

Product Release Notes  
Oracle FLEXCUBE Investor Servicing  
Release 12.4.0.13.1  
Part No.E86909-01  
[March] [2020]





Product Release Notes  
March 2020  
Version 12.4.0.13.1

Oracle Financial Services Software Limited  
Oracle Park  
Off Western Express Highway  
Goregaon (East)  
Mumbai, Maharashtra 400 063  
India

Worldwide Inquiries:  
Phone: +91 22 6718 3000  
Fax: +91 22 6718 3001  
[www.oracle.com/financialservices/](http://www.oracle.com/financialservices/)

Copyright © 2007 - 2020, Oracle and/or its affiliates. All rights reserved.

Oracle and Java are registered trademarks of Oracle and/or its affiliates. Other names may be trademarks of their respective owners.

**U.S. GOVERNMENT END USERS:** Oracle programs, including any operating system, integrated software, any programs installed on the hardware, and/or documentation, delivered to U.S. Government end users are "commercial computer software" pursuant to the applicable Federal Acquisition Regulation and agency-specific supplemental regulations. As such, use, duplication, disclosure, modification, and adaptation of the programs, including any operating system, integrated software, any programs installed on the hardware, and/or documentation, shall be subject to license terms and license restrictions applicable to the programs. No other rights are granted to the U.S. Government.

This software or hardware is developed for general use in a variety of information management applications. It is not developed or intended for use in any inherently dangerous applications, including applications that may create a risk of personal injury. If you use this software or hardware in dangerous applications, then you shall be responsible to take all appropriate failsafe, backup, redundancy, and other measures to ensure its safe use. Oracle Corporation and its affiliates disclaim any liability for any damages caused by use of this software or hardware in dangerous applications.

This software and related documentation are provided under a license agreement containing restrictions on use and disclosure and are protected by intellectual property laws. Except as expressly permitted in your license agreement or allowed by law, you may not use, copy, reproduce, translate, broadcast, modify, license, transmit, distribute, exhibit, perform, publish or display any part, in any form, or by any means. Reverse engineering, disassembly, or decompilation of this software, unless required by law for interoperability, is prohibited.  
The information contained herein is subject to change without notice and is not warranted to be error-free. If you find any errors, please report them to us in writing.

This software or hardware and documentation may provide access to or information on content, products and services from third parties. Oracle Corporation and its affiliates are not responsible for and expressly disclaim all warranties of any kind with respect to third-party content, products, and services. Oracle Corporation and its affiliates will not be responsible for any loss, costs, or damages incurred due to your access to or use of third-party content, products, or services.

# Table of Contents

<b>1. RELEASE NOTES .....</b>	<b>1-1</b>
1.1 BACKGROUND .....	1-1
1.2 PURPOSE.....	1-1
1.3 ABBREVIATIONS .....	1-1
1.4 RELEASE HIGHLIGHTS.....	1-2
1.5 ENHANCEMENTS TO THE EXISTING MODULES .....	1-2
1.5.1 Ageing Logic.....	1-2
1.5.2 Campaigns.....	1-2
1.5.3 Contingent Deferred Sales Charge (CDSC).....	1-2
1.5.4 One-to-many switch.....	1-3
1.5.5 Personal Information Protection Act (PIPA).....	1-3
1.5.6 Revolving Investments Scheme with Planned yield.....	1-3
1.5.7 Regular Savings Plan (RSP), Dynamic Regular Savings Plan (DRSP).....	1-3
1.5.8 Short Trade.....	1-4
1.5.9 Emergency Holiday Handling.....	1-4
<b>2. COMPONENTS OF THE SOFTWARE .....</b>	<b>2-1</b>
2.1 DOCUMENTS ACCOMPANYING THE SOFTWARE .....	2-1
2.2 SOFTWARE COMPONENTS .....	2-1
<b>3. ANNEXURE – A: ENVIRONMENT DETAILS .....</b>	<b>3-1</b>
3.1 TECH STACK – ORACLE.....	3-1
3.2 TECH STACK – IBM.....	3-3
<b>4. ANNEXURE – B: THIRD PARTY SOFTWARE DETAILS .....</b>	<b>4-1</b>
<b>5. ANNEXURE – C: MODULE CODE AND DESCRIPTION.....</b>	<b>5-2</b>

---

# 1. Release Notes

## **1.1 Background**

Oracle Financial Services Software Limited has developed a mutual fund automation solution, Oracle FLEXCUBE Investor Servicing that enables mutual fund companies to create a distributed network of branches for effective marketing and efficient handling of unit holder transactions. Oracle FLEXCUBE Investor Servicing is a real-time online solution, enabled for multi-currency, multilingual, multi-entity, multi-instance operations. Its mission-critical and robust architecture and use of leading-edge industry standard products ensure almost limitless scalability.

