

SAP IMPLEMENTATION

FUNCTIONAL SPECIFICATION



CIAL_SAP_MM_FS_20_INBOUND PO DETAILS

PREPARED BY



ABBREVIATIONS

ABBREVIATION	DESCRIPTION
CIAL	Cochin International Airport Ltd.

DOCUMENT REFERENCES

DOCUMENT	DOCUMENT NAME

CHANGE HISTORY

AUTHOR	CREATION DATE	VERSION	STATUS	CHANGES
Dayanandan	01.04.2014	1.0	Created	
AMENDED BY	DATE	VERSION	STATUS	

DISTRIBUTION

COMPANY	NAME	ROLE	ACTION	INFO
CIAL			X	
TCS			X	

REVIEW

COMPANY	NAME	DATE	SIGNATURE
CIAL			

SIGNOFF

COMPANY	NAME	DESIGNATION	SIGNATURE
CIAL			

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1.OBJECTIVE

To receive data from website in a specified format and to process and store these data in SAP

- *Report*
- *Interfaces*
- *Conversions*
- *Enhancements*
- *Forms*
- *Workflow*

SCOPE

This development is to create a data base for storing approved measurement details from CIAL website to SAP ECC and also to create PO and GR.

This interface is used to send approved measurement details from CIAL website to SAP ECC. Vendors enter the measurement details against rate contract in CIAL website which will go through two levels of approval either by CIAL personnel or external agency as the case may be. Once the measurement is finally approved at website it will be flagged as approved at database level. The measurement details are fetched by SAP PI and send to SAP for creating PO in SAP MM.

1.1 Assumptions

1.2 Exclusion

N/A

2. DEVELOPMENT DETAILS

2.1 Program Details

FS Description	Inbound PO Details		
Object Owner	Dayanandan	Date raised	01.04.2014
Complexity	Medium	Expected date	/ /
SAP Module	MM	Dev. object type	Interface
SAP Std modified	<input type="checkbox"/>	Oss note	
New Program	<input checked="" type="checkbox"/>	Copy from existing program	
Sap Existing Name		Existing T. code	
Type of Program	<input checked="" type="checkbox"/> Foreground	<input type="checkbox"/> Background	
(The section below will be completed by the Technical team)			
New Name		Transaction code	

3.REPORTS

*Note: This section should be filled out for each relevant component.
This section may be marked N/A if it is not relevant.*

3.1 Input

3.1.1 Selection Parameters

3.2 Processing Logic Overview

3.3 Output

3.3.1 Report Output Fields

3.3.2 Report Layout

3.4 Constraints

4.FORMS

*Note: This section should be filled out for each relevant component.
This section may be marked N/A if it is not relevant.*

4.1 Input

4.1.1 Selection Parameters

Table 1: Selection Parameters for Forms

Field Text	SAP Table Field Reference	Sel. Type (SO/PA/RB/ CB)	Def Value	Mandatory	Comments <If any>
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Field Text	SAP Table Field Reference	Sel. Type (SO/PA/RB/ CB)	Def Value	Mandatory	Comments <If any>

4.2 Processing Logic Overview

4.3 Form Layout

*Note: This section should be filled out for each relevant component.
This section may be marked N/A if it is not relevant.*

Output format (Form Layout) as mentioned below.

Table 2: Form Details

Printing Requirements (mandatory for programs that produces a hard copy)	Type of Printer (Forms)	
	<input type="checkbox"/> Dot Matrix <input type="checkbox"/> Laser /Desk Jet/Zebra	
	Type of Paper Printout (Forms)	
	<input type="checkbox"/> Pre-printed form <input type="checkbox"/> Regular Paper (as designed in the layout)	
	Paper Design (only for Forms)	
	Size of Paper	A4
	Orientation	<input type="checkbox"/> Portrait <input type="checkbox"/> Landscape
	Logo	<input type="checkbox"/> To be added
Form Layout (this should be an inserted file as an ICON that contains the output display of the program - e.g. excel sheet format)		

5.CONVERSIONS

5.1 Data System/Data Flow Diagram

5.2 Type of Data to be Converted

5.3 Logical Data Element Mapping

5.4 Historical Data

6.INTERFACES

6.1 Input

Service Interface Name: Website_To_SAP_PurchaseOrderDetails

6.1.1 Interface Parameters

Table :1-Message structure from CIAL website

Column/ Data Element	Description	Data Type	Format	Optional / Required
CONTRACT_NO	Contract Number	char 10		Required
MID	Measurement Id	char 10		Required
SNO	Serial Number	int	IDENTITY COLUMN	Required
CNTRCT_ITEM_NO	Contract item number	nvarchar 5		Required
CNTRCT_ITM_SHORT_TEXT	Short text	char 40		Required
CNTRCT_ITM_LONG_TEXT	Long text	Char 4000		Optional
LOCATION	Location for which measurement is captured	varchar 25		Optional
COST_CENTER	Cost Center	char 10		Optional
ACCOUNT	G/L Account	char 10		Optional
INVEST_ORDR_NO	Investment Order Number	char 12		Optional
ACT_START_DATE	Actual start date of work	date	YYYY-MM-DD	Required
ACT_END_DATE	Actual end date of work	date	YYYY-MM-DD	Required
FORMULA	Formula to be applied on measurement	char 255		Optional
PARAMETERS	Parameters and values separated by suitable separator	char 500		Optional

