pass those values to the SPML layer. Only valid dates are parsed and made available to SPML. Consequently, any SPML request that contains an invalid date format is ignored and not available for that operation. For example, if you specify the HireDate month as "8" instead of "08," the HireDate will not be populated after the Create request is completed and no error message is displayed.

The supported date format is:

`yyyy-MM-dd hh:mm:ss.fffffffff`

No other date format is supported.

36.2.10 Logs Populated with SoD Exceptions When the SoD Message Fails and Gets Stuck in the Queue

SoD functionality uses JMS-based processing. Oracle Identity Manager submits a message to the oimSODQueue for each SoD request. If for some reason an SoD message always results in an error, Oracle Identity Manager never processes the next message in the oimSODQueue. Oracle Identity Manager always picks the same error message for processing until you delete that message from the oimSODQueue.

To work around this issue, use the following steps to edit the queue properties and to delete the SoD message in oimSODQueue:

1. Log on to the Weblogic Admin Console at http://<hostname>:<port>/console
2. From the Console, select Services, Messaging, JMS Modules.
3. Click **OIMJMSModule**. All queues will be displayed.
4. Click oimSODQueue.
5. Select the Configurations, Delivery Failure tabs.
6. Change the retry count so that the message can only be submitted a specified number of times.
7. Change the default Redelivery Limit value from -1 (which means infinite) to a specific value. For example, if you specify 1, the message will be submitted only once.
8. To review and delete the SoD error message, go to the Monitoring tab, select the message, and delete it.

36.2.11 SoD Check Field Values Do Not Get Mapped from Request Dataset to Process Form in SAP UM

SoD Check field values do not get mapped from the request dataset to the process form in the SAP Connector because the SoD Check fields defined in the common dataset expect different labels than those currently provided in the connector.

To work around this issue, you must change the Process Form field labels in the SAP Connector to the following values:

- SoDCheckStatus

- SoDCheckTrackingID

- SoDCheckResult

- SoDCheckTimestamp

- SoDCheckEntitlementViolation

36.2.12 Underscore Character Cannot Be Used When Searching for Resources

When you are searching for a resource object, do not use an underscore character (_) in the resource name. The search feature ignores the underscore and consequently does not return the expected results.

36.2.13 Assign to Administrator Action Rule is Not Supported by Reconciliation

Reconciliation does not support the Assign to Administrator Action rule.

To work around this issue, change the Assign to Administrator to `None` in the connector XML before importing the connector. However, after changing the value to None, you cannot revert to Assign to Administrator.

36.2.14 Some Buttons on Attestation Screens Do Not Work in Firefox

If you are creating attestations in a Firefox Web browser and you click certain buttons, nothing happens.

To work around this issue, click the **Refresh** button to refresh the page.

36.2.15 The maxloginattempts System Property Causes Autologin to Fail When User Tries to Unlock

WLS Security Realm has a default lock-out policy that locks out users for some time after several unsuccessful login attempts. This policy can interfere with the locking and unlocking functionality of Oracle Identity Manager.

To prevent the WLS Security Realm lock-out policy from affecting the lock/unlock functionality of Oracle Identity Manager, you must set the 'Lockout Threshold' value in the WLS 'User Lockout Policy' to at least 5 more than the value in Oracle Identity Manager. For example, if the value in Oracle Identity Manager is set to 10, you must set the WLS 'Lockout Threshold' value to 15.

To change the default values for the 'User lockout Policy,' perform the following steps:

1. Open the WebLogic Server Administrative Console.

2. Select **Security Realms**, *REALM_NAME*.

3. Select the **User Lockout** tab.

4. If configuration editing is not enabled, then click the **Lock and Edit** button to enable configuration editing.

5. Change the value of lockout threshold to the required value.

6. Click **Save** to save the changes.

7. Click **Activate** to activate your changes.

8. Restart all the servers in the domain.

36.2.16 "<User not found>" Error Message Appears in AdminServer Console While Setting-Up an Oracle Identity Manager-Oracle Access Manager Integration

When you set up Oracle Identity Manager-Oracle Access Manager Integration with a JAVA agent and log into the Admin Server Console, a "<User not found>" error message is displayed. This message displays even when the login is successful.

36.2.17 Using a Single Quote in Request Matching Rule Causes Reconciliation to Fail

If you use single quotes in a Request Matching rule (for example, 'B'1USER1'), reconciliation will fail with an exception.

36.2.18 Do Not Use Roles with Special Characters in JDev

Due to a limitation in SOA Infrastructure, do not use special characters such as commas (,) in role names, group names, or container descriptions when reconciling roles from LDAP. Oracle Identity Manager's internal code uses special characters as delimiters. For example, Oracle Identity Manager uses commas (,) as approver delimiters and the SOA HWF-level global configuration uses commas as assignee delimiters.

36.2.19 SoD Check During Request Provisioning Fails While Using SAML Token Client Policy When Default SoD Composite is Used

SoD check fails and the following error is displayed on the SOA console when SoD check is performed during request provisioning only when the Default SoD Check composite is used:

```
SEVERE: FabricProviderServlet.handleException Error during retrieval of test page
or composite resourcejavax.servlet.ServletException:
java.lang.NullPointerException
```

This happens when Callback is made from OIM to SOA with the SoDCheck Results.

To resolve this issue, apply patch 9819201 on the SOA server. You can obtain patch 9819201 from My Oracle Support. The description of this patch on My Oracle Support is "ERROR WHILE USING SAML TOKEN CLIENT POLICY FOR CALLBACK."

For more information, refer to Obtaining Patches and Support Documents From My Oracle Support (Formerly OracleMetaLink).

36.3 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- ADF Issue Causes Oracle Identity Manager to Fail on the Sun JDK

36.3.1 ADF Issue Causes Oracle Identity Manager to Fail on the Sun JDK

Due to an ADF issue, using the Oracle Identity Manager application with the Sun JDK causes a StringIndexOutOfBoundsException error. To work around this issue, add the following option to the DOMAIN_HOME/bin/setSOADomainEnv.sh or the setSOADomainEnv.cmd file:

1. Open the *DOMAIN_HOME*/bin/setSOADomainEnv.sh or setSOADomainEnv.cmd file.

2. Add the -XX:-UseSSE42Intrinsics line to the JVM options.

3. Save the setSOADomainEnv.sh or setSOADomainEnv.cmd file.

> **Note:** This error does not occur when you use JRockit.

36.4 Multi-Language Support Issues and Limitations

This section describes multi-language issues and limitations. It includes the following topics:

- Multi-language Valued Attributes in SPML and Oracle Identity Manager Do Not Match

- Login Names with Some Special Characters May Fail to Register

- The Create Role, Modify Role, and Delete Role Request Templates are Not Available for Selection in the Request Templates List

- Parameter Names and Values for Scheduled Jobs are Not Translated

- Bidirectional Issues for Legacy User Interface

- Localization of Role Names, Role Categories, and Role Descriptions Not Supported

- Localization of Task Names in Provisioning Task Table Not Supported

- Localization of Search Results of Scheduled Tasks Not Supported

- Searching for User Login Names Containing Certain Turkish Characters Causes an Error

- Localization of Notification Template List Values for Available Data Not Supported

- Searching for Entity Names Containing German "ß" (Beta) Character Fails in Some Features

- Special Asterisk (*) Character Not Supported

- Translated Error Messages Are Not Displayed in UI

- Reconciliation Table Data Strings are Hard-coded on Reconciliation Event Detail Page

36.4.1 Multi-language Valued Attributes in SPML and Oracle Identity Manager Do Not Match

Oracle Identity Manager supports only the Display Name attribute for multi-language values. SPML specifies additional attributes, such as commonName and surname, as multi-language valued in the PSO schema. When multiple locale-values are specified in an SPML request for one of these attributes, only a single value is picked and passed to Oracle Identity Manager. The request will not fail and a warning message identifying the attributes and the value that was passed to Oracle Identity Manager is provided in the response.

36.4.2 Login Names with Some Special Characters May Fail to Register

In Oracle Identity Manager, the user login name is case-insensitive. When a user is created, the login name is converted to upper case and saved in the database. But the password is always case-sensitive. However, some special characters may encounter an error while registering to Oracle Identity Manager:

- Both the Greek characters σ (sigma) and ς (final sigma) maps to the Σ character.

- Both English character i and Turkish character ı maps to the I character.

- Both German character ß and English string SS maps to the SS string.

This means that two user login names containing these special characters when the other characters in the login names are same cannot be created. For example, the user login names Johnß and JohnSS maps to the same user login name. If Johnß already exists, then creation of JohnSS is not allowed because both the ß character and the SS string maps to the SS string.

36.4.3 The Create Role, Modify Role, and Delete Role Request Templates are Not Available for Selection in the Request Templates List

The Create Role, Modify Role, and Delete Role request templates are not available in the Request Templates list of the Create Request wizard. This is because request creation by using any request template that are based on the Create Role, Modify Role, and Delete Role request models are supported from the APIs, but not in the UI. However, you can search for these request templates in the Request Templates tab. In addition, the Create Role, Modify Role, and Delete Role request models can be used to create approval policies and new request templates.

36.4.4 Parameter Names and Values for Scheduled Jobs are Not Translated

In the Create Job page of Oracle Identity Manager Advanced Administration, the fields in the Parameter section and their values are not translated. The parameter field names and values are available only in English.

36.4.5 Bidirectional Issues for Legacy User Interface

The following are known issues in the legacy user interface, also known as TransUI, contained in the xlWebApp war file:

- Hebrew bidirectional is not supported

- Workflow designer bidirectional is not supported for Arabic and Hebrew

36.4.6 Localization of Role Names, Role Categories, and Role Descriptions Not Supported

Localization of role names, categories, and descriptions is not supported in this release.

36.4.7 Localization of Task Names in Provisioning Task Table Not Supported

All Task Name values in the Provisioning Task table list are hard-coded and these pre-defined process task names are not localized.

36.4.8 Localization of Search Results of Scheduled Tasks Not Supported

When you search Scheduler Tasks using a Simple or Advanced search, the search results are not localized.

36.4.9 Searching for User Login Names Containing Certain Turkish Characters Causes an Error

On the Task Approval Search page, if you select "View Tasks Assigned To", then "Users You Manage", and then choose a user whose login name contains a Turkish Undotted "&#305" or a Turkish dotted "&#304" character, a User Not Found error will result.

36.4.10 Localization of Notification Template List Values for Available Data Not Supported

Localizing Notification Template Available Data list values is not supported in this release. Oracle Identity Manager depends upon the Velocity framework to merge tokens with actual values, and Velocity framework does not allow a space in token names.

36.4.11 Searching for Entity Names Containing German "ß" (Beta) Character Fails in Some Features

When you search for entity names containing the special German "ß" (beta) character from the Admin Console, the search fails in the following features:

- System Configuration
- Request Template
- Approve Policy
- Notification

In these features, the "ß" character matches to "ss" instead of itself. Consequently, the Search function cannot find entity names that contain the German beta character.

36.4.12 Special Asterisk (*) Character Not Supported

Although special characters are supported in Oracle Identity Manager, using the asterisk character (*) can cause some issues. You are advised not to use the asterisk character when creating or modifying user roles and organizations.

36.4.13 Translated Error Messages Are Not Displayed in UI

Oracle Identity Manager does not support custom resource bundles for Error Message display in user interfaces. Currently, there is no workaround for this issue.

36.4.14 Reconciliation Table Data Strings are Hard-coded on Reconciliation Event Detail Page

Some of the table data strings on the Reconciliation Event Detail page are hard-coded, customized field names. These strings are not localized.

36.5 Documentation Errata

Currently, there are no documentation issues to note.

37

Oracle Identity Navigator

This chapter describes issues associated with Oracle Identity Navigator. It includes the following topics:

- Section 37.1, "General Issues and Workarounds"
- Section 37.2, "Configuration Issues and Workarounds"
- Section 37.3, "Documentation Errata"

37.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topics:

- Section 37.1.1, "Avoid Selecting Reset Page in Dashboard Edit Mode"
- Section 37.1.2, "How to Navigate Product Registration Using the Keyboard"
- Section 37.1.3, "How to Navigate Product Discovery When Using the Keyboard"
- Section 37.1.4, "Color Contrast is Inadequate for Some Labels in Edit Mode"
- Section 37.1.5, "No Help Topic in Dashboard Edit Mode"

37.1.1 Avoid Selecting Reset Page in Dashboard Edit Mode

If you select **Customize** to personalize the Dashboard, then click **Reset Page**, expect an error message. Reload Oracle Identity Navigator to recover from this error.

37.1.2 How to Navigate Product Registration Using the Keyboard

In the Product Registration section of the Administration screen, after you enter data into all the fields in the right pane, you must enter many Tab strokes to reach the **Test**, **Save**, or **Cancel** button. As a workaround, you can use Shift-Tab to move in the opposite direction.

You cannot use the Tab key alone to navigate the left pane of the Product Registration section. Use the Tab to move focus to the first category, then click the left or right arrow keys to expand and collapse the tree. Use the up and down arrow keys to navigate the nodes.

37.1.3 How to Navigate Product Discovery When Using the Keyboard

When you use **Product Discovery** to discover consoles, you enter a **Host** and **Port**, then click **Next**. Then, in the Add Products pane, you enter a **Display Name** for each of the products. If you want to change the display name, you must delete the entire

name to retype it. Alternatively, you can enter the F2 key to switch to insert mode, then use left and right arrow keys to move around the display name characters.

You cannot use the arrow keys alone to navigate through the Category list on the Add Products pane. Inside the editable table, use the F2 key to focus on a field, then use up and down arrows to make a selection within the field.

37.1.4 Color Contrast is Inadequate for Some Labels in Edit Mode

After clicking **Customize** to change the layout of the Dashboard, some users might find certain labels, such as **+ Add Content**, difficult to read, due to poor contrast.

37.1.5 No Help Topic in Dashboard Edit Mode

If you select **Customize** to personalize the Dashboard, then click the**?** icon for **Oracle Composer Help**, the help page displays `Topic Not Found`.

See "Personalizing Oracle Identity Navigator" in *Oracle Fusion Middleware Administrator's Guide for Oracle Identity Navigator* for more information about personalizing the Dashboard.

37.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 37.2.1, "No Oracle Icon is Visible in HTML Reports"
- Section 37.2.2, "Problems with Administration Screen When Using JAWS Screen Reader"
- Section 37.2.3, "SSO-Protected Consoles Must Be Configured by Name and Domain"

37.2.1 No Oracle Icon is Visible in HTML Reports

If you choose HTML as the format type when adding a report from the Dashboard screen, when you view the report, the words **An Image** appear in the report in place of the Oracle icon.

37.2.2 Problems with Administration Screen When Using JAWS Screen Reader

When you use a screen reader such as JAWS with the Administration screen in accessibility mode, and you bring up the list of combo boxes using the INS+CTRL+C JAWS keystroke, the combo boxes on the screen are listed as:

*Required Category(Required) Combo box

*Required Type(Required) Combo box

With this naming convention, keyboard shortcuts such as **C** for **C**ategory or **T** for **T**ype do not work. Use the up and down arrow keys to navigate to fields within and between the two combo boxes.

37.2.3 SSO-Protected Consoles Must Be Configured by Name and Domain

Sometimes, when you use product discovery to find a console, even if you provide the host by name, the discovered address that fills in contains an IP address instead of the host and domain names.

If the console is protected by SSO, replace the IP address with the `host.domain` address that is known to SSO. For example, use an address such as `http://myhost.mycompany.com:7005/odsm` rather than `http://130.35.10.10:7005/odsm`. If you do not replace the IP address with the host and domain, single sign-on will not occur. That is, when users attempt to access the console from Oracle Identity Navigator, they will be prompted for their login name and password.

In some browsers, a redirection or connection error occurs.

37.3 Documentation Errata

This section describes documentation errata. It includes the following topic:

- Section 37.3.1, "IPv4/IPv6 Translation Issues"

37.3.1 IPv4/IPv6 Translation Issues

The following statement appears in the Troubleshooting section in Chapter 2 and in a note in Chapter 3 of *Oracle Fusion Middleware Administrator's Guide for Oracle Identity Navigator*:

In a dual-stack, IPv4 and IPv6 environment, some URLs might be inaccessible from your browser. Consult your network administrator for more information.

Actually, in a correctly configured dual-stack environment, all URLs are accessible. For more information about IPv4/IPv6 Translation Issues, see *Framework for IPv4/IPv6 Translation draft-ietf-behave-v6v4-framework-09* at: `http://www.ietf.org/`

38

Oracle Internet Directory

This chapter describes issues associated with Oracle Internet Directory. It includes the following topics:

- Section 38.1, "General Issues and Workarounds"
- Section 38.2, "Configuration Issues and Workarounds"
- Section 38.3, "Documentation Errata"

38.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topic:

- Section 38.1.1, "ODSM Browser Window Becomes Unusable"
- Section 38.1.2, "In ldapdelete Command -V Should Be The Last Parameter"
- Section 38.1.3, "Bulkmodify Might Generate Errors"
- Section 38.1.4, "Turkish Dotted I Character is Not Handled Correctly"
- Section 38.1.5, "OIDCMPREC Might Modify Operational Attributes"
- Section 38.1.6, "OIDREALM Does Not Support Realm Removal"
- Section 38.1.7, "Do Not Use Replication Wizard to Change the Primary Replica"

38.1.1 ODSM Browser Window Becomes Unusable

Under certain circumstances, after you launch ODSM from Fusion Middleware Control, then select a new ODSM task, the browser window might become unusable. For example, the window might refresh repeatedly, appear as a blank page, fail to accept user input, or display a null pointer error.

As a workaround, go to the URL: `http://host:port/odsm`, where *host* and *port* specify the location where ODSM is running, for example, `http://myserver.example.com:7005/odsm`. You can then use the ODSM window to log in to a server.

38.1.2 In ldapdelete Command -V Should Be The Last Parameter

For certain platforms command ldapdelete considers everything after `-v`, as parameter. A typical ldapdelete command looks like this:

```
ldapdelete -h hostname  -p portname  -v 's' -D cn=orcladmin -w welcome1
```

For Linux x86-64 and Microsoft Windows x64 the command mentioned here works fine. However, for Solaris Operating System (SPARC 64-Bit), AIX Based Systems (64-Bit), HP-UX PA-RISC (64-Bit), HP-UX Itanium platforms the above command fails.

Workaround

Use the flag `-v` as the last parameter when running the ldapdelete command. For example:

```
ldapdelete -h hostname  -p portname -D cn=orcladmin -w welcome1  -v 's'
```

38.1.3 Bulkmodify Might Generate Errors

If Oracle Internet Directory is using Oracle Database 11*g* Release 1 (11.1.0.7.0), you might see `ORA-600` errors while performing `bulkmodify` operations. To correct this problem, apply the fixes for Bug 7019313 and Bug 7614692 to the Oracle Database.

38.1.4 Turkish Dotted I Character is Not Handled Correctly

Due to a bug, Oracle Internet Directory cannot handle the upper-case dotted I character in the Turkish character set correctly. This can cause problems in Oracle Directory Services Manager and in command-line utilities.

38.1.5 OIDCMPREC Might Modify Operational Attributes

By default, the `oidcmprec` tool excludes operational attributes during comparison.That is, `oidcmprec` does not compare the operational attributes values in source and destination directory entries. During reconciliation of user defined attributes however, operational attributes might be changed.

38.1.6 OIDREALM Does Not Support Realm Removal

The `oidrealm` tool supports creation, but not deletion, of a realm. A procedure for deleting a realm is provided in Note 604884.1, which is available on My Oracle Support at `https://support.oracle.com/`.

38.1.7 Do Not Use Replication Wizard to Change the Primary Replica

If you want to change the primary replica in LDAP-based multimaster replication, do not use the **Change Primary** option in the Fusion Middleware Control replication wizard. Instead, use the command line tool `remtool`, as follows:

```
remtool -pchgmaster -multimaster
```

> **See Also:** The "Oracle Internet Directory Replication Management Tools" chapter in *Oracle Fusion Middleware User Reference for Oracle Identity Management* for more information about `remtool`.

38.2 Configuration Issues and Workarounds

This section describes configuration issues and workarounds. It includes the following topics:.

- Section 38.2.1, "Re-Create Wallet After Moving Oracle Internet Directory from Test to Production"

38.2.1 Re-Create Wallet After Moving Oracle Internet Directory from Test to Production

If you configure Oracle Internet Directory to use SSL in server authentication mode or mutual authentication mode on your test machine, and then move Oracle Internet Directory to a production machine, re-create the Oracle Internet Directory wallet on the production machine.

The old wallet contains the hostname of the original machine as the DN in the certificate. This host name in the DN is not changed during the test to production move. Re-create the wallet on the production machine to avoid SSL communication issues.

38.3 Documentation Errata

This section describes documentation errata. It includes the following topic:

- Section 38.3.1, "Function Return Codes for DBMS_LDAP_UTL Functions are Incorrect"
- Section 38.3.2, "DSML is not Deprecated"
- Section 38.3.3, "Option to ldifwrite is Incorrect"
- Section 38.3.4, "Use Bulk Tools or LDAP Tools with Replication"
- Section 38.3.5, "You Can Start WebLogic Server in the Background"
- Section 38.3.6, "The orclldapconntimeout Attribute Must Be Specified in Minutes, not Seconds."
- Section 38.3.7, "Error in Introduction to Oracle Fusion Middleware Application Developer's Guide for Oracle Identity Management"
- Section 38.3.8, "Database Copy Procedure is Missing Some Details"
- Section 38.3.9, "New Account with Superuser Privileges"
- Section 38.3.10, "Do Not Modify orclsuname"
- Section 38.3.11, "Template File for Setting a Uniqueness Constraint"
- Section 38.3.12, "Incorrect Example of Search for Published Naming Contexts"
- Section 38.3.13, "None is a Valid Value for orclcryptoscheme"
- Section 38.3.14, "Syntax for ManageHiq.purge and ManageHiq.retry is Incorrect"
- Section 38.3.15, "Value for orclplugintype is Incorrect in Plug-in Examples"

38.3.1 Function Return Codes for DBMS_LDAP_UTL Functions are Incorrect

In Table 11-61, Function Return Codes, in Chapter 11 of *Oracle Fusion Middleware Application Developer's Guide for Oracle Identity Management*, some of the codes are incorrect and some are missing. The following codes should be removed:

Table 38–1   Function Return Codes

Name	Return Code	Description
ACCT_TOTALLY_LOCKED_EXCEPTION	-14	Returned by `DBMS_LDAP_UTL.authenticate_user()` function when a user account is locked. This error is based on the password policy set in the subscriber oracle context.
AUTH_PASSWD_CHANGE_WARN	-15	This return code is deprecated.

The following codes should be added:

Table 38–2   Function Return Codes

Name	Return Code	Description
ACCT_TOTALLY_LOCKED_EXCEPTION	9001	Returned by DBMS_LDAP_UTL.authenticate_user() function when a user account is locked.
PWD_EXPIRED_EXCEPTION	9000	Returned by DBMS_LDAP_UTL.authenticate_user() function when a user's password has expired.
PWD_EXPIRE_WARN	9002	Returned by DBMS_LDAP_UTL.authenticate_user() function when the user's password is about to expire.
PWD_MINLENGTH_ERROR	9003	Returned by DBMS_LDAP_UTL.authenticate_user() function when the user's password is less than pwdMinLength.
PWD_NUMERIC_ERROR	9004	Returned by DBMS_LDAP_UTL.authenticate_user() function when
PWD_NULL_ERROR	9005	Returned by DBMS_LDAP_UTL.authenticate_user() function when
PWD_INHISTORY_ERROR	9006	Returned by DBMS_LDAP_UTL.authenticate_user() function when the password has previously been used and the password policy does not allow password reuse.
PWD_ILLEGALVALUE_ERROR	9007	Returned by DBMS_LDAP_UTL.authenticate_user() function when the password is illegal.
PWD_GRACELOGIN_WARN	9008	Returned by DBMS_LDAP_UTL.authenticate_user() function during a grace login period.
PWD_MUSTCHANGE_ERROR	9009	Returned by DBMS_LDAP_UTL.authenticate_user() function when the user is required to reset the password upon login.
USER_ACCT_DISABLED_ERROR	9050	Returned by DBMS_LDAP_UTL.authenticate_user() function when the user's account has been disabled.

38.3.2 DSML is not Deprecated

The following statement appears at the beginning of the "DSML Syntax" appendix in the *Oracle Fusion Middleware Application Developer's Guide for Oracle Identity Management*:

Directory Services Mark-up Language (DSML) is deprecated in Oracle Fusion Middleware 11g Release 1 (11.1.1) and might not be supported in future releases.

The statement is incorrect. Please ignore it.

38.3.3 Option to ldifwrite is Incorrect

In the ldifwrite section of the "Oracle Internet Directory Data Management Tools" chapter in *Oracle Fusion Middleware User Reference for Oracle Identity Management*, several examples use the option file. This is incorrect. The option is actually ldiffile. For example:

```
ldifwrite connect="nldap" basedn="ou=Europe, o=imc, c=us" ldiffile="output1.ldif"

ldifwrite connect="nldap" basedn="cn=includednamingcontext000001, \
```

```
cn=replication namecontext,orclagreementid=000001, \
orclreplicaid=node replica identifier,cn=replication configuration" \
ldiffile="output2.ldif"
```

38.3.4 Use Bulk Tools or LDAP Tools with Replication

The following note appears in the `bulkload` sections of *Oracle Fusion Middleware Administrator's Guide for Oracle Internet Directory* and *Oracle Fusion Middleware User Reference for Oracle Identity Management*:

"NOTE: If a directory server instance is participating in a replication agreement, do not use the `bulkload` tool to add data into the node. Instead, use `ldapadd`."

This note is incorrect. You can use either bulk tools or LDAP tools, depending on the circumstances. The following rules apply when you add data to a node that is part of a DRG.

- When you add new entries to all nodes in the DRG, you can use either bulk tools or LDAP tools. For more than 20K entries, bulk tools are significantly faster. If you use LDAP tools, add the entries to only one node in the DRG and let replication propagate the entries. If you use bulk tools, generate the intermediate file only once from the LDIF file and use that intermediate file to load the entries onto all the nodes in the DRG.

- When you copy existing entries from one node to another in the same replication group, use bulk tools. Use the `bulkload` option `restore=true` when you upload the data.

- If the LDIF file contains operational attributes, which it does when created with `ldifwrite`, use `bulkload` to add the entries.

- If the replication agreement is a partial replication agreement, use `ldifwrite` with the base DN as the replication agreement DN to write the entries to the LDIF file. Then use `bulkload` with the `restore=true` option to load the data.

38.3.5 You Can Start WebLogic Server in the Background

The "Starting and Stopping the Oracle Stack" appendix to *Oracle Fusion Middleware Administrator's Guide for Oracle Internet Directory* includes the following command for starting the WebLogic Administration Server:

```
MW_HOME/user_projects/domains/DOMAIN_NAME/bin/startWebLogic.sh \
SERVER_NAME {ADMIN_URL}
```

If you start the Oracle WebLogic Administration Server from the command line as shown, it runs in the foreground and prints output to the screen. You can, however, run the server in the background by using `nohup` at the beginning of the command line. This sends all output to the file `nohup.out` and prevents the script from prompting you for *USER_NAME* and *PASSWORD*. To pass parameters to `StartWebLogic.sh` when using `nohup`, you can use a boot identity file, as described in the "Starting and Stopping Servers" chapter of *Oracle Fusion Middleware Managing Server Startup and Shutdown for Oracle WebLogic Server*.

38.3.6 The orclldapconntimeout Attribute Must Be Specified in Minutes, not Seconds.

In *Oracle Fusion Middleware Administrator's Guide for Oracle Internet Directory*, Table 9-5, Configuration Attributes on Server Properties Page, Performance Tab, incorrectly describes LDAP Idle Connection Timeout as being specified in seconds. Actually, this

field, and the corresponding attribute, orclldapconntimeout, must be specified in minutes.

