# ReadSoft Supplier Portal Synchronizer for PROCESS DIRECTOR Accounts Payable

Installation and Configuration Guide Version: 7.4

Date: 2020-02-04



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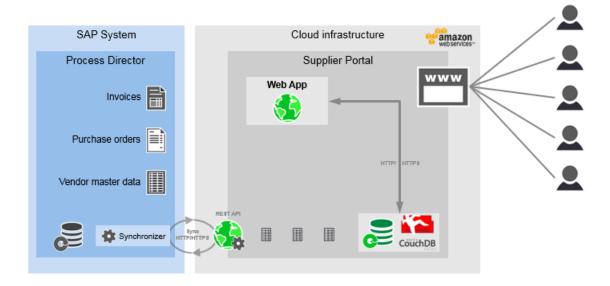
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# **Preface**

Kofax ReadSoft Supplier Portal Synchronizer for PROCESS DIRECTOR Accounts Payable<sup>™</sup> is responsible for sending and receiving data from an Enterprise Resource Planning (ERP) system to Kofax ReadSoft Supplier Portal<sup>™</sup>. ReadSoft Synchronizer is located inside the ERP system and calls out to ReadSoft Supplier Portal to begin its work.



The synchronization is always initiated from ReadSoft Synchronizer in the SAP systems. All connections are outbound. No port needs to be open for an inbound connection to the SAP systems. The synchronization can be configured to use either SSL or plain HTTP. For security reasons, it is recommended to use SSL.

Synchronizer activity is categorized by document type.

- Invoices (document originates from the ERP system)
- Incoming invoices (document originates from ReadSoft Supplier Portal)
- · Purchase orders (document originates from the ERP system)
- Vendor master data (data originates from the ERP system)
- Vendor master change request (data originates from ReadSoft Supplier Portal)

## About this guide

This guide explains how to install and configure ReadSoft Synchronizer to enable the synchronization of documents between ReadSoft Supplier Portal and the ERP system.

# Get started

# Synchronization

When first implementing ReadSoft Supplier Portal, a one-time initial synchronization needs to be executed in order to bring invoices, purchase orders, and vendor master data from the SAP system into ReadSoft Supplier Portal.

The recommended order for the initial synchronization is as follows.

- 1. vendor master data
- 2. purchase orders
- 3. ReadSoft PROCESS DIRECTOR Accounts Payable documents

After this initial synchronization, any subsequent synchronization runs are incremental. Incremental synchronization offers selection criteria that are different from those for the initial synchronization.

To detect the changes for a specific object type, incremental synchronization runs use the synchronization markers of previous incremental synchronization runs.

## **Transport Control Program**

The Transport Control Program (TP) is a utility for controlling transports between SAP systems and for upgrading SAP releases.

TP, a Transport Management System (TMS) feature available as of SAP Basis version 702, compares the component version of the transport that is released with the component version of the system to which the transport is going to be imported. If the versions differ, the difference is highlighted in the import queue (STMS IMPORT transaction).

Note You can turn off the check for the component versions by setting the SP\_TRANS\_SYNC transport parameter to OFF. To add this parameter, in the domain controller, go to STMS > Systems Overview > <SID> . Then, on the Transport Tool tab, in change mode, add the SP\_TRANS\_SYNC parameter.

## Synchronization markers

A synchronization marker is an entry that is calculated based on the selection screen, with the timestamp of the last synchronization run. Subsequent incremental synchronization runs will use this timestamp to reduce the amount of data to be synchronized.

Every object type has its own synchronization marker. Whenever the selection screen is adjusted, a new synchronization marker is calculated. An empty filter hash field indicates the default selection screen in which no additional filters were applied.

Synchronization markers are used for both types of synchronization runs.

- After the initial synchronization run, synchronization markers need to be manually generated for the process types that were synchronized.
  - For more information, see Generate initial synchronization markers.
- If an incremental synchronization run fails with the Last incremental run for XY not found message, or if an additional incremental synchronization run is necessary for a specific time frame, existing synchronization markers can be edited.

For more information, see Edit the synchronization markers.

#### Generate initial synchronization markers

To generate the synchronization markers after the initial synchronization, complete the following steps.

- 1. Go to the /COCKPIT/GC SYNC transaction.
- **2.** Under **Synchronization**, select the check boxes for the process types that you included in the initial synchronization run.
- **3.** In the transaction code field, enter %SYNCMARK\_ADD.
- **4.** In the Enter date for sync mark generation dialog box, enter the date of the initial synchronization run and click the **Continue** ✓ button.
- 5. To check if the synchronization markers have been correctly set, go to the /COCKPIT/GC\_C4 transaction.

#### Edit the synchronization markers

If an incremental synchronization fails, you can manually add or correct the required synchronization markers.

- 1. In the IMG, on the Supplier Portal Customizing menu, click Manage.
- 2. Next to the Edit synchronization markers entry, click the IMG Activity button.
- 3. In the Supplier Portal incremental synchronization window, click the **Display -> Change** button.
- 4. In change mode, click **New Entries**.
- **5.** Add the synchronization markers, as required. For a detailed description of each parameter, see Edit synchronization markers in the IMG reference.
- **6.** Click the **Save** | button.