## **1.2 Purpose**

The purpose of this Release Note is to highlight the enhancements in Oracle FLEXCUBE Investor Servicing 12.4.0.0.0

## **1.3 Abbreviations**

<b>Abbreviation</b>	<b>Description</b>
CDSC	Contingent Deferred Sales Charge
FCIS	Oracle FLEXCUBE Investor Servicing
FMG	Fund Manager
UH	Unitholder
PIPA	Personal Information Protection Act
LOV	List of Values
RSP	Regular Savings Plan
DRSP	Dynamic Regular Savings Plan
RIS	Revolving Investment Switch
LOCOM	Lower of cost or market

*For module code and description details, please refer Annexure C.*

## **1.4 Release Highlights**

The scope of the current release Oracle FLEXCUBE Investor Servicing 12.4.0.0.0 includes support for

- Personal Information Protection Act (PIPA)
- Unit Holdings Classification and Redemption Logic
- Regular Savings Plan (RSP), Dynamic Regular Savings Plan (DRSP)
- Short Trade
- Revolving Investments Scheme with Planned yield
- Campaigns
- Contingent Deferred Sales Charge (CDSC)
- Emergency Holiday
- One-to-many switch

## **1.5 Enhancements to the Existing Modules**

### **1.5.1 Ageing Logic**

- Facility provided at unit holder level to track permissible communication mode of Transactions.
- System enhanced to display Investor fund balance, differentiating front-end load units and CDSC fee units.
- Ability to maintain a user defined ageing logic which can be different for onshore/offshore funds
- Facility to maintain special discounts (e.g birthday discount) for investors
- New method for average cost computation has been introduced

### **1.5.2 Campaigns**

- Campaign functionality enhanced to support multiple campaigns by configuring discount in fee rate on specified number of successful executions.
- System enhanced to configure multiple campaigns and tag them in a campaign group which can then be tagged to inflow transactions like Subscriptions, Switch ins and RSP/DRSP. Campaigns can be setup based on new set of criteria like birthday/age/ account opening date range etc
- Benefit counters for each campaign can be viewed and updated at Unit Holder, Fund and Transaction type Level.

### **1.5.3 Contingent Deferred Sales Charge (CDSC)**

- Facility to tag units as CDSC/FEL and not charge CDSC fees on FEL units
- Facility to select ageing out preference as "FEL/CDSC"
- Contingent Deferred Sales Charge (CDSC) functionality enhanced to configure CDSC Fee (LOCOM) on Pseudo Switch transactions and business can charge CDSC fee only on transaction for which Front end load is not applicable.

- CDSC Load computation during outflows happens based on ageing entry of linked Inflows.
- Switch restrictions can be extended based on unit classifications.

#### **1.5.4 One-to-many switch**

- System enhanced to support one- to- many switch (pseudo switches) through the bulk transaction screen. Ability to capture pseudo switch out for a fund and multiple pseudo switch (inflows) through a single screen.
- Pseudo switch-out can be based on these transaction modes Net Amount, Gross Amount, Gross Units and Gross Percentage.
- System has been enhanced to support one- to- many switch (pseudo switches) through the bulk transaction screen. Using this screen, user can capture instruction to switch out (pseudo switch) from a given fund and invest the proceeds in multiple funds.
- The one-to-many switch instruction can be captured only for a single unitholder.

#### **1.5.5 Personal Information Protection Act (PIPA)**

- System enhanced to log audit details related to accessing of unit holder/ customer/ transaction and balance related information.
- The audit log of the business user accessing specific functions will be logged by the system and the details of the log will include user identification details, access information like date and time, function accessed and investor (unit holders) accessed.