The same error occurs in Table 18-7, "Configuration Attributes on Server Properties Page, Performance Tab," in the Oracle Internet Directory chapter of *Oracle Fusion Middleware Performance and Tuning Guide*.

38.3.7 Error in Introduction to Oracle Fusion Middleware Application Developer's Guide for Oracle Identity Management

In Oracle Fusion Middleware Application Developer's Guide for Oracle Identity Management, Section 1.1, the third bullet item:

Oracle Directory Integration Services

Should be:

Oracle Directory Synchronization Services

38.3.8 Database Copy Procedure is Missing Some Details

Some details are missing from Appendix L, "Adding a Directory Node by Using the Database Copy Procedure," in *Oracle Fusion Middleware Administrator's Guide for Oracle Internet Directory*.

- Step 13g says:

  If you have performed a database copy from a node that has Advanced replication configured with another node, you must delete the LDAP_REP replication group in the new node. To do so, execute the following command:

  ```
  sqlplus rep_admin_db_account_name/password
  SQL> exec dbms_repcat.drop_master_repgroup( gname => 'LDAP_REP' )
  SQL> shutdown immediate
  ```

  Before you perform that step, first execute following commands:

  ```
  sqlplus / as sydba
  dbms_defer_sys.delete_tran(null,null);
  dbms_defer_sys.delete_error(null,null);
  dbms_repcat.purge_master_log(null,null,null);
  ```

- Step 14 says:

  Copy the initialization parameter file initLDAP.ora from the sponsor node (rst-sun) to the new node under the UNIX directory $ORACLE_HOME/dbs using FTP or another appropriate tool. Ensure that the contents of the copied file initLDAP.ora are valid after copying.

  In addition, also copy the file orclpwORACLE_SID (the database password file) from the sponsor node to the new node.

- Step 28b says:

  Start up Oracle Internet Directory and the replication server on all the nodes, including the new node and the sponsor node.

  Use the following command to start replication server:

  ```
  oidctl connect=nldap server=OIDREPLD instance=1 \
      flags="-p new_node_port -h new_node_host" start
  ```

  In addition, also execute resumeasr or oidrrsme.sql.

38.3.9 New Account with Superuser Privileges

Section 12.5, "Creating Another Account With Superuser Privileges," in *Oracle Fusion Middleware Administrator's Guide for Oracle Internet Directory* is misleading and contains a command-line error. It should say the following:

The Superuser, cn=orcladmin, gets its privileges from membership in several privileged groups. You can query for those groups by using the following ldapsearch command:

```
ldapsearch -h host -p port -D "cn=orcladmin" -q -b "" -L \
-s sub "(|(uniquemember=cn=orcladmin)(member=cn=orcladmin)" dn
```

To create a second account with Superuser privilege, create another user entry that belongs to the same groups. Also add the user as member of the group `cn=directoryadmingroup,cn=oracle internet directory`.

After you have created additional users with Superuser privileges, you no longer need to use `cn=orcladmin` to administer Oracle Internet Directory. The privileged accounts should be sufficient. The attribute `orclsuname`, however, must have the value `cn=orcladmin`.

38.3.10 Do Not Modify orclsuname

Section 12.6, "Managing the Superuser by Using ldapmodify," in *Oracle Fusion Middleware Administrator's Guide for Oracle Internet Directory*, describes how to modify the Superuser's name and password. The information about changing the password is correct. You should never change the Superuser's name, however. The value of `orclsuname` must remain `cn=orcladmin`

38.3.11 Template File for Setting a Uniqueness Constraint

Section 17.4, "Managing an Attribute Uniqueness Constraint Entry by Using the Command Line," in `Oracle Fusion Middleware Administrator's Guide for Oracle Internet Directory` refers to a nonexistent template file called `uniquenessConstraint.ldif`. The file should look like this:

```
# Use this LDIF file to set up a uniqueness constraint on the nickname
# attribute within the user search base.
# Before running the script, change the following parameters in the LDIF file.
#  <userid_attribute> -  Specify the name of the attribute that holds the user
# id. This value should be the same as the orclcommonusernickname attribute
# configured for the realm.#  <dn _f_user_serach_base> - Specify the user search
base in which the
# uniqueness constraint should be enforced.
#
dn: cn=<userid_attribute> ,cn=unique,cn=common,cn=Products, cn=OracleContext
changetype: add
objectclass: orclUniqueConfig
orcluniqueattrname: <userid _ttribute>
orcluniquesubtree: <dn_of_user_search_base>
orcluniqueenable:1
```

Use the `ldapmodify` tool to set up the uniqueness constraint, as follows:

```
ldapmodify -p oid_port -h oid_host -D cn=orcladmin\
 -q -f UniquenessConstraint.ldif
```

38.3.12 Incorrect Example of Search for Published Naming Contexts

In Section 11.2, "Searching for Published Naming Contexts," in *Oracle Fusion Middleware Administrator's Guide for Oracle Internet Directory*, the `ldapsearch` command line is incorrect. It should be:

```
ldapsearch -p 3060 -q -D cn=orcladmin -b "" -s base -L "objectclass=*" \
namingcontexts
```

> **Note:** This command will not return anything unless naming contexts have been published.

38.3.13 None is a Valid Value for orclcryptoscheme

Section29.1.2, "Hashing Schemes for Creating Userpassword Verifiers," in *Oracle Fusion Middleware Administrator's Guide for Oracle Internet Directory*, should contain the value `None`, which is valid as a value for `orclcryptoscheme`. When `orclcryptoscheme` is set to `None`, passwords are stored in cleartext.

38.3.14 Syntax for ManageHiq.purge and ManageHiq.retry is Incorrect

Section 4.1.1, "Syntax for ManageHiq.retry and ManageHiq.purge" in Oracle Fusion Middleware User Reference for Oracle Identity Management contains errors. Specifically, the `exec` command is missing from the command lines. The syntax is actually as follows:

```
$ sqlplus /nologSQL> connect ods;
SQL> Enter password
SQL> Set serveroutput ON
SQL> exec ManageHiq.retry(SupplierNode, EqualChgNo, StartChgNo, EndChgNo)
SQL> exit

$ sqlplus /nologSQL> connect ods;
SQL> Enter password
SQL> Set serveroutput ON
SQL> exec (ManageHiq.purgeSupplierNode, EqualChgNo, StartChgNo, EndChgNo)
SQL> exit
```

38.3.15 Value for orclplugintype is Incorrect in Plug-in Examples

Section 42.2.1, "Loading and Registering the PL/SQL Program" in *Oracle Fusion Middleware Administrator's Guide for Oracle Internet Directory*, Step 2, contains examples of plug-in configuration files. The value for the attribute `orclplugintype` is specified as `configuration`. It should be specified as `operational`.

38.3.16 Deactivate Replication Before Deleting or Modifying a Replication Agreement.

The "Managing and Monitoring Replication" chapter of *Oracle Fusion Middleware Administrator's Guide for Oracle Internet Directory* does not clearly state that you must always deactivate replication before you delete or modify a replication agreement.

The following sections of the chapter should contain that information:

- Viewing or Modifying a Replication Setup by Using the Replication Wizard

- Deleting an LDAP-Based Replication Agreement by Using the Replication Wizard

■   Configuring Replication Agreement Attributes by Using ldapmodify

Instructions for activating and deactivating replication are provided in the same chapter, in the section entitled "Activating or Inactivating a Replication Server by Using Fusion Middleware Control."

39

Oracle Platform Security Services

This chapter describes notes on topics associated with Oracle Platform Security Services (OPSS), in the following sections:

- Section 39.1, "Configuration Issues and Workarounds"

The following documents are relevant to topics included in this chapter:

- *Oracle Fusion Middleware Security Guide*
- *Oracle Fusion Middleware Security Overview*
- *Oracle Fusion Middleware Administrator's Guide*

39.1 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 39.1.1, "Oracle Fusion Middleware Audit Framework"
- Section 39.1.2, "Trailing '\n' Character in Bootstrap Key"
- Section 39.1.3, "Authorization Policy Manager Patch Installations Fail on 64-bit Operating Systems"
- Section 39.1.4, "Some Errors/Warnings in Authorization Policy Manager Display Server Locale"

39.1.1 Oracle Fusion Middleware Audit Framework

This section describes configuration issues for the Oracle Fusion Middleware Audit Framework. It contains these topics:

- Section 39.1.1.1, "Configuring Auditing for Oracle Access Manager"
- Section 39.1.1.2, "Audit Reports do not Display Translated Text in Certain Locales"
- Section 39.1.1.3, "Audit Reports Always Display in English"

39.1.1.1 Configuring Auditing for Oracle Access Manager

Although Oracle Access Manager appears as a component in Oracle Enterprise Manager Fusion Middleware Control, you cannot configure auditing for Oracle Access Manager using Fusion Middleware Control.

39.1.1.2 Audit Reports do not Display Translated Text in Certain Locales

The standard audit reports packaged with Oracle Business Intelligence Publisher support a number of languages for administrators. Oracle Business Intelligence Publisher can start in different locales; at start-up, the administrator can specify the language of choice by setting the preferred locale in Preferences.

Due to this bug, if Oracle Business Intelligence Publisher is started on any of these 3 locales:

- zh_CN (simplified chinese)
- zh_TW (traditional chinese)
- pt_BR (portuguese brazilian)

then users cannot see the report in that locale (the entire report including labels, headers, titles and so on appears in English), while the other locales display the translated text as expected. For example, when Oracle Business Intelligence Publisher is started in zh_CN, the text cannot be seen in zh_CN even though the preferred locale is set to zh_CN; information is displayed in English.

This issue will be fixed in a future release of Oracle Business Intelligence Publisher.

39.1.1.3 Audit Reports Always Display in English

The standard audit reports packaged with Oracle Business Intelligence Publisher support a number of languages.

Due to this bug, report titles and descriptions are displayed in English even when they have been translated.

This issue will be fixed in a future release of Oracle Business Intelligence Publisher.

39.1.2 Trailing '\n' Character in Bootstrap Key

In 11gR1, the process that reassociates XML to LDAP stores creates a bootstrap key with the trailing new line character '\n', or its equivalent code '&#xA'. This key value is written in the file `jps-config.xml` and stored in the wallet. In both places, the key value contains the trailing character '\n'.

When reusing that same wallet in 11gR1 PS1, upon retrieving the bootstrap key, the system trims out the trailing '\n' character; but the key value in the wallet, however, still contains the trailing character, a situation that leads to errors since the requested and stored key values no longer match.

To resolve this issue, proceed as follows:

1. Use the WLST command `modifyBootStrapCredential` to reprovision wallet credentials without trailing '\n'. For details on the command usage, see section 9.5.2.5 in the *Oracle Fusion Middleware Security Guide*.

2. Manually edit the file `jps-config.xml` and remove the trailing characters '&#xA' from any bootstrap key.

This problem arises only in the scenario above, namely, when an 11gR1 wallet is reused in 11gR1 PS1; in particular, when reassociating in an 11gR1 PS1 environment, the above trailing character is not an issue.

39.1.3 Authorization Policy Manager Patch Installations Fail on 64-bit Operating Systems

To work around this issue:

1. In UNIX/Linux environments edit the *$ORACLE_HOME*/**OPatch/opatch** file. In Windows environments edit the **%***ORACLE_HOME*%**\OPatch\Opatch.bat** file.

2. Locate the following string:

```
:CALLOPATCHNODEBUG
<!--[if !supportLineBreakNewLine]-->
<!--[endif]-->
```

3. Append the following boldface text to the preceding string, but be sure to include the location of your 64-bit JDK directory:

   In UNIX/Linux environments:

```
:CALLOPATCHNODEBUG
setenv JAVA_HOME=$JAVA_HOME/bin/java -jre | - jdk $64BIT_JAVA_HOME
```

   In Windows environments:

```
:CALLOPATCHNODEBUG
set JAVA_HOME=%JAVA_HOME%\bin\java
C:\jdk1.6.0_21\bin\java %JAVA_VM_OPTION% %JRE_MEMORY_OPTIONS%
```

4. Save the file and follow the instructions in the patch README file to install the patch.

5. Remove the boldface text you added in Step 3.

6. Save and close your file.

39.1.4 Some Errors/Warnings in Authorization Policy Manager Display Server Locale

Errors and warnings in Authorization Policy Manager display the server locale and not the browser locale.

There is no workaround to this issue.

40

SSL Configuration in Oracle Fusion Middleware

This chapter describes issues associated with SSL configuration in Oracle Fusion Middleware. It includes the following topics:

- Section 40.1, "General Issues and Workarounds"
- Section 40.2, "Configuration Issues and Workarounds"

40.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 40.1.1, "Replacement User Certificates for Oracle Wallets"
- Section 40.1.2, "Incorrect Message or Error when Importing a Wallet"

40.1.1 Replacement User Certificates for Oracle Wallets

The Oracle wallets used by Oracle HTTP Server, Oracle Web Cache, and Oracle Internet Directory, as well as the keystore used by Oracle Virtual Directory, include a Verisign root key (Serial#: 02:ad:66:7e:4e:45:fe:5e:57:6f:3c:98:19:5e:dd:c0) that expires Jan 07, 2010 15:59:59 PST.

Customers using the user certificate signed by this root key will need to obtain a replacement user certificate signed by their Certificate Authority (CA), and import that CA's root key into the Oracle wallet.

See "Common Certificate Operations" in the "Wallet Management" section of the *Oracle Fusion Middleware Administrator's Guide* for steps to import a root key into an Oracle wallet.

40.1.2 Incorrect Message or Error when Importing a Wallet

Problem 1

Fusion Middleware Control displays an incorrect message when you specify an invalid wallet password while attempting to import a wallet. The issued message "Cannot create p12 without password." is incorrect. Instead, it should notify the user that the password is incorrect and request a valid password.

Problem 2

Fusion Middleware Control displays an incorrect message when you attempt to import a password-protected wallet as an autologin wallet. The issued message "Cannot create p12 without password." does not provide complete information. Instead, it should notify the user that importing a password-protected wallet requires a password.

Problem 3

If you attempt to import an autologin wallet as a password-protected wallet using either Fusion Middleware Control or WLST, a NullPointerException error is displayed.

40.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 40.2.1, "Tools for Importing DER-encoded Certificates"
- Section 40.2.2, "Using a Keystore Not Created with WLST or Fusion Middleware Control"
- Section 40.2.3, "Components May Enable All Supported Ciphers"

40.2.1 Tools for Importing DER-encoded Certificates

You cannot use Oracle Enterprise Manager Fusion Middleware Control or the `WLST` command-line tool to import DER-encoded certificates or trusted certificates into an Oracle wallet or a JKS keystore.

Instead, use other tools that are available for this purpose.

- To import DER-encoded certificates or trusted certificates into an Oracle wallet, use:
  - Oracle Wallet Manager or
  - `orapki` command-line tool
- To import DER-encoded certificates or trusted certificates into a JKS keystore, use the `keytool` utility.

40.2.2 Using a Keystore Not Created with WLST or Fusion Middleware Control

If an Oracle wallet or JKS keystore was created with tools such as `orapki` or `keytool`, it must be imported prior to use. Specifically:

- For Oracle HTTP Server, Oracle Webcache, and Oracle Internet Directory, if a wallet was created using `orapki` or Oracle Wallet Manager, in order to view or manage it in Fusion Middleware Control you must first import it with either Fusion Middleware Control or the WLST `importWallet` command.

- For Oracle Virtual Directory, if a keystore was created using `keytool`, in order to view or manage it in Fusion Middleware Control you must first import it with either Fusion Middleware Control or the WLST `importKeyStore` command.

40.2.3 Components May Enable All Supported Ciphers

Customers should be aware that when no cipher is explicitly configured, some 11g Release 1 (11.1.1) components enable all supported SSL ciphers including `DH_Anon` (Diffie-Hellman Anonymous) ciphers.

At this time, Oracle HTTP Server is the only component known to set ciphers like this.

Configure the components with the desired cipher(s) if `DH_Anon` is not wanted.

41

Oracle Virtual Directory

This chapter describes issues associated with Oracle Virtual Directory. It includes the following topics:

- Section 41.1, "General Issues and Workarounds"
- Section 41.2, "Configuration Issues and Workarounds"
- Section 41.3, "Documentation Errata"

41.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Oracle Directory Services Manager Browser Window is Not Usable
- Oracle Directory Services Manager's Data Browser Does Not Properly Import LDIF Files Containing Non-English Data
- Exceptions May Occur in Oracle Directory Services Manager When Managing Multiple Oracle Virtual Directory Components and One is Stopped
- Identifying the DN Associated with an Access Control Point in Oracle Directory Services Manager
- Issues With Oracle Virtual Directory Metrics in Fusion Middleware Control

41.1.1 Oracle Directory Services Manager Browser Window is Not Usable

In some circumstances, after you launch Oracle Directory Services Manager from Fusion Middleware Control, then select a new Oracle Directory Services Manager task, the browser window might become unusable. For example, the window might refresh repeatedly, appear as a blank page, fail to accept user input, or display a null pointer error.

As a work around, go to the URL: http://*host:port*/odsm, where *host* and *port* specify the location where Oracle Directory Services Manager is running, for example, http://myserver.example.com:7005/odsm. You can then use the Oracle Directory Services Manager window to log in to a server.

41.1.2 Oracle Directory Services Manager's Data Browser Does Not Properly Import LDIF Files Containing Non-English Data

Data errors or failure may occur when importing LDIF files containing non-English data using Oracle Directory Services Manager's Data Browser.

To workaround this issue, import LDIF files containing non-English data using the ldapadd tool from the command line.

41.1.3 Exceptions May Occur in Oracle Directory Services Manager When Managing Multiple Oracle Virtual Directory Components and One is Stopped

Under certain circumstances, when managing multiple Oracle Virtual Directory components from the same Oracle Directory Services Manager session, exception or error messages may appear if you stop one of the Oracle Virtual Directory components. For example, you are managing Oracle Virtual Directory components named ovd1 and ovd2 from the same Oracle Directory Services Manager session. Both ovd1 and ovd2 are configured and running. If you stop ovd1, an exception or Target Unreachable message may appear when you try to navigate Oracle Directory Services Manager.

To work around this issue, exit the current Oracle Directory Services Manager session, close the web browser, and then reconnect to Oracle Virtual Directory components in a new Oracle Directory Services Manager session.

41.1.4 Identifying the DN Associated with an Access Control Point in Oracle Directory Services Manager

When you create an Access Control Point (ACP) using Oracle Directory Services Manager, the Relative Distinguished Name (RDN) of the DN where you created the ACP appears in the navigation tree on the left side of the screen. For example, if you create an ACP at the DN of **cn=ForExample,dc=us,dc=sales,dc=west**, then **cn=ForExample** appears in the navigation tree. After clicking an ACP in the navigation tree, its settings appear in the right side of the screen and the RDN it is associated with appears at the top of the page.

To identify the DN associated with an ACP, move the cursor over ("mouse-over") the ACP entry in the navigation tree. The full DN associated with the ACP will be displayed in a tool-tip dialog box.

Mousing-over ACPs in the navigation tree is useful when you have multiple ACPs associated with DNs that have identical RDNs, such as:

ACP 1 = cn=ForExample,dc=us,dc=sales,dc=west

ACP 2 = cn=ForExample,dc=us,dc=sales,dc=east

41.1.5 Issues With Oracle Virtual Directory Metrics in Fusion Middleware Control

This topic describes issues with Oracle Virtual Directory metrics in Fusion Middleware Control, including:

- Configuring Operation-Specific Plug-Ins to Allow Performance Metric Reporting in Fusion Middleware Control After Upgrading to 11g Release 1 (11.1.1)

41.1.5.1 Configuring Operation-Specific Plug-Ins to Allow Performance Metric Reporting in Fusion Middleware Control After Upgrading to 11g Release 1 (11.1.1)

If you upgraded an Oracle Virtual Directory Release 10g installation with plug-ins configured to execute on specific operations, such as add, bind, get, and so on, to 11*g* Release 1 (11.1.1), you may have to update those operation-specific plug-ins before you can use Fusion Middleware Control to view performance metrics.

After upgrading to 11*g* Release 1 (11.1.1) and performing some initial operations to verify the upgrade was successful, check the Oracle Virtual Directory home page in

Fusion Middleware Control. You should see data for the Current Load and Average Response Time and Operations metrics.

If you do not see any data for these metrics, you must update the plug-ins configured to execute on specific operations. The work-around is to add the Performance Monitor plug-in to the operation-specific plug-in's configuration chain.

Perform the following steps to add the Performance Monitor plug-in to the operation-specific plug-in's configuration chain:

1. If the operation-specific plug-in is a Global-level plug-in, edit the server.os_xml file located in the *ORACLE_INSTANCE*/config/OVD/*NAME_OF_OVD_COMPONENT*/ directory.

   If the operation-specific plug-in is an adapter-level plug-in, edit the adapters.os_xml file located in the *ORACLE_INSTANCE*/config/OVD/*NAME_OF_OVD_COMPONENT*/ directory.

   > **Note:** If multiple adapters are configured, you must perform steps 2 and 3 for every adapter configuration in the adapters.os_xml file.

2. Locate the `pluginChains` element in the file. For example, if the Dump Transactions plug-in is configured to execute on the get operation, you will see something similar to the following:

Example 41–1 Dump Transactions Plug-In Configured for get Operation

```
<pluginChains xmlns="http://xmlns.oracle.com/iam/management/ovd/config/plugins">
 <plugins>
    <plugin>
      <name>Dump Transactions</name>

<class>com.octetstring.vde.chain.plugins.DumpTransactions.DumpTransactions</class>
      <initParams>
        <param name="loglevel" value="info"/>
      </initParams>
    </plugin>
    <plugin>
      <name>Performance Monitor</name>

<class>com.octetstring.vde.chain.plugins.performance.MonitorPerformance</class>
      <initParams/>
    </plugin>
 </plugins>
 <default>
    <plugin name="Performance Monitor"/>
 </default>
 <get>
    <plugin name="Dump Transactions">
      <namespace>ou=DB,dc=oracle,dc=com </namespace>
    </plugin>
 </get>
</pluginChains>
```

3. Add the following Performance Monitor plug-in element within the operation-specific configuration chain:

```
<plugin name="Performance Monitor"/>
```

For example:

Example 41–2   Adding the Performance Monitor to the Operation-Specific Plug-In Configuration Chain

```
<pluginChains xmlns="http://xmlns.oracle.com/iam/management/ovd/config/plugins">
  <plugins>
     <plugin>
       <name>Dump Transactions</name>

<class>com.octetstring.vde.chain.plugins.DumpTransactions.DumpTransactions</class>
        <initParams>
          <param name="loglevel" value="info"/>
        </initParams>
     </plugin>
     <plugin>
       <name>Performance Monitor</name>

<class>com.octetstring.vde.chain.plugins.performance.MonitorPerformance</class>
        <initParams/>
     </plugin>
  </plugins>
  <default>
     <plugin name="Performance Monitor"/>
  </default>
  <get>
     <plugin name="Dump Transactions">
       <namespace>ou=DB,dc=oracle,dc=com </namespace>
     </plugin>
     <plugin name="Performance Monitor"/>
   </get>
</pluginChains>
```

4. Save the file.

5. Restart Oracle Virtual Directory.

41.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Deploying Enterprise User Security Plug-ins for Microsoft Active Directory and Sun Java System Directory Server

- Database Adapter Character Requirements for Oracle Database Table and Column Names

- Configuring the ForkJoin Plug-in

41.2.1 Deploying Enterprise User Security Plug-ins for Microsoft Active Directory and Sun Java System Directory Server

In Oracle Virtual Directory Release 10*g* (10.1.4.2.0), the Enterprise User Security mappings for Microsoft Active Directory and Sun Java System Directory Server were deployed by default when you installed Oracle Virtual Directory. These mappings *are not* deployed by default in Oracle Virtual Directory 11*g* Release 1 (11.1.1).

You can deploy these mappings by referring to Chapter 14, "Managing Oracle Virtual Directory Mappings," in the *Oracle Fusion Middleware Administrator's Guide for Oracle Virtual Directory*.

41.2.2 Database Adapter Character Requirements for Oracle Database Table and Column Names

When creating Database Adapters for Oracle databases in Oracle Virtual Directory 11g Release 1 (11.1.1), use only alphanumeric characters or the following special characters in database table and column names: Dollar sign ($), underscore (_), and pound/hash (#).

When you create a Database Adapter for Oracle databases, be sure you:

- Do not use non-ASCII characters in database table and column names
- Do not surround database table and column names with double quotation marks ("), for example, do not use *"tablename"* or *"columnname"*

If you do not following these character requirements for database table and column names when you create Database Adapters for Oracle databases, you will encounter an ORA-00904 or LocalLDAPException error if you try to use Oracle Directory Services Manager's Data Browser to view the data in the database.

41.2.3 Configuring the ForkJoin Plug-in

Oracle Directory Services Manager incorrectly displays Full Outer Join as a configuration parameter for the ForkJoin plug-in. However, the ForkJoin plug-in supports only the SecondaryOnlyAttributes, PrimaryAndSecondaryAttributes, and JoinPolicy configuration parameters, with Full Outer Join as a supported value for the JoinPolicy configuration parameter.

Perform the following steps to set Full Outer Join as the value for the JoinPolicy configuration parameter:

1. Create a back-up copy of the ForkJoin plug-in manifest file:

   ```
   ORACLE_INSTANCE/config/OVD/NAME_OF_OVD_COMPONENT/adapters.os_xml
   ```

2. Locate the following entry in the adapters.os_xml file:

   ```
   <param name="FullOuterJoin" value="true"/>
   ```

3. Change the entry to the following:

   ```
   <param name="JoinPolicy" value="FullOuterJoin"/>
   ```

4. Restart the Oracle Virtual Directory server.

41.3 Documentation Errata

This section describes documentation errata. It includes the following topics:

- HideEntriesByFilter Plug-In Applies to All Users Except orcladmin
- Additional Step for Editing the Oracle Virtual Directory Administrative Listener Settings Using Fusion Middleware Control
- Audit Logs for Search Operations

41.3.1 HideEntriesByFilter Plug-In Applies to All Users Except orcladmin

Section 4.2.1 in the *Administrator's Guide for Oracle Virtual Directory*, which describes the HideEntriesByFilter plug-in, does not describe which users the plug-in applies to. The HideEntriesByFilter plug-in applies to all users—except orcladmin.

41.3.2 Additional Step for Editing the Oracle Virtual Directory Administrative Listener Settings Using Fusion Middleware Control

Section 11.4.3.1.1 in the *Administrator's Guide for Oracle Virtual Directory*, which describes "Editing the Oracle Virtual Directory Administrative Listener Settings" using Oracle Enterprise Manager Fusion Middleware Control, is incomplete.

The following, additional step must be performed after completing the six steps that are documented in section 11.4.3.1.1:

7. Use the `opmnctl updatecomponentregistration` command to update the registration of the Oracle Virtual Directory component that contains the Admin Listener you edited.

The syntax for `opmnctl updatecomponentregistration` is:

```
$ORACLE_INSTANCE/bin/opmnctl updatecomponentregistration
    [-adminHost hostname]
    [-adminPort weblogic_port]
    [-adminUsername weblogic_admin]
    [-adminPasswordFile 'FILE_WITH_WEBLOGIC_ADMIN_PASSWORD']
    [-componentType OVD]
    -componentName componentName
    [-Host OVD_HOST_NAME]
```

> **Notes:**
> - If you do not use the -Host option, the value in listeners.os_xml will be used.
> - Both the `componentName` and `componentType` parameters are required.

For example:

```
$ORACLE_INSTANCE/bin/opmnctl updatecomponentregistration -adminHost myhost \
-adminPort 7001 -adminUsername weblogic -componentType OVD -componentName ovd1
```

41.3.3 Audit Logs for Search Operations

The *Administrator's Guide for Oracle Virtual Directory* does not include information about when audit logs are created for search operations. Audit logs are created for search operations only when the search requests the userPassword attribute.