# View release information

To view information about the installed ReadSoft Synchronizer version, complete the following steps.

- 1. Go to the  $/ \texttt{COCKPIT}/\texttt{GC\_SYNC}$  transaction.
- 2. Click the Release notes 1 button.

# Install ReadSoft Synchronizer

ReadSoft Synchronizer can be installed on any ERP system with SAP Basis version 620 or higher and having the latest supported ReadSoft PROCESS DIRECTOR Accounts Payable version installed (/ COCKPIT/VER transaction).

- 1. Go to the STMS transaction.
- 2. In the Transport Management System, import the transport request.
- 3. Ideally, the component versions of the source and target systems should match. If the versions differ, the difference is highlighted in the import queue (STMS\_IMPORT transaction) by the Transport Control Program (TP). You then have the following options.
  - If you still want to import the transport request, upon importing, on the Options tab, select Ignore
    invalid component version. If you do not select this option, the import displays a warning
    message about the difference in the SAPCOMPONENT versions.
  - If you perform the import using the command line, you can use the mode u4. For example: tp import <TR> <SID> u4.
  - You can limit the check for certain components. Please see SAP Note 1742547 under the Configuration: Component inclusion and exclusion section. SAP Note 1756116 corrects a program error with that function.
- 4. Complete the post installation
- 5. Install certificates

### Complete the post installation

To complete the post installation, complete the following steps.

- **1.** Perform an initial consistency check to validate the current installation, using the /COCKPIT/ GC RICK transaction.
- 2. If required, create the missing object and subobject. For more information see Create the object and subobject.
- 3. If required, create the missing indexes. For more information, see Create an index.
- 4. Implement the required EMEIC corrections to ReadSoft PROCESS DIRECTOR Accounts Payable.

#### Create the object and subobject

When using the application log, ReadSoft Synchronizer program requires a certain object and subobject in the SLG0 transaction. For more information, see *SAP Note 1706526 - Missing APPLOG in transaction CRIT*. As of version R69, the objects are delivered.

If the object and subobject are missing, you need to create them by completing the following steps.

1. Go to the SLGO transaction.

- 2. In change mode, click New Entries.
- 3. In the Overview of Added Entries window, complete the following substeps.
  - As the **Object**, enter /COCKPIT/GC SYNC.
  - As the **Object text**, enter ReadSoft Supplier Portal Synchronizer.
- **4.** Click the **Save** | button.
- **5.** Select the newly created entry.
- 6. Double-click the Sub-objects dialog structure menu.
- **7.** In the Sub-objects window, complete the following substeps.
  - As the Subobject, enter /COCKPIT/GC SYNC DOC.
  - As the Sub-object text, enter Documents.
- 8. Click the Save | button.

#### Create an index

The ReadSoft Synchronizer program requires a specific indexing in the CDHDR table.

For more information about index creation in the CDHDR table, see the following SAP Notes.

- 573864 CD: Select in CDHDR, without an index
- 856624 Indexes for the CDHDR table (SAPKB62050/51, SAPKB64011)
- 884534 CD: Two CDHDR table indexes, with the "no database index" option
- 1271166 CD: CHANGEDOCU WRI performance selection control parameter

**Note** Index creation is not required on an SAP HANA system.

To create an index, complete the following steps.

- 1. Go to the SE11 transaction.
- 2. In the CDHDR table, create an index for the following fields, as described in the SAP Note 573864.
  - MANDANT
  - OBJECTCLAS
  - UDATE
  - UTIME (optional)

This index is shipped by SAP with the ERP 6.0 EHP5 release, as CDHDR~003. If you have ERP 6.0 EhP5 or a higher release, make sure that the CDHDR~003 index in the CDHDR table is active in DDIC and the database.

#### Install certificates

ReadSoft Synchronizer requires a secure connection to ReadSoft Supplier Portal. To ensure a correct ReadSoft Synchronizer operation, the SAP system requires that a proper certificate chain be established to validate the security certificate in use.

To install certificates using the Trust Manager, complete the following steps.

1. Go to the STRUST transaction.

- 2. Double-click the SSL client SSL Client (Standard) node.
- 3. Under **Certificate**, import the certificate by completing the following substeps.
  - a. Click the **Import certificate** Note button.
  - **b.** In the Import Certificate window, on the **File** tab, select the certificate file that you want to import.

**Note** In the case of cloud-delivery solutions, two certificates are used - the readsoftdev.com certificate for the development (DEV), quality assurance and test (QAT) instances, and the readsoftonline.com certificate for the production instance (PRD).

- c. Click the **Input** ✓ button.
- d. Click the Add to Certificate List 🐺 button.

# Configure ReadSoft Synchronizer

You need to configure the synchronization parameters as well as the logic according to which the synchronization between the ERP system and ReadSoft Supplier Portal is executed.

1. Open the IMG using the /COCKPIT/GC CI transaction.

Note You can also go to the /COCKPIT/GC SYNC transaction and click Setup.

