

Development Workbench - Tracking Changes  
Oracle FLEXCUBE Universal Banking  
Release 14.7.3.0.0  
Part No. F91985-01  
[February] [2024]



---

## Contents

1	Preface.....	3
1.1	Audience.....	3
2	Introduction.....	3
2.1	How to use this Guide.....	3
3	View Changes.....	4
3.1	Process Steps.....	4
4	Change Report.....	8
4.1	Process Steps.....	9
4.2	Functionality Demonstration.....	14

---

# 1 Preface

This document describes the Tracking Changes available in Oracle FLEXCUBE Development Workbench for Universal Banking and guides the developers on how to use this feature

## 1.1 Audience

This document is intended for FLEXCUBE Application developers/users that use Development Workbench to develop various FLEXCUBE components.

To Use this manual, you need conceptual and working knowledge of the below:

<i>Proficiency</i>	<i>Resources</i>
FLEXCUBE Functional Architecture	Training programs from Oracle Financial Software Services.
FLEXCUBE Technical Architecture	Training programs from Oracle Financial Software Services.
FLEXCUBE Object Naming conventions	<i>Development Overview Guide</i>
Working knowledge of Web based applications	Self Acquired
Working knowledge of Oracle Database	Oracle Documentations
Working knowledge of PLSQL developer	Respective vendor documents
Working knowledge of PLSQL & SQL Language	Self Acquired
Working knowledge of XML files	Self Acquired

## 2 Introduction

### 2.1 How to use this Guide

The information in this document includes:

- [Chapter 2 , "Introduction"](#)
- [Chapter 3 , "View Changes "](#)
- [Chapter 4 , "Change Report"](#)

### 3 View Changes

View Changes allows the developer to see what exact change has been done in the radxml as part of the various nodes in the Workbench across different releases.

Track changes will show various changes done in each node in the radxml. It will highlight the nodes through the color. It shows the modified Data Sources, Data Source Fields, LOVs, Data Blocks, Block Fields, Call forms etc in Blue Color. And it shows the newly added Data Sources, Data Source Fields, LOVs, Data Blocks, Block Fields, Call forms etc in Green Color.

The main page of View changes looks like function generation page.

Here in this page user is allowed to load a radxml. Then Workbench will show the all the changes done in the radxml across the release and release type accordingly with two different colors.

**Blue** indicates **modified**

**Green** indicates **new**.

So using View changes in Development Workbench, user can easily identify the changes done in the radxmls across releases

Across the release and release type.

#### 3.1 Process Steps

The starting page of the View changes will have only load button enabled and all the other buttons will be disabled at the beginning.

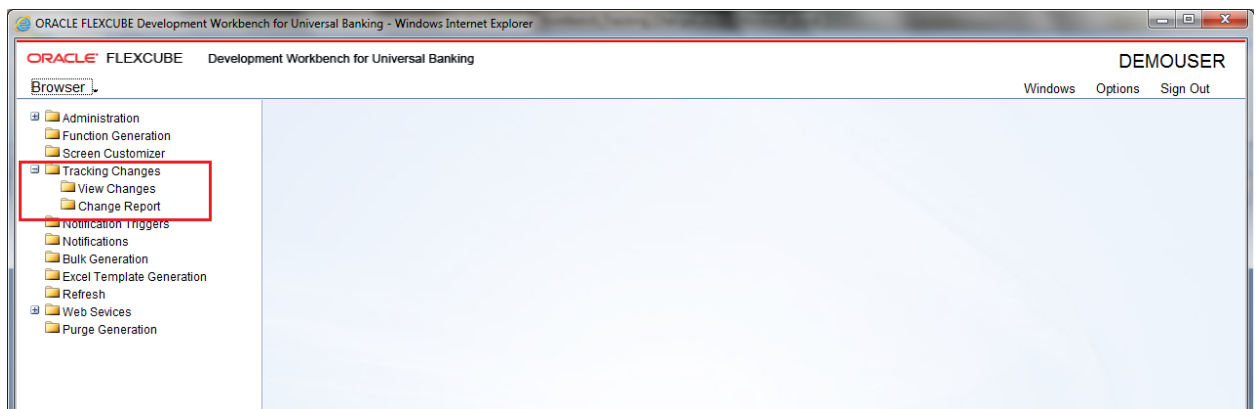


Fig 4.0 Development Workbench - View Changes link.