Part IX

Oracle Portal, Forms, Reports and Discoverer

Part IX contains the following chapters:

42

Oracle Business Intelligence Discoverer

This chapter describes issues associated with Oracle Business Intelligence Discoverer. It includes the following topics:

- Section 42.1, "General Issues"
- Section 42.2, "Issues Specific to Oracle BI Discoverer Plus Relational"
- Section 42.3, "Issues Specific to Oracle BI Discoverer Plus OLAP"
- Section 42.4, "Issues Specific to Oracle BI Discoverer Portlet Provider"
- Section 42.5, "Issues Specific to Oracle BI Discoverer Viewer"
- Section 42.6, "Issues Specific to Oracle BI Discoverer EUL Command Line for Java"
- Section 42.7, "Issues Specific to Oracle BI Discoverer Administrator"
- Section 42.8, "Documentation Errata"

42.1 General Issues

This section describes general issues that affect more than one Discoverer component. It includes the following topics:

- Section 42.1.1, "Issues with Metadata Repository and Oracle Database 10g Release 1"
- Section 42.1.2, "Compatibility Issues with Required Support Files"
- Section 42.1.3, "Serif Font Issue in Worksheets"
- Section 42.1.4, "Additional Fonts Required for Non-ASCII Data When Exporting to PDF"
- Section 42.1.5, "Query Prediction Requires the Majority of the Query Time"
- Section 42.1.6, "Word Wrapping Behavior with Oracle BI Discoverer Plus and Oracle BI Discoverer Viewer"
- Section 42.1.7, "Applet Appears Behind Browser Window"
- Section 42.1.8, "Issues with Mac OS X Browser and Oracle BI Discoverer Plus"
- Section 42.1.9, "Issues with Turkish Regional Settings"
- Section 42.1.10, "Multibyte Characters Rendered as Square Boxes in Exported PDF and Other Formats"
- Section 42.1.11, "Java Plug-in Not Downloaded Automatically on Firefox"

- Section 42.1.12, "HTTP 404 Error While Accessing Discoverer on a Remote Machine"

- Section 42.1.13, "Error While Launching Discoverer Plus Applet on an IPv6 Environment"

- Section 42.1.14, "Error While Updating the Discoverer Web Services Configuration Parameter"

- Section 42.1.15, "Exception Logged for Discoverer Web-Based Applications in an Extended Domain"

- Section 42.1.16, "Issue with Discoverer Application URL in Fusion Middleware Control after a Backup Recovery"

- Section 42.1.17, "Incorrect Version Number for Discoverer in Fusion Middleware Control 11g."

42.1.1 Issues with Metadata Repository and Oracle Database 10*g* Release 1

When using Oracle Database 10*g* Release 1 (10.1.*x*) for the Metadata Repository or after upgrading the Metadata Repository to Oracle Database 10*g* Release 1, you might see the following error on the Oracle BI Discoverer Plus Connection pages, the Oracle BI Discoverer Viewer Connection pages, and the Public Connection definition page in Fusion Middleware Control:

```
The connection list is currently unavailable.
ORA-06510: PL/SQL: unhandled user-defined exception
ORA-06512: at "ORASSO.WWSSO_API_PRIVATE," line 258
ORA-06510: PL/SQL: unhandled user-defined exception
ORA-06512: at "ORASSO.WWSSO_UTL" line 728
ORA-28231: no data passed to obfuscation toolkit
ORA-06512: at line 1 Unable to retrieve connection list
```

To resolve this issue, make the following changes in the Metadata Repository database:

1. Edit the `init%ORACLE_SID%.ora` file. This file exists either in the `dbs` folder or the `database` folder. For example, in Windows, this file is located in the DB_install_home/database/ folder.

2. Add the following line to this file:

   ```
   event="10946 trace name context forever, level 36"
   ```

3. If an `spfile%ORACLE_SID%.ora` exists in either the `dbs` folder or the `database` folder, rename the file to `spfile%ORACLE_SID%.bak`. Changes to `init%ORACLE_SID%.ora` are not loaded if the database server finds an `spfile`.

4. Log in as a `sysadmin`.

5. At the SQL prompt, shut down then start up the database server.

6. Restart the Oracle BI Discoverer server using the command `opmnctl restartall`.

42.1.2 Compatibility Issues with Required Support Files

The Oracle Database and other Oracle database client software (for example, SQL*Plus, the database export utility) use Oracle Required Support Files (RSF).

Oracle BI Discoverer also uses Oracle Required Support Files (RSF), specifically RSF version 11.1.0.7. This version of the Oracle Required Support Files is installed during Oracle BI Discoverer installation.

Note that the Required Support Files version 11.1.0.7 is incompatible with earlier versions of Oracle Database 10*g*. So if the machine on which you install Oracle BI Discoverer already has a version of Oracle Database 10*g* or database client software that is earlier than 11.1.0.7, there will be compatibility issues. For example, if you install Oracle BI Discoverer and attempt to run a version of SQL*Plus earlier than 11.1.0.7, then the following error is displayed:

```
ORA-12557 TNS: protocol adapter not loadable
```

To avoid the compatibility issues, upgrade Oracle Database 10*g* or database client software on the machine to the same version (11.1.0.7) as the version of the Required Support Files that were installed with Oracle BI Discoverer.

This issue does not exist for Oracle9i Database Server.

42.1.3 Serif Font Issue in Worksheets

You might notice unsightly font issues when using a non-English locale such as Czech. For example, when a worksheet uses a serif font, text in that worksheet might be displayed incorrectly on the screen and in printouts.

To work around this issue, update the file that maps the serif fonts. The name of this file differs depending on the locale in use. When you use Oracle BI Discoverer Plus Relational or Plus OLAP in English, the file is named `file.properties`. If you use Oracle BI Discoverer in a non-English locale, then the file name includes the code for the locale, such as `file.properties.cs` for Czech.

Update the mapping file with the following information:

```
serif.0=Times New Roman,EASTEUROPE_CHARSET
serif.1=WingDings,SYMBOL_CHARSET,NEED_CONVERTED
serif.2=Symbol,SYMBOL_CHARSET,NEED_CONVERTED
```

Consult the following Sun Web site for additional information about fonts:

http://java.sun.com/j2se/1.3/docs/guide/intl/addingfonts.html

42.1.4 Additional Fonts Required for Non-ASCII Data When Exporting to PDF

If you are running Oracle BI Discoverer Plus Relational or Plus OLAP on a Macintosh or Linux client machine, you must add the appropriate font files to your client machine to allow exported PDF files to display non-ASCII data correctly.

These font files include Albany fonts with names such as `ALBANWTJ.TTF` and `ALBANWTK.TTF`. The files are stored in the `/utilities/fonts` directory on the CD-ROM or DVD for the Oracle Application Server Metadata Repository Upgrade Assistant.

To install the additional required fonts:

1. Navigate to the `/utilities/fonts` directory on the CD-ROM or DVD for the OracleAS Metadata Repository Upgrade Assistant.

2. Copy the appropriate Albany TTF file from the `/utilities/fonts` directory to the plug-in directory in the `$jdk/jre/lib/fonts` directory on the Macintosh or Linux client machine.

42.1.5 Query Prediction Requires the Majority of the Query Time

When using Oracle BI Discoverer with a relational data source, you can predict the time that is required to retrieve information by setting the value of the QPPEnable

preference to 1. However, in some circumstances, the majority of the time taken to retrieve information is consumed by the prediction activity itself.

To work around this issue, set the value of the QPPObtainCostMethod preference to 0 (use the EXPLAIN PLAN statement to predict query times) rather than to 1 (use dynamic views to predict query times).

For more information about setting preferences, see the *Oracle Fusion Middleware Configuration Guide for Oracle Business Intelligence Discoverer*.

42.1.6 Word Wrapping Behavior with Oracle BI Discoverer Plus and Oracle BI Discoverer Viewer

To use word wrap settings correctly, you must understand how they are designed for Oracle BI Discoverer:

- **Oracle BI Discoverer Plus**: Word wrap settings that you make in Oracle BI Discoverer Plus are saved in the worksheet and affect the display of worksheets in Oracle BI Discoverer Plus and when printing to PDF.

- **Oracle BI Discoverer Viewer**: Word wrap settings that you see in the **Print Settings** dialog work as follows:

  - The word wrap settings do not affect the display of worksheets in Oracle BI Discoverer Viewer.

  - **For relational data**:

    * The word wrap settings do affect the printing of worksheets to PDF.

    * If the **Always wrap text when size exceeds column width** box is checked, then the print settings in Oracle BI Discoverer Viewer do override the settings made in a worksheet in Oracle BI Discoverer Plus Relational for printing to PDF.

    * If the **Always wrap text when size exceeds column width** box is not checked, then the print settings in Oracle BI Discoverer Viewer do not override the settings made in a worksheet in Oracle BI Discoverer Plus Relational for printing to PDF.

  - **For OLAP data**:

    * The word wrap settings do not affect the printing of worksheets to PDF.

    * Regardless of whether the **Always wrap text when size exceeds column width** check box is selected, the print settings in Oracle BI Discoverer Viewer never override the settings made in a worksheet in Oracle BI Discoverer Plus OLAP for printing to PDF.

42.1.7 Applet Appears Behind Browser Window

When you use Microsoft Internet Explorer, the Oracle BI Discoverer Plus Relational or Plus OLAP applet initialization and download dialog appears behind the browser window from which it was launched. After the applet is downloaded and initialized, it appears in front of the browser window from which it was launched.

To work around this issue:

- Use a browser other than Internet Explorer, such as Netscape Navigator or Mozilla Firefox.

■ Use the Oracle BI Discoverer Plus URL parameter `_plus_popup=false`, which is documented in the *Oracle Fusion Middleware Configuration Guide for Oracle Business Intelligence Discoverer*.

42.1.8 Issues with Mac OS X Browser and Oracle BI Discoverer Plus

The following are issues that you might encounter when you use the Safari browser on Mac OS X with Oracle BI Discoverer Plus Relational or Plus OLAP:

■ If you resize the browser window in the applet, then some parts of the content might be clipped. To work around this problem, always maximize the browser window for the applet when working with Mac OS X.

■ Keyboard combinations (also known as mnemonics) do not work in Oracle BI Discoverer Plus Relational and Plus OLAP.

For example, you cannot press Alt+F to access the `File` menu.

■ In the **Share Workbooks** dialog of Oracle BI Discoverer Plus Relational, the leading characters of the "**Shared:**" list are clipped. In other words, the left edge of the list is truncated. For example, if you shared a workbook with `DISCODEV`, then you will only see `SCODEV` in the list. The title for the list is also truncated such that you see only the vertical line of the "**d**" in "**Shared**" and the colon (that is, "**l:**").

The dialog continues to work as expected, but you might have difficulty reading the names in the "**Shared:**" list.

This issue has no workaround.

42.1.9 Issues with Turkish Regional Settings

Because of Sun JRE 1.4 bug 4688797, you might encounter issues when connecting to a database schema from a computer that has Turkish regional settings. You will encounter the issue when you attempt to connect to a database schema with a user name that contains certain letters, such as the letter 'I' or 'i', for example, in "bibdemo". See the Sun JRE bug for information on the letters that are affected.

To work around this issue, either do not use Turkish regional settings or use a user name that does not contain the affected letters.

42.1.10 Multibyte Characters Rendered as Square Boxes in Exported PDF and Other Formats

When you export a workbook to PDF and other formats, multibyte characters (for example, Korean, Japanese, and Chinese characters) appear as square boxes.

To work around this issue, copy the following Albany fonts from *ORACLE_HOME*/jdk/jre/lib/fonts to the `fonts` folder of your JDK (Oracle JRockit or Sun) within the *MW_HOME* directory. For example, if you are using HP-UX JDK, you must copy the fonts to *MW_HOME*/jre/jdk160_11/lib/fonts.

■ `AlbanWTJ.ttf`
■ `AlbanWTK.ttf`
■ `AlbanWTS.ttf`
■ `AlbanWTT.ttf`
■ `ALBANYWT.ttf`

42.1.11 Java Plug-in Not Downloaded Automatically on Firefox

When you attempt to connect to Discoverer Plus by using the Mozilla Firefox browser on a machine that does not have Java 1.6 installed, the browser does not download the JRE 1.6 plug-in automatically. Instead, the browser displays the following message:

```
Additional plugins are required to display this page...
```

You must download the JRE 1.6 plug-in (by clicking the **Install Missing Plugin** link) and install it manually.

42.1.12 HTTP 404 Error While Accessing Discoverer on a Remote Machine

When you attempt to connect to Discoverer Plus, occasionally, the browser returns an HTTP 404 (File Not Found) error.

The page loads correctly when you refresh the browser a few times.

42.1.13 Error While Launching Discoverer Plus Applet on an IPv6 Environment

If the Web tier is on an IPv6 machine, when you start Discoverer Plus, the following error message might be displayed:

```
Attempt1. RMI protocol over JRMP transport: Connection refused to host:
DiscoServerMahcineName;nested exception is:
@ java.net.ConnectionException: Connection timed out
```

To work around this issue, in the System MBean Browser of Fusion Middleware Control, change the TransportProtocols attribute of the Plus Config MBean to "jrmp,http" (or "jrmp,https" if Discoverer Plus is accessed by using secure HTTP).

42.1.14 Error While Updating the Discoverer Web Services Configuration Parameter

When you update the web services configuration parameter (Maximum Sessions) using the Discoverer Web Services Configuration page of Fusion Middleware Control and click **Apply**, the following error message is displayed:

```
Applying changes - Failed.
Exception caught:
```

You can ignore the error message because the changes are applied even if the exception is thrown. Alternatively, you can update the MaxSessions attribute of the WebServicesConfig MBean in the System MBean Browser of Fusion Middleware Control.

42.1.15 Exception Logged for Discoverer Web-Based Applications in an Extended Domain

When you extend a domain and add Discoverer application in a remote machine, you may see the following exception in the WebLogic Server log:

```
java.lang.IllegalArgumentException: ODL-52057: The handler 'disco-server-handler'
is not defined.
```

To work around this issue, modify the log_handlers and loggers elements in the logging.xml file located in the *DOMAIN_HOME*/config/fmwconfig/servers/*WLS_ DISCO* folder of the machine where the domain exists.

In the log_handlers section, add the handlers as follows:

```
<log_handler name='discoverer-handler'
class='oracle.core.ojdl.logging.ODLHandlerFactory'>
  <property name='path'
value='${domain.home}/servers/${weblogic.Name}/logs/discoverer/diagnostic.log'
/>
<property name='maxFileSize' value='1048576'/>
  <property name='maxLogSize' value='10485760'/>
  <property name='format' value='ODL-Text'/>
  <property name='useSourceClassAndMethod' value='false'/>
</log_handler>

<log_handler name='disco-server-handler'
class='oracle.core.ojdl.logging.ODLHandlerFactory'>
  <property name='path'
value='${domain.home}/servers/${weblogic.Name}/logs/discoverer/server/diagnost
ic.log'/>
  <property name='maxFileSize' value='1048576'/>
  <property name='maxLogSize' value='10485760'/>
  <property name='format' value='ODL-Text'/>
</log_handler>
```

In the loggers sections, add the following elements:

```
<logger name='ORACLE.DISCOVERER.VIEWER' level='TRACE:32'
useParentHandlers='false'>
  <handler name='discoverer-handler'/>
  <handler name='odl-handler'/>
</logger>
  <logger name='ORACLE.DISCOVERER.PORTLET_PROVIDER' level='TRACE:32'
useParentHandlers='false'>
  <handler name='discoverer-handler'/>
  <handler name='odl-handler'/>
</logger>
  <logger name='ORACLE.DISCOVERER.MODEL' level='TRACE:32'
useParentHandlers='false'>
  <handler name='discoverer-handler'/>
  <handler name='odl-handler'/>
</logger>
  <logger name='ORACLE.DISCOVERER.WEB_SERVICES' level='TRACE:32'
useParentHandlers='false'>
  <handler name='discoverer-handler'/>
  <handler name='odl-handler'/>
</logger>
  <logger name='ORACLE.DISCOVERER.SERVER' level='TRACE:32'
useParentHandlers='false'>
  <handler name='disco-server-handler'/>
  <handler name='odl-handler'/>
</logger>
```

After adding these elements, save the logging.xml file, and restart the Administration
Server and Discoverer Managed Servers.

42.1.16 Issue with Discoverer Application URL in Fusion Middleware Control after a Backup Recovery

When you recover the Oracle BI Discoverer middle tier from a backup, the Discoverer
application URL in the Discoverer Home page of Fusion Middleware Control point to
a wrong location.

You must configure the application URLs that appear on the Oracle BI Discoverer Home page in Fusion Middleware Control after recovering the Oracle BI Discoverer middle tier from a backup.

For more information, see "How to configure application URLs displayed on the Fusion Middleware Control Discoverer Home page" in the Oracle Business Intelligence Discoverer Configuration Guide.

42.1.17 Incorrect Version Number for Discoverer in Fusion Middleware Control 11*g*

In Fusion Middleware Control 11*g*, the Enterprise Manager Fusion Middleware Control pages display wrong version number (11.1.1.2.0) for the Oracle BI Discoverer application. The correct version number for Oracle BI Discoverer is 11.1.1.3.0.

42.2 Issues Specific to Oracle BI Discoverer Plus Relational

This section describes issues that are specific to Oracle BI Discoverer Plus Relational. It includes the following topics:

- Section 42.2.1, "Text Appearing Truncated or Clipped"
- Section 42.2.2, "Non-ASCII Characters Not Saved Correctly in Title or Text Area"
- Section 42.2.3, "Canceling Query Causes Discoverer to Hang"
- Section 42.2.4, "Nonaggregable Values Not Displayed for Scheduled Workbooks"
- Section 42.2.5, "Migrating Oracle BI Discoverer Plus Relational Worksheets from Oracle BI Discoverer Desktop"

42.2.1 Text Appearing Truncated or Clipped

When you run Oracle BI Discoverer Plus Relational with Sun Java Plug-in 1.4.2_06, the Browser Look and Feel, and an Asian language (such as Korean or Chinese), you might notice that static text and text in buttons in the user interface appears truncated or clipped. To work around this issue, do one of the following:

- Change the Look and Feel to either Plastic or System.
- Use JInitiator 1.3.1.17 instead of the Sun Java Plug-in.
- Install Sun Java Plug-in version 1.4.2_10 or higher.

42.2.2 Non-ASCII Characters Not Saved Correctly in Title or Text Area

When you save a new workbook in Oracle BI Discoverer Plus, any text characters beyond the standard ASCII characters are not saved correctly when all the conditions that are described in the following list are met:

- You are logged in as an Oracle e-Business Suite user.
- The language for the computer is not English.
- Oracle BI Discoverer Plus is running against an Oracle e-Business Suite database that does not have that non-English language installed.

This issue has no workaround.

42.2.3 Canceling Query Causes Discoverer to Hang

If you cancel a query that is running in Oracle BI Discoverer Plus Relational, then you are prompted to either choose YES to undo the changes or NO to show a blank sheet.

If you choose YES, then Oracle BI Discoverer Plus Relational hangs and you must close the window and restart.

To work around this issue, choose NO to show a blank worksheet. You can then refresh the sheet and continue working.

42.2.4 Nonaggregable Values Not Displayed for Scheduled Workbooks

Oracle BI Discoverer Plus Relational does not display nonaggregable values for scheduled workbooks. In other words, Oracle BI Discoverer Plus Relational processes scheduled workbooks as if you selected the **Show values that cannot be aggregated as: <Non-aggregable label>** option in the **Worksheet Properties dialog: Aggregation** tab.

Nonaggregable values include those based on the following SQL functions:

- A CASE SQL statement

- A DECODE SQL statement

- A PL/SQL function

- A DISTINCT SQL statement

- An analytic function

42.2.5 Migrating Oracle BI Discoverer Plus Relational Worksheets from Oracle BI Discoverer Desktop

If you use Oracle BI Discoverer Plus Relational to open a worksheet that was created using Oracle BI Discoverer Desktop Version 9.0.4 (or earlier), the size of the title area for that worksheet defaults to two lines in height. A title height of two lines might be a problem if a worksheet title requires more than or less than two lines. If you want to change the size of the title area, you must resize the title area manually and save the worksheet.

To resize the title area for a worksheet, open the worksheet and drag the bar at the bottom of the title area pane up or down.

42.3 Issues Specific to Oracle BI Discoverer Plus OLAP

This section describes issues that are specific to Oracle BI Discoverer Plus OLAP. It includes the following topics:

- Section 42.3.1, "Issues with Applet Download"

- Section 42.3.2, "Disabled Netscape and Mozilla Browsers"

- Section 42.3.3, "Tabbing Fails to Synchronize Menus"

- Section 42.3.4, "Esc Key Fails to Close Certain Dialogs"

- Section 42.3.5, "Link Tool Works Incorrectly in Some Locales"

- Section 42.3.6, "Memory Issues when Exporting Extremely Large Graphs"

- Section 42.3.7, "Issue While Printing Worksheets with Large Data Values"

- Section 42.3.8, "Issues with Titles and Text Areas"

- Section 42.3.9, "Errors with JAWS and Format Dialogs"

42.3.1 Issues with Applet Download

There may be Oracle Business Intelligence Discoverer Plus applet download issues when caching has been enabled in the Sun Java Plug-In.

To avoid these issues, disable caching in the plug-in.

42.3.2 Disabled Netscape and Mozilla Browsers

When you are running Netscape 7.*x* or Mozilla browsers, the Netscape and Mozilla Mail clients and Web browser may become disabled when Oracle BI Discoverer Plus OLAP modal dialogs are displayed.

Dismissing the Oracle BI Discoverer Plus OLAP dialogs resumes normal operation for the Netscape and Mozilla tools.

42.3.3 Tabbing Fails to Synchronize Menus

When you use the `Tab` key to select items in a worksheet, the menus do not always synchronize to reflect the currently selected item.

This issue has no workaround.

42.3.4 Esc Key Fails to Close Certain Dialogs

The `Esc` key does not close the following dialogs: Totals, New Total, Parameter, and Manage Catalog.

Instead of using the **Esc** key, click the **Close** or **OK** button.

42.3.5 Link Tool Works Incorrectly in Some Locales

The **Link** tool, which enables users to drill out to external URLs from a crosstab cell, might not work correctly in all locales due to URL encoding issues.

This issue has no workaround.

42.3.6 Memory Issues when Exporting Extremely Large Graphs

Exporting extremely large graphs can cause memory issues, requiring a restart of the Oracle BI Discoverer Plus OLAP session.

This issue has no workaround.

42.3.7 Issue While Printing Worksheets with Large Data Values

When printing a worksheet that contains large numbers in the data cells, the string ####### may be printed instead of the actual numbers.

This issue has no workaround.

42.3.8 Issues with Titles and Text Areas

The following issues exist with titles and text areas:

- Nonempty titles and text areas are printed even if they are hidden in the worksheet.

  This issue has no workaround.

- When you set the title or text area background to green and export the worksheet to an HTML file, the background is incorrectly set to red in the exported file.

  This issue has no workaround.

42.3.9 Errors with JAWS and Format Dialogs

When you use JAWS, you will notice errors when you attempt to format graphs and crosstabs using the **Format** dialogs.

This issue has no workaround.

42.4 Issues Specific to Oracle BI Discoverer Portlet Provider

This section describes issues that are specific to Oracle BI Discoverer Portlet Provider. It includes the following topics:

- Section 42.4.1, "Inability to Turn Off Display of Range Min and Max as Labels"
- Section 42.4.2, "Using Oracle BI Discoverer Portlet Provider with Oracle Single Sign-On and Secure Sockets Layer (SSL) Modes"
- Section 42.4.3, "Issues with Discoverer Portlets in WebCenter"
- Section 42.4.4, "Issue while Publishing Discoverer WSRP Portlets in Portals Other than Oracle Portal and Oracle WebCenter"
- Section 42.4.5, "Issue with Portlet Titles in Discoverer WSRP Portlets Published on IBM WebSphere"
- Section 42.4.6, "Issue with Color and Date Pickers in Discoverer WSRP Portlets"
- Section 42.4.7, "Worksheet Parameter LOV is not Displayed in Discoverer WSRP Portlets on IBM WebSphere Portal"
- Section 42.4.8, "Issue with Worksheet Parameter LOV Pop-Up Window in Discoverer WSRP Portlets"

42.4.1 Inability to Turn Off Display of Range Min and Max as Labels

In the **Display Options** of a gauge portlet, the **Minimum Value** and **Maximum Value** range labels are selected but are also disabled so that you cannot deselect the display of those values. The values for the minimum and the maximum appear at the ends of every gauge in the set except for those gauges where the value to be gauged is out of the range of the minimum and the maximum values. For those gauges where the value to be displayed exceeds the range of the minimum and the maximum values, the gauge will automatically adjust to accommodate the value.

This issue has no workaround.

42.4.2 Using Oracle BI Discoverer Portlet Provider with Oracle Single Sign-On and Secure Sockets Layer (SSL) Modes

If you configure Oracle BI Discoverer Portlet Provider to work with Oracle Single Sign-On and SSL, then UIX images might not display correctly in Oracle BI Discoverer. For example, on the Connect to OracleBI Discoverer page, the expand icon (that is, the blue + symbol) in the **Details** column of the Discoverer connections list might not display correctly.

To address this issue, you must add certain server startup properties.

1. Start Enterprise Manager Fusion Middleware Control. For more information, see "Managing and Configuring Discoverer" in *Oracle Fusion Middleware Configuration Guide for Oracle Business Intelligence Discoverer*.

2. Navigate to the WebLogic Server node (for example, **WLS_DISCO**) node, and click the WebLogic Server Administration Console link.

3. Select the **Server Start** tab on the **Configurations** page of the WebLogic Server Administration Console.

4. In the **Arguments** field, append the following lines, if they do not exist.

   - `-Doracle.discoverer.applications.protocol=https`

   - `-Doracle.discoverer.applications.port=port_no`

     Set `port_no` to the HTTPS port number that you want to use (for example, 4443).

5. Restart the server.

42.4.3 Issues with Discoverer Portlets in WebCenter

The following issues exist for Discoverer portlets displayed in Oracle WebCenter.

- When a Worksheet portlet is displayed in Oracle WebCenter, the links to navigate to the next set of records does not work.

- When a List of Worksheets portlet is displayed in Oracle WebCenter, the Expand All Icons link does not work.

To work around these issues, set the `RenderPortletInIFrame` attribute of the portlet tag to `TRUE`. For more information, see "Setting Attribute Values for the Portlet Tag" in *Oracle Fusion Middleware Developer's Guide for Oracle WebCenter*.

42.4.4 Issue while Publishing Discoverer WSRP Portlets in Portals Other than Oracle Portal and Oracle WebCenter

When you publish Discoverer WSRP Portlets in portals other than Oracle Portal and Oracle WebCenter (such as Oracle WebLogic Portal and IBM WebSphere Portal), the pop-up windows for input selection will have the same page layout as the portal page with all navigation options. If you select any of these navigation options, the current portlet state will be lost. You might need to start publishing the portlet from the beginnng.

The issue has no workaround.

42.4.5 Issue with Portlet Titles in Discoverer WSRP Portlets Published on IBM WebSphere

You cannot dynamically change the portlet title of a Discoverer WSRP portlet in IBM WebSphere after it is published. Static title is rendered in the portal for each portlet instance.

To work around this issue, set a meaningful title for the portlet by editing the title using the Set Title or Description option in the WebSphere portal. For more information about changing the title of a portlet, see WebSphere documentation.

42.4.6 Issue with Color and Date Pickers in Discoverer WSRP Portlets

The Color and Date pickers in Discoverer WSRP Portlets do not work on portals other than Oracle WebCenter.