- 2. To successfully run ReadSoft Synchronizer, you need to configure at least the basic settings by completing the following substeps.
  - a. Define the connection parameters
  - b. Define invoice settings
  - c. Define purchase order settings
  - d. Define vendor master data settings
  - e. Define master data change request settings
  - f. Define the upload object types
- **3.** Optional. Adjust the standard synchronization of document types to development classes. For more information, see Redefine document type references.
- **4.** Optional. If Supplier Portal notes should be used, register the vendors who should be able to receive such notes. For more information, see Register portal suppliers.

# Define the connection parameters

To define the connection parameters, complete the following steps.

- 1. In the IMG, on the Supplier Portal Customizing menu, click Basic settings.
- 2. Next to the **Define connection** entry, click the **IMG Activity** 🕒 button.
- 3. In the Supplier Portal connection window, click the **Display -> Change** button.
- 4. In change mode, click New Entries.
- **5.** Define the connection parameters. For a detailed description of each parameter, see to Define connection in the IMG reference.
- **6.** Optional. To test the connection, click the **Connection test 4** button.
- 7. Click the Save | button.

## Define invoice settings

Different note types are supported for ReadSoft PROCESS DIRECTOR Accounts Payable invoices.

To define the note type to be used, complete the following steps.

- 1. In the IMG, on the Supplier Portal Customizing menu, click Basic settings.
- 2. Next to the **Define IV settings** entry, click the **IMG Activity** 🕒 button.
- 3. In the PROCESS DIRECTOR AP settings window, click the **Display -> Change** button.
- 4. In change mode, under PROCESS DIRECTOR AP, select the type of note that should be supported.
  - To support ReadSoft Supplier Portal notes, select the SuppPort note check box.
  - To support WEB BOARD notes, select the WEB BOARD note check box.

**Note** WEB BOARD notes are required only if the customer is moving from WEB BOARD to ReadSoft Supplier Portal. For new installations, it is recommended that you use ReadSoft Supplier Portal notes.

5. Click the Save | button.

## Define purchase order settings

To define the purchase order settings, complete the following steps.

- 1. In the IMG, on the Supplier Portal Customizing menu, click Basic settings.
- 2. Next to the **Define PO settings** entry, click the **IMG Activity** button.
- 3. In the Purchase order settings window, click the **Display -> Change** button.
- 4. In change mode, under Purchase order settings, define the following parameters.
  - The SAP Purchase Order Version Management enables you to generate and manage versions of purchase requisitions and external purchasing documents, such as purchase orders (POs). If you activated SAP Purchase Order Version Management, select the **Version Mngt** check box.
  - The SAP Purchase Order Release provides a number of options to control the approval (release)
    of purchase orders. If you are using the SAP Purchase Order Release Procedure, select the
    Release Proc check box.
- 5. Click the Save | button.

#### Define vendor master data settings

The masking of vendor master bank data can be activated or deactivated.

To define the masking of vendor master bank data, complete the following steps.

- 1. In the IMG, on the Supplier Portal Customizing menu, click Basic settings.
- 2. Next to the **Define MA settings** entry, click the **IMG Activity (L)** button.
- 3. In the Vendor master data settings window, click the **Display** -> **Change** button.

- **4.** During synchronization, bank data can be protected by masking it. Only the last four digits of the bank number will then be visible in ReadSoft Supplier Portal. If you want the bank data to be masked, in change mode, under **Vendor master data settings**, select the **Mask values** check box. **Example** 12345678 is displayed as \*\*\*\*5678; 123456 is displayed as \*\*\*4567.
- 5. Click the Save | button.

# Define master data change request settings

To define the mapping from ReadSoft Supplier Portal to the Kofax ReadSoft PROCESS DIRECTOR<sup>TM</sup> master, complete the following steps.

**Prerequisite**: Before you set up the mapping, you need to set up a vendor master configuration in /EBY/PDBOC. For more information, see the *PROCESS DIRECTOR Configuration Guide*.

- 1. In the IMG, on the **Supplier Portal Customizing** menu, click **Basic settings**.
- 2. Next to the **Define MC settings** entry, click the **IMG Activity** button.
- 3. In the Vendor master change request settings window, click the **Display -> Change** button.
- 4. In change mode, click **New Entries**.
- **5.** Under **Vendor master change request**, configure the mapping from ReadSoft Supplier Portal to the ReadSoft PROCESS DIRECTOR vendor master. For a detailed description of each configuration parameter, see Define MC settings in the IMG reference.
- **6.** If the ReadSoft Supplier Portal environment does not exist yet in ReadSoft PROCESS DIRECTOR, complete the following substeps.
  - Go to the /EBY/PDBOC transaction and create a new environment called SP Supplier Portal.
  - Create an external data model for the newly created environment. For details about the model, see External data model.