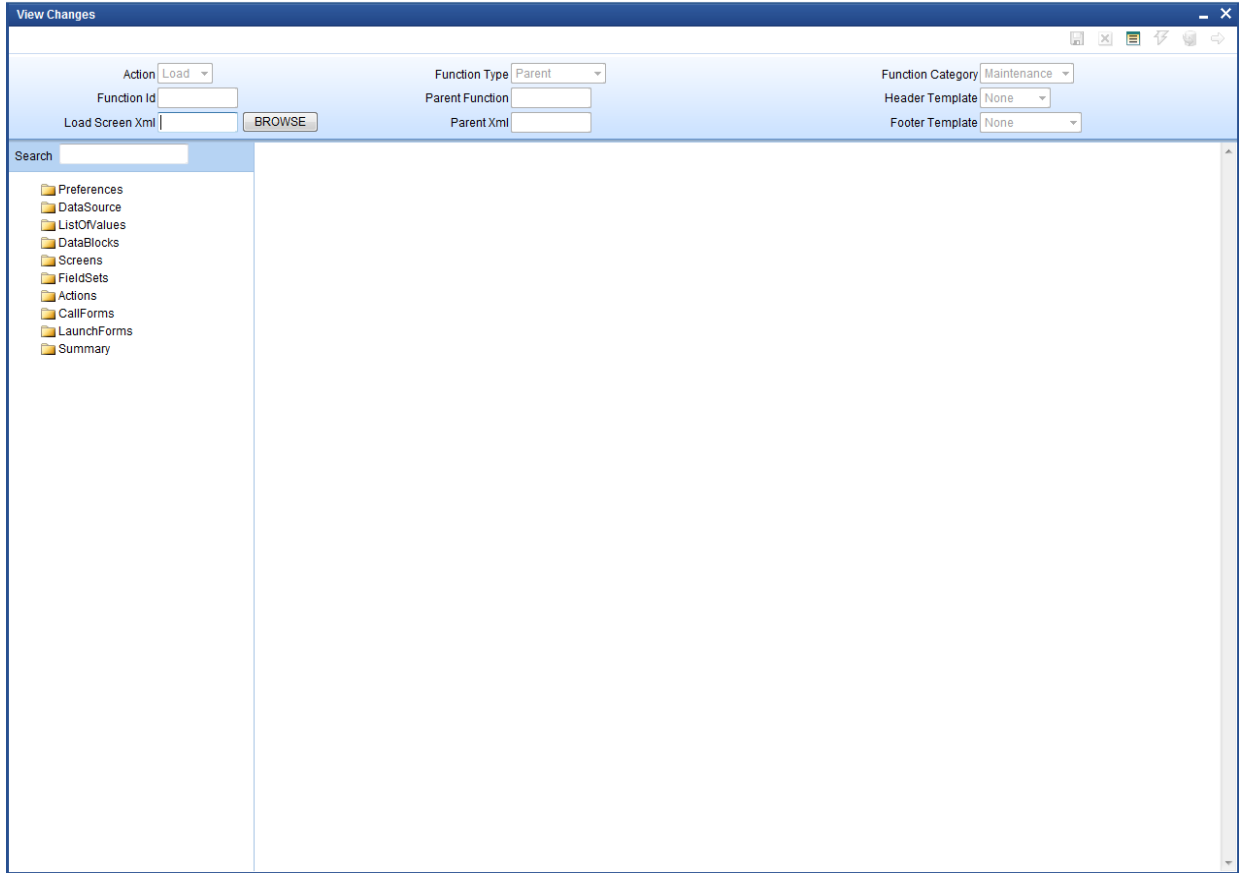


Fig 4.2 Development Workbench - View Changes page.

This page will allow user to load the radxml to view the changes in the radxml across releases and release types.  
Workbench allows viewing the changes done as part of Child or Cluster or Custom Release. Upon loading the Cluster or Custom or Child RAD xml, it shows the Modifications done as part Of Cluster or Custom or Child.

To load the radxml.

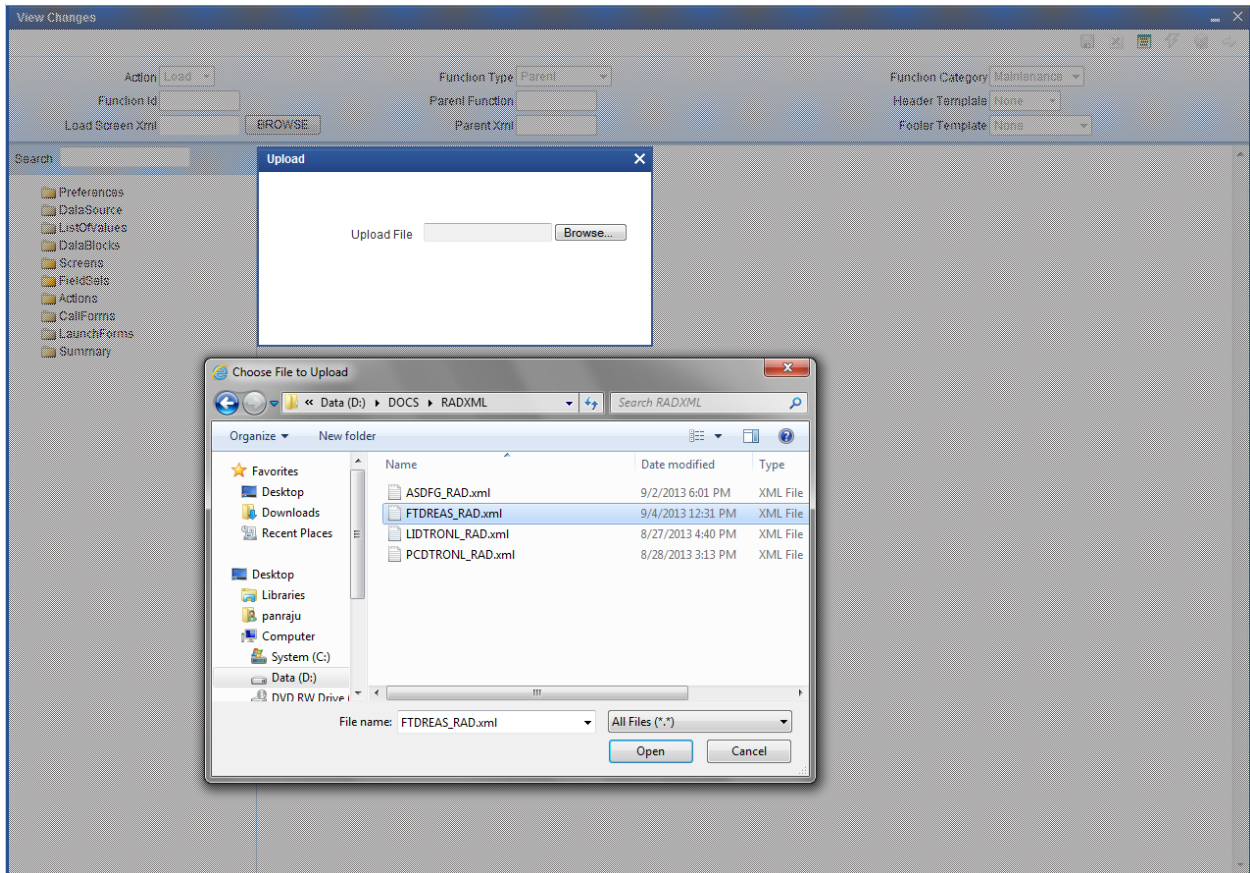


Fig 4.3 View Changes - loading radxml.

After loading the radxml one small window will pop up and will notify the details of the function id Like Function Type, Release Type.

Figure notifies that changes done in the radxml as part of Cluster Release will be highlighted