On portals such as Oracle Portal, Oracle WebLogic Portal and IBM WebSphere, to workaround this issue, set the value of the configuration parameter `useInlineUIXPicker` to true. The default value of this parameter is false. When you set the `useInlineUIXPicker` parameter to true, set the color and date as follows:

- Inline color pickers are enabled in the Gauges Selection page and you can select a color from the palette.

- You cannot select the color using the Format option of the Personalize menu of the worksheet. Use the Analyze option in the portlet window to change the color.

- The Date picker in the Refresh option will not be available. Enter the date manually.

42.4.7 Worksheet Parameter LOV is not Displayed in Discoverer WSRP Portlets on IBM WebSphere Portal

The Worksheet Parameter LOV icon is not displayed when you publish Discoverer WSRP portlets in IBM WebSphere portal.To work around this issue, enter parameter values manually.

42.4.8 Issue with Worksheet Parameter LOV Pop-Up Window in Discoverer WSRP Portlets

In Oracle Portal and Oracle WebLogic Portal, when you select values from the parameter LOV from a worksheet portlet published by using the Discoverer WSRP Portlet producer, the pop-up window is not getting closed on selection of values.You must explicitly close the pop-up window after selection of values.

42.5 Issues Specific to Oracle BI Discoverer Viewer

This section describes issues that are specific to Oracle BI Discoverer Viewer. It includes the following topics:

- Section 42.5.1, "Drill Icons Cannot Be Hidden in Oracle BI Discoverer Viewer"
- Section 42.5.2, "Error Displaying Page for Multiple SSO Users"
- Section 42.5.3, "Inability to Disable the Display of Row Numbers"
- Section 42.5.4, "Issues with Oracle BI Discoverer Viewer Embedded in Frames"
- Section 42.5.5, "Issue Exporting to PDF Under Certain Circumstances"
- Section 42.5.6, "Issue When Changing Colors for Oracle BI Discoverer Viewer in Fusion Middleware Control on Mac OS X"
- Section 42.5.7, "Discoverer Catalog Items Not Visible From UNIX Servers"
- Section 42.5.8, "Known Bug with JAWS Prevents Drilling Using the Enter Key"
- Section 42.5.9, "JAWS Does Not Read Asterisks that Precede Fields"
- Section 42.5.10, "Oracle BI Discoverer Viewer Pages are not Cached by Oracle Web Cache"

42.5.1 Drill Icons Cannot Be Hidden in Oracle BI Discoverer Viewer

The `pref.txt` file contains a setting called `ShowDrillIcon`, which is not functioning properly. If you set `ShowDrillIcon` to `False`, then drill icons are still displayed in Oracle BI Discover Viewer.

The issue has no workaround.

42.5.2 Error Displaying Page for Multiple SSO Users

When an Oracle Single Sign-On (SSO) user tries to view a worksheet from a List of Worksheets Portlet by using the same browser window that is already being used by an SSO user to view that worksheet, the second user sees the following error message: `"The page cannot be displayed"`.

To work around this issue, start a new browser session and view the worksheet.

42.5.3 Inability to Disable the Display of Row Numbers

Oracle BI Discoverer Viewer no longer offers the ability to disable the display of row numbers in a tabular worksheet.

42.5.4 Issues with Oracle BI Discoverer Viewer Embedded in Frames

Users might see JavaScript errors such as `"Access Denied"` or other unexpected behavior when both of the following conditions are met:

- When Oracle BI Discoverer Viewer is embedded in an IFRAME tag.

- When the domain of the server that hosts the HTML page with the IFRAME tag is different from the domain of the Oracle BI Discoverer server that is running Oracle BI Discoverer Viewer.

Use one of the following workarounds for this issue:

- Run the Oracle BI Discoverer server and the server that hosts the HTML page with the IFRAME tag in the same domain.

- Alter the `Common2_2_20.js` file on the Oracle BI Discoverer server using the following steps:

  1. Use Fusion Middleware Control to stop all services on the middle tier for Oracle Business Intelligence.

  2. Make a backup copy of the `Common2_2_20.js` file from the following directory:

     `domain\servers\managed_`
     `server\stage\discoverer\release\discoverer\discoverer.war\`
     `cabo\jsLib`

     `domain` is the path of directory that contains the domain.

     `managed_server` is the name of the managed server on which the Discoverer application is deployed.

     `release` is the release number of Discoverer. For example, `11.1.1.1.0`.

  3. Edit the `Common2_2_20.js` file and replace all occurrences of "parent._pprSomeAction" with "window._pprSomeAction".

  4. Use Fusion Middleware Control to start all services on the middle tier for Oracle Business Intelligence.

5. Clear the browser cache on the client machine so that the new `Common2_2_20.js` file will be used.

42.5.5 Issue Exporting to PDF Under Certain Circumstances

If you are using Oracle BI Discoverer Viewer with Microsoft Internet Explorer, you might encounter an error message when you try to export to PDF a worksheet that is named with non-ASCII characters, a space, and a number. The export fails and you will see a message similar to the following one:

```
No %PDF- in a file header
```

Use one of the following methods to work around this issue:

- Use a browser other than Internet Explorer, such as one from Netscape or Mozilla.

- Remove the space between the non-ASCII characters and the number, or remove the number altogether.

- Continue to use Internet Explorer and leave the space in the worksheet name, but follow these steps:

    1. Start the Adobe Reader.

    2. From the **Edit** menu, choose **Preferences**, then click **Internet**.

    3. Clear the **Display PDF in browser** box.

42.5.6 Issue When Changing Colors for Oracle BI Discoverer Viewer in Fusion Middleware Control on Mac OS X

You can use Fusion Middleware Control to change the look and feel of Oracle BI Discoverer Viewer. That page contains a color chooser, or palette. If you use Fusion Middleware Control on Mac OS X with the Safari browser, then the page does not correctly enter the color code when you select a color from the palette.

To work around this issue, you can either use the Firefox browser or you can enter a color code directly.

The color codes are standard HTML hexadecimal color codes. You can enter one of the 49 colors that are available in the color palette, or you can enter any valid HTML hexadecimal color code.

The following list provides examples of colors with their codes:

white #FFFFFF
grey #CCCCCC
black #000000
pink #FFCCCC
red #FF0000
light yellow #FFFFCC
yellow #FFFF00
light green #99FF99
dark green #00CC00
light blue #66FFFF
dark blue #3333FF
lavender #FF99FF
purple #CC33CC

42.5.7 Discoverer Catalog Items Not Visible From UNIX Servers

You might encounter issues when trying to see items in the Discoverer Catalog when using Oracle BI Discoverer Viewer with OLAP data on UNIX servers.

You can resolve this issue on the middle-tier machine where Oracle BI Discoverer runs by performing the following steps.

To check whether the time zone variable is set:

1. Open a shell prompt.

2. Type `echo $TZ` to display the time zone setting.

If no value is displayed, then the time zone has not been set.

To set the time zone variable:

1. Open a shell prompt.

> **Note:** The UNIX user that sets the TZ variable must be the same UNIX user that installed Oracle Business Intelligence.

---

2. If you do not know which shell you are using, type `$echo $SHELL` to display the name of the current shell.

3. Set the time zone as appropriate.

   For example, to set the time zone variable for US/Pacific time:

   - For the Bourne, Bash, or Korn shell, type `export TZ=US/Pacific`
   - For the C shell, type `setenv TZ US/Pacific`

> **Note:** Consult the shell documentation for the appropriate values.

42.5.8 Known Bug with JAWS Prevents Drilling Using the Enter Key

Oracle BI Discoverer can be used in conjunction with assistive technologies such as the JAWS screen reader. However, a bug in JAWS prevents the drilling feature from working correctly in Oracle BI Discoverer Viewer when querying a relational data source.

Assume that you use the keyboard to navigate to the drill icon beside an item in the worksheet header. When you press the `Enter` key to drill on that header item, the **Drill** page should be displayed as described in the "Worksheet Display page: (Page level tools and controls)" topic in the Help system and the *Oracle Fusion Middleware User's Guide for Oracle Business Intelligence Discoverer Viewer*).

However, when JAWS is running, the **Drill** page is not displayed. Instead, the **Drill** popup menu is displayed. It is not possible to select items from this popup menu by using the keyboard, and JAWS does not read the items on the popup menu.

This issue has no workaround.

42.5.9 JAWS Does Not Read Asterisks that Precede Fields

In Oracle BI Discoverer Viewer, an asterisk that precedes a text field indicates that the user is required to enter a value into that text field. The JAWS screen reader does not read an asterisk that precedes a required text field and does not otherwise indicate that the field is required.

This issue has no workaround.

42.5.10 Oracle BI Discoverer Viewer Pages are not Cached by Oracle Web Cache

When using Oracle BI Discoverer with Oracle Web Cache, note the following:

- When Oracle Single Sign-On is enabled, Oracle Web Cache does not cache Oracle BI Discoverer Viewer pages, regardless of whether they are accessed using a public connection or a private connection.

- If an Oracle BI Discoverer Viewer page is accessed directly through a URL and the URL contains URL parameters that specify login details (for example, user name, database name), then Oracle Web Cache does not cache the page. For example, Oracle Web Cache does not cache worksheet "Sheet 1" in workbook "Workbook 2" that is displayed by using the following URL:

  ```
  http://<host.domain>:<port>/discoverer/viewer?us=video5&db=db
  1&eul=VIDEO5&wbk=Workbook+2&ws=Sheet+1
  ```

  > **Note:** In the example above, `us=` specifies the database user name, and `db=` specifies the database name.

  However, Oracle Web Cache does cache worksheet "Sheet 1" in workbook "Workbook 2" if a user logs in manually to Oracle BI Discoverer Viewer by using the same login details, and navigates to the worksheet.

- You must increase the delays for Oracle BI Discoverer Viewer by at least 60 seconds for Oracle BI Discoverer Viewer to properly cache workbooks with Oracle Web Cache.

  For more information, see "How to configure Discoverer Viewer to enable maximum caching" in the *Oracle Fusion Middleware Configuration Guide for Oracle Business Intelligence Discoverer*.

42.6 Issues Specific to Oracle BI Discoverer EUL Command Line for Java

This section describes issues that are specific to Oracle BI Discoverer EUL Command Line for Java.

42.6.1 Issue with Exported Non-ASCII Data

When you export multibyte or Eastern European data (such as the names of items and business areas in Japanese or Russian characters) from Oracle BI Discoverer EUL Command Line for Java on a platform other than Windows, the exported data is corrupted.

To work around this issue, edit the `discwb.sh` file that is located in the `ORACLE_HOME/discoverer` directory before exporting. Change the character set value in the NLS_LANG variable to UTF8.

For example, if the original setting of the variable is:

```
NLS_LANG="GERMAN_GERMANY.WE8ISO8859P1"
```

Change the setting to:

```
NLS_LANG="GERMAN_GERMANY.UTF8"
```

42.7 Issues Specific to Oracle BI Discoverer Administrator

This section describes issues that are specific to Oracle BI Discoverer Administrator. It includes the following topic:

- Section 42.7.1, "Issue with Installation of Video Stores Tutorial"

42.7.1 Issue with Installation of Video Stores Tutorial

Before installing the video stores tutorial in Oracle Database 10*g* Enterprise Edition Release 2 (version 10.2.0.1 and higher), you must manually create the VIDEO5 user. If you attempt to install the video stores tutorial in Oracle Database 10*g* Enterprise Edition Release 2, then the installation will fail if the VIDEO5 user does not already exist. To work around this issue:

1. Create the VIDEO5 user manually by completing these steps:

   a. Access Oracle Database 10*g* with SQL*Plus, Enterprise Manager, or any SQL command line tool.

   b. Create the VIDEO5 user.

   c. Grant CONNECT and RESOURCE privileges to the VIDEO5 user.

   For more information about creating users and granting privileges, see the *Oracle Database SQL Reference* or your DBA

2. Connect to Discoverer Administrator as the EUL owner and install the tutorial. You must enter the VIDEO5 user password during installation.

   For information about installing the video stores tutorial, see the *Oracle Fusion Middleware Administrator's Guide for Oracle Business Intelligence Discoverer*.

42.8 Documentation Errata

This section describes the documentation errata. It includes the following topics:

- Section 42.8.1, "Incorrect Information about Databases Supported for Discoverer"

- Section 42.8.2, "Additional Configuration Required to Display Graphics in SSL-Enabled Discoverer Viewer"

- Section 42.8.3, "Missing Information about Public and Private Non-SSO Connections in Configuration Guide"

42.8.1 Incorrect Information about Databases Supported for Discoverer

Section 1.3.3 "About Discoverer installations and the Oracle11g Database" of the *Oracle Fusion Middleware Configuration Guide for Oracle Business Intelligence Discoverer* does not contain complete and correct information about the databases supported for Discoverer.

Ignore the content in that section; instead, see *System Requirements and Supported Platforms for Oracle Fusion Middleware 11gR1* on OTN.

42.8.2 Additional Configuration Required to Display Graphics in SSL-Enabled Discoverer Viewer

The following problem and solution are missing in the chapter "Troubleshooting Discoverer" of *Oracle Fusion Middleware Configuration Guide for Oracle Business Intelligence Discoverer*.

Problem

When SSL is enabled for an Oracle BI Discoverer instance, icons and other graphics are not displayed properly in the Discoverer Viewer.

Solution

This problem occurs when the `WebLogic Plug-In Enabled` property is not configured for the Oracle WebLogic Server Administration Server and the Managed Server (WLS_DISCO). For more information about configuring the `WebLogic Plug-In Enabled` property through the Oracle WebLogic Server Administration Console, see the section "Servers: Configuration: General" in *Oracle Fusion Middleware Oracle WebLogic Server Administration Console Online Help*.

42.8.3 Missing Information about Public and Private Non-SSO Connections in Configuration Guide

The following information about Discoverer connections in Chapter 3, "Managing Oracle BI Discoverer Connections" of *Oracle Fusion Middleware Configuration Guide for Oracle Business Intelligence Discoverer* is incomplete:

"If Discoverer is not associated with an Oracle Internet Directory (and the PStore and Portlet Provider schemas), then Discoverer connections are not available to end users."

Instead, read the sentence as:

"If Discoverer is not associated with an Oracle Internet Directory (and the PStore and Portlet Provider schemas), then Discoverer connections (SSO-enabled) are not available to end users. Non-SSO public and private connections are available even if Discoverer is not associated with an Oracle Internet Directory."

43

Oracle Forms

This chapter describes issues associated with Oracle Forms. It includes the following topics:

- Section 43.1, "General Issues and Workarounds"
- Section 43.2, "Configuration Issues and Workarounds"
- Section 43.3, "Documentation Errata"

43.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 43.1.1, "Backwards Compatibility with Earlier Releases"
- Section 43.1.2, "Linux/UNIX Issues and Workarounds"

43.1.1 Backwards Compatibility with Earlier Releases

For information about upgrading from Forms 6*i*, see the "Upgrading to Oracle Forms Services 11*g*" chapter in *Oracle Fusion Middleware Forms Services Deployment Guide*. For information about changed or obsolete features, see the *Oracle Forms Upgrading Oracle Forms 6i to Oracle Forms 11g Guide*.

For upgrading from Oracle Forms 10*g* and prior releases, you can use the Upgrade Assistant. For more information, see the *Oracle Fusion Middleware Upgrade Planning Guide* and *Oracle Fusion Middleware Upgrade Guide for Oracle Portal, Forms, Reports, and Discoverer*.

Additional information about backwards compatibility is included in My Oracle Support Note 113987.1 at: `http://myoraclesupport.oracle.com`

Regardless from which version of Oracle Forms you are upgrading, you will need to recompile your applications and restart Oracle Forms.

43.1.2 Linux/UNIX Issues and Workarounds

This section describes issues related to Oracle Forms and Linux/UNIX. It includes the following topics:

- Section 43.1.2.1, "LD_PRELOAD Setting Required for Signal Chaining Facility"
- Section 43.1.2.2, "Check the Reports Engine Logs for FRM-41214"
- Section 43.1.2.3, "Changing User Permissions"

43.1.2.1 LD_PRELOAD Setting Required for Signal Chaining Facility

The `LD_PRELOAD` setting in `default.env` is required for the working of signal chaining facility in JVM version 1.5 and later. If you are creating or using other environment files, the setting in the environment file for `LD_LIBRARY_PATH` and `LD_PRELOAD` must be the same as in `default.env`.

43.1.2.2 Check the Reports Engine Logs for FRM-41214

If you encounter the Forms error FRM-41214:Unable to run report when trying to run Reports from a Forms session, check the Reports engine logs for more details on the error.

43.1.2.3 Changing User Permissions

The 11*g* installation sets the permissions of the files so that only the user who installed 11*g* can run the executables. Refer to the document *Setting Developer Tools Permissions on Unix* at `http://www.oracle.com/technology/products/forms` for instructions on changing permissions for other users to allow execution of the Forms development tools.

43.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 43.2.1, "Non-Internet Explorer Browser Proxy Settings when Using One-Button-Run"

- Section 43.2.2, "WebUtil Client Files Allow Configuration of Destination Directory"

- Section 43.2.3, "webutil.properties Files Renamed for Different Libraries"

- Section 43.2.4, "Forms does not Work with JDK 1.6.0_12 on Client with WinRunner"

- Section 43.2.5, "JavaScript Communication Does not Work in IE7 for Framed HTML File"

- Section 43.2.6, "Modification of Forms J2EE Application Deployment Descriptors"

43.2.1 Non-Internet Explorer Browser Proxy Settings when Using One-Button-Run

If you encounter a FORBIDDEN error when using One-Button-Run with any of the supported browsers other than Internet Explorer, verify if 127.0.0.1 (localhost) is in the proxy settings for your browser. If 127.0.0.1 is not in the exceptions list, then add it. This ensures that the browser will bypass the proxy server.

43.2.2 WebUtil Client Files Allow Configuration of Destination Directory

WebUtil downloads `install.syslib` libraries into the bin directory of the JRE or JVM on Windows and into the lib directory of JRE on Linux. This location can be specified in the parameter `install.syslib.location.client.<OS> = <Path on client machine>` (where `<Path on client machine>` represents the path to the location where libraries used on the client by WebUtil are stored and is either absolute or relative to client user home) in `webutil.cfg`.

43.2.3 webutil.properties Files Renamed for Different Libraries

When `install.syslib` libraries are downloaded, WebUtil creates the `webutil.properties` file which is located in the client user home. Different webutil.properties files are maintained on client side to allow different servers to download and manage their libraries on client. The files are named `webutil.<HOST>.<CONFIG>.properties` on the client, where `HOST` is the server computer name and `CONFIG` is the name of configuration section in `formsweb.cfg`.

43.2.4 Forms does not Work with JDK 1.6.0_12 on Client with WinRunner

Forms does not run when using JDK 1.6.0_12 and later versions on a client that also has WinRunner installed.

As a workaround, rename the two environment variables `_JAVA_OPTIONS` and `JAVA_TOOLS_OPTIONS`. For example, rename them to `test_JAVA_OPTIONS` and `test_JAVA_TOOLS_OPTIONS`. This will disable WinRunner but allows Forms to run.

43.2.5 JavaScript Communication Does not Work in IE7 for Framed HTML File

JavaScript communication does not work in framed HTML file that is opened in Internet Explorer 7 with file:// protocol.

As a workaround, use the IP address instead of the machine name in the URL for the frame. For example in testform.htm, change:

```
<frame noresize="noresize"
 src="http://testform.us.oracle.com:8888/forms/java/js2frm1.html" name="fr2"
 frameborder="0">
   <frame noresize="noresize"
 src="http://testform.us.oracle.com:8888/forms/frmservlet?play=&record=forms&
 form=js2frm1&userid=scott/tiger@adt10220" name="fr1" frameborder="0">
```

to

```
<frame noresize="noresize"
 src="http://10.229.147.186:8888/forms/java/js2frm1.html" name="fr2"
 frameborder="0">
   <frame noresize="noresize"
 src="http://10.229.147.186:8888/forms/frmservlet?play=&record=forms&form=js2fr
 m1&userid=scott/tiger@adt10220" name="fr1" frameborder="0">
```

43.2.6 Modification of Forms J2EE Application Deployment Descriptors

Post-deployment, Forms J2EE application deployment descriptors (`weblogic.xml`, `web.xml`, `application.xml` and `weblogic-application.xml`) cannot be modified in Oracle WebLogic Server.

As a workaround, perform the following steps to customize the Forms J2EE application deployment descriptors and redeploy the application:

1. Back up the default formsapp deployment plan, `$DOMAIN_HOME/deploymentplans/formsapp/11.1.1/plan.xml`.

2. Add the deployment descriptors customizations to the Forms J2EE application's deployment plan.

3. Using the WebLogic Administration Console, update the forms application (redeploy) and select the option **Update this application in place with new deployment plan changes**.

4. Restart the Forms J2EE application using the WebLogic Administration Console.

> **Note:** For more information on updating the deployment plan, refer to the *Oracle Fusion Middleware Deploying Applications to Oracle WebLogic Server 11g Release 1 (10.3.1)*.

For example, to override the Forms Servlet `testMode` parameter and set it to true, perform the following steps:

1. Enter the following commands:

```
Mkdir -p $CLASSIC_ORACLE_HOME/forms/j2ee/backup
cd $CLASSIC_ORACLE_HOME/forms/j2ee
cp $DOMAIN_HOME/deploymentplans/formsapp/11.1.1/plan.xml backup/
Vi $DOMAIN_HOME/deploymentplans/formsapp/11.1.1/plan.xml
```

2. Add the modifications to the deployment plan. The following is a sample of the deployment plan with the added entries highlighted in bold:

```
<?xml version='1.0' encoding='UTF-8'?>
<deployment-plan xmlns="http://xmlns.oracle.com/weblogic/deployment-plan"
 xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
 xsi:schemaLocation="http://xmlns.oracle.com/weblogic/deployment-plan
 http://xmlns.oracle.com/weblogic/deployment-plan/1.0/deployment-plan.xsd"
 global-variables="false">
  <application-name>formsapp</application-name>
  <variable-definition>
    <variable>
      <name>vd-/scratch/t_work/Oracle/Middleware/as_1/forms</name>
      <value>/scratch/t_work/Oracle/Middleware/as_1/forms</value>
    </variable>
    <variable>
      <name>vd-/scratch/t_work/Oracle/Middleware/user
_projects/domains/ClassicDomain/config/fmwconfig/servers/WLS
_FORMS/applications/formsapp_11.1.1/config/forms</name>
      <value>/scratch/t_work/Oracle/Middleware/user
_projects/domains/ClassicDomain/config/fmwconfig/servers/WLS
_FORMS/applications/formsapp_11.1.1/config/forms</value>
    </variable>
    <variable>
      <name>FormsServlet_InitParam_testMode</name>
      <value>true</value>
    </variable>
  </variable-definition>
  <module-override>
    <module-name>formsapp.ear</module-name>
    <module-type>ear</module-type>
    <module-descriptor external="false">
      <root-element>weblogic-application</root-element>
      <uri>META-INF/weblogic-application.xml</uri>
    </module-descriptor>
    <module-descriptor external="false">
      <root-element>application</root-element>
      <uri>META-INF/application.xml</uri>
    </module-descriptor>
    <module-descriptor external="true">
      <root-element>wldf-resource</root-element>
      <uri>META-INF/weblogic-diagnostics.xml</uri>
    </module-descriptor>
  </module-override>
```

```
        <module-override>
          <module-name>formsweb.war</module-name>
          <module-type>war</module-type>
          <module-descriptor external="false">
            <root-element>weblogic-web-app</root-element>
            <uri>WEB-INF/weblogic.xml</uri>
            <variable-assignment>
              <name>vd-/scratch/t_work/Oracle/Middleware/as_1/forms</name>
<xpath>/weblogic-web-app/virtual-directory-mapping/[url-pattern="java/*"]
/local-path</xpath>
            </variable-assignment>
            <variable-assignment>
              <name>vd-/scratch/t_work/Oracle/Middleware/as_1/forms</name>
<xpath>/weblogic-web-app/virtual-directory-mapping/[url-pattern="webutil/*"]
/local-path</xpath>
            </variable-assignment>
            <variable-assignment>
              <name>vd-/scratch/t_work/Oracle/Middleware/user
_projects/domains/ClassicDomain/config/fmwconfig/servers/WLS
_FORMS/applications/formsapp_11.1.1/config/forms</name>
<xpath>/weblogic-web-app/virtual-directory-mapping/[url-pattern="registry/*"]
/local-path</xpath>
            </variable-assignment>
          </module-descriptor>
          <module-descriptor external="false">
            <root-element>web-app</root-element>
            <uri>WEB-INF/web.xml</uri>
            <variable-assignment>
              <name>FormsServlet_InitParam_testMode</name>
<xpath>/web-app/servlet/[servlet-name="frmservlet"]/init-param
/[param-name="testMode"]/param-value</xpath>
            </variable-assignment>
          </module-descriptor>
        </module-override>
</deployment-plan>
```

3. Using the WebLogic Administration Console, update the Forms J2EE application deployment (formsapp (11.1.1)).

4. Restart the Forms J2EE application using the WebLogic Administration Console.

43.3 Documentation Errata

This section describes documentation errata. It includes the following topics:

- Section 43.3.1, "EVENT_PARAMETERS is a Keyword"

43.3.1 EVENT_PARAMETERS is a Keyword

EVENT_PARAMETERS is not documented as a keyword in Forms Builder Online Help.

44

Oracle Portal

This chapter describes issues associated with Oracle Portal. It includes the following topics:

44.1 Before You Begin

In addition to the known problems and workarounds described in this document, Oracle recommends that you read the My Oracle Support note 834615.1 - *Oracle Fusion Middleware 11g Portal (11.1.1) Support Status and Alerts*. This article contains known issues that were discovered after the release of Oracle Portal 11g Release 1 (11.1.1).

44.2 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- [Section 44.2.7, "Manual Changes to Oracle Portal Default Schema Objects"](#)
- [Section 44.2.8, "Creating Readable URLs"](#)
- [Section 44.2.9, "Encrypting a Password in MOD_ORADAV.CONF"](#)
- [Section 44.2.10, "Migrating an External Application"](#)
- [Section 44.2.11, "Portal Throws Discoverer Provider is Busy Error Message"](#)
- [Section 44.2.12, "Error When Creating RCU Portal Schema"](#)
- [Section 44.2.13, "Error When Adding Sample RSS Portlets to a Page"](#)
- [Section 44.2.14, "Internal Error when Using Portal Search With Oracle Text Enabled to Search for Pages"](#)
- [Section 44.2.15, "IPv6 Support in Oracle Portal 11g Release 1 (11.1.1)"](#)

44.2.1 Oracle Portal 11g Release 1 (11.1.1) with Oracle Application Server Wireless

Integrating Oracle Application Server Wireless 10*g* with Oracle Portal 11*g* Release 1 (11.1.1) requires you to complete a set of manual steps, as described in the My Oracle Support note 837837.1 (*Oracle Portal 11g Release 1 (11.1.1) with Oracle Application Server Wireless*). In addition, see the following My Oracle Support notes for information about deprecated features in 10*g*:

- Deprecated Features in Oracle Application Server 10*g* Release 2 (10.1.2)
- Deprecated Features in Oracle Application Server 10*g* Release 3 (10.1.3)

44.2.2 Editing a Database Link Requires Password

If the database where the portal schema is installed is version 10.2 or later, then users must re-enter the remote user's password when they rename or edit a database link from the Portal Navigator's Database Objects tab. This is applicable only for those database links that are created with the **Specific User** option.

44.2.3 Moving Content When Approval Is Enabled Does Not Require Approval

Moving content between pages or between regions of the same page does not trigger approvals. For example, when a target page is configured with an approval process and a contributor moves content from a source page to the target page, the moved content does not trigger the approval process on the target page, even when approval is required for all users.

44.2.4 Firefox and Safari Browsers Do Not Display Tooltips on Oracle Portal Screens

Firefox and Safari browsers do not support the display of tooltip text, which is set using the ALT attribute for image descriptions.