**Note** For an example of a possible mapping, see Example mapping.

7. Click the Save | button.

#### External data model

Origin	Node ID	Parent	Logical level
SP (Supplier Portal)	SINGLEITEM		HEADER
SP (Supplier Portal)	BANKDATA	SINGLEITEM	BANK

#### **Example mapping**

Origin	Map ID	Node ID	Parent	Logical level	Field name	External field name
SP	<mapid></mapid>	SINGLEITEM	1	HEADER	ACTIVITY	ACTIVITY
SP	<mapid></mapid>	SINGLEITEM	1	HEADER	ANRED	TITLE
SP	<mapid></mapid>	SINGLEITEM	1	HEADER	BUKRS	COMP_CODE

Origin	Map ID	Node ID	Parent	Logical level	Field name	External field name
SP	<mapid></mapid>	SINGLEITEM	1	HEADER	KTOKK	ACCOUNT_ GROUP
SP	<mapid></mapid>	SINGLEITEM	1	HEADER	LAND1	COUNTRY_ KEY
SP	<mapid></mapid>	SINGLEITEM	1	HEADER	LIFNR	VENDOR_NO
SP	<mapid></mapid>	SINGLEITEM	1	HEADER	NAME1	NAME1
SP	<mapid></mapid>	SINGLEITEM	1	HEADER	ORT01	CITY
SP	<mapid></mapid>	SINGLEITEM	1	HEADER	PSTLZ	POSTCODE
SP	<mapid></mapid>	SINGLEITEM	1	HEADER	SORT1	SEARCH_ TERM1
SP	<mapid></mapid>	SINGLEITEM	1	HEADER	STRAS	STREET_NO
SP	<mapid></mapid>	BANKDATA	SINGLEITEM	BANK	BANKL	BANK_KEY
SP	<mapid></mapid>	BANKDATA	SINGLEITEM	BANK	BANKN	BANK_ACCT
SP	<mapid></mapid>	BANKDATA	SINGLEITEM	BANK	BANKS	BANK_CTRY
SP	<mapid></mapid>	BANKDATA	SINGLEITEM	BANK	BUKRS	COMP_CODE
SP	<mapid></mapid>	BANKDATA	SINGLEITEM	BANK	LIFNR	VENDOR
SP	<mapid></mapid>	BANKDATA	SINGLEITEM	BANK	WAERS	WAERS

# Define the upload object types

You need to activate the document types that are to be transferred from ReadSoft PROCESS DIRECTOR Accounts Payable to ReadSoft Supplier Portal, and from invoices/credits in ReadSoft Supplier Portal to ReadSoft PROCESS DIRECTOR Accounts Payable.

To define the upload types, complete the following steps.

- 1. In the IMG, on the Supplier Portal Customizing menu, click Basic settings.
- 2. Next to the **Define upload** entry, click the **IMG Activity**  $\bigoplus$  button.
- 3. In the Supplier Portal archive object window, click the **Display -> Change** button.
- 4. In change mode, click **New Entries**.
- **5.** Enter the parameters necessary to activate the document types. For a detailed description of each parameter, see Define upload in the IMG reference.

Note The same settings need to be made on the ReadSoft Supplier Portal side.

6. Click the Save | button.

# Register the attachment types

To process attachments, you need to register them, as well as assign them to document types.

To register the attachment types, complete the following steps.

- 1. In the IMG, on the Supplier Portal Customizing menu, click Advanced settings.
- 2. Next to the Register attachment type entry, click the IMG Activity ( button.
- 3. In the Supplier Portal archive object window, click the Display -> Change by button.
- 4. In change mode, click New Entries.
- **5.** Set up the mapping of the document types to the corresponding object types. For a detailed description of each parameter, see Register attachment type in the IMG reference.
- **6.** Click the **Save** | button.

## Configure user exits

User exits enable customers to add their own functionality, without modifying the standard program.

For more information on developing and working with user exits, refer to the following guides:

- PROCESS DIRECTOR Advanced Configuration Guide
- PROCESS DIRECTOR Accounts Payable Configuration Guide

To configure a user exit, complete the following steps.

- 1. In the IMG, on the **Supplier Portal Customizing** menu, click **Advanced settings**.
- 2. Next to the Configure user-exit entry, click the IMG Activity ( button.
- 3. In the Synchronizer user-exit window, click the Display -> Change by button.
- 4. In change mode, click New Entries.
- **5.** Set up the mapping of the function names to the corresponding object types. For a detailed description of each parameter, see Configure user-exit in the IMG reference.
- 6. Select the Active check box to activate the user exit.
- 7. Click the Save | button.

#### User exit for filtering document lists

You can configure a user exit to filter the document lists selected for processing in ReadSoft Synchronizer. This user exit can be used to define custom parameters for the required filtering.

The function module template for the user exit is /COCKPIT/GC EXAMPLE FILTER.

## Redefine document type references

The standard synchronization of document types to development classes can be replaced with a custom synchronization.

To redefine document types to reference custom development classes, complete the following steps.

- 1. In the IMG, on the Supplier Portal Customizing menu, click Advanced settings.
- 2. Next to the **Redefine document type** entry, click the **IMG Activity** 🕒 button.
- 3. In the Supplier Portal Redefine document type window, click the **Display -> Change** button.
- 4. In change mode, click New Entries.
- **5.** Set up the mapping of document types to custom development classes. For a detailed description of each parameter, see Redefine document type in the IMG reference.

**Note** If, within the ReadSoft Supplier Portal configuration, you redefine the standard class to a custom class in order to map custom or more fields than those in the standard, you need to add those fields to the view.

6. Click the Save | button.

# Register portal suppliers

If it should be possible to send Supplier Portal notes to Supplier Portal vendors, you need to register the vendors who should be able to receive such notes.

Prerequisite: You activated Supplier Portal notes in the COCKPIT/GC C8 transaction.

