Oracle Financial Services Data Foundation Application Pack

Installation and Configuration Guide

Release 8.1.2.2.0

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OFS Data Foundation Application Pack Installation and Configuration Guide

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Preface 1

This document provides instructions to install the Oracle Financial Services Data Foundation (OFSDF) Application Pack v8.1.2.2.0 Maintenance Level (ML) Release.

Topics:

- **Audience**
- How this Guide is Organized
- Access to the Oracle Support
- **Related Documents**
- Conventions
- **Abbreviations**

Audience 1.1

This document is intended for Administrators, Business Users, Strategists, and Data Analysts, who are responsible for installing and maintaining the Application Pack Components.

- **OFSAA** application components
- **OFSAA** architecture
- **UNIX** commands
- Database concepts
- **OFSDF Data Model**

How this Guide is Organized 1.2

The OFSDF Application Pack Installation Guide includes the following sections:

- OFS Data Foundation Application Pack Maintenance Release 8.1.2.2.0: This section provides information about the prerequisites, pre-installation, installation, and post-installation procedures for the OFSDF Application Pack Release v8.1.2.2.0.
- Appendix A: This section provides information about the FAQs for the OFSDF Application Pack Release v8.1.2.2.0.

Access to the Oracle Support 1.3

Oracle customers have access to electronic support through My Oracle Support. For information, visit http://www.oracle.com/pls/topic/lookup?ctx=acc&id=info Or visit http://www.oracle.com/pls/topic/lookup?ctx=acc&id=trs if you are hearing impaired.

1.4 Related Documents

Oracle strives to keep this and all other related documents updated regularly; visit the OHC
Documentation Library and My Oracle Support (MOS) to download the latest version available there. The following is the list of related documents:

- For the OFSDF Application Pack Release 8.1.x.x.x product documents <u>OHC Documentation</u> <u>Library</u>.
- For the OFSDF Application Pack Release 8.1.x.x.x other documents <u>OHC Documentation Library.</u>
- My Oracle Support for the OFSDF Application Pack Release 8.1.x.x.x technical documents:
 - Data Model Difference Reports
 - Changelog
 - SCD Metadata
 - T2T Metadata
 - Run Chart
- Oracle Financial Services Analytical Applications (OFSAA) Technology Matrix Release 8.1.2.0.0
- Oracle Financial Services Analytical Applications (OFSAA) Licensing Information User Manual Release 8.1.2.0.0

1.5 Conventions

The following Text Conventions are used in this document.

Table 1: Document Conventions

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, file names, text that appears on the screen, or text that you enter.
Hyperlink	Hyperlink type indicates the links to external websites, internal document links to sections.

1.6 Abbreviations

The following table lists the Abbreviations used in this document.

Table 2: Abbreviations

Conventions	Description
AIX	Advanced Interactive eXecutive
DEFQ	Data Entry Forms and Queries
DML	Data Manipulation Language
EAR	Enterprise Archive
EJB	Enterprise JavaBean
ERM	Enterprise Resource Management
FTP	File Transfer Protocol
GUI	Graphical User Interface
HTTPS	Hypertext Transfer Protocol Secure
J2C	J2EE Connector
J2EE	Java 2 Enterprise Edition
JDBC	Java Database Connectivity
JDK	Java Development Kit
JNDI	Java Naming and Directory Interface
JRE	Java Runtime Environment
JVM	Java Virtual Machine
LDAP	Lightweight Directory Access Protocol
LHS	Left Hand Side
MFA	Multi-Factor Authentication
MOS	My Oracle Support
OFS	Oracle Financial Services
OFSAAI	Oracle Financial Services Analytical Application Infrastructure
OFSDF	Oracle Financial Services Data Foundation
OHC	Oracle Help Center
OLAP	On-Line Analytical Processing
OS	Operating System
RAM	Random Access Memory
RDMS	Relational Database Management System
SFTP	Secure File Transfer Protocol

Conventions	Description
SID	System Identifier
SSL	Secure Sockets Layer
TDE	Transparent Data Encryption
TNS	Transparent Network Substrate
URL	Uniform Resource Locator
VM	Virtual Machine
Web Archive	WAR
XML	Extensible Markup Language

2 OFS Data Foundation Application Pack Maintenance Release v8.1.2.2.0

This Maintenance Release of the Oracle Financial Services Data Foundation Application Pack includes all enhancements and bug fixes that are done since the Oracle Financial Services Data Foundation Application Pack v8.1.2.0.0 Release.