As a workaround, you can download and install browser-specific add-ons, such as Popup ALT Attribute for Firefox (see https://addons.mozilla.org/en-US/firefox/addon/1933).

44.2.5 Non-ASCII URLs Cannot be Decoded in Some Scenarios

If the JVM default character encoding is set to ISO8859-1, the Portal repository database character set must match with the JVM default character encoding. If this condition is not satisfied, non-ASCII URLs may become inaccessible.

44.2.6 Adding a Zip File with a Non-ASCII Character Name

If you are adding a zip file to a page under a pagegroup using non-ascii character name, and when you unzip the file, it throws the following exception:

```
IllegalArgumentException: null and unzip will be failed.
```

To avoid this exception, you must use ascii character as the zip file name.

44.2.7 Manual Changes to Oracle Portal Default Schema Objects

Any manual changes to Oracle Portal default objects, such as tables, views, packages, or indexes are not supported. Such changes may render Oracle Portal unusable. Note that the internal structure of Portal objects can change between versions.

For more information, see the 403179.1 My Oracle Support note.

44.2.8 Creating Readable URLs

If you are using Secure Enterprise Search (SES), then by default, the search result of your Portal displays durable URL format for an item or a page. To display your URL as a readable format, perform the following steps:

1. Run `sbrsrxml.sql`, located at `ORACLE_HOME\upgrade\portal\admin\plsql\wws` in Windows and `ORACLE_HOME/upgrade/portal/admin/plsql/wws`, in UNIX, using your Portal schema password.

2. Enter the value `0`, for example `@wws\sbrsrxml.sql  0` in Windows.

After you run a full SES crawl, your URL is displayed in a readable format. And if you want your URL to display the durable URL format, then run `sbrsrxml.sql` and enter the value `1`.

44.2.9 Encrypting a Password in MOD_ORADAV.CONF

This section describes how to encrypt a password in the `mod_oradav.conf` file. Perform the following tasks:

Editing the DAV Password

To edit the password in the `mod_oradav.conf` file, do the following:

1. Open your `mod_oradav.conf` file, located at `ORACLE_INSTANCE/config/OHS/ohs1/moduleconf` (UNIX).

2. Locate the `DAV` entry for which you wish to change the password. In a default portal instance, you can find the `DAV` configuration entry in the following directive:

```
<Location /dav_portal/portal>
```

3. In the `DAV` entry, remove the directive `ORACRYPTPASSWORD` (For example, `DAVParam ORACRYPTPASSWORD BS50NfrosVZOjfgc9hUQ9wcbFFxLSYT/BA==`), and replace with the clear text password using the following syntax:

```
DAVParam ORAPASSWORD <your_password_here>
```

For example:

If you want to have a password of `passwd123`, add a line as follows: `DAVParam ORAPASSWORD passwd123`.

4. Save the file.

Obfuscate the Password

After editing the DAV password, it is recommended that the DAV password be obfuscated by running the `oradavTool.pl` script located at `ORACLE_HOME/bin` in UNIX and `ORACLE_HOME\bin` in Windows. To do so, perform the following steps:

1. If necessary, change the user to the Oracle software owner user, typically oracle, using the following command:

```
su - oracle
```

2. Set the `ORACLE_HOME` environment variable to specify the path to the Oracle home directory for the current release, and set the PATH environment variable to include the directory containing the Perl executable and the location of the `oradavTool.pl` script (Located at `ORACLE_HOME/ohs/bin` in UNIX and `ORACLE_HOME\ohs\bin` in Windows).

Bourne, Bash, or Korn shell:

```
$ ORACLE_HOME=new_ORACLE_HOME_path;export ORACLE_HOME
PATH=$ORACLE_HOME/bin:$ORACLE_HOME/perl/bin:$PATH;export PATH
```

C or tcsh shell:

```
% setenv ORACLE_HOME new_ORACLE_HOME_PATH
% setenv PATH ORACLE_HOME/bin:$ORACLE_HOME/perl/bin:PATH
```

On Microsoft Windows, set the PATH and PERL5LIB environment variable:

```
set PATH=ORACLE_HOME\bin;%ORACLE_HOME%\perl\bin;%PATH%
set PERL5LIB=ORACLE_HOME\perl\lib
```

3. On UNIX platforms, set the shared library path environment variable

Include the `ORACLE_HOME/lib` or `lib32` directory in your shared library path. Table 44–1 shows the appropriate directory and environment variable for each platform.

Table 44–1   Shared Library Path Environment Variable

Platform	Environment Variable	Include Directory
AIX Based Systems	LIBPATH	ORACLE_HOME/lib
HP-UX PA-RISC	SHLIB_PATH	ORACLE_HOME/lib
Solaris Operating System	LD_LIBRARY_PATH	ORACLE_HOME/lib32
Other UNIX platforms, including Linux and HP Tru64 UNIX	LD_LIBRARY_PATH	ORACLE_HOME/lib

For example, on HP-UX PA-RISC systems, set the SHLIB_PATH environment to include the `ORACLE_HOME/lib` directory:

```
$SHLIB_PATH=$ORACLE_HOME/lib:$SHLIB_PATH;export SHLIB_PATH
```

4. Change directory to the `ORACLE_HOME/bin` (UNIX) directory, as this is the location of the `oradavTool.pl` script.

5. Invoke the following Perl script to encrypt the `mod_oradav.conf` password:

```
perl oradavTool.pl -f mod_oradav.conffilename
```

Where *mod_oradav.conffilename* is the filename for `mod_oradav.conf`, which includes the full path to the `mod_oradav.conf` file.

For example, in UNIX:

```
perl oradavTool.pl -f /u01/app/oracle/as11gr1/ORACLE_INSTANCE/config/OHS/<ohs_
name>/moduleconf/mod_oradav.conf
```

6. The directive `ORAPASSWORD` is updated with the new directive `ORACRYPTPASSWORD`, and your password is obfuscated.

7. Restart your Oracle HTTP Server.

44.2.10 Migrating an External Application

When migrating an external application during the cloning process, you must run the `ssomig` utility after the import is completed as follows:

1. Open the `tnsnames.ora` file, and enter connect string entries to the sso database in `tnsnames.ora` file.

2. Set the `TNS_ADMIN` environment variable to the `tnsnames.ora` file location.

3. Run the `ssomig` utilty (Located at `INFRA_HOME/sso/bin`):

```
$INFRA_HOME/sso/bin/ssomig -import -overwrite -s orasso
-p <<ORASSO_SCHEMA_PASSWORD>> -c <<TNS_ALIAS>> -d ssomig.dmp
-log_d <<ABSOLUTE_PATH_FOR_MREXPDIR>> -discoforce
```

44.2.11 Portal Throws Discoverer Provider is Busy Error Message

Portal throws an error message `The Discoverer Provider is busy, please try again later`. This occurs when you perform the following steps:

1. Click **Edit Portlet** defaults

2. Click **Update for Database** section

3. Change selection for **User not logged** sub-section

4. Click **Next** to fetch worksheet list

Workaround

To workaround this issue perform the following steps:

1. Add `stall` timeout to $DOMAIN_HOME/servers/WLS_PORTAL/

    stage/portal/portal/configuration/appConfig.xml

    For example: `<stall>200</stall>`

2. Restart WebLogic Server Portal

44.2.12 Error When Creating RCU Portal Schema

If RCU portal schema creation fails with the error message ORA-24246: empty access control list (ACL) not allowed, do the following:

1. Connect to the database as a SYS user.

2. At the SQL prompt, run the following command:

```
BEGIN
```

```
                              DBMS_NETWORK_ACL_ADMIN.drop_acl (
                                  acl         => '/sys/acls/portal-permissions.xml');
                            COMMIT;
                         END;
                         /
```

44.2.13 Error When Adding Sample RSS Portlets to a Page

When you try to add the sample Scrolling RSS Portlet or the sample Simple RSS portlet to a Portal page, an error message is displayed.

The error occurs because the RSS used by the sample portlets are no longer available.

Currently, there is no workaround for this problem.

44.2.14 Internal Error when Using Portal Search With Oracle Text Enabled to Search for Pages

If you have Oracle Text enabled, the following internal server error may occur when you are searching for Pages:

```
Internal error (WWC-00006)
An unexpected error has occurred (WWS-32100)
Unknown Exception (WWC-45131)
User-Defined Exception (WWV-11230)
Unexpected error - ORA-00600: internal error code, arguments:
[qkeIsExprReferenced1], [], [], [], [], [], [], [] (WWC-35000)
```

If this error occurs, you must download and install database updates from
http://updates.oracle.com/download/7041059.html.

44.2.15 IPv6 Support in Oracle Portal 11g Release 1 (11.1.1)

Oracle Portal 11g Release 1 (11.1.1) is not directly supported on Internet Protocol Version 6 (IPv6). The supported configuration comprises the following:

- An IPv4/IPv6 reverse proxy setup on an IPv4/IPv6 dual stack machine.

- The Portal mid-tier and the backend database on IPv4 machines, and clients accessing the Portal server through the proxy.

44.2.16 Issue After Creating a Oracle Portal Schema

After creating the Oracle Portal schema, you may get the following error:

```
checkinstall2=Add ACL for network packages if DB is 11.1 or higher...
 old   4:     schema varchar2(2000)   := upper('&&1');
 new   4:     schema varchar2(2000)   := upper('CLASSIC17_PORTAL');
 Package DBMS_NETWORK_ACL_ADMIN exists, assign ACL if not already assigned
 Removing dangling principals,if any from the ACL privilege list ...
 ERROR: when assigning network ACL
 declare
 *
 ERROR at line 1:
 ORA-24246: empty access control list (ACL) not allowed
 ORA-06512: at "SYS.DBMS_NETWORK_ACL_ADMIN", line 421
 ORA-06512: at line 1
 ORA-01403: no data found
 ORA-06512: at line 83
```

To fix this error, you must create a schema with a different prefix, and then run the following command to clean out the dangling ACL:

```
begin
DBMS_NETWORK_ACL_ADMIN.DELETE_PRIVILEGE('portal-permissions.xml','PREFIX_PORTA
L');
end;
```

`PREFIX_PORTAL` is replaced with the schema prefix used in the schema that was dropped.

You must run the Repository Creation Utility to install the new schema.

44.2.17 Updating Database Tables

In Oracle Portal database object, if you insert one row data which has MB character and then update the row, the update will not work. You must manually update the table and view in the database to avoid this issue and update the table and view successfully.

44.3 Upgrade Issues and Workarounds

This section describes the upgrade issues and workarounds. It discusses the following topics:

- Section 44.3.1, "Upgrading Portal 10g SSL Environment to Oracle Portal 11g Release 1 (11.1.1)"

44.3.1 Upgrading Portal 10*g* SSL Environment to Oracle Portal 11*g* Release 1 (11.1.1)

When you upgrade SSL environment from Oracle Portal 10*g* to Oracle Portal 11g Release 1 (11.1.1), you will not able to login to Oracle Portal, when you have SSO and Portal Midtier on the same hostname. Internet Explorer has a problem redirecting back and forth on the same hostname between two different ports under SSL mode. As a workaround, you can use Mozilla Firefox.

44.4 Interoperability Issues and Workarounds

This section describes the interoperability issues and workarounds. It discusses the following topics:

- Section 44.4.1, "Interoperability Between Oracle Portal 11g Release 1 (11.1.1) with Secured Enterprise Search (SES) 10.1.8.3"

- Section 44.4.2, "Interoperability Between Oracle Portal 11g Release 1 (11.1.1) with Secured Enterprise Search (SES) 10.1.8.4"

- Section 44.4.3, "Creating Webproviders in the Oracle Portal 11g Release 1 (11.1.1) Midtier Interoperability with Oracle Portal Repository 10g Release"

44.4.1 Interoperability Between Oracle Portal 11*g* Release 1 (11.1.1) with Secured Enterprise Search (SES) 10.1.8.3

For this interoperability scenario to work, you must download and install updates from `http://updates.oracle.com/download/7685124.html` and see note 816929.1 in My Oracle Support.

44.4.2 Interoperability Between Oracle Portal 11*g* Release 1 (11.1.1) with Secured Enterprise Search (SES) 10.1.8.4

For this interoperability scenario to work, you must download and install updates from `http://updates.oracle.com/download/7971335.html`.

44.4.3 Creating Webproviders in the Oracle Portal 11g Release 1 (11.1.1) Midtier Interoperability with Oracle Portal Repository 10*g* Release

In Portal 11*g* 1 (11.1.1), you cannot create webproviders when you are using 11*g* midtier with 10*g* portal repository.

44.5 User Interface Issue and Workaround

This section describes issue and workaround related to the Oracle Portal user interface. It includes the following topic:

Cannot Set Privileges Using List View on Pages Inheriting Privileges from Parent or Template

If you use the List View to set access privileges for one or more pages, then privileges will *not* be set on pages inheriting privileges from a parent page or template. As a workaround, change the privileges for such pages individually, that is, using the Access tab for the subpage.

44.6 Export and Import Issues and Workarounds

This section describes issues and workarounds related to export and import in Oracle Portal. This section includes the following topics:

- Section 44.6.1, "Export and Import Does Not Support Reports Server Components"
- Section 44.6.2, "Saving the Transport Set"
- Section 44.6.3, "Error when importing a page group"

44.6.1 Export and Import Does Not Support Reports Server Components

If you include Reports Server Components within a transport set, then they are deleted on export and import. In addition, do not configure the Oracle Reports item type in any page groups intended for export and import. If you do, then the following error is displayed when you try to configure item types in the imported page group (by clicking the Content Type and Classifications **Edit** link on the Configure tab for the page group):

```
Internal error (WWC-00006)
Unexpected error - User-Defined Exception (WWC-35000)
Unexpected error - ORA-01403: no data found (WWC-35000)
```

44.6.2 Saving the Transport Set

After you complete the transport set transfer, click **Display Manifest** to display the transport set manifest. Ensure that you save the transport set before performing the precheck of the transferred data. This step takes the manifest changes.

44.6.3 Error when importing a page group

Importing a page group may fail with the following error message:

```
[Error: (WWU-80338)] context = Schema Validation user =
ORCLADMIN There were some inconsistencies found and hence import process is
aborted.Check the debug log for further details.Fix those inconsistencies, by
running schema validation in cleanup mode to proceed
```

This problem might occur after deleting a page group containing shared portlets. You must run SVU in cleanup mode to ensure a smooth export or import process.

44.7 Portlet and Provider Issues and Workarounds

This section describes issues and workarounds related to OmniPortlet, Web Clipping, Simple Parameter Form, Page portlet, and WSRP providers. This section includes the following topics:

- Section 44.7.1, "Registering WSRP Producers in Enterprise Configurations"
- Section 44.7.2, "Setting up the WSRP and JPDK Applications in Oracle Portal"
- Section 44.7.3, "Issue When Accessing Page Portlet Using Federated Portal Adapter"
- Section 44.7.4, "Error in JPS Portlet After Redeployment"
- Section 44.7.5, "SSL Support for Oracle Portal Integration Solutions (Microsoft Exchange)"

44.7.1 Registering WSRP Producers in Enterprise Configurations

When you register a WSRP producer in an Enterprise configuration, you must create a Web Services Definition Language (WSDL) document manually, then register the WSRP producer using that WSDL. This is because the dynamically generated WSDL creates URLs using the HTTPS protocol and the HTTPS port while WSRP producers use HTTP.

> **Note:** A *producer* for WSRP portlets is analogous to a *provider* for PDK-Java portlets.

To create a WSDL document manually, perform the following tasks:

1. View the dynamically generated WSDL through your browser (preferably Internet Explorer).

    To view the WSDL for our WSRP samples, go to:

    ```
    http://host:external http port/portletapp/portlets?WSDL
    ```

2. Save the file from the browser to any externally available location.

    For our WSRP Samples, save the file from the browser into the following directory:

    ```
    ORACLE_HOME/j2ee/home/applications/portletapp/wsrp-samples
    ```

    Save the file as `wsrpsamples.wsdl`.

3. Edit the file, replacing `https` with `http` and correcting the ports to be the external http ports.

4. View the file through a browser.

For example, for our WSRP Samples use the following URL:

```
http://host:external http port/portletapp/wsrpsamples.wsdl
```

5. Use the URL to your `*.wsdl` file (such as the URL under Step 4) when you register the WSRP producer.

For more information about Enterprise configurations, see the *Oracle Fusion Middleware Enterprise Deployment Guide for Java EE*.

44.7.2 Setting up the WSRP and JPDK Applications in Oracle Portal

This section describes steps to manually configure the WSRP and JPDK application and deploying them on the Oracle WebLogic Server. This section includes:

- Configuring and Deploying the WSRP
- Configuring and Deploying the JPDK

44.7.2.1 Configuring and Deploying the WSRP

To configure the WSRP, complete the following steps:

- Creating WSRP Managed Server
- Adding the Required Libraries to the WSRP Managed Server
- Starting the WSRP Managed Server
- Configuring the Datasource
- Extending the Existing WebLogic Domain
- Adding wsm-pm to the WSRP Managed Server
- Deploying the Sample EAR File
- Configuring Oracle Web Cache
- Registering and Viewing Your Portlet

Creating WSRP Managed Server

You can create a WebLogic Managed Server on an existing domain using the Oracle WebLogic Server Administration Console to create the managed server instance and provision the shared libraries required to run a custom Oracle Portal application. To create the WSRP Managed Server, complete the following steps:

1. Log on to the Oracle WebLogic Server Administration Console.

2. If you have not already done so, in the Change Center of the Administration Console, click **Lock & Edit**.

3. In the Domain Structure tree, expand **Environment**, and then select **Servers**.

The **Summary of Servers** page is displayed.

4. Click **New**.

The **Create a New Server** page is displayed.

5. In the Create a New Server page enter the following information:

- **Server Name**: Enter the name of the server, for example **WLS_WSRP**.

- **Server Listen Port**: Enter the port number from which you want to access the server instance. For example, 9003.

- Select the **No, this is a stand-alone server** radio button.

6. Click **Finish**.

7. In the **Summary of Servers page**, click on the Server (**WLS_WSRP**) you have created.

8. Select your machine name from the **Machine** drop-down list and click **Save**.

9. Click **Activate Changes**.

Adding the Required Libraries to the WSRP Managed Server

For a portlet producer application, you must deploy the following libraries to the new Managed Server or cluster:

- oracle.portlet-producer.wsrp(11.1.1,11.1.1)

- oracle.portlet-producer.jpdk(11.1.1,11.1.1)

- DMS Application (11.1.1.1.0)

- oracle.jrf.system.filter

- oracle.jsp.next(11.1.1,11.1.1)

- oracle.wsm.seedpolicies(11.1.1,11.1.1)

- wsil-wls

To add the libraries, complete the following steps:

1. Click **Lock & Edit**.

2. In the Domain Structure tree, select **Deployments**.

   The **Summary of Deployments** page is displayed.

3. Select **oracle.portlet-producer.wsrp(11.1.1,11.1.1)** from the Deployments table.

   The **Settings for oracle.portlet-producer.wsrp(11.1.1,11.1.1)** page is displayed.

   > **Note:** If the oracle.portlet-producer.wsrp(11.1.1,11.1.1) does not appear in the Deployment table, then click **Customize this table**, and disable the **Exclude libraries when displaying deployments** check box. Click **Apply**.

4. Click the **Targets** tab, and select **AdminServer** and **WLS_WSRP** from the Servers section.

5. Click **Save**.

6. Go to your **Summary of Deployments** page, and for each shared library, click the **Targets** tab, and then check **AdminServer** and **WLS_WSRP** from the Servers section.

7. To add the wsil-wls library, complete the following steps:

   a. Select **wsil-wls** from the Deployments table.

   b. Click the **Targets** tab, and select **wsil-wls** from the Component table.

   c. Click **Change Targets**, and then check **AdminServer** and **WLS_WSRP** from the Servers section.

    d. Click **Yes**.

8. Click **Activate Changes**.

Starting the WSRP Managed Server

To start the managed server, complete the following steps:

1. Click **Lock & Edit**.

2. In the Domain Structure tree, expand **Environment**, and then select **Servers**.

The **Summary of Servers** page is displayed.

3. Click the **Control** tab, and check your created server (**WLS_WSRP**).

4. Click **Start**.

The **Server Life Cycle Assistant page** is displayed.

5. Click **Yes**, to start the managed server.

Configuring the Datasource

To map the portletPrefs datasource targets to the managed server (**WLS_WSRP**), do the following:

1. In the Domain Structure tree, expand **Services**, and then select and expand **JDBC** and click **Data Sources**.

The **Summary of JDBC Data Sources** page is displayed.

2. Click the Name associated with the `jdbc/portletPrefs` JNDI.

3. Click the **Targets** tab, and check **WLS_WSRP** from the Servers section.

4. Click **Save**.

5. Click **Activate Changes**.

Extending the Existing WebLogic Domain

To extend your existing Oracle WebLogic Server domain with the Oracle WSM Policy Manager, complete the following steps:

> **Note:** You must stop all the servers running in the Oracle Portal domain.

---

1. Go to the `oracle_common/common/bin` directory and run the `config.sh` (UNIX).

The **Welcome** window is displayed.

2. Select **Extend an existing WebLogic Domain** and click **Next**.

The **Select a WebLogic Domain Directory** screen is displayed.

3. Select your valid domain directory and click **Next**.

The **Select Extension Source** screen is displayed.

4. Select **Oracle WSM Policy Manager - 11.1.1.0 [Oracle_Common]** (Select the one associated with your Oracle Portal) check box from the **Extend my domain automatically to support the following added products** option and click **Next**.

The **Configure JDBC Data Sources** screen is displayed.

5. Click **Next**.

   The **Test JDBC Data Sources** screen is displayed.

6. Click **Next**.

   The **Configure JDBC Component Schema** screen is displayed.

7. Check the **OWSM MDS Schema** and enter the Host Name, Port, DBMS/ Service, Schema Password for the MDS schema. Click **Next**.

   > **Note:** This is the schema created for MDS when you run the Repository Configuration Utility (RCU) at install time. If you did not created this schema already then you need to create this schema first using RCU.

   The **Test Component Schema** screen is displayed.

8. Confirm the test is successful and click **Next**.

   The **Select Optional Configuration** screen is displayed.

9. Select **Deployments and Service**s.

10. Click **Next**.

    The **Target Deployments to Clusters or Servers** screen is displayed.

11. Ensure **wsrp-pm** is targeted to servers including **WLS_WSRP** and **AdminServer**.

12. Click **Next**.

    The **Target Services to Cluster or Servers** screen is displayed

13. Click **Next**.

14. Review your settings in the **Configuration Summary** screen, and click **Extend**.

15. Click **Done**.

Start the Oracle WebLogic Administration Server, the managed server, and the WLS_ WSRP managed server.

Adding wsm-pm to the WSRP Managed Server

You must add the wsm-pm to the WLS_WSRP managed server, by completing the following steps:

1. If you have not already done so, in the Change Center of the Administration Console, click **Lock & Edit**.

2. In the Domain Structure tree, select **Deployments**.

   The **Summary of Deployments** page is displayed.

3. Select **wsm-pm** from the Deployments table.

4. Click the **Targets** tab, and select **wsm-pm** from the Component table.

5. Click **Change Targets**, and then check **AdminServer** and **WLS_WSRP** from the Servers section.

6. Click **Yes**.

Deploying the Sample EAR File

To deploy the EAR file, download the **wsrp-samples.ear** file, from Download the Oracle Portlet Container at
http://www.oracle.com/technology/products/ias/portal/pdk.html
and do the following:

1. Click **Lock & Edit**.

2. In the Domain Structure tree, select **Deployments**.

   The **Summary of Deployments** page is displayed.

3. Click **Install**.

4. Select **wsrp-samples.ear** from your directory, click **Next**.

5. Select **Install this deployment as an application**, and click **Next**.

6. Check **WLS_WSRP** from the Servers section, and click **Next**.

7. Enter a name for the deployment, and click **Finish**.

8. Click **Activate Changes**.

9. In the **Summary of Deployments** page, select the application you have deployed, and then click **Start**.

10. Now that you have deployed the sample EAR file, you need to test its WSDL URL by entering it into a browser. The WSDL URL is of the form:

    ```
    http://host:port/portletapp/portlets?WSDL
    ```

    You should see a page similar to the one shown in Example 44–1.

Example 44–1   WSRP Producer WSDL Page

```
<?xml version="1.0" encoding="UTF-8" ?>
<definitions targetNamespace="urn:oasis:names:tc:wsrp:v1:wsdl"
 xmlns="http://schemas.xmlsoap.org/wsdl/"
 xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/"
 xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"
 xmlns:bind="urn:oasis:names:tc:wsrp:v1:bind">
<import namespace="urn:oasis:names:tc:wsrp:v1:bind"
 location="http://stamf10.us.abc.com:8090/wsrp-tools/portlets/wsrp1?WSDL=wsrp_v1_
bindings.wsdl" />
<service name="WSRP_v1_Service">
<port name="WSRPServiceDescriptionService"
 binding="bind:WSRP_v1_ServiceDescription_Binding_SOAP">
<soap:address
location="http://stamf10.us.oracle.com:8090/wsrp-tools/portlets/WSRPServiceDescrip
tionService" />
</port>
<port name="WSRPBaseService" binding="bind:WSRP_v1_Markup_Binding_SOAP">
<soap:address
location="http://stamf10.us.oracle.com:8090/wsrp-tools/portlets/WSRPBaseService"
/>
</port>
<port name="WSRPPortletManagementService"
 binding="bind:WSRP_v1_PortletManagement_Binding_SOAP">
<soap:address
location="http://stamf10.us.abc.com:8090/wsrp-tools/portlets/WSRPPortletManagement
Service" />
</port>
<port name="WSRPRegistrationService" binding="bind:WSRP_v1_Registration_Binding_
```

```
SOAP">
<soap:address
location="http://stamf10.us.abc.com:8090/wsrp-tools/portlets/WSRPRegistrationServi
ce"/>
</port>
</service>
</definitions>
```

Configuring Oracle Web Cache

To view the WSDL URL using the Oracle Web Cache port, edit the `portal.conf` file
(Located at `ORACLE_INSTANCE\config\OHS\ohs1\moduleconf` in Windows) as
follows:

```
<Location /portletapp>
    SetHandler weblogic-handler
    WebLogicHost servername.domain.com
    WebLogicPort 9003
</Location>
```

Save your file and restart the Oracle HTTP Server. Now you can access the WSDL URL
through the Oracle Portal port (The default port is `8090`).

Registering and Viewing Your Portlet

After you've created and deployed the provider and its portlets, you should register
the provider with Oracle Portal. For more information, see Registering and Viewing
Your JSR 168 Portlet in the "*Oracle Fusion Middleware Developer's Guide for Oracle
Portal.*"

44.7.2.2 Configuring and Deploying the JPDK

To configure and deploying the JPDK, perform the following:

- Creating the JPDK Managed Server

- Adding the Required Libraries to the JPDK Managed Server

- Starting the JPDK Managed Server

- Configuring the Datasource

- Deploying the EAR File

Creating the JPDK Managed Server

You can create a WebLogic Managed Server on an existing domain using the Oracle
WebLogic Server Administration Console to create the managed server instance and
provision the shared libraries required to run a custom Oracle Portal application. To
create the JPDK Managed Server, do the following:

1. Log on to the WebLogic Server Administration Console.

2. If you have not already done so, in the Change Center of the Administration
   Console, click **Lock & Edit**.

3. In the Domain Structure tree, expand **Environment** and then select **Servers**.

   The **Summary of Servers** page is displayed.

4. Click **New**.

   The **Create a New Server** page is displayed.

5. In the Create a New Server page enter the following information:

- **Server Name**: Enter the name of the server. For this step use **WLS_JPDK** as an example.

- **Server Listen Port**: Enter the port number from which you want to access the server instance. For this step use **9004** as an example.

- Select the **No, this is a stand-alone server** radio button.