- 1. In the IMG, on the Supplier Portal Customizing menu, click Manage.
- 2. Next to the Registered Portal Suppliers entry, click the IMG Activity 🕒 button.
- 3. In the Registered Portal Suppliers window, click the Display -> Change by button.
- 4. In change mode, click **New Entries**.
- **5.** Enter the data of the vendors that you want to register. For a detailed description of each parameter, see Registered Portal Suppliers
- **6.** Click the **Save** | button.

# Synchronize search helps

In most cases, you need to make adjustments in ReadSoft Supplier Portal to support the search help. Before synchronizing the search help to determine if it is supported in the standard ReadSoft Supplier Portal configuration, consult with your Kofax representative.

To create, update, and delete search helps in ReadSoft Supplier Portal, complete the following steps.

- 1. Go to the /COCKPIT/GC SRCHHELP transaction or the /COCKPIT/GC SEARCHHELP program.
- **2.** In the Synchronize searchhelp window, under **Destination**, select the connection from the / COCKPIT/GC C1 transaction.
- **3.** Under **Selection**, define the parameters, as required. Then, select the radio button to decide whether you want to create, update, or delete a search help.
- 4. Under Logging, define the parameters that are required to activate logging.
- 5. Under **Debugging**, define the parameters that are required to activate debugging.

# Selection parameters

Parameter	Description
Object type	<ul> <li>II = Incoming invoice</li> <li>IV = PROCESS DIRECTOR Accounts Payable</li> <li>MA = Master data</li> <li>PO = Purchase order</li> </ul>
Header field	Header field in ReadSoft Supplier Portal
Table name	DDIC table name for the data table

# Logging parameters

Parameter	Description
Parameters	Print all the used parameters in a log
Log level	<ul> <li>0 = Abort</li> <li>1 = Error</li> <li>2 = Production (default, recommended)</li> <li>3 = Performance</li> <li>4 = Warn</li> <li>5 = Info</li> <li>6 = Debug</li> </ul>
Verbose	Print additional information like timestamp and message class
Statistics	Print statistics at the end of the log

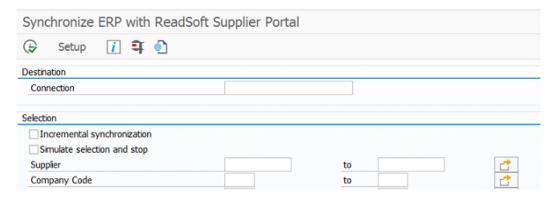
# Debugging parameters

Parameter	Description
Debug mode (synchron)	Deactivate parallel task execution (available only for the /COCKPIT/GC_SYNC transaction)
Verbose	Print additional information like timestamp and message class
Dump HTTP requests	Activate the dump of HTTP requests
Path for HTTP dump files	Path for the HTTP dump files

# Run ReadSoft Synchronizer in SAP

After you configured ReadSoft Synchronizer, you need to execute a one-time initial synchronization between ReadSoft Supplier Portal and SAP. After this initial synchronization, you need to execute incremental synchronization runs only.

Go to the /COCKPIT/GC\_SYNC transaction.
 The Synchronize ERP with ReadSoft Supplier Portal screen opens

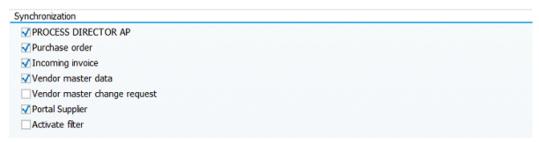


- **2.** Under **Destination**, to establish a connection to ReadSoft Supplier Portal, select the connection you set up using the /COCKPIT/GC C1 transaction.
- 3. Configure the attachment types that need to be synchronized.
- **4.** Under **Selection**, define the selection parameters, as required.

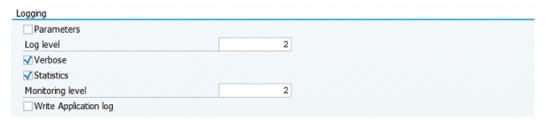


If you want to execute an initial synchronization run, make sure that the **Incremental synchronization** check box is cleared.

**5.** Under **Synchronization**, define the synchronization parameters, as required.



6. Optional. Under Logging, define the logging and monitoring parameters, as required.



7. Optional. Under **Debugging**, select the parameters that are required to activate debugging.

Debugging	
Debug mode (synchron)	
Display document IDs	
Verbose	
Dump HTTP requests	
Path for HTTP dump files	

8. To execute the synchronization run, click the **Execute**  $\oplus$  button.

**Note** For incremental synchronization runs, if no synchronization markers have been created, an error message will be displayed. In this case, you have to edit the synchronization markers as described in Edit the synchronization markers.

- **9.** After an initial synchronization, you need to generate the initial synchronization markers for the process types that you synchronized. For details, see Generate initial synchronization markers.
- **10.** Schedule the incremental synchronization runs as a periodical job. Use the same parameters as for the initial synchronization, but select the **Incremental synchronization** check box.

## Selection parameters

Parameter	Description
Incremental synchronization	Defines the synchronization run as an incremental run.