Topics:

- <u>Pre-installation Requirements</u>
- Applying this Maintenance Release

NOTE

The schemas or domains for OFSDF are referred to as BFND.

2.1 Pre-installation Requirements

These are the pre-installation requirements for the Oracle Financial Services Data Foundation Application Pack v8.1.2.2.0 Release:

NOTE

Before installing OFSDF Application Pack v8.1.2.2.0, if the Data Management Release v8.0.5.0.0 Application Pack (full installer) is already installed on the system, then execute the following statements in the Atomic Schema:

- DROP INDEX DIM DATES CALENDAR DATE;
- DROP INDEX DIM KI GROUP LRI;

 To resolve the Primary Key and Not Null Column changes in specific tables, follow these Preinstallation Steps:

NOTE

Perform the following steps only if you are upgrading from OFSDF 8.1.2.0.0 to OFDF 8.1.2.2.0.

Table 3: Pre-installation Steps to resolve Primary Key and Not Null Column changes

Step No.	Pre-installation Steps	Example
a.	Create a backup table of each of the following Tables: • STG_ADDR_PURPOSE_TYPE_MASTER • STG_ACCOUNT_ADDRESS_MAP • STG_ACCOUNT_PHONE_MAP • STG_ACCOUNT_EMAIL_MAP • STG_INDEX_COMPOSITION • FCT_INDEX_COMPOSITION	The backup table of STG_ACCOUNT_ADDRESS_MAP can be STG_ACCOUNT_ADDRESS_MAP_BKP
b.	Truncate the Original Tables.	Truncate the STG_ACCOUNT_ADDRESS_MAP.

Oracle Financial Services Data Foundation (OFSDF) Application Pack v8.1.2.0.0 Minor Release
Patch ID 32820351 plus other prerequisite OFSDF Patches (download from My Oracle Support
(MOS)) must be installed and configured on your machine. For more information, see the
Preparing for Installation Section in the Oracle Financial Services Data Foundation Application
Pack Installation and Configuration Guide Release 8.1.2.0.0.

NOTE

The erwin Files for OFSDF Application Pack v8.1.2.2.0 is available on My Oracle Support (MOS) in patch **34273209**.

• Enable the Unlimited Cryptographic Policy. By default, JCE Policy JAR Files are available for the Java versions mentioned in the following link and for later versions:

https://bugs.java.com/view_bug.do?bug_id=JDK-8170157

For the Java versions, where the Unlimited Cryptographic Policy is disabled by default, follow these steps:

a. Download the JCE Policy related Jar Files local_policy.jar and US export policy.jar.

- For Oracle Java, download the local_policy.jar and US_export_policy.jar Files from http://www.oracle.com/technetwork/java/javase/downloads/jce-7-download-432124.html.
- For IBM Java, download the local_policy.jar and US_export_policy.jar Files from https://www14.software.ibm.com/webapp/iwm/web/preLogin.do?source=jcesdk.
- **b.** Copy (or replace) the downloaded JCE Policy related Jar Files <code>local_policy.jar</code> and <code>US_export_policy.jar</code> to the <code>/jre/lib/security</code> Directory of the Java Installation Directory used for OFSAAI and the Web Application Servers.

NOTE

For information about the hardware and software requirements, see the Oracle Financial Services Analytical Applications (OFSAA) Technology Matrix Release 8.1.2.0.0.

2.2 Applying this Maintenance Release

This section provides information about installing this Maintenance Release.

NOTE

This Maintenance Release Patch is applicable only for an RDBMS mode of installation.

Topics:

- Downloading OFS Data Foundation Application Pack
- Pre-installation Activities
- Installing the OFS Data Foundation Application Pack
- Post-installation Activities

2.2.1 Downloading OFS Data Foundation Application Pack

To download and extract the Release contents, follow these steps:

NOTE

Enable the Unlimited Cryptographic Policy. By default, JCE Policy JAR Files are available for Java.