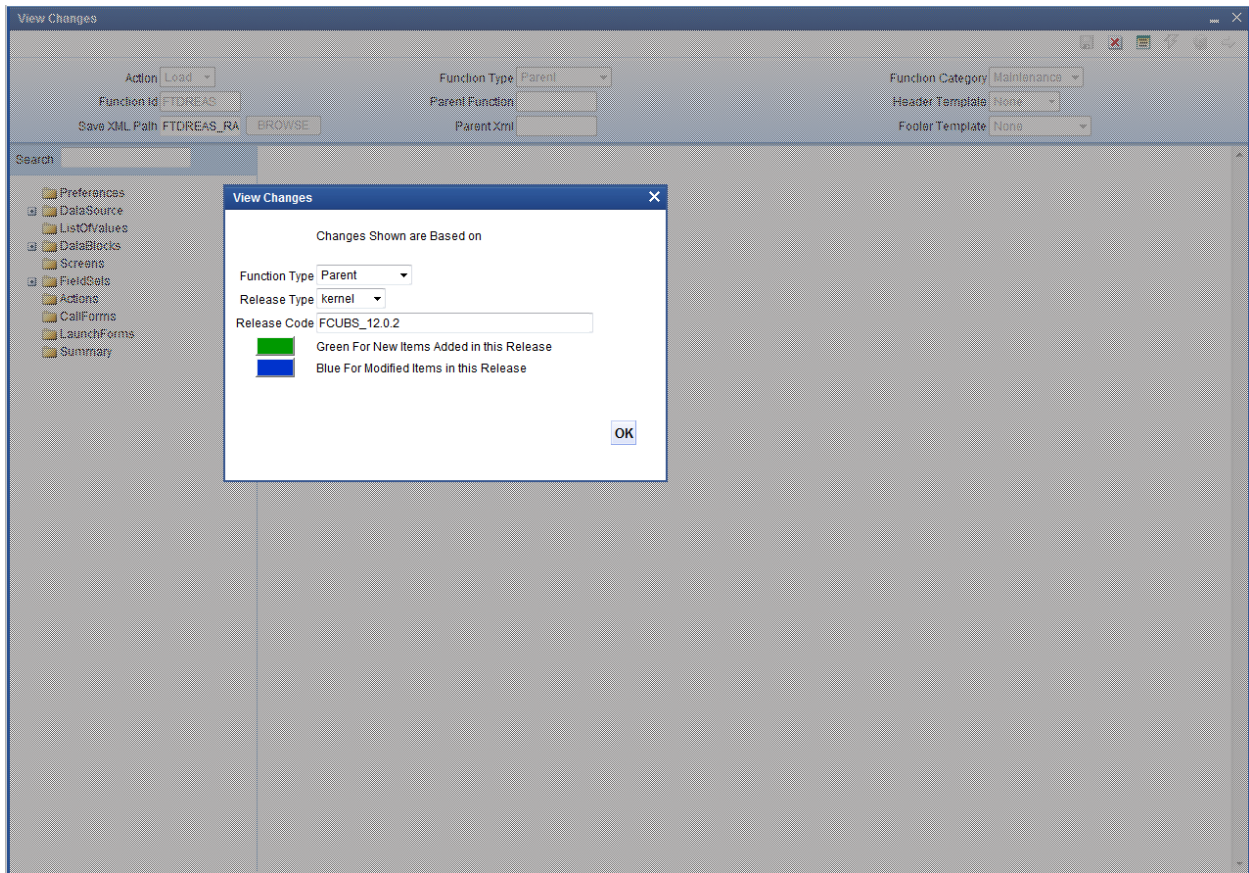


Fig 4.4 View Changes – Notifying the release type in which changes done

This will give brief details of what are the changes shown according to the release type. After loading the function id , Workbench will show the screen in the below format with blue and green accordingly.

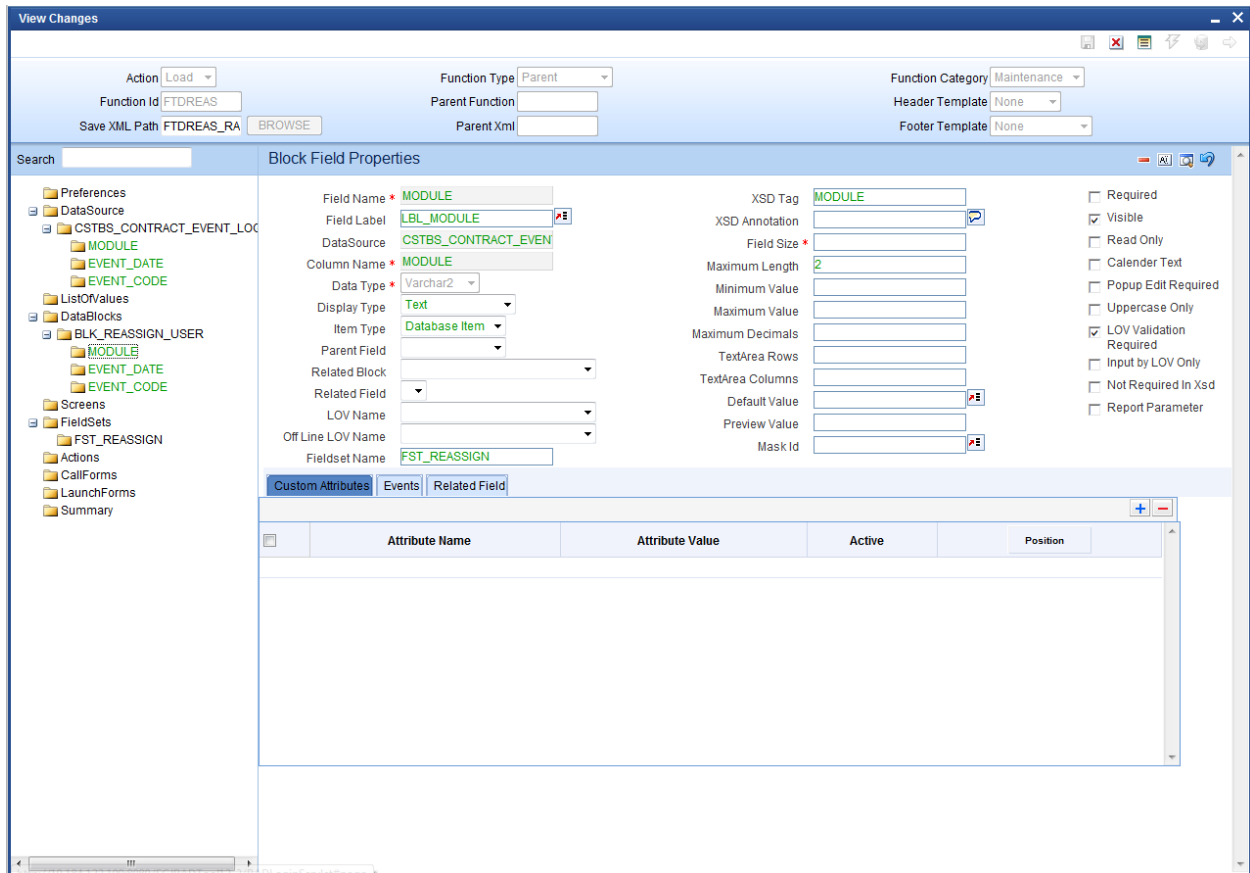


Fig 4.5 Highlighting the Changes done in Cluster Release

This will show the changes in the colors blue and green. Blue indicates modified and green indicates new, so in this function id.

One data source is modified (in blue color) while one block is newly added (in green color) as part of cluster release

## 4 Change Report

Change Report allows us to view the changes in the provided base and source list of radxml's, helps to get the changes done in the two radxml's across releases and release types.



View Changes Report allows the developer to see what exact change has been done in the radxml's as part of the various nodes in the Development Workbench across two different releases or release types.

It generates reports based on two formats

**Comparison Types:**

- 1. **Function specific:** Compares Radxml's Based on the function name
- 2. **Parent child:** Compares Radxml's Based on the parent child Relation

These are the nodes which are compared and report is generated based on the differences found in these below nodes of the two radxml's given in the list Radxml's.