Parameter	Description	
Simulate selection and stop	Runs a selection query that presents a report on the number of documents that will be synchronized.	
	<b>Note</b> The synchronization run is simulated only, no actual synchronization is taking place. It is recommend that you perform such a run before a big initial synchronization to check how many documents will be processed.	
Supplier	Limit the selection to the supplier in ReadSoft PROCESS DIRECTOR Accounts Payable/purchase order/master data.	
Company Code	Limit the selection to the company code in PD AP/ purchase order.	
Account group	Limit the selection to the account group in PD AP/ purchase order/master data.	
Order Type	Limit the selection to the order type of the purchase order.	
PROCESS DIRECTOR doc. type	ReadSoft PROCESS DIRECTOR Accounts Payable document types. See the PROCESS DIRECTOR Accounts Payable Configuration Guide for more details.	
No. of parallel processes	The number of parallel processes running at the same time; maximum 2.	
Max. No. of Objects	The number of objects that are processed in a single task.	

# Synchronization parameters

# Synchronization

Following are the basic synchronization parameters.

Parameter	Description
PROCESS DIRECTOR AP	<ul> <li>Document type to be synchronized.</li> <li>II = Incoming invoice</li> <li>IV = PROCESS DIRECTOR Accounts Payable</li> <li>MA = Master data</li> <li>MC = Master data change request</li> <li>PO = Purchase order</li> </ul>
Purchase order	Synchronize purchase orders with ReadSoft Supplier Portal.

Parameter	Description
Incoming invoice	Synchronize new invoices in ReadSoft Supplier Portal with ReadSoft PROCESS DIRECTOR Accounts Payable.
Vendor master data	Synchronize vendor master data with ReadSoft Supplier Portal.
	Note Synchronizing vendor master data between ReadSoft PROCESS DIRECTOR and ReadSoft Supplier Portal is possible only if the Master Data Maintenance process type license has been activated in ReadSoft PROCESS DIRECTOR.
Vendor master change request	Synchronize vendor master change requests from ReadSoft Supplier Portal, with the vendor master in ReadSoft PROCESS DIRECTOR.
	Note This check box is available only if, in the /COCKPIT/GC_C11 transaction, the vendor master change request object type has been configured accordingly.
Portal Supplier	Synchronize registered Supplier Portal vendors.
Activate filter	Displays additional sections in which to set up the filter criteria for the synchronization of the corresponding document types.
	<b>Note</b> This check box is not available if, under Selection, the Incremental synchronization check box is selected.

#### PROCESS DIRECTOR AP

Following are the additional filter parameters for the ReadSoft PROCESS DIRECTOR Accounts Payable document type.

Parameter	Description
Document number	Document number (DOCNO)
Document date	Document date (DOC_DATE)
Creation date	Creation date (CR_TIMESTAMP)

#### Purchase order

Following are the additional filter parameters for the Purchase order document type.

Parameter	Description
Purchasing document	Purchasing document

Parameter	Description
Order type	Order type
Document date	Document date

## Incoming invoice

Following is the additional filter parameter for the incoming invoices document type.

Parameter	Description
Vendor	Vendor number

#### Vendor master data

Following are the additional filter parameters for the vendor master data document type.

Parameter	Description
Supplier	Supplier number
Account group	Account group
Include deleted records	Includes deleted records

# Logging parameters

Parameter	Description
Parameters	Print all the used parameters in a log
Log level	<ul> <li>0 = Abort</li> <li>1 = Error</li> <li>2 = Production (default, recommended)</li> <li>3 = Performance</li> <li>4 = Warn</li> <li>5 = Info</li> <li>6 = Debug</li> </ul>
Verbose	Print additional information like timestamp and message class
Statistics	Print statistics at the end of the log

Parameter	Description
Monitoring level	To acquire additional logging information sent from the Synchronizer to ReadSoft Supplier Portal, in the Monitoring level text box, enter a monitoring level.  • 0 - Off: Switches off monitoring  • 1 - Basic: Sends simple information about the synchronization  • 2 - Document: Sends back an additional table with information of each document status.  The information is connected with the logging information in ReadSoft Supplier Portal.  Note Monitoring is available for incremental synchronization runs only. For initial synchronization runs, the sending of monitoring documents is switched off.
Write Application log	If you want to create a basic application log with additional logging information, select the Write Application Log check box.  Note To view this log, go to the SLG1 transaction.

# Debugging parameters

Parameter	
Debug mode (synchron)	Deactivate parallel task execution (available only for the /COCKPIT/GC_SYNC transaction)
Display document IDs	Display log information about the documents that have been selected for synchronization in the simulation mode
Verbose	Print additional information like timestamp and message class
Dump HTTP requests	Activate the dump of HTTP requests
Path for HTTP dump files	Path for the HTTP dump files

# Commands

Following are the commands that are available for the  $/\texttt{COCKPIT/GC\_SYNC}$  transaction.

Command	Description
%DUDE	Hides the Debugging section with the expert options.
%EXPERT	Shows the Debugging section with the expert options.

Command	Description
%FILTER_HASH	Shows the current filter hash.
%HELP	Shows the list of available hidden commands.
%SYNCMARK_ADD	Creates a synchronization mark for the current filter hash.

# Check the data consistency

ReadSoft Synchronizer can be used in conjunction with the ReadSoft Supplier Portal database to test, if the synchronization run has selected the correct fields for the synchronization and that the database has properly received the data.