6. Click **Finish**.

7. In the **Summary of Servers page**, click on the Server (**WLS_JPDK**) you have created.

8. Select your machine name from the **Machine** drop-down list and click **Save**.

9. Click **Activate Changes**.

Adding the Required Libraries to the JPDK Managed Server

For a portlet producer application, you must deploy the following libraries to the new Managed Server or cluster:

- oracle.portlet-producer.jpdk(11.1.1,11.1.1)

- DMS Application (11.1.1.1.0)

- oracle.jsp.next(11.1.1,11.1.1)

To add the libraries, do the following:

1. Click **Lock & Edit**.

2. In the Domain Structure tree, select **Deployments**.

   The **Summary of Deployments** page is displayed.

3. Select **oracle.portlet-producer.jpdk(11.1.1,11.1.1)** from the Deployments table.

   The **Settings for oracle.portlet-producer.jpdk(11.1.1,11.1.1)** page is displayed.

   > **Note:**   If the oracle.portlet-producer.jpdk(11.1.1,11.1.1) does not appear in the Deployment table, then click **Customize this table**, and disable the **Exclude libraries when displaying deployments** check box. Click **Apply**.

4. Click the **Targets** tab, and select **AdminServer** and **WLS_JPDK** from the Servers section.

5. Click **Save**.

6. Go to your **Summary of Deployments** page, and for each shared library, click the **Targets** tab, and then check **AdminServer** and **WLS_JPDK** from the Servers section.

7. Click **Activate Changes**.

Starting the JPDK Managed Server

To start the managed server do the following:

1. Click **Lock & Edit**.

2. In the Domain Structure tree, expand **Environment** and then select **Servers**.

   The **Summary of Servers** page is displayed.

3. Click the **Control** tab, and select your created server (**WLS_JPDK**).

4. Click **Start**.

    The **Server Life Cycle Assistant page** is displayed.

5. Click **Yes**, to start the managed server.

Configuring the Datasource

To map the `portletPrefs` datasource targets to the managed server (WLS_JPDK), do the following:

1. In the Domain Structure tree, expand **Services**, and then select and expand **JDBC** and click **Data Sources**.

    The **Summary of JDBC Data Sources** page is displayed.

2. Click the Name associated with the **jdbc/portletPrefs** JNDI.

3. Click the **Targets** tab, and check **WLS_JPDK** from the Servers section.

4. Click **Save**.

5. Click **Activate Changes**.

Deploying the EAR File

To deploy the JPDk, do the following:

1. Click **Lock & Edit**.

2. In the Domain Structure tree, select **Deployments**.

    The **Summary of Deployments** page is displayed.

3. Click **Install**.

    The **Install Application Assistant** page is displayed.

4. In the **Path** field, enter the location of the jpdk.ear file (Located at `ORACLE_HOME/archives/applications` for Windows and `ORACLE_HOME\archives\applications` for UNIX).

5. Select **jpdk.ear**, and click **Next**.

6. Select **Install this deployment as an application**, and click **Next**.

7. Check **WLS_JPDK** from the Servers section, and click **Next**.

8. In the **Name** field, enter a name for the deployment.

9. Click **Finish**.

10. Click **Activate Changes**.

11. Click **Lock & Edit**.

12. From the **Summary of Deployments** page, select the application and click **Start** and then, Servicing all requests.

13. From the **Start Application Assistant**, click **Yes**.

14. Now that you have deployed the sample EAR file, you need to test its URL by entering it into a browser. The URL is of the form:

    ```
    http://host:port/jpdk/providers/sample/
    ```

For more information, see Creating Java Portlets in the *Oracle Fusion Middleware Developer's Guide for Oracle Portal*.

Configuring Oracle Web Cache

To view the JPDK sample URL using the Oracle Web Cache port, edit the `portal.conf` file (Located at `ORACLE_INSTANCE\config\OHS\ohs1\moduleconf` in Windows) as follows:

```
<Location /jpdk>
    SetHandler weblogic-handler
    WebLogicHost servername.domain.com
    WebLogicPort 9004
</Location>
```

Save your file and restart the Oracle HTTP Server. Now you can access the WSDL URL through the Oracle Portal port (The default port is `8090`).

Registering and Viewing Your Portlet

After you've created and deployed the provider and its portlets, you should register the provider with Oracle Portal. For more information, see "Registering and Viewing Your Oracle PDK-Java Portlet" section in the *Oracle Fusion Middleware Developer's Guide for Oracle Portal*.

44.7.3 Issue When Accessing Page Portlet Using Federated Portal Adapter

The Federated Portal Adapter enables you to display remote portal pages in your portal. However, if both portal instances do not share the same Oracle Single Sign-On server, then you cannot display a remote portal page as a page portlet, even if the remote page is public. A message is displayed instead of the page portlet, as shown in the following example:

```
Portlet 257,75057 responded with content-type text/plain when the client was
requesting content-type text/html
```

As a workaround, configure both portal instances to use the same Oracle Single Sign-On server.

44.7.4 Error in JPS Portlet After Redeployment

When you redeploy your portlets to the portlet container, all existing sessions between the producer and all of its consumers are lost. If a consumer tries to reuse an existing producer session, then it may receive an error message the first time it tries to contact the producer after redeployment, as shown in the following example:

```
Error: Could not get markup. The cookie or session is invalid or there is a
runtime exception.
```

To reestablish the producer's session, refresh the portal page. You will not see this error message if you are reaccessing the portlet from a new browser session because it automatically establishes a new producer session.

44.7.5 SSL Support for Oracle Portal Integration Solutions (Microsoft Exchange)

SSL support is not available for Oracle Portal Integration Solutions (Microsoft Exchange). This is a known limitation.

44.8 PDK Issue and Workaround

Oracle Portal Developer Kit (PDK) version 10.1.2 is included with the Portal and Wireless installation. Release notes for the PDK-Java and PDK-PL/SQL can be found at the following middle-tier *ORACLE_HOME* locations:

- **PDK-Java:** *ORACLE_ HOME*`/portal/pdkjava/v2/pdkjava.v2.releasenotes.html`

- **PDK-PL/SQL:** *ORACLE_ HOME*`/portal/pdkjava/v2/pdkplsql.release.notes.html`

Latest Version of Oracle PDK

New versions of the Oracle PDK are released periodically providing new features, new APIs, and additional documentation. To take advantage of all the latest features, download the latest PDK from the PDK downloads page on the Oracle Technology Network (OTN) at
`http://www.oracle.com/technology/products/ias/portal/pdk.html`.

Release notes for the latest Oracle PDK version are available on Oracle Portal on OTN and also in these PDK download locations:

- `pdk\plsql\pdkplsql.release.notes.html`

- `pdk\jpdk\v2\pdkjava.v2.release.notes.html`

44.9 Globalization Support Issues and Workarounds

This section describes issues and workarounds related to Globalization Support in Oracle Portal. It includes the following topics:

- Section 44.9.1, "Text Entry Always Right to Left in BiDi Languages"
- Section 44.9.2, "Non-ASCII Character Limitations in Oracle Portal"
- Section 44.9.3, "Multibyte Characters in Log Files"

44.9.1 Text Entry Always Right to Left in BiDi Languages

The direction of all text areas and fields is right to left (RTL). However, you may want some text areas to work left to right (LTR). Internet Explorer users can change this by pressing the left hand side Ctrl and Shift keys.

44.9.2 Non-ASCII Character Limitations in Oracle Portal

When you copy and paste an item URL containing non-ASCII characters from one browser Location or Address field into another, you may not be able to access the item if your login credentials have not been authenticated through OracleAS Single Sign-On.

As a workaround, log in to the portal before you access the item and copy the item URL.

44.9.3 Multibyte Characters in Log Files

In some scenarios, multibyte characters in log files may get corrupted.

For example, when the WLS_PORTAL managed server is started from the Oracle WebLogic Server Administration Console, multibyte characters, such as `username`, `password`, and `is starting`, may get corrupted.

Workarounds:

- Change `-Dfile.encoding=iso-8859-1` to `-Dfile.encoding=utf8` in the WLS_PORTAL start-up parameter through the Oracle WebLogic Server Administration Console.

- Change `-Dfile.encoding=iso-8859-1` to `-Dfile.encoding=utf8` in the `setDomainEnv.sh` file (Located at `MW_HOME/user_projects/domains/DomainName/bin`).

For more information, see note 403179.1.

44.10 Documentation Errata

This section lists errors in the Oracle Portal 11g Release 1 documentation on OTN.

44.10.1 Limit for Parameters Per Portal Page

Section 22.3 "Adding a Parameter to a Page or Portal Template" of the *Oracle® Fusion Middleware User's Guide for Oracle Portal* describes the procedure to add parameters to a Portal page or template.

That section does not mention the maximum number of parameters that you can add. Note that you can add a maximum of 2000 parameters to a page.

If you add more than 2000 parameters, when the request is processed, the following error message is logged:

```
ERROR: Repository Gateway error: Request Processing Error: Too
many arguments passed in. Got <n> parameters. Upper limit is
2000
```

45

Oracle Reports

This chapter describes issues associated with Oracle Reports. It includes the following topics:

- Section 45.1, "General Issues and Workarounds"
- Section 45.2, "Documentation Errata"

45.1 General Issues and Workarounds

This section describes general issue and workarounds. It includes the following topic:

- Section 45.1.1, "Output Image Format for PDF Reports with Graphs"
- Section 45.1.2, "Mapping Users and Roles to Reports Application"

45.1.1 Output Image Format for PDF Reports with Graphs

PDF reports with Graphs may fail to open in Adobe Acrobat Reader in Oracle Reports 11.1.1.3.0 if you specify PNG, JPG, or JPEG as the image output format either by using the `outputimageformat` command-line parameter or by using the `REPORTS_OUTPUTIMAGEFORMAT` environment variable.

By default, GIF is used as the output image format even if it is not explicitly specified. Therefore, use GIF as the output image format for PDF reports with graphs.

45.1.2 Mapping Users and Roles to Reports Application

In Oracle Fusion Middleware 11g Release 1 (11.1.1.3.0) installations, roles and users are not added to the Reports application, by default. To run a report using JPS security, you must add roles and users to the Reports application.

For more information, see:

- "Managing Application Roles" in the *Oracle Fusion Middleware Security Guide*
- "Managing Users and Security Policies" in the Oracle Fusion Middleware *Publishing Reports to the Web with Oracle Reports Services* manual

45.2 Documentation Errata

This section lists errors in the Oracle Reports documentation published on OTN.

45.2.1 Incorrect JSP Deployment Path

In Section 42.5 "Deploy the JSP Parameter Form and the Target Report" of the *Oracle®
Fusion Middleware Oracle Reports User's Guide to Building Reports*, the JSP deployment
path is incorrectly mentioned as `$BEA_HOME\servers\WLS_
REPORTS\stage\reports\reports\web.war`.

The correct path is `$DOMAIN_HOME\servers\WLS_REPORTS\tmp_WL_
user\reports_11.1.1.2.0\dir_name\war`.

Note that `dir_name` is a randomly generated directory name for each deployment
instance.

45.2.2 Restriction on Horizontal Panels Per Page in a Matrix Report Produced in the ENHANCEDSPREADSHEET Format

For a matrix report, if the horizontal panels per page is set to a value higher than 1,
running the report in the `ENHANCEDSPREADSHEET` output format would result in the
following error:

`REP-1223: THE PAGE SIZE IS INVALID`

You can set the horizontal panels per page to a value higher than 1 for a matrix report
for all `DESFORMAT`s except `ENHANCEDSPREADSHEET`.

Part X

Oracle Enterprise Content Management Suite

Part X contains the following chapters:

46

Oracle ECM Application Adapters

This chapter describes issues associated with Oracle application adapters for ECM. It includes the following topics:

- Section 46.1, "General Issues and Workarounds"

- Section 46.2, "Configuration Issues and Workarounds"

- Section 46.3, "Documentation Errata"

46.1 General Issues and Workarounds

There are no known issues at this time.

46.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 46.2.1, "E-Business Suite and PeopleSoft Adapters: Further Configuration or Solution Template Required for Imaging Solution"

- Section 46.2.2, "PeopleSoft Adapter: Encrypted Gateway Password May Be Required"

- Section 46.2.3, "E-Business Suite Adapter: Workaround to Enable PaperClip Functionality For Imaging Solution Only Configuration"

- Section 46.2.4, "PeopleSoft Adapter: Gateway Required For Communications Between PeopleSoft and AXF Server"

- Section 46.2.5, "Managed Attachments Solution Not Clustered in Clustered Environment"

46.2.1 E-Business Suite and PeopleSoft Adapters: Further Configuration or Solution Template Required for Imaging Solution

After completing installation and configuration of the Imaging Solution, one of the following steps is required for implementation:

- Apply a solution template. To obtain a solution template, contact your systems integrator, Oracle Consulting, or Oracle Support.

- Further configuration of the AXF tables and either E-Business Suite or PeopleSoft AXF tables.

  – For the E-Business Suite adapter, see "Imaging Solution Tables" in the *Oracle Fusion Middleware Administrator's Guide for Oracle E-Business Suite Adapter for Oracle Enterprise Content Management*.

  – For the PeopleSoft adapter, see "Imaging Solution Tables" in *Oracle Fusion Middleware Administrator's Guide for Oracle PeopleSoft Adapter for Oracle Enterprise Content Management*.

46.2.2 PeopleSoft Adapter: Encrypted Gateway Password May Be Required

In "Configuring Integration Broker to Communicate with AXF" in *Oracle Fusion Middleware Administrator's Guide for Oracle PeopleSoft Adapter for Oracle Enterprise Content Management*, if *Success* is not displayed after pinging the node, you may need to encrypt the secureFileKeystorePasswd value under Gateway Properties, as described in the following steps.

1. In PeopleSoft Server, open **PeopleTools**, then **Integration Broker,** then **Configuration**, then **Gateways**.

2. Search for and open the LOCAL gateway, then click the **Gateway Setup Properties** link.

3. Sign on to access the integrationGateway.properties file.

4. Click the **Advanced Properties Page** link.

5. Use the Password Encryption Utility on the Gateway Properties page to encrypt the secureFileKeystorePasswd value.

6. In the Gateway Properties screen, paste the encrypted password after **secureFileKeystorePasswd=** and click **OK**.

46.2.3 E-Business Suite Adapter: Workaround to Enable PaperClip Functionality For Imaging Solution Only Configuration

Installing and configuring the Managed Attachments solution automatically disables the E-Business Suite attachments paperclip icon and functionality. To reenable the paperclip functionality for an Imaging Solution only configuration, follow these steps to disable the Managed Attachments solution:

1. Open the AXF_CONFIGS table (E-Business Suite) table.

2. In the FORMFUNCTION field, rename the `AXF_MANAGED_ATTACHMENTS` entry.

    For example, rename the entry as follows:

    ```
    AXF_MANAGED_ATTACHMENTS-DISABLED
    ```

    For more information, see "AXF_CONFIGS Table (E-Business Suite)" in *Oracle Fusion Middleware Administrator's Guide for Oracle E-Business Suite Adapter for Oracle Enterprise Content Management*.

    > **Note:** To reenable the Managed Attachments solution, change the FORMFUNCTION field back to the following entry:
    >
    > ```
    > AXF_MANAGED_ATTACHMENTS
    > ```

46.2.4 PeopleSoft Adapter: Gateway Required For Communications Between PeopleSoft and AXF Server

When configuring a PeopleSoft imaging solution, a PeopleSoft local integration gateway must be set up for PeopleSoft external communications. See the PeopleSoft Enterprise documentation for information about setting up gateways. You can then proceed with configuring the PeopleSoft service operation to communicate with a 10g or 11g AXF Server, as described in "Setting Up the Service Operation Routings" in *Oracle Fusion Middleware Administrator's Guide for Oracle PeopleSoft Adapter for Oracle Enterprise Content Management*.

46.2.5 Managed Attachments Solution Not Clustered in Clustered Environment

When configuring the adapter in a clustered environment, the Managed Attachments solution will not be clustered. Instead, it will point to the server that is configured in the AXF configuration.

46.3 Documentation Errata

There are no known issues at this time.

47

Oracle Enterprise Content Management Suite Installation and Configuration

This chapter describes installation and configuration issues associated with Oracle Enterprise Content Management Suite (Oracle ECM). It includes the following topics:

- Section 47.1, "File Formats Wizard Might Display Error First Time After Upgrade"
- Section 47.2, "Oracle UCM Configuration Automatic on Same Machine and Domain As Oracle I/PM"
- Section 47.3, "Verifying the AXF Installation with HelloBpel"

For more information about Oracle ECM installation and configuration, see *Oracle Fusion Middleware Installation Guide for Oracle Enterprise Content Management Suite* or *Oracle Fusion Middleware Quick Installation Guide for Oracle Enterprise Content Management Suite*.

47.1 File Formats Wizard Might Display Error First Time After Upgrade

In certain circumstances, the first time that you update the File Formats Wizard in Oracle Content Server after an upgrade, you might see an error. This error is harmless, and it will not occur on subsequent updates.

The File Formats Wizard is available in Oracle Content Server when Oracle Inbound Refinery is configured to work with Oracle Universal Content Management. For more information, see Section 6.2, "Installing and Configuring Oracle IBR on Oracle UCM," in *Oracle Fusion Middleware Installation Guide for Oracle Enterprise Content Management Suite*.

47.2 Oracle UCM Configuration Automatic on Same Machine and Domain As Oracle I/PM

When you configure Oracle Universal Content Management (Oracle UCM) on the same machine and in the same Oracle WebLogic Server domain as Oracle Imaging and Process Management (Oracle I/PM), the postinstallation configuration of Oracle UCM is done automatically. In this case, Oracle UCM does not display the Content Server Configuration page when you first log in to Oracle Content Server at

`http://`*`managedServerHost`*`:`*`managedServerPort`*`/cs`

If you follow the default configuration for the installation of Oracle UCM and Oracle I/PM, both applications are installed on the same machine. In this environment, Oracle I/PM provides a configuration file to Oracle UCM that sets up Oracle UCM for use by Oracle I/PM.

If the Oracle UCM instance is intended to be used as a full Oracle UCM Managed Server in addition to servicing Oracle I/PM, then the Oracle UCM administrator should review the automatic configurations through the administration interfaces in Oracle Content Server. The additional configuration steps described in Chapter 5, "Configuring Oracle Universal Content Management," of *Oracle Fusion Middleware Installation Guide for Oracle Enterprise Content Management Suite* should be done on the Oracle UCM Managed Server to fully configure it for production.

The Oracle I/PM administrator should verify that the default Oracle UCM configurations are correct for use by the Oracle I/PM Managed Server. For Oracle I/PM use, many of the Oracle UCM postinstallation configuration steps, such as configuring Oracle Inbound Refinery, are not required.

47.3 Verifying the AXF Installation with HelloBpel

In Section 7.5.2, "Verifying the AXF Installation with HelloBpel," of *Oracle Fusion Middleware Installation Guide for Oracle Enterprise Content Management Suite*, the following values to enter for Step 5 are not correct:

- Solution Namespace: `HelloBpel`

- Command Namespace: `OPEN_TASKLIST`

- User Name: `jcooper`

Here are the correct values to enter for Step 5:

- Solution Namespace: `HelloBPEL`

- Command Namespace: `StartHelloBPEL`

- User Name: A valid Oracle I/PM user; for example, `weblogic`

The preceding Oracle I/PM user needs to be part of a group named `California`. If this group does not exist, then create it, and add the user to the group.

48

Oracle Imaging and Process Management

This chapter describes issues associated with Oracle Imaging and Process Management. It includes the following topics:

- Section 48.1, "General Issues"
- Section 48.2, "Browser Compatibility Issues"
- Section 48.3, "Accessibility Issues"
- Section 48.4, "Documentation Errata"

48.1 General Issues

This section describes general issues. It includes the following topics:

- Section 48.1.1, "I/PM Session Time Out When Using OSSO Requires Browser Refresh"
- Section 48.1.2, "Mixed Translations On Page"
- Section 48.1.3, "Deleting More Than 100 Documents Can Cause Http 404 Errors"
- Section 48.1.4, "Time Zone Based on Time Zone of I/PM Server"
- Section 48.1.5, "I/PM Documents May Be Visible Natively Within WebCenter"
- Section 48.1.6, "Removing Full-Text Search Capabilities From Defined Applications"
- Section 48.1.7, "Application Field Limitations When Using Oracle Text Search"
- Section 48.1.8, "Oracle URM Records Missing from Oracle I/PM Searches"
- Section 48.1.9, "WebLogic Server Listening Address and AXF Driver Page URL Must Reference the Same Domain"
- Section 48.1.10, "/imaging/faces Directory Must Be Protected When Using Oracle Access Manager With I/PM"
- Section 48.1.11, "WebLogic Scripting Tool Doesn't Recognize Multibyte Characters in Export File Path"

48.1.1 I/PM Session Time Out When Using OSSO Requires Browser Refresh

When using Oracle Single Sign On and an I/PM session expires, WebLogic Server will return an internal server error. Refreshing the page returns to the I/PM log in page for reauthentication to start a new session.

48.1.2 Mixed Translations On Page

Oracle products support 10 standard languages for administrative tasks and 27 standard languages for user tasks. This means that in instances when a selected language is supported for user but not administrative tasks and an administrative task is performed, multiple languages may be displayed in the user interface.

48.1.3 Deleting More Than 100 Documents Can Cause Http 404 Errors

There is a known issue with Microsoft Internet Explorer if attempting to delete more than 100 documents using a search results table. Doing so can cause Internet Explorer to return a 404 Page Not Found error or potentially lock. This is due to Internet Explorer limiting URL strings to a maximum of 2083 characters. If it is necessary to delete over 100 documents using a search results table, Mozilla Firefox supports URLs up to 65,000 characters.

48.1.4 Time Zone Based on Time Zone of I/PM Server

All time information is now based on the time zone of the I/PM server. This means that any date metadata generated by the Oracle I/PM system, such as document creation date, modify date, or other audit events, is governed by the time zone of the I/PM server, and not the user time zone. This can cause date data to be displayed differently to what may be expected on some documents because the time zone may cross midnight.

For example, if the I/PM server is in the Greenwich Mean Time (GMT) time zone and a document is created in the GMT+6 time zone on January 10th at 2:00 AM local time, the creation date that will be displayed in the user interface will be January 9th at 8:00 PM. This can have implications when searching for content based on creation and modification dates of documents.

48.1.5 I/PM Documents May Be Visible Natively Within WebCenter

If an I/PM is viewed through WebCenter, then the document is cached in WebCenter. This means that if a document is viewed in WebCenter prior to being annotated, the non-annotated document is viewable until such time as the WebCenter cache is refreshed. Redacting a document after it has been cached in WebCenter does not cause the original document to be purged from the WebCenter cache, and so redacted content may be compromised. To help protect redacted content when I/PM is integrated with WebCenter, use the Viewer on the Upload page to redact documents prior to uploading to I/PM.

48.1.6 Removing Full-Text Search Capabilities From Defined Applications

Removing full-text search capabilities from a defined application can cause an error in any defined search against that application if the Document Content condition is not also removed from the search. When modifying an existing application to remove full-text indexing capabilities, ensure that you also remove all Document Content conditions from any defined searches against that application.

48.1.7 Application Field Limitations When Using Oracle Text Search

When Oracle I/PM is configured to use OracleTextSearch and an application is defined to do full-text indexing, a maximum limit of 20 SDATA fields for the Content Server repository is imposed on I/PM. SDATA fields are defined as optimized fields

by the Oracle Text Search component and are typically non-text, non-memo fields, although other criteria can exist to define text fields as optimized SDATA fields.

When defining an application, Oracle I/PM queries the repository DOCMETA table for the number of available SDATA fields and does not allow the creation of any non-text fields within the application beyond the available number. However, additional components installed on the Content Server repository, such as Folders or Discussions, may reduce the total number of available SDATA fields. Because other configurations may consume SDATA outside of the DOCMETA table, you may be able to add fields to an application but get an error when trying to rebuild the search index in Content Server. If this occurs, you must redefine the application using a different Oracle Content Server connection with available SDATA fields. If no additional Content Server connection is defined, you can install and configure an additional Oracle Content Server and create a new connection to it in Oracle I/PM. Alternately, you can redefine the application using the original Content Server connection but with fewer non-text fields until you are able to successfully rebuild the search index.

48.1.8 Oracle URM Records Missing from Oracle I/PM Searches

Care should be taken when integrating Oracle I/PM with Oracle Universal Records Management. If a document is uploaded into an Oracle I/PM application that has been configured to use a Records-only Retention Category and the user who uploaded the document does not have rights on the Oracle Content Server repository to see records, they will not be able to see any of the uploaded documents in an I/PM search. Rights to retention categories are determined in Oracle URM. If integrating Oracle I/PM and Oracle URM, ensure that all users needing rights to view records have the correct security, that Retention Categories are set correctly in all Oracle I/PM applications, and that users understand what can happen if the Records-only Retention Categories are used.

48.1.9 WebLogic Server Listening Address and AXF Driver Page URL Must Reference the Same Domain

If leveraging AXF functionality with Oracle I/PM, the Listen Address base domain configured in the WebLogic Server console must match how the domain is specified in the URL used to access AXF. Otherwise content may not load properly and users may not have access to AXF. To configure the Listen address in AXF, do the following:

1. Log in to the WebLogic Server administration console.

2. Under the Environment section of the ecm_domain, select **Servers**. The Summary of Servers page is displayed with the **Configuration** tab active.

3. Click **IPM_server<*number*>**. The Setting for **IPM_server<*number*>** page is displayed for the selected Oracle I/PM server with the **Configuration** and **General** tabs active.

4. Set the **Listen Address** to the preferred URL. The Listen Address specified should be the base domain without the protocol.

> **Note:** The Listen Address base domain and the URL base domain used to access AXF must be identical. If the fully qualified domain name is used for the Listen Address setting, then it must also be used for the access URL, even when inside the domain. For example, if the base domain **server_name.domain.com** is used in the Listen Address configuration setting, the access URL would be **http://server_name.domain.com:<*port*>/**.

48.1.10 /imaging/faces Directory Must Be Protected When Using Oracle Access Manager With I/PM

When configuring Oracle I/PM for use with Oracle Access Manager, the /imaging/faces directory must be protected. Failure to do so prevents access to the I/PM Viewer.

48.1.11 WebLogic Scripting Tool Doesn't Recognize Multibyte Characters in Export File Path

When using WLST commands importIPMSearch, importIPMInput, importIPMApplication, the first parameter is the file path to the export file. WebLogic Scripting Tool does not recognize multibyte characters in the file path, and so multibyte characters should not be used in the path.

48.2 Browser Compatibility Issues

This section describes browser compatibility issues. It includes the following topics:

- Section 48.2.1, "Safari: Unexpected Tab Order In Search Results Toolbar and Viewer Menus"

- Section 48.2.2, "Safari: Unable to Use Keyboard to Select Panels In Viewer"

- Section 48.2.3, "IE: Non-ASCII Characters Not Supported in Internet Explorer for ExecuteSearch"

- Section 48.2.4, "Firefox 3.6: Version and Download Dialog Boxes Appear Behind Viewer in Advanced Mode"

48.2.1 Safari: Unexpected Tab Order In Search Results Toolbar and Viewer Menus

When using the keyboard tab button to select functions on the Toolbar of a Search results page, the expected behavior is to focus on the first option (View) and then move to the next (Email). Instead, the tab button causes focus to move through the hidden View submenus before moving the focus to Email. Similarly, when using the tab button to select menus on the Viewer, the expected behavior is to move focus from the first Viewer menu (File) to the next (View). Instead, the tab button causes the focus to move through the hidden submenus of each top-level menu before moving focus to the next menu.

48.2.2 Safari: Unable to Use Keyboard to Select Panels In Viewer

When using the keyboard tab button to select items on the Viewer, none of the panels (History, Sticky Notes, or Properties) can be selected. This is a known issue with Safari. If you need to use the keyboard to select a panel in the Viewer, you must use either Microsoft Internet Explorer or Mozilla Firefox to view documents.