**PREFERENCES, MENU\_DETAILS, DATASOURCES, COLUMNS, LOVS LOV\_DETAILS, DATA\_BLOCKS, BLOCK\_FIELDS, DATASOURCES\_ATTACHED, CUSTOM\_ATTRIBUTES, LOV\_RETURN\_FIELDS, LOV\_BIND\_VARS, FIELD\_EVENTS, LOV\_OFF\_LINE\_BIND\_VARS, LOV\_OFF\_LINE\_RETURN\_FIELDS, SCREENS, SCREEN\_ARGUMENTS, TABS, SECTIONS, PARTITIONS, FIELDSETS, FIELDSET\_FIELDS, SUMMARY, SUMMARY\_DETAILS, LAUNCHFORMS, CALLFORMS, ACTIONS, WEB\_SERVICES.**

### 4.1 Process Steps

View Changes Report process is explained taking STDCUSAC as example

From FCUBS\_11.3.0 and FCUBS\_11.4.0 Releases.

Click on View Change Report Node from Development Workbench landing page .

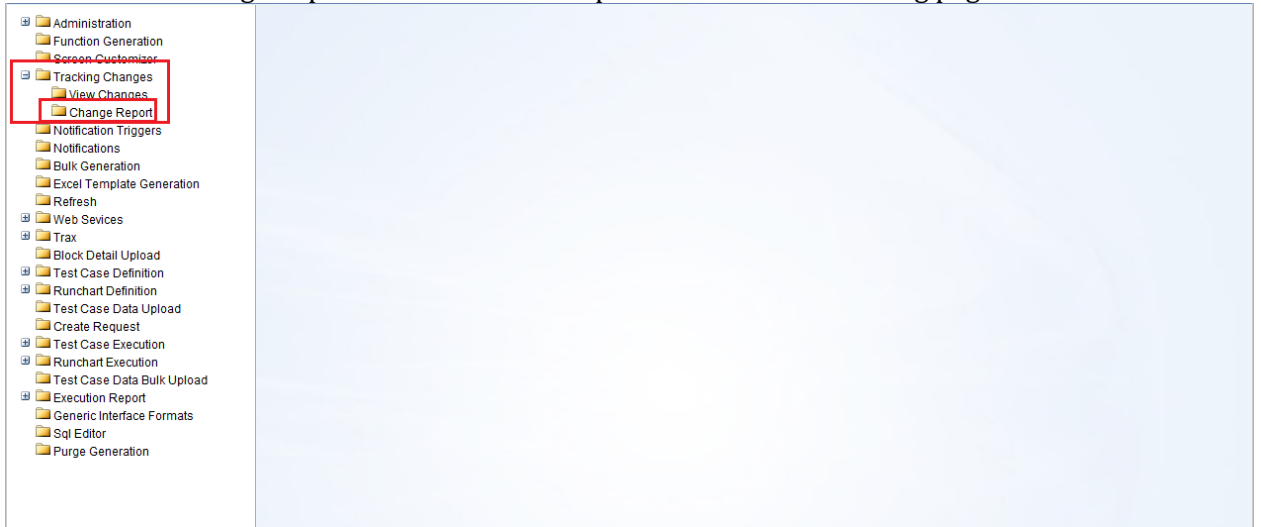