To check for data consistency, complete the following steps.

- 1. Check the field selection
- 2. Check the data

#### Check the field selection

ReadSoft Synchronizer loads fields into a field catalog from the SAP system, and then queries ReadSoft Supplier Portal as to which fields should be synchronized.

To check if the loaded data is consistent, complete the following steps.

- 1. Examine the fields loaded into the field catalog by selecting a document type. Ensure that ReadSoft Synchronizer operates in log level 6 (DEBUG mode).
- Trigger the synchronization on at least one document.The resulting log file shows the fields loaded into the catalog (see Example 1).
- 3. ReadSoft Synchronizer queries the web service of ReadSoft Supplier Portal to determine which fields should be synchronized. To check whether the selection is correct or not, view the log file (see Example 2) and compare its content with the view selection in the database.

Note For the configuration on the ReadSoft Supplier Portal side, contact your Kofax representative.

```
Example 1:

20131218195830,983 d Add to Field catalog: ACCOUNT COMP_CODE
20131218195830,983 d Add to Field catalog: ACCOUNT COPA_ICON
20131218195830,983 d Add to Field catalog: ACCOUNT COSTCENTER

Example 2:

20131218195831,189 d Mapping skip: False /COCKPIT/SHDR_IF -> HEADER VENDOR_NO
20131218195831,189 d Mapping skip: True /COCKPIT/SHDR_IF -> HEADER DIFF_INV
20131218195831,189 d Mapping skip: False /COCKPIT/SHDR_IF -> HEADER PO_NUMBER
```

#### Check the data

To check that the data transmission has been successfully executed without any errors, complete the following steps.

- 1. Examine the source document, either directly on the ERP database or in the TEKKI service transaction in ReadSoft PROCESS DIRECTOR.
- **2.** Compare the source document with the values in the ReadSoft Supplier Portal database after the synchronization.

**Note** You can also use the user interface for further examination and to confirm that the values are correct. However, as some fields are used for logical reasons but do not have a display purpose, the user interface does not show all the synchronized values.

# Background jobs

The following programs can be run as background jobs.

Program	Description
/COCKPIT/GC_SYNCHRONIZER	Used to schedule ReadSoft Synchronizer as a background job.
/COCKPIT/GC_SEARCHHELP	Used to schedule the regular ReadSoft Supplier Portal search help updates as background jobs.
/COCKPIT/GC_DYNAMIC_DISCOUNT	Used to schedule dynamic discounting settings as background jobs.
/COCKPIT/SAP_DOC_IMPORT	Used to import SAP invoices (MM and FI) into ReadSoft PROCESS DIRECTOR Accounts Payable as a background job.

**Note** If you use the SM36 transaction to define background jobs, you can add SAP or email users as spool list recipients. Spool list recipients receive logs for every program run, thus having better control if the job succeeds or fails.

# **IMG** reference

# Basic settings

#### **Define connection**

/COCKPIT/GC\_C1

Parameter	Description
Connection	Name of connection
Destination	Destination of type G (HTTP connections to the external server) in the SM59 transaction  If you enter a destination, you do not need to specify a
	host name, port number and SSL port number.
Host Name	Host name of the ReadSoft Supplier Portal tenant
SSL Port Number	Port number for the secure SSL/TLS connection
Port Number	Port number for the non-secure connection
HTTP Script	URI for web service Usually, supplier-portal/rest/sync
	<b>Note</b> For backward compatibility, the legacy application context name pdweb-idaho is still supported, but rerouted to supplier-portal.
Username	Username for the web service
Password	Password for the web service
ERP sys ID	ERP system ID  If you keep the field empty, the system ID from the SAP system is taken.

# Define IV settings

Parameter	Description
SuppPort note	Determines that ReadSoft Supplier Portal notes are used for ReadSoft PROCESS DIRECTOR Accounts Payable invoices.
	<b>Note</b> To ensure that the Supplier Portal notes reach the intended vendor, it is recommended to register the vendors who should be able to receive notes. For more details, see Register portal suppliers.
WEB BOARD note	Determines that WEB BOARD notes are used for ReadSoft PROCESS DIRECTOR Accounts Payable invoices.
	WEB BOARD notes are required only if the customer is moving from WEB BOARD to ReadSoft Supplier Portal. For new installations, it is recommended that you use ReadSoft Supplier Portal notes.

# Define PO settings

/COCKPIT/GC\_C2

Parameter	Description
Version Mngt	If you activated SAP Purchase Order Version Management, select the Version Mngt check box.
	The SAP Purchase Order Version Management enables you to generate and manage versions of purchase requisitions and external purchasing documents, such as purchase orders (POs).
Release Proc	If you are using the SAP Purchase Order Release Procedure, select the Release Proc check box.
	The SAP Purchase Order Release provides a number of options to control the approval (release) of purchase orders.

# Define MA settings

/COCKPIT/GC\_C12

Parameter	Description
Mask values	During synchronization, bank data can be protected by masking it. Only the last four digits of the bank number will then be visible in ReadSoft Supplier Portal.