48.2.3 IE: Non-ASCII Characters Not Supported in Internet Explorer for ExecuteSearch

The Search URL Tool (ExecuteSearch) does not work in Microsoft Internet Explorer if non-ascii characters are used in the search name. If it is necessary for your search name to have non-ascii characters, you must use Mozilla Firefox version 3.5 or higher and set the following parameters:

- prefs.converted-to-utf8=true

- network.standard-url.escape-utf8=true

- network.standard-url.encode-utf8=true

- network.standard-url.encode-query-utf8=true

48.2.4 Firefox 3.6: Version and Download Dialog Boxes Appear Behind Viewer in Advanced Mode

There is a problem with how Firefox 3.6 handles layer order of page items in the advanced mode of the Viewer. This causes the main page region where documents are displayed to hide the Version and Download dialog boxes when a document is viewed using Firefox 3.6. To work around this issue, expand the Properties, History, or Sticky Notes panel into the main page region enough to allow the obscured items to be displayed prior to accessing dialog boxes. This is not an issue when using Microsoft Internet Explorer or Firefox 3.5.*x* and a workaround would be to use either of these browsers to view documents when using the advanced Viewer mode.

48.2.5 Firefox 3.5.9 and 3.6.3: JRE 1.6.0_18 and Above Can Cause Errors When Updating Document

When using a combination of J2SE Runtime Environment (JRE) version 1.6.0_18 or above and Firefox 3.5.9 or 3.6.3, attempting to update a document viewed in the advanced Viewer mode can cause multiple errors. Using J2SE Runtime Environment version 1.6.0_17 should solve the problem. J2SE Runtime Environment is available at http://java.sun.com/products/archive/.

48.3 Accessibility Issues

This section describes accessibility issues. It includes the following topics:

48.3.1 Button Activation Behavior Different Depending on Viewer Mode

The keyboard command to activate a button that has focus is different between basic and advanced viewer modes. The enter key is used to activate a focused button when using the basic viewer mode. The space key is used to activate a focused button when using the advanced viewer mode.

48.3.2 Limitations of Sticky Note Contents

The contents of sticky notes are not downloaded or printed with the document, nor are they viewable through the REST Viewer. The contents of a sticky note can be printed, with limitations, by expanding the sticky note in the Sticky Notes Panel and printing the web page.

48.3.3 Skip to Content Link Added for Keyboard Navigation

The first link encountered on a page when using keyboard navigation in the I/PM user interface is a **Skip to Content** link at the top of the page. Selecting this link and pressing **Enter** takes the focus to the first item in the content region of the page. For example, if on the home page, the first content item is the help links. If a search has been executed and the results are displayed in the content region, then the **Skip to Content** link takes you to the first search tab.

48.3.4 Firefox: Skip to Applet Link Added for Keyboard Navigation in Advanced Viewer Mode

When viewing a document in the advanced viewer mode, keyboard focus starts in the viewer toolbar. However, in Firefox, if focus moves out of the toolbar, it will not return when cycling through the elements using the keyboard. To work around this, a **Skip to Applet** link is at the top of the page. To return keyboard focus to the viewer toolbar, tab to the **Skip to Applet** link and press **Enter**.

48.3.5 Internet Explorer 7: Focus Issue on Upload Document and Preferences Pages

When using Internet Explorer 7, the keyboard appears not to focus on any command buttons on the Upload Document page (Open Viewer, Create, Reset, Close) or Preferences page (Apply, Revert, Close). Focus is achieved, however there is no indication which button is active. This issue does not occur in Internet Explorer 8.

48.3.6 Name of File Selected For Import Not Displayed in Screen Reader Mode

When in screen reader mode and selecting a file to import, the file is loaded and the Next button becomes available, but the name of the file to be imported is not displayed.

48.3.7 Issues Selecting From Calendar Using Keyboard

In Internet Explorer 7, when selecting dates from a calendar using the keyboard, you cannot select a day. This is not an issue in Firefox, Internet Explorer 8 or Safari 4. In addition, the following buttons are skipped when tabbing: Previous month, Previous year, Month increase/decrease, and Year increase/decrease. An alternative to selecting the date with the keyboard is to manually enter the date with the number keys.

48.3.8 Focus Issue in Create Searches Wizard Using Keyboard

After completing fields in the Create New Search Wizard, the keyboard focus changes to the browser URL and you must tab through the banner and navigation before you can edit the current page.

48.3.9 Annotations Not Recognized By JAWS

When viewing a document with annotations while running JAWS, you can tab to an annotation, but no description is read by JAWS.

48.3.10 403 Link Error Returned For Collapse Pane Link

When viewing a document using screen reader mode and Advanced Viewer mode, JAWS reaches the Close Tab options in the Viewer and reads a collapse pane link that is not visible after More options. If you click when JAWS reads *link*, a 403 Forbidden Page error is returned.

48.3.11 Internet Explorer: Focus Issue During Search Using Keyboard

When searching using Internet Explorer, expanding and collapsing the instructions tree using the keyboard incorrectly changes the focus to the **Skip to Content** link instead of the next row.

48.3.12 Date Selected From Calendar Lost Using Keyboard

When using the keyboard to select a date from a calendar control, the selected date is not retained. The workaround is to enter the date into the date field using the number keys on the keyboard.

48.3.13 Some Annotation Buttons Incorrectly Read by JAWS

When you first open a document in Advanced Viewer mode using screen reader mode, JAWS incorrectly adds the phrase *Insert F1 Help Text* after each button name.

48.3.14 Internet Explorer: Long Panels Not Visible In Screen Reader

When using Microsoft Internet Explorer and **I use a screen reader** is enabled on the user preferences page, some panels in the Navigation pane may not display, although the text of the panel title is still read. This is caused when the panel name is too long. Depending on the user interface language, this could happen to one or multiple

panels. If you expand the panel above the hidden panel, the hidden panel is then displayed.

48.3.15 Keyboard Keys To Open and Navigate Sticky Notes In Panel

When a document contains multiple sticky notes, the following keys are used to navigate and control the sticky notes in the sticky note panel:

Key	Description
Up Arrow	Moves focus to the previous sticky note.
Down Arrow	Moves focus to the next sticky note
Right Arrow	Expands a sticky note
Left Arrow	Collapses a sticky note

There is a known issue with keyboard navigation in the sticky note panel. When a sticky note is expanded, the up and down arrow keys do not change focus to a different note. The left arrow key must first collapse the expanded sticky note, then the up and down arrow keys can be used to navigate from one note to another.

48.3.16 Keyboard Keys To The Close Options In Search Form

The following keys are used to control search tabs in the Oracle I/PM content areal:

Key	Description
Shift+F10	Opens a contextual menu when the search tab has focus.
Ctl+Alt+F4	Closes the tab that has focus.

There are known issues with these keyboard commands in the following browsers:

- Firefox 3.6: Ctr+Alt+F4 does not close the focused search tab.

- Internet Explorer 8: Ctr+Alt+F4 does not close the focused search tab and Shift+F10 causes menus to display for both the search tab contextual menu and the browser file menu. Pressing the Esc key closes the browser file menu and puts focus on the search tab contextual menu.

- Safari 4: Shift+F10 does not open a contextual menu.

48.3.17 Disable UI Animation Preference Does Not Disable Busy Indicator

There is a known issue in all browsers that after checking the **Disable UI Animations** on the Preferences page, the busy indicator in the top banner continues to spin when performing a task that keeps the system busy.

48.3.18 Using JAWS and Selecting Expansion Arrow Causes Error

When using JAWS and viewing a multipage document in the Viewer basic mode on screen resolutions less than 1280 pixels wide, focusing on the toolbar expansion arrows and pressing Enter causes an error. This prevents access to tools necessary to navigate to the document. To workaround this issue, view the multi-page document in the Viewer advanced mode. Alternately, set your screen resolution to 1280 x 1024 pixels if your monitor supports it. The higher resolution setting allows for access to all buttons in the Viewer basic mode except the **Go to Next Page**, **Go to Last Page**, and

Help buttons. However, the functionality these buttons provide is accessible by other means.

48.4 Documentation Errata

This section details know errors in the online help or library documentation. It includes the following topics:

48.4.1 Inaccurate Online Help for Application Document Security Page

The online help system incorrectly details the available options on the Application Document Security page.

Modify is listed in the help as a security option but is identified in the user interface as **Write**. Also, **Grant Access** is not listed in the online help but is an available option in the user interface. The two options are detailed in the following table.

Element	Description
Write	Grants a user group rights to upload, update, and copy documents and document metadata within a specific application. Until a user has Write security rights to documents in at least one application, the Upload tool is not visible in the Tools panel of the Navigator Pane.
Grant Access	Grants a user group rights to assign document rights to other user groups. Note that users with Grant Access rights are automatically assigned Delete and Write security rights.

The correct documentation is available in PDF and HTML formats from the documentation library on Oracle Technology Network.

49

Oracle Information Rights Management

This chapter describes issues associated with Oracle IRM Server and Oracle IRM Desktop, together known as 'Oracle IRM'. Unless otherwise stated, the version of Oracle IRM to which these release notes apply is 11.1.1.3.0 (incorporating version 11.1.20 of Oracle IRM Desktop).

This chapter includes the following topics:

- Section 49.1, "General Issues and Workarounds"
- Section 49.2, "Configuration Issues and Workarounds"
- Section 49.3, "Documentation Errata"

49.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 49.1.1, "Renamed Contexts, Roles, and Context Templates are Not Listed Correctly"
- Section 49.1.2, "Some Adobe Reader Buttons Do Not Function"
- Section 49.1.3, "Selecting Oracle IRM Menu Items on the Control Console Using IE8"
- Section 49.1.4, "Support for Microsoft Windows 2000 Has Been Removed"
- Section 49.1.5, "Unreadable Error Message Text When Client and Server Locales are Different"
- Section 49.1.6, "Changes Lost if Tab Changed Before Applying the Apply Button"
- Section 49.1.7, "Some File Formats are Not Supported When Using the Microsoft Office 2007 Compatibility Pack with Microsoft Office 2003"
- Section 49.1.8, "Microsoft Word May Hang if a Sealed Email is Open During Manual Rights Check-In"
- Section 49.1.9, "Sealed Emails in Lotus Notes will Sometimes Show a Temporary File Name"
- Section 49.1.10, "Behavior of Automatic Save and Automatic Recovery in Microsoft Office Applications"
- Section 49.1.11, "No Support for Sealing Files of 2GB or Larger in Size in Oracle IRM Desktop"

- Section 49.1.12, "Inappropriate Authentication Options After Failed Login on Legacy Servers When Setting Up Search"

- Section 49.1.13, "Opening Microsoft Excel files in Microsoft SharePoint"

- Section 49.1.14, "Opening Legacy Sealed Documents in Microsoft Office 2007 May Fail on First Attempt"

- Section 49.1.15, "Log Out Link Inoperative When Using OAM 11g for SSO"

- Section 49.1.16, "Double-byte Languages Cannot be Used for Entering Data with Legacy Servers"

- Section 49.1.17, "Use of SPACE Key Instead of Return Key in Oracle IRM Server"

- Section 49.1.18, "Calendar Controls in Oracle IRM Server Not Accessible Via the Keyboard"

49.1.1 Renamed Contexts, Roles, and Context Templates are Not Listed Correctly

When a Context, Role or Context Template is renamed, the new name will not immediately be reflected in the list in the left panel of the Oracle IRM Server Management Console.

To see the new name listed correctly, the user must click the **Refresh** button at the top of the list.

It is particularly important to do this if the name change has resulted in the order of the list changing. This is because, without refreshing the list, the user may appear to be viewing or editing the wrong item.

49.1.2 Some Adobe Reader Buttons Do Not Function

To protect the security of sealed PDF documents, the following Adobe Reader buttons do not function:

- Email

- Collaborate

- Create PDF using Acrobat.com

If you click these buttons, you will see a message that the associated function is unavailable.

All other Adobe Reader controls are available if you have sufficient rights. If you do not have sufficient rights, you will see a message when you attempt to use the control.

A further restriction applies to controls added to the Adobe Reader interface by users when they have a sealed PDF document open: the added control will be inactive until Adobe Reader is closed and reopened.

49.1.3 Selecting Oracle IRM Menu Items on the Control Console Using IE8

If you are using Microsoft Internet Explorer 8 to access the Oracle IRM pages on the Oracle Fusion Middleware Control Console, you may find that menu item selection highlighting does not behave as expected. The correct item will be used when clicking, but a different entry (or none at all) may be indicated as being selected.

49.1.4 Support for Microsoft Windows 2000 Has Been Removed

Oracle IRM no longer supports the Microsoft Windows 2000 operating system.

49.1.5 Unreadable Error Message Text When Client and Server Locales are Different

Error messages are sent to the client (Oracle IRM Desktop) in the language of the server (Oracle IRM Server). Therefore, if the locale of the server is different to the locale of the client, the error code may be rendered in garbage characters. The error code remains readable, and can be provided to support services as necessary.

49.1.6 Changes Lost if Tab Changed Before Applying the Apply Button

On the Oracle IRM Server Management Console, if you make changes on a tabbed page that has an Apply button, and then move to another tab without using the Apply button, the changes will be lost. You will not be prompted to save the changes that you made.

49.1.7 Some File Formats are Not Supported When Using the Microsoft Office 2007 Compatibility Pack with Microsoft Office 2003

The following Microsoft PowerPoint and Microsoft Excel formats are not supported for sealing when using the Office 2007 Compatibility Pack with Office 2003 and earlier: SPOTM, SPOTX, SPPTM, SPPTX, SXLSX, and SXLTX. For these applications, use other file formats that are supported for sealing.

49.1.8 Microsoft Word May Hang if a Sealed Email is Open During Manual Rights Check-In

In Oracle IRM Desktop, if you attempt to check in your rights while a sealed email is open in Microsoft Word, Microsoft Word may hang. It is recommended that you do not check in your rights while a sealed email is open.

49.1.9 Sealed Emails in Lotus Notes will Sometimes Show a Temporary File Name

In Lotus Notes, if a sealed email has a communication thread with multiple messages or replies, the title bar may show a temporary file name instead of the correct subject name. You may also be prompted to save changes when you have not made any. No harm should arise from these anomalies.

49.1.10 Behavior of Automatic Save and Automatic Recovery in Microsoft Office Applications

The behaviour of automatic save and automatic recovery in Microsoft Office applications is as detailed below.

Word
- All versions: automatic save and recovery of sealed files should behave as normal, with the exception that automatic saving is blocked if the filename contains a dot that is not part of the extension (for example, `my.filename.sdoc`).
- In Word 2000, automatic recovery of sealed files will prompt the user to "save as" immediately, rather than when the user clicks the **Save** button.

PowerPoint
- PowerPoint XP, 2003: automatic save and recovery of sealed files should behave as normal.
- PowerPoint 2007: the automatic saving of sealed files does not take place.

- PowerPoint 2000: automatic save is disabled if sealed files are open, meaning that, if the system crashes, any unsaved changes to any file (sealed or original) will be lost.

Excel

- All versions: automatically saved Excel files (`.xar`) will be sealed, but the recovery of these files does not happen automatically. To recover "lost" changes, users need to locate the `.xar` file and rename it to `.sxls`.

Because of these restrictions, it is recommended that you do not rely on automatic save and recovery. Instead, save your work frequently when using these applications.

49.1.11 No Support for Sealing Files of 2GB or Larger in Size in Oracle IRM Desktop

Sealing files of size 2GB or larger is not supported in the current release of Oracle IRM Desktop.

49.1.12 Inappropriate Authentication Options After Failed Login on Legacy Servers When Setting Up Search

When setting up indexed search, if you enter incorrect authentication credentials for a legacy server (for example, a 10*g* Oracle IRM Server) that has been set up for Windows NT authentication, the login retry dialog will show options for Windows basic authentication. You should not use Windows Authentication credentials to log in to legacy servers set up for Windows NT Authentication.

49.1.13 Opening Microsoft Excel files in Microsoft SharePoint

Sealed Microsoft Excel files cannot be opened from the Document Management pane in Microsoft SharePoint.

49.1.14 Opening Legacy Sealed Documents in Microsoft Office 2007 May Fail on First Attempt

If users attempt to open a legacy Microsoft Office 2007 document (a document sealed with an older version of Oracle IRM), and Oracle IRM Desktop has not been synchronized with the server against which the document was sealed, the attempt will fail. The sealed document will not be opened, and the user will not be prompted to authenticate against the server to which the document was sealed. A second attempt to open the sealed document should succeed, because the initial attempt should have synchronized Oracle IRM Desktop with the server. Alternatively, the user can synchronize to the server manually (using the Oracle IRM Desktop Options dialog) before opening a legacy sealed document.

49.1.15 Log Out Link Inoperative When Using OAM 11*g* for SSO

When using OAM (Oracle Access Management) 11*g* for SSO, the Log Out link on the Oracle IRM Server Management Console does not log the user out.

49.1.16 Double-byte Languages Cannot be Used for Entering Data with Legacy Servers

This release of Oracle IRM Desktop is available in many more languages than previous releases, including some double-byte languages. However, for legacy (10*g*) servers, as previously, data (user names, etc.) must still be entered using the 7-bit ASCII range of characters.

49.1.17 Use of SPACE Key Instead of Return Key in Oracle IRM Server

In some dialogs in the Oracle IRM Server Management Console, the Return key does not execute buttons. When this occurs, use the SPACE key instead.

49.1.18 Calendar Controls in Oracle IRM Server Not Accessible Via the Keyboard

In the Oracle IRM Server Management Console, the calendar controls are not accessible via the keyboard, and do not appear if the console is in Screen Reader mode. To enter a date using the keyboard, the date should be typed in.

49.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 49.2.1, "LDAP Reassociation Fails if User and Group Names are Identical"

- Section 49.2.2, "Upgrading Oracle IRM Desktop From Versions Earlier Than 5.5"

- Section 49.2.3, "Synchronizing Servers After an Upgrade of Oracle IRM Desktop"

- Section 49.2.4, "Reapplying Lost Settings After an Upgrade of Oracle IRM Desktop"

- Section 49.2.5, "Changing Oracle IRM Account When Authenticated Using Username and Password"

- Section 49.2.6, "Post-Installation Steps Required for Oracle IRM Installation Against Oracle RAC"

- Section 49.2.7, "Enabling Search With Sharepoint 2007"

- Section 49.2.8, "Enabling the Oracle IRM Installation Help Page to Open in a Non-English Server Locale"

49.2.1 LDAP Reassociation Fails if User and Group Names are Identical

When reassociating an LDAP identity store, the Oracle IRM process for exporting user and group information has an issue if user and group names are identical. If a user and group have identical names, the export process will lose either the user or the group details during the export step. This is because the user or group name is used as the file name, so one file overwrites the other. A post-reassociation workaround is to check user and group right assignments, and to manually reassign any that are missing.

49.2.2 Upgrading Oracle IRM Desktop From Versions Earlier Than 5.5

You can upgrade to this release from Oracle IRM Desktop version 5.5 onwards, by running the installation wizard on the computer that has the older version.

For versions earlier than 5.5, or from any version of SealedMedia Unsealer or Desktop, you can upgrade to this release only by uninstalling the older version and installing this release.

If you are upgrading to this release of Oracle IRM Desktop from a 10*g* release, you will lose the locally stored rights to use sealed documents (the rights that enable you to continue working when you are offline). When this happens, you will have to obtain new rights by going online and synchronizing with the server. For this reason, do not begin an upgrade unless you have online access to the server.

When upgrading on Windows Vista or Windows 7, you may encounter a file lock and be prompted to retry, ignore, or cancel. You can safely use the ignore option if this happens.

49.2.3 Synchronizing Servers After an Upgrade of Oracle IRM Desktop

If you are upgrading to this release of Oracle IRM Desktop from a 10*g* release, you will not be synchronized to any servers (Oracle IRM Server). This will show as a blank list on the Servers tab of the Oracle IRM Desktop Options dialog. Servers are automatically added to the list when you open sealed documents for which you have access rights. The easiest way to repopulate your list of servers is to open documents that have been sealed against servers on which you have rights.

49.2.4 Reapplying Lost Settings After an Upgrade of Oracle IRM Desktop

If you are upgrading to this release of Oracle IRM Desktop from a 10*g* release, your previous settings (as shown on the Oracle IRM Desktop Options dialog) are not applied to the new installation. These include support for email systems, so you should reset these before attempting to work with sealed emails in Microsoft Outlook and Lotus Notes.

49.2.5 Changing Oracle IRM Account When Authenticated Using Username and Password

Oracle IRM Desktop caches user rights in an offline database. In earlier releases, this database was shared by all users of a machine. In this release, there is one offline database per Windows user.

You are strongly advised to use only one Oracle IRM account with each Windows account.

If you authenticate to the server (Oracle IRM Server) with a username and password, you can change the account you use as follows:

1. On the Update Rights tab of the Oracle IRM Desktop Options dialog, check in rights for all servers by clicking **Check in**.

2. On the Servers tab of the Oracle IRM Desktop Options dialog, select the server to be updated and click **Clear Password**.

3. Restart Windows.

4. On the Update Rights tab of the Oracle IRM Desktop Options dialog, synchronize rights for all servers by clicking Synchronize.

Users who are automatically authenticated to the server using Windows authentication cannot change their Oracle IRM account.

Access to the offline database is protected by your Windows credentials. You are no longer required to additionally authenticate to Oracle IRM when working offline.

49.2.6 Post-Installation Steps Required for Oracle IRM Installation Against Oracle RAC

To use Oracle RAC with an Oracle IRM instance, the Oracle IRM data source needs to be altered using the WebLogic Administration Console and the following procedure:

1. From Services, select **JDBC**, then select **DataSources**.

2. Select the OracleIRM data source.

3. On the Transaction tab, check **Supports Global Transactions**, then check **Emulate Two-Phase Commit**.

4. Click **Save**.

This will set the `global-transactions-protocol` for Oracle IRM data-sources for Oracle RAC to `EmulateTwoPhaseCommit`.

49.2.7 Enabling Search With Sharepoint 2007

To enable searching of files with Sharepoint 2007, change the configuration as follows:

1. Run DCOMCNFG.EXE (for example, by entering `dcomcnfg` into the Windows Run dialog and clicking **OK**).

2. Navigate to Component Services, Computers, My Computer, DCOM Config, OracleIRMServiceHost.

3. Right click and select **Properties** on OracleIRMServiceHost object.

4. Navigate to the Security tab in the OracleIRMServiceHost Properties dialog.

5. On the Security tab, in the Launch and Activation Permissions section, check the **Customize** check box and then click the **Edit** button

6. In the Launch and Activation Permission dialog, click the **Add** button to open the user selection dialog.

7. Add **Everyone** to the object names.

8. In the Launch and Activation Permission dialog, select the **Everyone** group name, then check the **Local Launch** and **Local Activation** check boxes.

9. On the Security tab, in the **Access Permissions** section, check the **Customize** check box, then click the **Edit** button.

10. In the Access Permission dialog, click the **Add** button to open the user selection dialog.

11. Add **Everyone** to the object names.

12. In the Access Permission dialog, select the **Everyone** group name, then check the **Local Access** check box.

Follow these steps to restart the `OracleIRMServiceHost` service with the new DCOM settings:

1. Start the service management console (for example, by entering `services.msc` into the Windows Run dialog and clicking **OK**).

2. Find the `OracleIRMServiceHost` service in the list of services.

3. Right-click `OracleIRMServiceHost` and select **Restart**.

49.2.8 Enabling the Oracle IRM Installation Help Page to Open in a Non-English Server Locale

Use the following procedure to enable the Oracle IRM installation help page to open in a non-English server locale:

1. Unzip the shiphome.

2. Extract all the non-HTM files (7 files in total) from `help\en` in the `ecminstallhelp.jar` file located in `Disk1\stage\ext\jlib\`

3. Put these 7 files into the folder jar for the locale in which you will install ECM.

4. Overwrite `ecminstallhelp.jar` with the modified version.

49.3 Documentation Errata

There are no known issues at this time.

50

Oracle Universal Content Management

This chapter describes issues associated with Oracle Universal Content Management (Oracle UCM). It includes the following topics:

- Section 50.1, "General Issues and Workarounds"
- Section 50.2, "Configuration Issues and Workarounds"
- Section 50.3, "Documentation Errata"

50.1 General Issues and Workarounds

This section describes general issues and workarounds. It includes the following topics:

- Section 50.1.1, "Enterprise Manager Page Crashes After Extended Time When Using Flash Browser Plug-In"
- Section 50.1.2, "Folio Items With Content IDs Containing Multibyte Characters Do Not Display Correctly in Safari"
- Section 50.1.3, "Site Studio Does Not Support Multibyte Characters in Site IDs, Directory Names, and Page Names"
- Section 50.1.4, "Site Studio Publisher Does Not Support Multibyte Characters"
- Section 50.1.5, "Desktop Integration Suite Users Cannot Perform Oracle Content Server Operations If Their User Logins Contain Multibyte Characters"
- Section 50.1.6, "Characters Not Native to Server Operating System Entered in Web Layout Editor Are Corrupted After Portal Update"
- Section 50.1.7, "Transferring Folder Archives Between Content Servers Fails If Server System Locales Do Not Match"
- Section 50.1.8, "Importing Folder Archives Fails If User Locale Did Not Match Server System Locale During Export"
- Section 50.1.9, "Issues With Converting Files With Content IDs Containing Non-ASCII Characters Using Dynamic Converter"
- Section 50.1.10, "Some Asian Time Zones Cannot Be Set on User Profile Page"
- Section 50.1.11, "Download Applet Considerations"
- Section 50.1.12, "New Folio Page Does Not Work in French and Italian Languages"
- Section 50.1.13, "UCM Servers and IPv6 Support"

50.1.1 Enterprise Manager Page Crashes After Extended Time When Using Flash Browser Plug-In

When the DMS page is open for an extended period of time (at least 35 minutes), Enterprise Manager crashes. The DMS page is opened by first selecting UCM, then Monitoring, then Performance. The crash happens when the page is open for 35 minutes or more, there are lots of services being called on the server, and Adobe Flash is installed as a browser plug-in.

50.1.2 Folio Items With Content IDs Containing Multibyte Characters Do Not Display Correctly in Safari

If you use the Safari web browser to download content into a simple folio where one or more content IDs include multibyte characters, then these multibyte content IDs are displayed as '------'. To avoid this, you can either use Internet Explorer or Firefox, or avoid using multibyte characters in content IDs.

50.1.3 Site Studio Does Not Support Multibyte Characters in Site IDs, Directory Names, and Page Names

Oracle Site Studio does not support multibyte characters in any value that will be used in URLs, including site IDs, directory names, and page names.

50.1.4 Site Studio Publisher Does Not Support Multibyte Characters

Oracle Site Studio Publisher does not support multibyte characters.

50.1.5 Desktop Integration Suite Users Cannot Perform Oracle Content Server Operations If Their User Logins Contain Multibyte Characters

Some operations that require a Desktop Integration Suite user to log in to Oracle Content Server are blocked if that user has a login name that contains multibyte characters. There are no issues if the login name contains only ASCII characters.

50.1.6 Characters Not Native to Server Operating System Entered in Web Layout Editor Are Corrupted After Portal Update

Characters entered in the Web Layout Editor that are not part of the content server's operating system character set will be corrupted (displayed as '?') after the Update Portal feature is used. To avoid this, use characters that are native to the operating system character set of the content server.

50.1.7 Transferring Folder Archives Between Content Servers Fails If Server System Locales Do Not Match

If you transfer folder archives between two Oracle Content Server instances using the Archiver utility, then this will fail if these servers have different system locales. No folder will be created on the target server, and no items under that folder will be imported. To avoid this, make sure that the system locales of both content servers match.