- 1. Log in to My Oracle Support (MOS). In the Patches & Updates Tab, search for Patch ID 33984652.
- **2.** Download the OFSDF Application Pack v8.1.2.2.0 Archive File and copy it to your OFSAA Server in the **Binary** Mode.

NOTE

The Archive Files are different for different Operating Systems such as AIX, Solaris, and RHEL or Oracle Linux.

3. Stop all the OFSAAI Services.

For more information, see the *Stop the Infrastructure Services* Section in the <u>Oracle Financial</u> Services Advanced Analytical Applications Infrastructure Installation Guide Release 8.1.2.0.0.

- **4.** Log in to the OFSAA Server as a Non-root User.
- **5.** Execute the following command:

chmod -R 750 \$FIC HOME

6. Assign the WRITE Permission to the Files and Folders such as commonscripts, EXEWebService, ficapp, ficweb, and ficdb by using the following command:

chmod -R 775 *

- 7. If you have an Unzip Utility, skip to the next step. Download the Unzip Utility (OS-specific) unzip_<os>. Z and copy it in the Binary Mode to the Directory that is included in the PATH Variable, in the \$HOME Path or Directory in which you copied the OFSDF Application Pack v8.1.2.2.0 Installer.
 - **a.** Extract the unzip Installer File using the following command:

uncompress unzip <os>.Z

NOTE

If you notice an Error Message: "uncompress: not found [No such file or directory]" when the package is not installed, contact your UNIX Administrator.

b. Give the EXECUTE Permission to the File using the following command:

chmod 751 OFS BFND 8.1.2.2.0 <OperatingSystem>.zip

8. Extract the contents of the OFSDF v8.1.2.2.0 Archive File using the following command:

unzip <os> -a <name of the file to be unzipped>

NOTE

 Rename or remove the existing OFSAA Application Pack Folder from the OFSAA Server before extracting the contents from the Release Archive (.zip).

For example: When this Release is extracted from the archive, it creates a Folder named OFS_BFND_PACK. Rename or remove any existing Folder with the same name, which exists in the Path where the Release Archive is copied.

-a option in this step is mandatory to unzip the Archive File.
 For example:

Pre-installation Activities 2.2.2

This section provides Pre-installation Activities required for the installation of the OFSDF Application Pack v8.1.2.2.0 Release.

Topic:

Model Upload Parameter

Model Upload Parameter 2.2.2.1

You must upload the Configuration File params.conf before triggering the installation. The params.conf File is present in the /OFS BFND PACK/appsLibConfig/conf/ Directory.

The following are the Input Parameters for the params.conf File:

Model Upload Process

- The required input value is 0 or 1.
 - 0 is an indication to skip the Data Model Upload Process.
 - 1 is an indication to trigger the Data Model Upload Process.
- If the value is 1, then select the type of the Data Model for the Data Model Upload Process:
 - **0** indicates the Released Data Model.
 - 1 indicates a Customized Data Model.

If the value is 1, then provide the inputs for the Data Model Name and the Path of the Data Model.

Installing the OFS Data Foundation Application Pack 2.2.3

To install the OFSDF Application Pack v8.1.2.2.0 Release, follow these steps:

1. Assign the EXECUTE Permission to the Maintenance Release Archive File. Navigate to the./OFS BFND PACK Directory and execute the following command:

```
chmod 750 OFSAAIUpdate.sh
```

2. Execute the OFSAAIUpdate.sh File using the following command:

```
./OFSAAIUpdate.sh
```

3. Verify if the Release is applied successfully by checking the Log File generated in the Installation Folder. The Log File such as OFS FSDF installation.log is stored in the /OFS BFND PACK/OFS FSDF/logs/ Directory. You can ignore the ORA-00001, ORA-00955, ORA-02260, ORA-01031, and ORA-01430 errors in the Log File. For any other errors, contact My Oracle Support.

2.2.4 Post-installation Activities

The following sections provide information about the Post-installation Activities for the OFSDF Application Pack v8.1.2.2.0 Release.