Fig 4.1.1: Development Workbench Landing Page

The following window will be launched

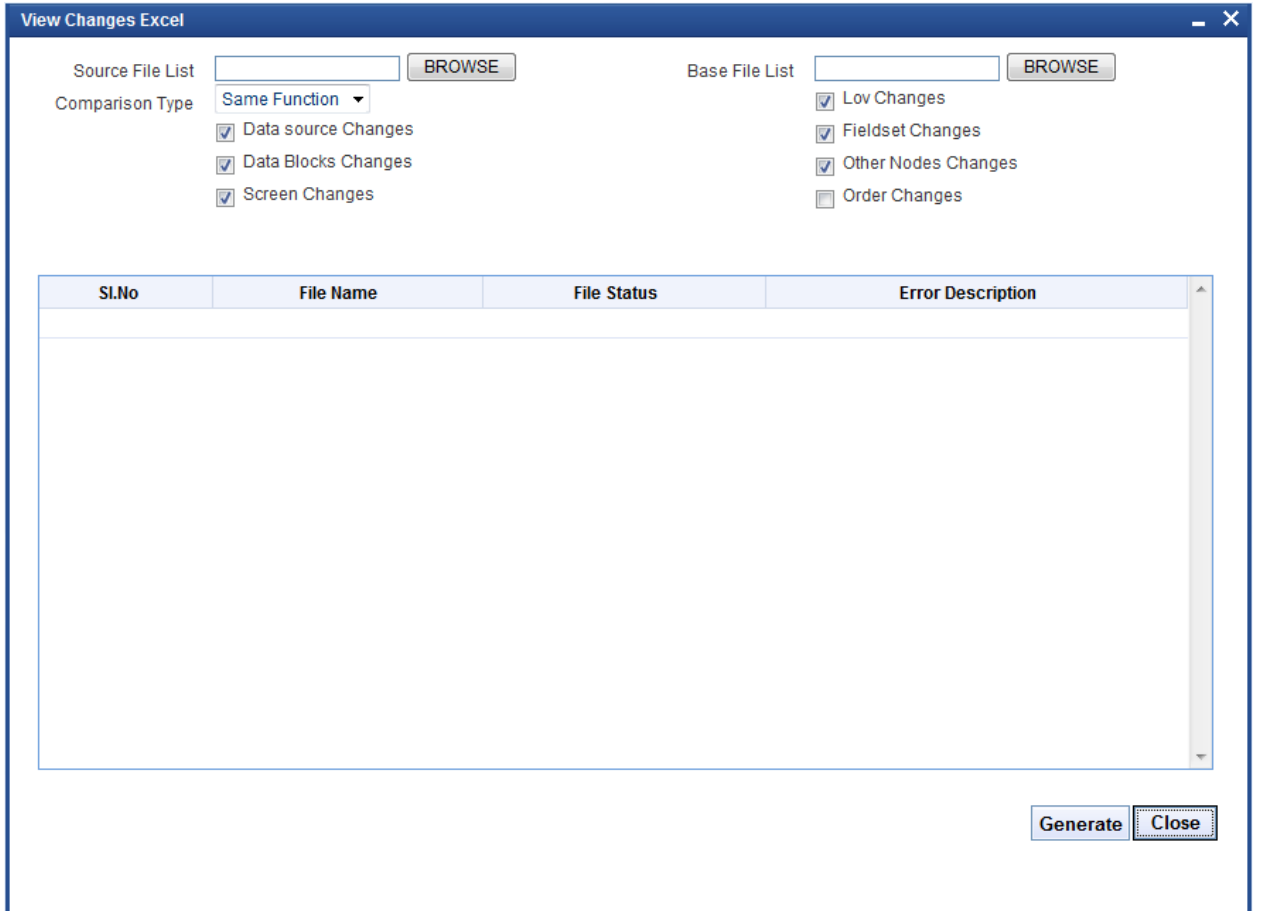


Fig 4.1.2: Development Workbench View Changes Report Screen

**Source File List:** Browse and select the text file containing source file list.

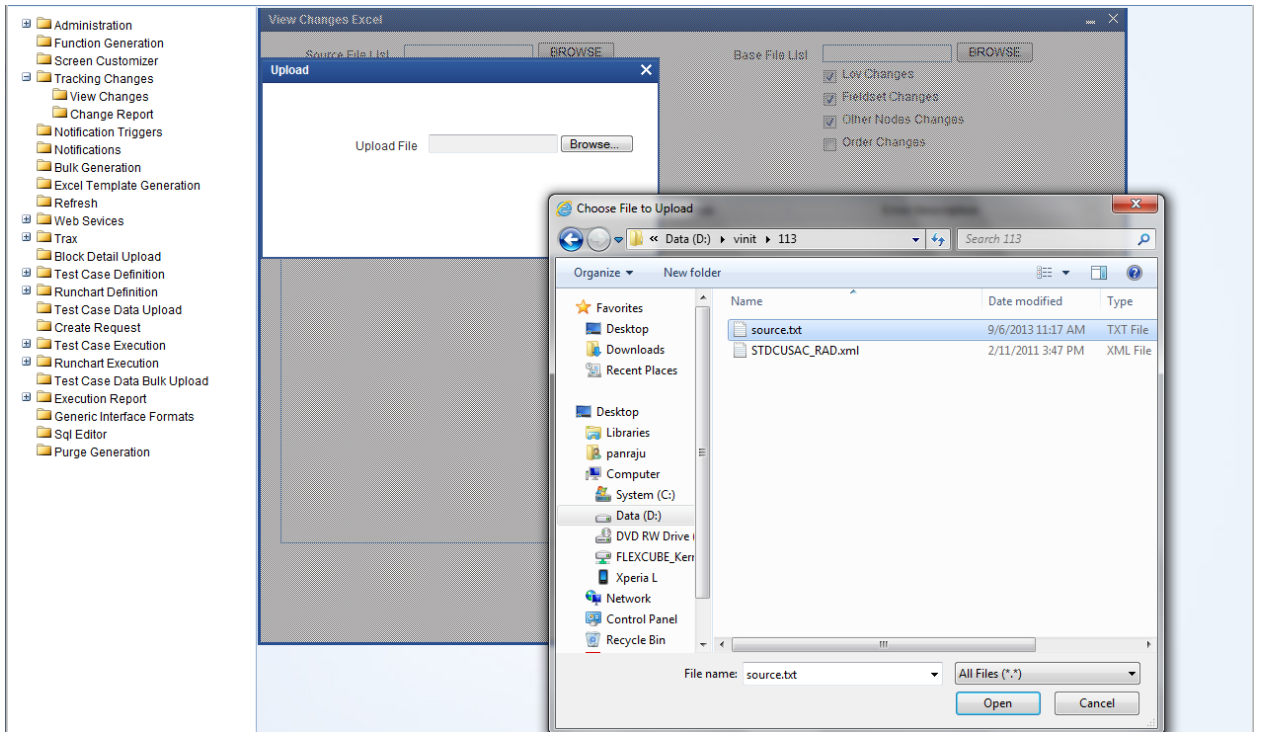


Fig 4.1.3: Selecting source file list text file for View Changes Report

Source File list is a text file which contains the absolute path of all the radxml's to be compared.

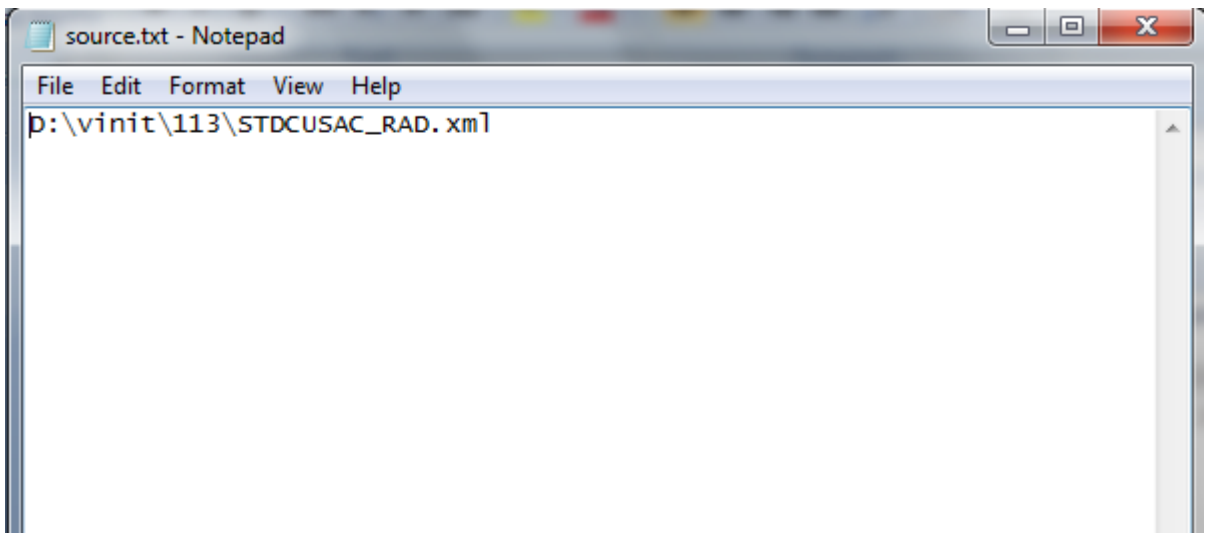


Fig 4.1.4: Content of source.txt file

The figure above shows the content of the source.txt file .Here STDCUSAC is the source radxml which has to be compared.