#### **1.5.6 Revolving Investments Scheme with Planned yield**

- System enhanced to support the revolving investment scheme with target yield feature to facilitate the investors to automatically switch back to source fund by capitalizing the gains.
- System enhanced to capture yield % and switch back fund.
- New screen has been added to facilitate investor and fund risk rating mapping at AMC level
- Facility to disable specific transaction from yield computation has also been provided.

#### **1.5.7 Regular Savings Plan (RSP), Dynamic Regular Savings Plan (DRSP)**

- Standing Instructions maintenance screen enhanced to capture RSP and DRSP specific attributes.
- System enhanced to accommodate investor risk level expiry date and fund rule screen enhanced to support maintenance of cut of days.
- System enhanced to enrich campaign functionality for the user to define campaigns based on successful deduction counter.
- Campaign maintenance screen enhanced to capture the attributes required for deduction counter logic.
- Facility to amend DRSP/RSP information include application / amendment of fund, contribution amount, expiry date reinstate / suspension of RSP, change of RSP type etc
- Support for Dynamic RSP to facilitate investment of low/high contribution amount based on yield computation

### **1.5.8** **Short Trade**

- System allows user to configure a short trade period and allows user to charge investors who transact (outflow) within the short trade period following the investment.
- Provision to mark specific transaction type as enabled for short trade
- System will have facility to amend the short trade counter set up at fund level.
- New logic introduced to derive short trade transactions based on the short trade days maintained and apply charges on the short trade units

### **1.5.9** **Emergency Holiday Handling**

- System enhanced to mark current business day as holiday and move unprocessed activities to next business day in case of any emergencies. All un-allotted transactions fall under such emergency holiday will be treated as non-business date transactions and automatically move the transaction attributes to next business date.
- New maintenance screen introduced for capturing the emergency holiday details and also modified EOD process. If emergency day continues for multiple days only first day of emergency will be maintained as emergency holiday and subsequent days will be declared as System holiday.

---

## 2. Components of the Software

### **2.1 Documents accompanying the software**

The various documents accompanying the software are as follows:

- Release Note
- Installer Kit
- User Manuals and Installation manuals can be accessed from [http://docs.oracle.com/cd/E86909\\_01/index.htm](http://docs.oracle.com/cd/E86909_01/index.htm)

### **2.2 Software Components**

Software Components of Oracle FLEXCUBE 12.4.0.0.0 that form part of this release are as follows:

- Application Server
  - Java Sources
  - UI Components (JS, XML)
  - Reporting Components (Data models (xdmz), Reports (xdoz))
  - Process Framework components (BPEL)
- Database Server
  - Stored Procedures (Packages, Functions, Procedures, Triggers, Views)
- Gateway
  - Java application layer
    - Java Sources
    - Configuration files used for deployment
  - Messaging layer
    - Stored Procedures (Packages, Functions, Procedures, Triggers, Views)
  - Services
    - The WSDL files for the service supported
    - The XSDs of the messages involved
    - The service documents – describing the services
- Adapters
  - IS-UBS
  - FCIS MDB Adapter
    - UI Components (JS, XML)
    - Java sources
    - Stored Procedures (Packages, Functions, Procedures, Triggers, Views)
  - FCIS Callout Adapter
    - Java sources
    - Stored Procedures (Packages, Functions, Procedures, Triggers, Views)
  - FCIS Insulation Adapter
    - Java sources
    - Stored Procedures (Packages, Functions, Procedures, Triggers, Views)
- Installation utilities
  - UI and Script based installation for Application Server, Database Server and Gateway



- Installation documents for
  - FCIS Application Deployment
  - Gateway
- Online Help Files