Topics:

- Applying all the Mandatory Patches and Platform-related Post-installation Activities
- OFSDF Related Post-installation Activities

2.2.4.1 Applying all the Mandatory Patches and Platform-related Post-installation Activities

After OFSDF Application Pack is successfully installed, to perform the OFSAAI related Post-installation Activities, follow these steps:

- 1. Clear the Application Cache.
- **2.** Navigate to the following Directory depending on the configured Web Application Server and delete the following Files:
 - Tomcat:

<Tomcat installation folder>/work/Catalina/localhost/<Application name>/org/apache/jsp

WebLogic:

<Weblogic installation location>/domains/<Domain
name>/servers/<Server name>/tmp/_WL_user/<Application name>/<auto
generated folder>/jsp servlet

Websphere:

<Websphere installation directory>/AppServer/profiles/<Profile
name>/temp/<Node name>/server1/<Application name>/<.war file name>

- **3.** Add umask 0027 in the .profile File of the UNIX Account, which manages the Webserver to ensure restricted Access Permissions.
- **4.** Perform any necessary Additional Configuration mentioned in the *Additional Configurations* Section in the <u>Oracle Financial Services Data Foundation Application Pack Installation and Configuration Guide Release 8.1.2.0.0</u>.
- **5.** Generate the Application EAR or WAR File, and redeploy the Application on the configured Web Application Server.

For more information on generating and deploying the EAR or WAR File, see the *Create and Deploy the EAR/WAR Files* Section in the <u>Oracle Financial Services Advanced Analytical Applications Infrastructure Installation Guide Release 8.1.2.0.0</u>.

6. After the successful installation of the OFSDF Application Pack v8.1.2.2.0 Release, restart all the OFSAAI Services.

For more information, see the *Start the Infrastructure Services* Section in the <u>Oracle Financial</u> <u>Services Advanced Analytical Applications Infrastructure Installation Guide Release 8.1.2.0.0</u>.

2.2.4.2 OFSDF Related Post-installation Activities

This section provides the Post-installation procedures for the OFSDF Application Pack v8.1.2.2.0 Release.

Topics:

- Resolve the Primary Key and Not Null Column Changes
- Change Batch ICC Ownership
- Enable Integration T2Ts

2.2.4.2.1 Resolve the Primary Key and Not Null Column Changes

To resolve the Primary Key and Not Null Column changes in specific tables, follow these Post-installation Steps:

NOTE

Perform the following steps only if you have executed the Pre-installation Steps to resolve Primary Key and Not Null Column Changes in this release.

Table 4: Post-installation Steps to resolve Primary Key and Not Null Column changes

Step No.	Post-installation Steps	Example
1.	In the backup tables of the following original tables, inspect the data duplication based on the Primary Key Columns: • STG_ADDR_PURPOSE_TYPE_MASTER • STG_ACCOUNT_ADDRESS_MAP • STG_ACCOUNT_PHONE_MAP • STG_ACCOUNT_EMAIL_MAP • STG_INDEX_COMPOSITION • FCT_INDEX_COMPOSITION	In the STG_ACCOUNT_ADDRESS_MAP_BKP Table, inspect the data duplication based on the Primary Key Columns.
2.	Remove the duplicate records in the backup tables.	In the STG_ACCOUNT_ADDRESS_MAP_BKP Table, remove the duplicate records.
3.	Move the remaining (non-duplicate) data from the backup tables into original tables.	Move the non-duplicate data from STG_ACCOUNT_ADDRESS_MAP_BKP to STG_ACCOUNT_ADDRESS_MAP.

2.2.4.2.2 Change Batch ICC Ownership

All the Seeded Batches in the OFSDF Application Pack are automatically assigned to the SYSADMN User during the Installation Process. To see Batches in the **Batch Maintenance** Menu, execute the following queries in the Config Schema of the Database.

Syntax:

```
begin
AAI_OBJECT_ADMIN.TRANSFER_BATCH_OWNERSHIP ('fromUser','toUser','infodom');
end;
OR
begin
AAI_OBJECT_ADMIN.TRANSFER_BATCH_OWNERSHIP ('fromuser','touser');
end;
```

- fromUser indicates the User who currently owns the Batch.
- toUser indicates the User to whom the ownership must be transferred.
- Infodom is an Optional Parameter. If you specify this Parameter, the ownership of the Batches of that Infodom is changed.