If View Changes Report of more than one function\_id is required, absolute path of each radxml has to be specified; each in a new line

**Base File List:** Browse and select the text file containing base file list

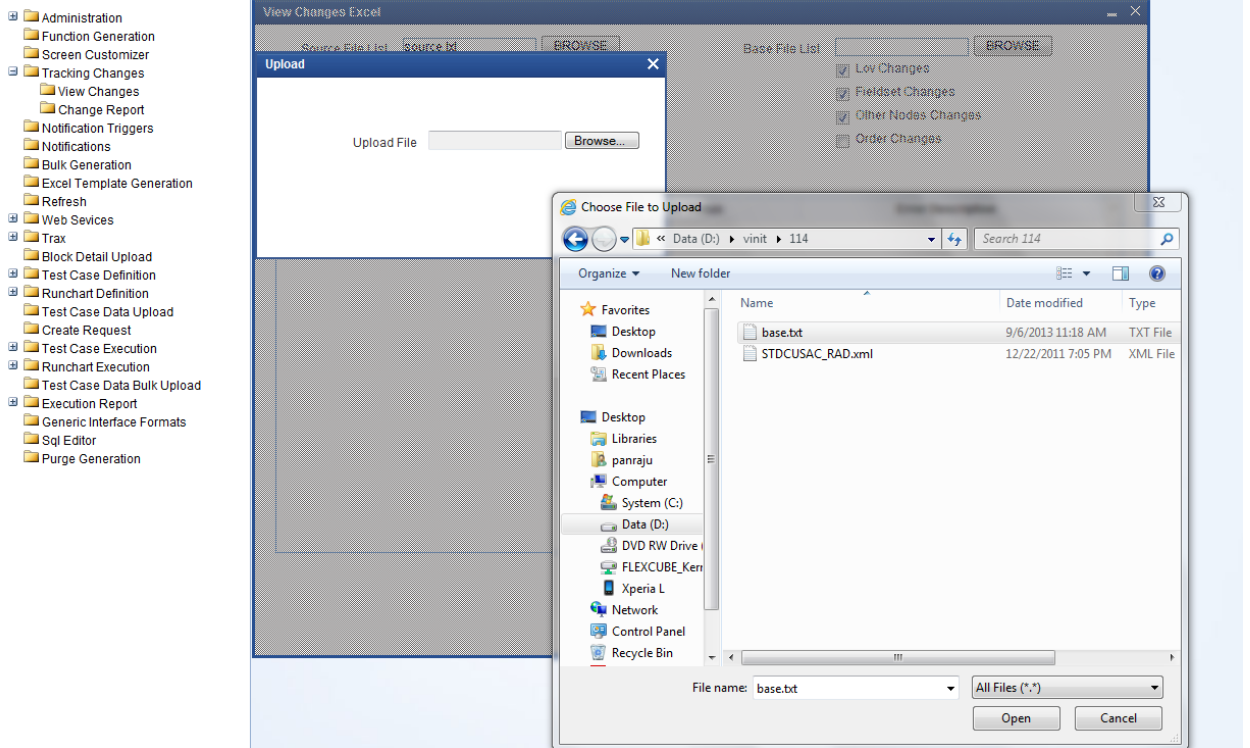


Fig 4.1.5: Selecting base file list text file for View Changes Report

Base File list is a text file which contains the absolute path of all the base radxml's to be Compared (here STDCUSAC is the base radxml)

If View Changes Report of more than one function\_id is required, absolute path of each base radxml has to be specified; each in a new line

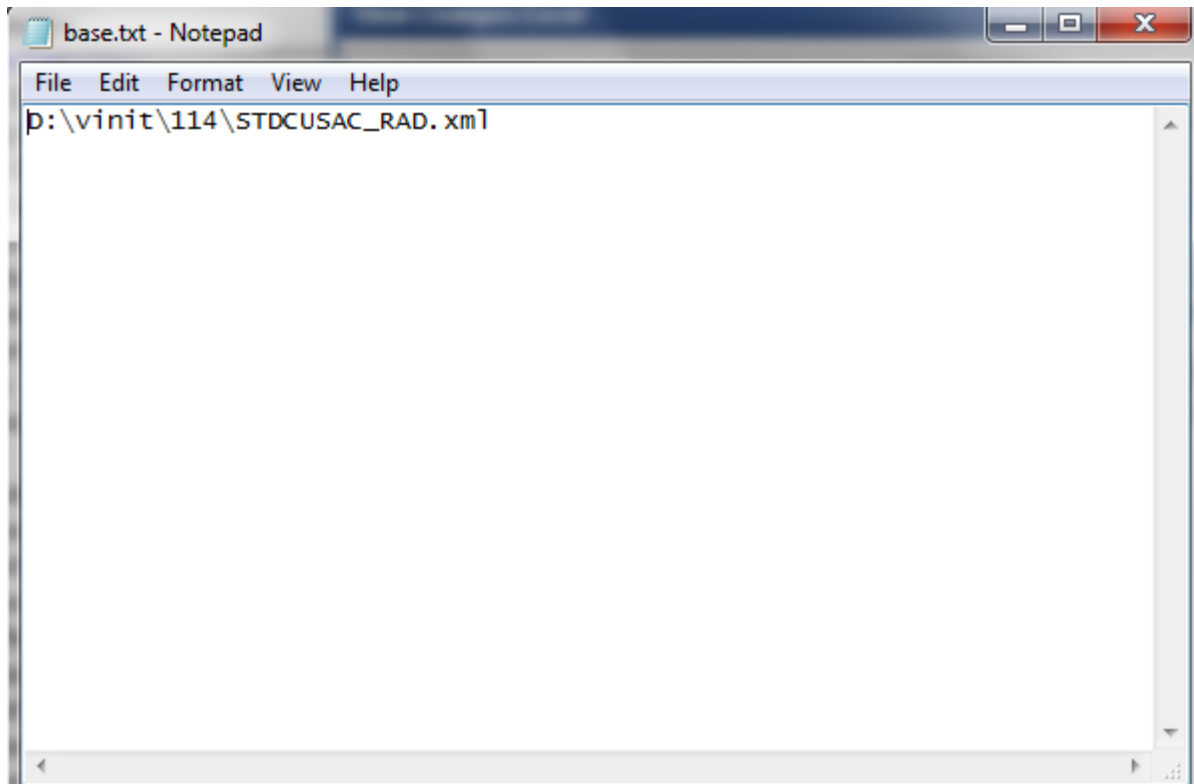


Fig 4.1.6: Content of base.txt file

**File Location:** Choose file location as client if the path provided is in the client machine.

**Comparison Type:** Choose Comparison type as Function Specific.

**Select Changes:** Check if required to compare the selected nodes also.

Click on Generate button on lower left portion of the screen and wait for the system to do the process.