Column/ Data Element	Description	Data Type	Format	Optional / Required
NO_OF_UNITS	Number of similar measurements	int		Optional
MEASURED_QTY	Measurement quantity	int		Required
FILENAME	Name of the attachment	varchar 200		Optional
DOC_DATE	Document Date	date		Required
POST_DATE	Posting Date	date		Required
COMMENTS	Text for comments	varchar 4000		Optional
CNTRCT_ITM_REF_TEXT	Reference Text	varchar 40		Optional
ENG_IN_CHARGE	Engineer In Charge	char 100		Required
FINAL_APPROVER	Final approver	char 100		Required
SAP_FLAG	Flag for selection	char 2	NULL – Fresh record 0 – Denotes an approved rate contract to be picked by PI 1 – Denotes an approved rate contract picked by PI	Required

6.2 Process/Data Flow Diagram

Once the measurement details are approved at CIAL website, SAP PI will process the data from source system based on the scheduled poll interval using JDBC adapter; transform data as per SAP MM requirement and sends to target system using ABAP proxy

6.3 Logical Data Element Mapping

Table:2 Message structure for SAP

Column/ Data Element	Description	Data Type	Format	Optional / Required
ZMBOOKID	Measurement Id	char10		Required
EVRTN	Contract Number	char 10		Required
SNO	Serial Number	numc 12		Required
EVRTP	Contract item number	numc 5		Required
KTEAT1	Short text	char 40		Required
SGTXT	Long text	char 4000		Optional
ZLOC	Location	char 25		Optional
KOSTL	Cost Center	char 10		Optional
HKONT	G/L Account	char 10		Optional
AUFNR	Investment Order Number	char 12		Optional
DATS	Actual start date of work	date 8		Required

Column/ Data Element	Description	Data Type	Format	Optional / Required
DATS	Actual end date of work	dates 8		Required
ZFRMLA	Formula	char 255		Optional
ZPARAM	Parameters	char 500		Optional
ZNUM	Units of similar measurement	char 10		Optional
MENGE	Quantity for each measurement recording	quan 13		Required
ZFNAM	File Name	char 60		Optional
BLDAT	Document Date	Dats 8		Required
BUDAT	Posting Date	Dats 8		Required
SGTXT	Text for comments	char 4000		Optional
SGTXT	Reference text	char 40		Optional
ZEIC	Engineer In Charge	char100		Required
ZFINAPRVR	Final approver	char 100		Required

6.4 Business Process Specifications

7.WORKFLOW

7.1 Process/Data Flow Diagram

7.2 Roles and Responsibilities

8.ENHANCEMENTS

8.1 Process Flow Diagram

8.2 Enhancement Specifications

A custom table is to be maintained to capture details for the incoming details of GR from website. The mapping of data element of incoming details from website to the custom table in SAP is given below

Incoming details from website

Custom table in SAP

CONTRACT_NO	ZMBOOKID
MID	EVRTN
SNO	SNO
CNTRCT_ITEM_NO	EV RTP
CNTRCT_ITM_SHORT_TEXT	KTEAT1
CNTRCT_ITM_LONG_TEXT	SGTXT
LOCATION	ZLOC
COST_CENTER	KOSTL
ACCOUNT	HKONT
INVT_ORDR_NO	AUFNR
ACT_START_DATE	DATS
ACT_END_DATE	DATS
FORMULA	ZFRMLA
PARAMETERS	ZPARAM
NO_OF_UNITS	ZNUM
MEASURED_QTY	MENGE
FILENAME	ZFNAM
DOC_DATE	BLDAT
POST_DATE	BUDAT
COMMENTS	SGTXT
CNTRCT_ITM_REF_TEXT	SGTXT
ENG_IN_CHARGE	ZEIC
FINAL_APPROVER	ZFINAPRVR

9. ADDITIONAL INFORMATION

9.1 Volume and Frequency

9.2 Authorizations

9.3 Error Handling Specifications

9.4 Additional Security Considerations

List any security considerations that are different than that specified in Section 1.4 or are not covered in Section 1.4.

10. UNIT TEST CASE SCENARIOS

Table 3: Test Case Scenarios

Case Scenario	Description
Case 1	

A Appendix

B Naming Conventions

Document Naming Convention: CIAL_DT_<Module Name>_<Description>.doc

Module Name - Functional Work stream. Example, For FICO Functional specification, <Module Name> should be FI.

- FI = Finance
- MM = Procurement
- PP = Manufacturing
- SD = Sales & Distribution
- HR = Human Resource
- PM = Maintenance
- PS = Project System
- WM = Warehouse Management
- DMS = Document Management System
- EHS = Environment Health & Safety

DT- Document Type indicator, in this case it is FS (Functional Specification).