For example:

```
begin
AAI_OBJECT_ADMIN.TRANSFER_BATCH_OWNERSHIP
('SYSADMN','FSDFOP','OFSBFNDINFO');
end;
```

2.2.4.2.3 Enable Integration T2Ts

In the Integration Process, if more than one OFSAA Application exists in the same Environment, then the output of one OFSAA Application can be consumed by another OFSAA Application.

To enable the Integration Process, you must execute the Integration Utility.

For more information, see the *Enable Integration T2Ts* Section in the <u>Oracle Financial Services Data Foundation Application Pack Installation and Configuration Guide Release 8.1.2.0.0</u>.

3 Appendix A

This chapter includes FAQs for the OFSDF Application Pack v8.1.2.2.0 Release.

Topic:

Frequently Asked Questions

3.1 Frequently Asked Questions

What checks does the v8.1.2.2.0 Release patch perform?

This release patch performs the following checks:

- Environment Check: During the environment check, it performs Java validation, Environment Variables validation, OS-specific validation, DB-specific validation, and shuts down all the OFSAAI Services (Infrastructure Server, ICC Server, and Back-end Services).
- Post-installation check: As a part of the Post-installation check, the Patch checks if the OFSAAI Services can be successfully started.

Which version of the erwin Data Modeler does OFSAAI support?

For the erwin Data Modeler Version supported in this Release, see the <u>Oracle Financial Services</u> <u>Analytical Applications (OFSAA) Technology Matrix Release 8.1.2.0.0</u>.

What should I do for viewing the Log Files at the Debug level for troubleshooting?

By default, the log level is set as **INFO**. You must manually change the log level to **Debug** to view the Log Files in the debug level. Based on your requirements, you can also change the log level to Warn, Error, or Fatal. To view Log Files, follow these steps:

- 1. Navigate to the \$FIC HOME/conf Directory in the APP layer of your OFSAAI installation.
 - Change the priority value to Debug in the RevLog4jConfig.xml File.

For example:

```
<root>
<priority value ="debug" />
<appender-ref ref="ConsoleAppender1"/>
</root>
```

• Replace the value of the LOGGERLEVEL Parameter in the DynamicServices.xml File from 20 with 0 (20 is the value for Info and 0 for Debug).

NOTE

For a Multi-tier Installation, also change the LOGGERLEVEL Value to 0 (Debug) in the DynamicServices.xml and RevLog4jConfig.xml Files, which are present in the \$FIC_APP_HOME/conf, \$FIC_DB_HOME/conf, and \$FIC_WEB_HOME/conf_Directories.

- 2. Navigate to the <code>\$FIC_WEB_HOME/webroot/conf</code> Directory and change the <code>priority</code> value to <code>Debug</code> in the <code>ExportLog4jConfig.xml</code>, <code>MDBLogger.xml</code>, and <code>PR2Logger.xml</code> Files to view the Log Files at the Debug level for the modules Archive or Restore, Metadata Browser, and RRF, respectively.
- 3. Generate the Application EAR/WAR File and redeploy the application on the configured Web Application Server.
 For more information on generating and deploying the EAR/WAR file, see the *Post-installation* Section in the <u>Oracle Financial Services Advanced Analytical Applications Infrastructure</u> Installation Guide Release 8.1.2.0.0.
- **4.** Restart the OFSAAI Services (APP and WEB). For more information, see the *Start the Infrastructure Services* Section in the <u>Oracle Financial Services Advanced Analytical Applications Infrastructure Installation Guide Release 8.1.2.0.0</u>.

OFSAA Support

Raise a Service Request (SR) in My Oracle Support (MOS) for queries related to the OFSAA Applications.

Send Us Your Comments

Oracle welcomes your comments and suggestions on the quality and usefulness of this publication. Your input is an important part of the information used for revision.

- Did you find any errors?
- Is the information clearly presented?
- Do you need more information? If so, where?
- Are the examples correct? Do you need more examples?
- What features did you like most about this manual?

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Before sending us your comments, you might like to ensure that you have the latest version of the document wherein any of your concerns have already been addressed. You can access My Oracle Support site that has all the revised/recently released documents.