Process time will vary depending on the number of files provided, size of each files etc

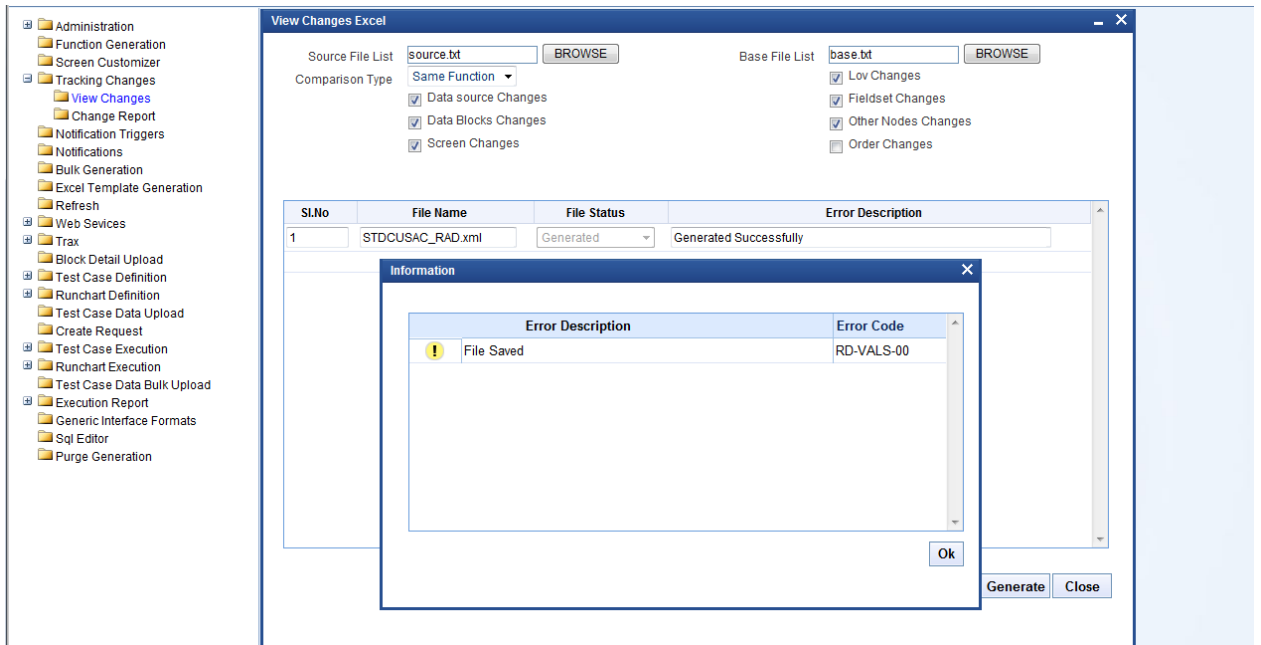


Fig 4.1.7: File Status after View Changes Report

After Completion of the process, status will be shown in the screen. File status will be generated successfully if comparison is successful.

**Generated Files:**

- 1) **Excel Report of Changes:** A war file named RAD will be created and will be shown after successful process of comparing, which will contain Excel files for the particular source radxml's.

PANDETIP\_FRONTEND\_LOG.txt

- 2) **Log Files :** Following log files will be generated

**i) View Comparison Log:** This contains the status of all the files Compared.

**ii) View Comparison Report:** This file can be used for troubleshooting.

All the nodes will be compared and will be painted in the excel sheet based upon the values of base and source list of radxml's, the values will be having 3 statuses

**NEW, MODIIFED, DELETED.**

Based on this status old and new values will be shown in the view changes report.

**4.2 Functionality Demonstration**

In the above View Changes Report process, **STDCUSAC** is compared with the latest **STDCUSAC**. The figure below shows the comparison of **STDCUSAC (FCUBS\_11.3.0)** and **STDCUSAC (FCUBS\_11.4.0)**.

**This source is part of the FLEXCUBE Software System and is copyrighted by Oracle Financial Services Software Limited.**

**All rights reserved. No part of this work may be reproduced, stored in a retrieval system, adopted or transmitted in any form or by any means, electronic, mechanical, photographic, graphic, optic recording or otherwise, translated in any language or computer language, without the prior written permission of Oracle Financial Services Software Limited.**

**Oracle Financial Services Software Limited.**

**10-11, SDF I, SEEPZ, Andheri (East),**

**Mumbai -400096.**

**India.**

**Copyright 2008-2010 by Oracle Financial Services Software Limited. All rights reserved.**

Fig 4.2.1: STDCUSAC screen copy right clause.

	SOURCE	BASE
FUNCTION_ID	STDCUSAC	STDCUSAC
RELEASE_CODE	FCUBSV.UM 11.2.0.0.0.0.0	FCUBS_11.4.0
RELEASE_TYPE	KERNEL	KERNEL
FUNCTION_TYPE	P	P
FUNCTION_CATEGORY	MAINTENANCE	MAINTENANCE

Fig 4.2.2: STDCUSAC screen Header.

# PREFERENCES

STATUS	PREFERENCES	PROPERTIES	OLD VALUE	NEW VALUE
MODIFIED	MENU			
		TXN BLOCK NAME	BLK_CUST_ACCOUNT	
		TXN FIELD NAME	BRN	
		MULTI BRANCH ACCESS	Y	

STATUS	MENU_DETAILS	PROPERTIES	OLD VALUE	NEW VALUE
MODIFIED	STDCUSAC			
		LBL FUNCTION DESC		LBL_STDCUSAC_FNDESC
		FUNCTION DESC		Customer Accounts
		LBL FUNC MODULE DESC		Maintenance
				LBL_STDCUSAC_MODULE
MODIFIED	STSCUSAC			-
		LBL FUNCTION DESC		LBL_STSCUSAC_FNDESC
		FUNCTION DESC		Customer Accounts
		LBL FUNC MODULE DESC		Summary
				LBL_STSCUSAC_MODULE
				-

Fig 4.2.3: STDCUSAC screen Preferences changes from previous release screen

The change report will compare the two function ids and will paint the excel sheet in the format above represented for the preferences node of the radxml's compared. Preferences will show the difference in the both versions of the releases. The nodes representing here are

**(PREFERENCES, MENU\_DETAILS)**



## Description:

change Report will compare two radxml's and will form one Dom which will have the nodes which will have the diff between two radxml's which has old value and new value.

Here in preferences, the status is the nodes are modified and the node modified is preferences the property of that node modified is Txn block name Old value is block\_cust\_account no and new value is null ,STDCUSAC (FCUBS\_11.3.0) radxml has no value and STDCUSAC (FCUBS\_11.4.0) has block\_cust\_account as Txn block Similarly for the other screens also the values will be painted as below fig.