### 3. Annexure – A: Environment Details

#### 3.1 Tech Stack – Oracle

Component	Deployment option	Machine	Operating System	Software	Version Number
Oracle FLEXCUBE Investor Servicing	UI-Host and Centralized	Application Server	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	Oracle Fusion Middleware Infrastructure (or) Oracle WebLogic Server	12.2.1.4.0
				Java HotSpot(TM) JDK (with WebLogic Application Server)	JDK 1.8 Update 221
				Oracle Platform Security Services	12.2.1.3.0
				Open Symphony Quartz	2.3.1-ad5302c
		Database Server	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	Oracle RDBMS Enterprise Edition	19.6.0.0.0
		Document Management System	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	Oracle WebLogic Server	12.2.1.4.0
				Oracle WebCenter Content Imaging	12.2.1.4.0
		Reporting Server	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	Oracle Analytics Server	5.5.0
				Java HotSpot(TM) JDK (with WebLogic Application Server)	JDK 1.8 Update 221
		Client Machines	#Supported Browsers	Internet Explorer	Microsoft Internet Explorer Release (11.*)
				Mozilla Firefox	Mozilla Firefox Release(66+)
				Google Chrome	Google Chrome Release(73+)
				Microsoft Edge	Microsoft Edge (41.16299.15)
				Safari	Safari 11+
		Single Sign On Server	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	JDK	JDK 1.8 Update 221
				Oracle Fusion Middleware Infrastructure	12.2.1.4.0
				Oracle Identity And Access Management	12.2.1.4.0
				Oracle Identity Management(OID)	12.2.1.4.0
				Oracle SOA	12.2.1.4.0
				OID Connector	OID 11.1.1.6.0

Oracle FLEXCUBE Investor Servicing BPEL/BPMN Processes and Process Framework	UI-Host and Centralized	Application Server	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	Oracle Fusion Middleware Infrastructure	12.2.1.4.0 (JDK 1.8 Update 221)
				Oracle SOA Suite, Oracle BPM Suite	12.2.1.4.0
Oracle FLEXCUBE Investor Servicing Integration Gateway	Web services (incoming)	Integration Server	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	Oracle Fusion Middleware Infrastructure (or) Oracle WebLogic Server	12.2.1.4.0
	HTTP Servlet (incoming)				
	EJB (incoming)				
	MDB (incoming)				
	Notifications (outgoing)				
Oracle FLEXCUBE Investor Servicing Machine Learning	Manual Deployment	Machine Learning Server	Oracle Enterprise Linux server 7.3 (x86 64 bit)	Oracle Machine Learning for R	1.5.1

# Browser support is no longer based on Operating Systems but strictly tied to the browser themselves, no matter which Operating Systems they are installed on. Current release is certified on client workstations with Windows 7, 10 and Mac OS X.

## 3.2 Tech Stack – IBM

Component	Deployment option	Machine	Operating System	Software	Version Number
Oracle FLEXCUBE Investor Servicing	UI-Host and Centralized	Application Server	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	IBM WebSphere Application Server with inbuilt JVM (IBM JDK 1.8_64)	9.0.0.10
				IBM WebSphere MQ Server	9.0.4.0
				Open Symphony Quartz	2.3.1-ad5302c
		Database Server	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	Oracle RDBMS Enterprise Edition	19.6.0.0.0
		Client Machines	#Supported Browsers	Internet Explorer	Microsoft Internet Explorer Release (11.*)
				Mozilla Firefox	Mozilla Firefox Release(66+)
				Google Chrome	Google Chrome Release(73+)
				Microsoft Edge	Microsoft Edge (41.16299.15)
				Safari	Safari 11+
Oracle FLEXCUBE Investor Servicing Integration Gateway	Web services (incoming)	Integration Server	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	IBM WebSphere Application Server with inbuilt JVM (IBM JDK 1.8_64)	9.0.0.10
	HTTP Servlet (incoming)				
	EJB (incoming)				
	MDB (incoming)	Integration Server	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	IBM WebSphere Application Server with inbuilt JVM (IBM JDK 1.8_64)	9.0.0.10
				IBM WebSphere MQ Server	9.0.4.0
	Notifications (outgoing)	Integration Server	Oracle Enterprise Linux Server 7.4 (x86 64 Bit)	IBM WebSphere Application Server with inbuilt JVM (IBM JDK 1.8_64)	9.0.0.10
				IBM WebSphere MQ Server	9.0.4.0

# Browser support is no longer based on Operating Systems but strictly tied to the browser themselves, no matter which Operating Systems they are installed on. Current release is certified on client workstations with Windows 7, 10 and Mac OS X.

---

## 4. Annexure – B: Third Party Software Details

- For information on the third party software details, refer the latest Oracle FLEXCUBE Investor Servicing License Guide

---

## 5. Annexure – C: Module Code and Description

Abbreviation/ Acronym	Meaning
FCIS	Oracle FLEXCUBE Investor Servicing
SMS	Security Management System
LEP	Life and Endowment Product
UT	Unit Trust