50.1.8 Importing Folder Archives Fails If User Locale Did Not Match Server System Locale During Export

If you export a folder archive from the Folder Configuration page in Oracle Content Server and the user locale during export does not match the server system locale, then you will not be able to import that folder archive to the same or a different content server, even if the user and system locales on that server do match. To avoid this, make sure that the user and system locales match during the folder archive export.

50.1.9 Issues With Converting Files With Content IDs Containing Non-ASCII Characters Using Dynamic Converter

There are various issues when converting files with content IDs containing non-ASCII characters using Dynamic Converter in Linux environments with native encoding. To avoid these issues, use only ASCII characters in content IDs. Please note that these issues do not occur in Linux environments with UTF-8 encoding.

50.1.10 Some Asian Time Zones Cannot Be Set on User Profile Page

Users cannot change their time zone in their user profile page on Oracle Content Server to Kolkota (GMT +05.30), Kathmandu (GMT + 05.45), or Almaty (GMT +06.00).

50.1.11 Download Applet Considerations

Please note the following considerations when working with the download applet in Oracle Content Server:

- The option to check out a native file when downloading it from a search results page does not work.

- When downloading native files from a search results page, you must manually enter the target file name for the first item you are downloading.

50.1.12 New Folio Page Does Not Work in French and Italian Languages

If both the Folios and AppAdapterCore features are enabled, and the user language is set to either French or Italian, the New Folio page does not allow you to select a template and create a new folio.

50.1.13 UCM Servers and IPv6 Support

UCM servers are supported on IPv4/IPv6 dual-stack hosts, but not on"IPv6-only" hosts. The following topologies are supported:

- Oracle Database on IPv4 hosts

- Oracle UCM, Oracle URM, Oracle IBR on IPv4/IPv6 dual-stack hosts

- Client (browser) on either IPv4 or IPv6 hosts

50.2 Configuration Issues and Workarounds

This section describes configuration issues and their workarounds. It includes the following topics:

- Section 50.2.1, "Minimum JDBC Driver Version Required for Oracle Text Search Component"

- Section 50.2.2, "Using Oracle Text Search Together With Collaboration"
- Section 50.2.3, "Using Standalone Admin Applications with DB2 or SQL Server System Database"

50.2.1 Minimum JDBC Driver Version Required for Oracle Text Search Component

The Oracle Text Search component that is part of Oracle UCM 11*g*R1 requires a JDBC driver version of 10.2.0.4 or higher. The component will not work with older JDBC driver versions.

50.2.2 Using Oracle Text Search Together With Collaboration

Searches on Oracle Content Server may fail in instances where the UseCollaboration configuration flag is set to 'true' and the search index used is Oracle Text Search. If this is the case, modify Oracle Content Server's config.cfg file to include the following configuration flag:

```
ZonedSecurityFields=xClbraUserList,xClbraAliasList
```

If this flag already exists, append the two new fields to the list.

The config.cfg file can be modified from Admin Server, by selecting General Configuration, and then adding the information to the Additional Configuration Variables box. You must restart the content sever for the changes to take effect.

50.2.3 Using Standalone Admin Applications with DB2 or SQL Server System Database

For the standalone administration applications to work, JDBC connection information for the system database must be provided. You can enter this information most easily in the System Properties application, in the Database tab. How much information you need to provide depends on what type of database and JDBC driver you are using; you always need to provide at least a connection string, username, and password. If Oracle Content Server is using a DB2 or SQL Server database, then select "Other JDBC Driver" and modify Oracle Content Server's intradoc.cfg file (located at *Domain_Dir*/ucm/cs/bin/intradoc.cfg) to include the following two lines, exactly as shown:

```
IDC_WL_LIB_DIR=${AppServerHome}/server/lib
IDC_WL_MODULES_DIR=$IDC_MW_HOME/modules
```

Then the driver name and classpath will be calculated by Content Server, and do not need to be entered in System Properties. You must still enter the connection string, username, and password.The JDBC connection string for DB2 should be as follows:

```
jdbc:weblogic:db2://database_hostname:database_port_number;databaseName=database_name
```

The JDBC connection string for SQL Server should be as follows:

```
jdbc:weblogic:sqlserver://database_hostname:database_port_number;databaseName=database_name
```

50.3 Documentation Errata

There are no known issues at this time.

51

Oracle Universal Records Management

This chapter describes issues associated with Oracle Universal Records Management. It includes the following topics:

- Section 51.1, "General Issues and Workarounds"
- Section 51.2, "Configuration Issues and Workarounds"
- Section 51.3, "Documentation Errata"

51.1 General Issues and Workarounds

This section describes general issues and workarounds. It contains the following sections:

- Section 51.1.1, "Role Report Output is Dependent on User Generating the Report"
- Section 51.1.2, "Viewing Frozen Items After Freeze Execution"
- Section 51.1.3, "Items Returned When Using Screening"
- Section 51.1.4, "Oracle Text Search and Report Configuration Options"

51.1.1 Role Report Output is Dependent on User Generating the Report

A role report can be generated by clicking **Records** then **Reports** then **Role** from the Main menu. The output of the report may not show all data for all roles. The output is dependent on the user who is generating the report and the permissions given to that user.

51.1.2 Viewing Frozen Items After Freeze Execution

When a freeze is executed from the Search Results page, the ensuing page does not redirect the customer back to the search results. To view frozen items after a freeze is executed from the Search Results page, execute a new search or refresh the page manually by clicking the Refresh button on the browser.

51.1.3 Items Returned When Using Screening

It should be noted that screening is a retention feature that only returns content items with a life cycle or items that are frozen.

51.1.4 Oracle Text Search and Report Configuration Options

When using Oracle Text Search, an incompatibility existed with the options to exclude report templates and reports in search results. These options appear on the Configure Report Settings Page.

It is now possible to exclude reports in search results by checking the Exclude Reports in Search Results checkbox. However, if the Exclude Report Template in Search Results box is checked, templates are still included in searches. Oracle is aware of this issue and is working to fix it in a future release.

51.2 Configuration Issues and Workarounds

This section contains configuration issues and workarounds. It contains the following sections:

- Section 51.2.1, "Import FOIA Archive Error Message"
- Section 51.2.2, "Oracle Text Search and Index Rebuilds"
- Section 51.2.3, "Restart Required: Performance Monitoring and Reports"

51.2.1 Import FOIA Archive Error Message

Importing the Freedom of Information Act (FOIA) archive from the Setup Checklist page may display a spurious error message stating *Archiver is already running, please try again later*.

This error may be safely ignored. It is generated because the click to initiate the archive is registered twice. Ignore the warning, wait fifteen minutes and then see if the alert notification for that task is removed. The import of the archive can also be confirmed by opening the Archiver and verifying that the FOIAPrivacyAct archive is present.

51.2.2 Oracle Text Search and Index Rebuilds

When installing the Freedom of Information Act (FOIA) functionality for Oracle Universal Records Management you may not be able to do fast index rebuilds. Uncheck the Fast Index Rebuild option if using the FOIA option.

51.2.3 Restart Required: Performance Monitoring and Reports

After performance monitoring is selected and enabled, the content server must be restarted in order for monitoring to commence. Note that a restart is also required after configuration of Oracle URM in order for all report options to appear on the appropriate menus.

51.3 Documentation Errata

There are no known issues at this time.

Part XI

Oracle Data Integrator

Part XI contains the following chapters:

52

Oracle Data Integrator

This chapter describes issues associated with Oracle Data Integrator. It includes the following topics:

- Section 52.1, "Configuration Issues and Workarounds"
- Section 52.2, "Design-Time Environment Issues and Workarounds"
- Section 52.3, "Oracle Data Integrator Console Issues and Workarounds"
- Section 52.4, "Technologies and Knowledge Modules Issues and Workarounds"
- Section 52.5, "Oracle Data Profiling and Oracle Data Quality Issues and Workarounds"

52.1 Configuration Issues and Workarounds

This section describes the following issues and their workarounds:

- Section 52.1.1, "Generated Templates Including a Datasource With an Oracle RAC URL Fail to Deploy"
- Section 52.1.2, "Generated Templates Including Datasources Fail to Deploy"
- Section 52.1.3, "Template Generation Fails When Using the Default Path on Windows."
- Section 52.1.4, "Repository Creation Does not Trace in the Studio Log Window"
- Section 52.1.5, "Switching Password Storage to Internal Leaves Context Keys"
- Section 52.1.6, "Setting Test Queries on WLS Datasources"
- Section 52.1.7, "Hypersonic SQL not Supported as a Repository"

52.1.1 Generated Templates Including a Datasource With an Oracle RAC URL Fail to Deploy

Oracle WebLogic Configuration Wizard does not support Oracle RAC URLs for datasources. When a datasource is included in a Java EE Agent template that has been generated using Oracle Data Integrator Studio, this template fails to deploy, and raises the following exception is raised:

```
com.oracle.cie.wizard.WizardController - Uncaught Exception
java.lang.NullPointerException
atcom.oracle.cie.domain.jdbc.DatasourceXBeanAspectHelper.decomposeURL
```

As a workaround, do not include this datasource definition in the generated template and deploy the datasource from Oracle Data Integrator Studio.

52.1.2 Generated Templates Including Datasources Fail to Deploy

As the Oracle WebLogic Configuration Wizard uses specific code for parsing the URL and exposing its parameters in a user friendly format, it only supports a predefined set of JDBC URLs. If a JavaEE Agent template that has been generated using Oracle Data Integrator Studio contains a datasource with a URL or driver not included in this set, the Wizard fails to use this template with the following exception:

```
com.oracle.cie.wizard.WizardController - Uncaught Exception
java.lang.NullPointerException
atcom.oracle.cie.domain.jdbc.DatasourceXBeanAspectHelper.decomposeURL
```

As a workaround, do not include this datasource definition in the generated template, and deploy the datasource from Oracle Data Integrator Studio.

52.1.3 Template Generation Fails When Using the Default Path on Windows.

When generating an agent template from Oracle Data Integrator Studio running on a Windows platform, the default path for the target template is set to `C:/Documents and Settings/<username>/My Documents/agent_template.jar`.

If the template is generated to this default path, the following exception appears:

```
Exception in thread "main" org.apache.commons.vfs.FileSystemException: Could not
create file...
```

This exception appears because this folder is read-only.

As a workaround, specify another writable target path for the generated template.

52.1.4 Repository Creation Does not Trace in the Studio Log Window

Oracle Data Integrator Studio does not trace the actions taking place during a repository creation procedure in the Message - Log window , unlike what is stated in the documentation.

Repository creation actions are traced in the terminal console that are used to start Oracle Data Integrator Studio.

As a workaround, to display this trace:

- On UNIX, start Studio using the `odi.sh` command from a shell. Repository creation operations are traced in this shell.

- On Windows, start Studio from a Command Shell by executing `odi.exe`. Repository creation operations are traced in this Command Shell.

52.1.5 Switching Password Storage to Internal Leaves Context Keys

When switching the password storage from external to internal, context related keys (named OdiContext@_<internal id>) remain in the credential map of the WebLogic domain, unlike what is stated in the documentation.

As a workaround, remove these keys manually.

52.1.6 Setting Test Queries on WLS Datasources

The Clean Stale Sessions feature of the Agent relies on the stale or dead connections of the connection pool to be automatically cleaned up either through expiration or connection validations tests done by the connection pool implementation.

If the stale connections are not removed out by the connection pool, then the Clean Stale Sessions feature does not work even after the database has been restarted. None of the other requests of the agent will work after the database restart if the agent itself is not restarted.

In a WebLogic Server container, connections are validated every few seconds using a test query. It is recommended to verify and provide the table name used by the database to run the test query: `select count(*) from <test_table_name>`.

For Master Repositories and Work Repositories, datasources use `SNP_LOC_REP` and `SNP_LOC_REPW` as the test tables.

Alternatively, you can use the `DUAL` table for an Oracle repository.

52.1.7 Hypersonic SQL not Supported as a Repository

Although it may be used for demo or testing purposes, Hypersonic SQL (HSQL) is not supported in this release as a Repository platform.

Customers using HSQL should switch to a supported platform for their repository.

52.2 Design-Time Environment Issues and Workarounds

This section describes the following issues and their workarounds:

- Section 52.2.1, "Unable to Edit Data for Technologies Using Catalog and Schema Qualifiers."

- Section 52.2.2, "OdiFTPGet Tool Raises IndexOutOfBound Exception on Invalid Password"

- Section 52.2.3, "OdiXMLSplit Tool Generates Empty Target Files"

- Section 52.2.4, "OdiXMLSplit Tool: if_file_exists=skip Option Does Not Work"

- Section 52.2.5, "Incorrect Non-ASCII File Names in Zip Export Files"

- Section 52.2.6, "Non-ASCII Characters Incorrectly Converted to Underscore Characters"

- Section 52.2.7, "Unable to Add Datastores to Model Diagrams"

- Section 52.2.8, ""Process Model Datastores Only" User Parameter Behavior Is Incorrect"

- Section 52.2.9, "Focus Lost in Mapping Property Inspector"

- Section 52.2.10, "Double Scrollbar and Incorrect Checkbox Behavior in KM and Procedure Editor"

- Section 52.2.11, "PDF Printing of Project Diffing Issues an Empty File"

- Section 52.2.12, "Temporary Target Columns are Sorted Alphabetically"

- Section 52.2.13, "Project Variables Become Global After Import in Duplication Mode"

- Section 52.2.14, "Interface Cannot be Saved When Changes are Made on The Overview or Control Tabs"

52.2.1 Unable to Edit Data for Technologies Using Catalog and Schema Qualifiers.

When using the Data context menu on a datastore, it is possible to modify the data in the Data Editor. However, an error appears when applying these changes. This error appears as an invalid object name error. For example, on Microsoft SQL Server:

```
[SQLServer JDBCDriver][SQLServer]Invalid object name 'dbo.SRC_CITY'.
```

This error appears with technologies that support object names and that are qualified by both a catalog (database in the context of Microsoft SQL Server) and a schema name (owner in the context of Microsoft SQL Server).

When fetching the data, the object name is fully qualified (`<catalog>.<schema>.<table_name>`), but when performing updates, the object is qualified only with the schema name (`<schema>.<table_name>`) and cannot be found.

There is no generic workaround at this time.

52.2.2 OdiFTPGet Tool Raises IndexOutOfBound Exception on Invalid Password

Submitting an `OdiFtpGet` call with an incorrectly encoded password raises the following error:

```
java.lang.IndexOutOfBoundsException: toIndex = 53273 at
java.util.SubList.<init>(AbstractList.java:602) at
java.util.RandomAccessSubList.<init>(AbstractList.java:758) at
java.util.AbstractList.subList(AbstractList.java:468) ...
```

Check the encoded password if this error is raised.

52.2.3 OdiXMLSplit Tool Generates Empty Target Files

Submitting an OdiXMLSplit call generates empty target files. The correct number of files are generated, but their content is empty.

There is no workaround for this issue at this time.

52.2.4 OdiXMLSplit Tool: if_file_exists=skip Option Does Not Work

The if_file_exists option of the OdiXMLSplit tool does not work when set to skip and existing target files are overwritten.

There is no workaround for this issue at this time.

52.2.5 Incorrect Non-ASCII File Names in Zip Export Files

Non-ASCII file names are incorrectly generated in Zip export files. Non-ASCII characters in these file names are replaced with underscores. Setting the *Never transform non ASCII characters to underscores* user parameter to `Yes` has no effect.As a workaround, export the files in a folder and compress this folder.

52.2.6 Non-ASCII Characters Incorrectly Converted to Underscore Characters

Non-ASCII characters are handled incorrectly in the following situations, even if the *Never transform non ASCII characters to underscores* user parameter is set to Yes:

- Non-ASCII characters are replaced with underscores in the Alias field of a column when using the fixed file reverse-engineering wizard.

- Non-ASCII characters from the header line are replaced with underscores in column names when doing a delimited file reverse-engineering.

As a workaround, manually modify the column definitions after the reverse process.

52.2.7 Unable to Add Datastores to Model Diagrams

If the user parameter called "Directory for Saving your Diagrams (PNG)" is set to an empty value, it is not possible to drag and drop a single datastore into a diagram. As a workaround, set this directory to a valid value.

52.2.8 "Process Model Datastores Only" User Parameter Behavior Is Incorrect

The user parameter "Process Model Datastores only" behavior is incorrect. If this parameter is set to `false`, only model datastores are processed.

As a workaround, set this parameter temporarily to the opposite value to get the expected result.

52.2.9 Focus Lost in Mapping Property Inspector

In the Interface Editor, when attempting a drag and drop of a source datastore column into the implementation field of the Mapping Property Inspector, the Property Inspector switches to show the source column properties.

This occurs if the focus is in the mapping property inspector.

As a workaround, use the mapping fields on the target datastore for source column drag and drop.

52.2.10 Double Scrollbar and Incorrect Checkbox Behavior in KM and Procedure Editor

When editing a KM or Procedure Command and expanding the Options accordion that is collapsed by default, a double vertical scrollbar appears for the Editor.

When one of the Options is checked, the Editor scrolls to the top and the second scrollbar disappears, and the checkbox is unselected.

As a workaround, scroll down and select the option again.

52.2.11 PDF Printing of Project Diffing Issues an Empty File

Printing a version diffing report for a project that only has a new interface compared to the versioned project generates an empty PDF file.

There is no workaround for this issue at this time.

52.2.12 Temporary Target Columns are Sorted Alphabetically

Columns of the temporary target datastore of an interface are sorted alphabetically in 11*g*. In 10*g*, they were sorted in their order of creation.

Note that this issue does not impact the overall behavior of the interface or the structure of the temporary datastore.

There is no workaround for this issue at this time.

52.2.13 Project Variables Become Global After Import in Duplication Mode

If a project containing variables is imported in Duplication mode, these variables are not imported under the project but appear as global variables.

As a workaround, export these global variables and re-import them under the project in Duplication mode.

52.2.14 Interface Cannot be Saved When Changes are Made on The Overview or Control Tabs

When the only changes performed on an interface are made in the Overview and/or the Control tabs, it is not possible to save this interface. The error "Unable to save <interface name>" appears. As a workaround, select the Mapping tab before saving the interface

52.3 Oracle Data Integrator Console Issues and Workarounds

This section describes the following issues and their workarounds:

- Section 52.3.1, "Oracle Data Integrator Console Page Task Flow Resets When Another Tab Is Closed."

- Section 52.3.2, "Enterprise Manager Logout Does Not Propagate to Oracle Data Integrator Console"

- Section 52.3.3, "Error When Viewing an Error Table From Oracle Data Integrator Console"

- Section 52.3.4, "Session Search Does Not Support Wildcards and Case Insensitivity on Some Fields"

- Section 52.3.5, "Currently Connected Work Repository Is Exported Only"

52.3.1 Oracle Data Integrator Console Page Task Flow Resets When Another Tab Is Closed.

When the tab containing a page is closed in Oracle Data Integrator Console, all the tabs after this one reset their task flows (the navigation actions that were made). The pages in these tabs reset to the original object that was opened.

There is no workaround for this issue at this time.

52.3.2 Enterprise Manager Logout Does Not Propagate to Oracle Data Integrator Console

When Enterprise Manager Fusion Middleware Control (EM) is used in conjunction with Oracle Data Integrator Console with Single Sign-On (SSO) activated, a user logging out from SSO in Enterprise Manager might still be able to access Oracle Data Integrator Console pages from the same browser window by typing a direct URL.

This issue is caused by a cookie that is created by Oracle Data Integrator Console not being invalidated by the Enterprise Manager logout action.

As a workaround:

- Administrators should configure their Enterprise Manager and Oracle Data Integrator Console servers for access fronted by a gateway. The gateway automatically redirects the user that is not logged into SSO to the SSO Login page.

■ If you're accessing Oracle Data Integrator Console or Enterprise Manager from a shared or public computer, close the session by logging out. For additional security, close the browser session.

52.3.3 Error When Viewing an Error Table From Oracle Data Integrator Console

When trying to view an error table from Oracle Data Integrator Console, the following error appears:

```
"Error fetching records from error table <table_name>. The table might no more
exist or the format of the table is not correct."
```

This dialog appears if you are trying to access an error table created and populated by an interface that uses a check knowledge module (CKM) from a previous Oracle Data Integrator release (10gR3). Legacy knowledge modules do not create the error table with all the fields required for Oracle Data Integrator Console.

The error table structure should be upgraded by using the interfaces in 11*g* CKMs and activating the `UPGRADE_ERROR_TABLE = true` or `DROP_ERROR_TABLE=true` CKM options.

The former should be used if records in the error table need to be recycled. If recycling old records is not required then the latter can be used.

52.3.4 Session Search Does Not Support Wildcards and Case Insensitivity on Some Fields

Session Search does not support wild cards on scenario names and does not support case insensitivity on scenario names and messages.

There is no workaround for this issue at this time.

52.3.5 Currently Connected Work Repository Is Exported Only

When exporting a work repository from Oracle Data Integrator Console, the repository exported is always the currently connected one regardless of the work repository selected in the tree. As a workaround, connect to a given work repository before exporting it.

52.4 Technologies and Knowledge Modules Issues and Workarounds

This section describes the following issues and their workarounds:

■ Section 52.4.1, "Oracle Technology Is Defined With Non-Ordered Joins"

■ Section 52.4.2, "Incorrect Mention of Javascript Support"

■ Section 52.4.3, "IKM SQL Incremental Update (Row by Row) Cannot Target Japanese Tables"

■ Section 52.4.4, "LKM File to DB2 UDB (Load) Fails on Task Load Data With Non-ASCII Files"

■ Section 52.4.5, "LKM File to Oracle (SQLLDR) Fails on Task Call SQLLDR With Non-ASCII Files"

■ Section 52.4.6, "SAP BW OpenHub Extraction with LKM SAP BW to Oracle Does not Work"

52.4.1 Oracle Technology Is Defined With Non-Ordered Joins

The Oracle Technology provided with this release of Oracle Data Integrator is defined as supporting the Non-Ordered syntax for joins. However, Oracle Database supports both the Ordered and Non-Ordered syntax.

Oracle Data Integrator technologies allows technology definition with either one or the other syntax checked, but not both.

The Non-Ordered syntax was preserved from the previous product version to allow upgrading customers to execute their existing interfaces with no change.

The Ordered syntax is now the recommended syntax for working with the Oracle database, and allows a better support for the new features from this version.

The following guideline is provided for managing the Join syntax:

- New customers should preferably switch their Oracle technology to the Ordered syntax.

- Upgrading customers with existing flows willing to use this new syntax can also switch their Oracle technology to the ordered syntax. They will have to review their interfaces' joins and check their validity with this new syntax.

  Note that changing this syntax does not impact existing scenarios but only interfaces, packages, or new scenarios generated after the upgrade.

To switch the Oracle technology to the Ordered syntax:

1. Edit the Oracle technology from the Physical Architecture accordion in the Topology Navigator.

2. In the Data Handling option group, set the Reference radio button to **Ordered** (SQL ISO).

3. Click Save in the toolbar.

52.4.2 Incorrect Mention of Javascript Support

Chapter 12 of the *Oracle Fusion Middleware Developer's Guide for Oracle Data Integrator* guide mentions that Javascript is supported as a scripting language. This is incorrect. Javascript is not a supported as a scripting engine in this release.

52.4.3 IKM SQL Incremental Update (Row by Row) Cannot Target Japanese Tables

IKM SQL Incremental Update (Row by Row) fails on task *Flag rows for update* if the target table name contains Japanese characters. In the generated code, the integration table name appears as "I$_??????" where "?" characters replaces a Japanese character.

As a workaround, replace this IKM with another IKM suitable for the technology. For example, 'IKM Oracle Incremental Update' for Oracle.

52.4.4 LKM File to DB2 UDB (Load) Fails on Task Load Data With Non-ASCII Files

LKM File to DB2 UDB(LOAD) fails on task *Load Data* if the source file contains non-ASCII data. In the load script, non-ASCII characters are transformed to "?" character.

As a workaround, replace this LKM with another LKM suitable for the technology. For example, 'LKM File to SQL'.

52.4.5 LKM File to Oracle (SQLLDR) Fails on Task Call SQLLDR With Non-ASCII Files

LKM File to Oracle (SQLLDR) fails on task *Call SQLLDR* if the source file contains non-ASCII data, even if the *Charset Encoding* KM option is set to UTF-8.

As a workaround, replace this LKM with another LKM suitable for the technology. For example, 'LKM File to SQL'.

52.4.6 SAP BW OpenHub Extraction with LKM SAP BW to Oracle Does not Work

When using SAP BW OpenHub extraction with LKM SAP BW to Oracle, the following error message appears: "The Source and the Target Columns are different in OpenHub, Please make sure that all the Source Column And Target Column Are Same." Note that this message is localized.

This bug makes extraction from SAP BW Open Hub Destinations impossible. Other BW data targets like InfoCube, InfoObjects and ODS/DSO are not impacted and can still be used for extraction.

There is no workaround for this issue at this time.

52.5 Oracle Data Profiling and Oracle Data Quality Issues and Workarounds

This section describes the following issues and their workarounds:

- Section 52.5.1, "Unable to Connect the Client to a Data Quality Server on UNIX"
- Section 52.5.2, "Unable to Create a Quality Project With a Data Quality Server on Linux"
- Section 52.5.3, "Menus Are in English When Starting the Client Using a .tss File."
- Section 52.5.4, "Incorrect Error Message for a Wrong User/Password when Creating an Entity from a Japanese or Chinese Client"
- Section 52.5.5, "Strings Truncated in Client for non-English Languages"
- Section 52.5.6, "Project Export is Empty if Folder Path Contains Non-ASCII Characters"

52.5.1 Unable to Connect the Client to a Data Quality Server on UNIX

When connecting from the Oracle Data Quality Client to a Data Quality Server installed on a UNIX machine the following error message may appear: "No support for client application "Admin" version 12.0.1".

To solve this issue re-install the metabase definitions using the following steps:

1. On the UNIX server go to the following directory:`ODQ_ HOME/oracledi/odp/Client/SvrSide`

2. Run `./setup`

3. At the prompt, enter the Metabase Installation location: `ODQ_ HOME/oracledq/metabase_server/`

4. Enter the metabase admin user and password.

5. When the metabase definitions installation completes, restart the Scheduler service using the following command: `ODQ_HOME/oracledq/metabase_ server/metabase/bin/scheduler -restart`

52.5.2 Unable to Create a Quality Project With a Data Quality Server on Linux

When connecting from the Oracle Data Quality Client to a Data Quality Server installed on a Linux machine the menu to create a quality project is disabled.

To solve this issue:

1. Edit the `ODQ_HOME/oracledq/metabase_server/etc/.registry` file and locate the `TSQ_Root` parameter value. This parameter may appear as below:`value TSQ_Root /scratch/odidq_1/oracledq/12`

2. Set this value to the root directory of the Data Quality Server Installation.

3. Save the .registry file.

4. After modifying this value, restart the scheduler service with the following command:`ODQ_HOME/oracledq/metabase_server/metabase/bin/scheduler -restart`

52.5.3 Menus Are in English When Starting the Client Using a .tss File.

When starting Oracle Data Quality Client by double-clicking on a saved .tss file, the menus appear in English independently of the client machine's locale.

As a workaround, open the client from the shortcut menu, then open the .tss file.

52.5.4 Incorrect Error Message for a Wrong User/Password when Creating an Entity from a Japanese or Chinese Client

When creating an entity, if an incorrect user and password combination is entered for configuring the loader connection, an incorrect message appears in the Create Entity page.

There is no workaround for this issue at this time.

52.5.5 Strings Truncated in Client for non-English Languages

When using the Oracle Data Quality Client from a non-English machine, strings may appear truncated in various places in the client user interface. This does not impact the features and behavior of the client.

There is not workaround for this issue at this time.

52.5.6 Project Export is Empty if Folder Path Contains Non-ASCII Characters

When a data quality project is exported to a folder which path contains non-ASCII characters, the project folder structure is created with no files.

As a workaround, use a folder path that does not include any non-ASCII characters.