## DATASOURCES

1	A	B	C	D	E	F	G	H
1	STATUS	DATASOURCES	PROPERTIES	OLD VALUE	NEW VALUE			
2	MODIFIED	ICTMS_ACC_PR		prod IN (SELECT product_code FROM ictms_product_definition WHERE product_type in ('T', 'P'))	prod IN (SELECT product_code FROM ictms_product_definition WHERE product_type = 'T')			
3			DEFAULT WHERE					
4	MODIFIED	ACVWS_CRTUR_LMT_BAL		LIMIT_PRD = (SELECT LIMIT_PRD FROM STTM_TURNOVER_PERIODS WHERE LIMIT_CODE = p_wrk_stdcusac.v_sttms_cust_account.TRNOVER_LMT_CODE AND to_date(global.application_date) BETWEEN LIMIT_START_DATE AND LIMIT_END_DATE)	LIMIT_PRD = (SELECT LIMIT_PRD FROM STTM_TURNOVER_PERIODS WHERE LIMIT_CODE = p_stdcusac.v_sttms_cust_account.TRNOVER_LMT_CODE AND to_date(global.application_date) BETWEEN LIMIT_START_DATE AND LIMIT_END_DATE)			
5			DEFAULT WHERE					
6			DATASRC TYPE	NORMAL				
7			CHILD DATASRC	N				
8						STATUS	COLUMNS	PROPERTIES
9						DELETED	BRANCH_CODE	OLD VALUE
10								COLUMN NAME
11								DATATYPE
12								MAX LENGTH
13								BLOCK NAME
14						DELETED	CUST_AC_NO	BLK_STTMS NKAGES
15								COLUMN NAME
16								DATATYPE
17								MAX LENGTH
18								BLOCK NAME
19						DELETED	COLLATERAL_TYPE	BLK_STTMS NKAGES
20								COLUMN NAME
21								DATATYPE
22								MAX LENGTH
23								BLOCK NAME
24						DELETED	COLLATERAL	BLK_STTMS NKAGES
25								COLUMN NAME
26								DATATYPE
27								MAX LENGTH

Fig 4.2.4: STDCUSAC screen Data Sources changes from previous release screen

The change report will compare the two function ids and will paint the excel sheet in the format above represented for the Data Sources node of the radxml's compared. Data Sources will show the difference in the both versions of the releases. The nodes representing here are

**(DATASOURCES, COLUMNS)**

Order Changes:

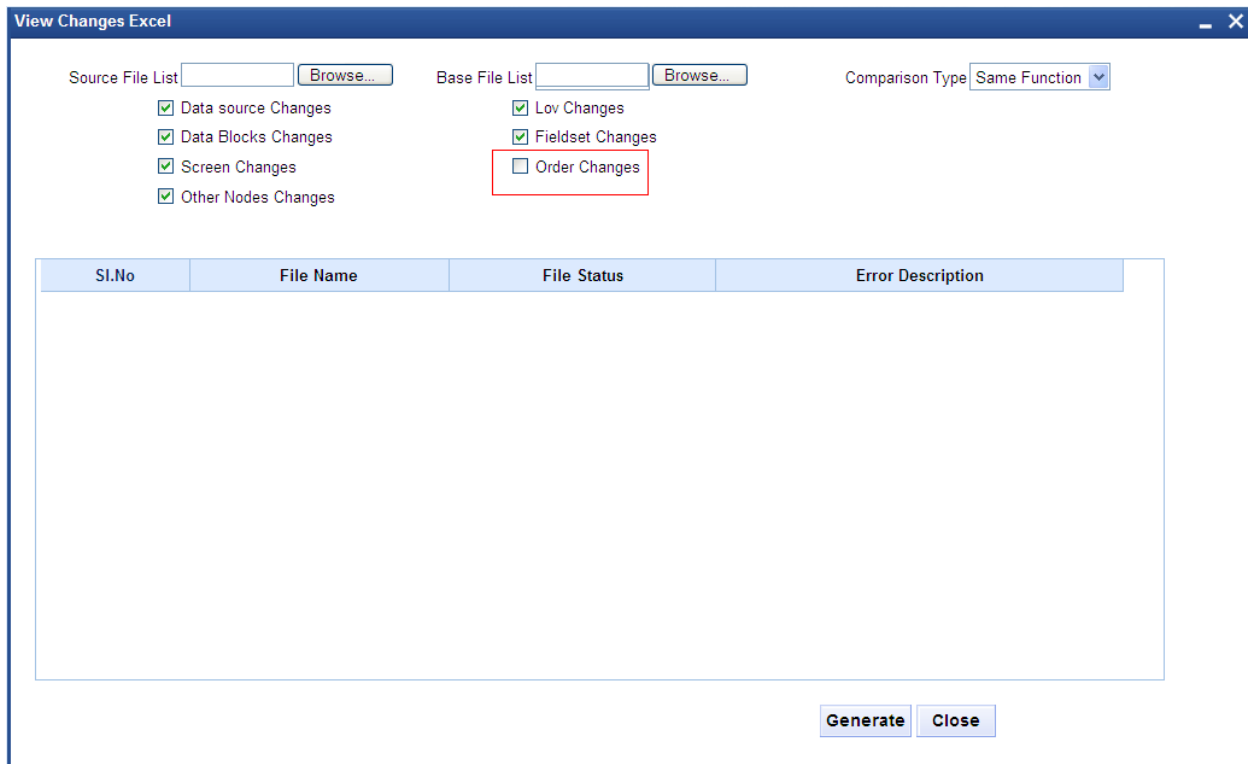


Fig 4.2.5: order changes in change report screen

On click of this order changes the nodes will also be compared for the order maintained in the radxml of respective releases. Mainly order changes will affect 3 nodes

**FIELD\_ORDER, FIELDSET\_ORDER, TAB\_ORDER, SEC\_ORDER, DATA\_BLK\_ORDER, BLK\_FIELD\_ORDER**

All the orders will be compared between sources and base radxml's and will be painted in the excel as below fig

One such example Comparing two radxml's with order changes required in the screen the comparison will include the above nodes in comparing the two radxml's.

### Order Changes screen for fieldsets:

STATUS	FIELDSETS	PROPERTIES	OLD VALUE	NEW VALUE
MODIFIE	FST_REVOLVING_LOAN	FIELDSET_SECTION	SEC_PREF1	SEC_PREF4
		FIELDSET_PARTITIO	SEC_PART3	SEC_PREF4_PART
		FIELDSET_VISIBLE	Y	N
		FIELDSET_ORDER	59	0
MODIFIE	FST_PRD			
MODIFIE	FST_RML			

STATUS	FIELDSET_FIELDS	PROPERTIES	OLD VALUE	NEW VALUE
MODIFIED	LEASE_TYPE	ACTIVE	Y	N
		FIELD_ORDER	8	0
STATUS	FIELDSET_FIELDS	PROPERTIES	OLD VALUE	NEW VALUE
NEW	ROLLALWD	FIELD_NAME		ROLLALWD
		ACTIVE		Y
		FIELD_ORDER		2
NEW	PRDTYPE	FIELD_NAME		PRDTYPE
		ACTIVE		Y
		FIELD_ORDER		3

Fig 4.2.6: order changes painted in excel sheet in change report screen



Development Workbench - Tracking Changes  
[February] [2024]  
Version 14.7.3.0.0

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, 2024, 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.