# Define MC settings

Parameter	Description
Object type	ReadSoft PROCESS DIRECTOR object type
	For the vendor master change request, it must be MD_VENDOMA (object type for ReadSoft PROCESS DIRECTOR vendor master).
Origin	Origin of the data
	Check in the /EBY/PDBOC transaction to determine which origins are maintained for ReadSoft Supplier Portal.
Mapping ID	The mapping ID used in the /EBY/PDBOC transaction to map the vendor master data from ReadSoft Supplier Portal to ReadSoft PROCESS DIRECTOR.

# Define OR settings

/COCKPIT/GC\_C14

Parameter	Description
Object type	ReadSoft PROCESS DIRECTOR object type
	For the order confirmation request, it must be OR (object type for ReadSoft PROCESS DIRECTOR order confirmations).
Origin	Origin of the data
	Check in the /EBY/PDBOC transaction to determine which origins are maintained for ReadSoft Supplier Portal.
Mapping ID	The mapping ID used in the /EBY/PDBOC transaction to map the order confirmation data from ReadSoft Supplier Portal to ReadSoft PROCESS DIRECTOR.

# Define upload

Parameter	Description
Object type	<ul> <li>II = Incoming invoice</li> <li>IV = PROCESS DIRECTOR Accounts Payable</li> <li>MA = Master data (not yet supported)</li> <li>MC = Master data change request (not yet supported)</li> <li>PO = Purchase order (not yet supported)</li> </ul>
Document type	Any document type from the OAC2 transaction which is set up in use with /COCKPIT/B or /COCKPIT/I, in the OAC3 transaction.

# Advanced settings

# Register attachment type

/COCKPIT/GC\_C16

Parameter	Description
Object type	II Incoming invoice
	IV PROCESS DIRECTOR Accounts Payable
	MA Vendor master data
	<ul> <li>MC Vendor master change request</li> </ul>
	OR Order Confirmation
	PO Purchase order
	SP Portal Supplier
Document type	Use to select the type of document that can be attached and processed for the corresponding object type.

# Configure user-exit

/COCKPIT/GC\_C15

Parameter	Description
Object type	II Incoming invoice
	IV PROCESS DIRECTOR Accounts Payable
	MA Vendor master data
	MC Vendor master change request
	OR Order Confirmation
	PO Purchase order
	SP Portal Supplier
Function name	Use to select the custom function module that can be run for the corresponding object type.
Active	Select this check box to activate the user exit.

# Redefine document type

Parameter	Description
Туре	Object type  II Incoming invoice  IV PROCESS DIRECTOR Accounts Payable  MA Vendor master data  MC Vendor master change request  OR Order Confirmation  PO Purchase order  SP Portal Supplier
Reference to	The custom development class that the object type should reference to.  A custom development class should inherit from the original /COCKPIT/CL_GC_XX_SYNCHRONIZER class where XX is the selected object type.

# Dynamic discounting settings

Dynamic discounting is currently not supported by ReadSoft Supplier Portal.

# Manage

#### Initial consistency check

/COCKPIT/GC\_RICK

## Edit synchronization markers

Parameter	Description
Filter hash	A filter hash is calculated if there is any selection for the incremental synchronization. The empty filter hash is for the default selection screen.
Туре	The document type.  II = Incoming invoice  IV = PROCESS DIRECTOR Accounts Payable  MA = Master data  MC = Master data change request  PO = Purchase order
Marker	The synchronization marker.

## Edit error queue

/COCKPIT/GC\_C9

Parameter	Description
Filter hash	A filter hash is calculated if there is any selection for the incremental synchronization. The empty filter hash is for the default selection screen.
Туре	The document type.  II = Incoming invoice  IV = PROCESS DIRECTOR Accounts Payable  MA = Master data  MC = Master data change request  PO = Purchase order
Number	The dispatcher number
Counter	The number of attempts in the last synchronization run.
Taskname	The number of the task in the synchronization run.
State	The synchronization status.  O Ready  Temporally error  Skipped  OUpdated  Tereated  Tereated  Tereated  Tereated  Tereated  Tereated
Message text	The text of the message.
Time stamp	Start timestamp of the synchronization run.
Time stamp	Stop timestamp of the synchronization run.

# Registered Portal Suppliers

Parameter	Description
Company Code	The company code of the vendor.
Vendor	The vendor number.
E-Mail Address	The email address of the vendor.

#### Appendix A

# **Troubleshooting**

## Connection problems

If it is not possible to connect to ReadSoft Supplier Portal, either using the SM59, or the /COCKPIT/GC C1 transaction, you have several troubleshooting options.

- In the STRUST transaction, check if the correct certificate is in place. For more information, see Install certificates.
- Check if a proxy is in place and requires user authentication.
- Change the port from 443 to 80.
- In the SE37 transaction, use the HTTP\_GET function module for a connection test (http://{sp-url}/checkHealth).

## Synchronization issues

If the customer reports an issue with the synchronization in SAP, you can check the log files for possible causes.

- 1. Go to the SLG1 transaction.
- 2. Select a date range for the /COCKPIT/GC\_SYNC object and the /COCKPIT/GC\_SYNC\_DOC sub-object.
- 3. Click the Execute (b) button.
- 4. Analyze the displayed log files.

#### "Last incremental run for XY not found" error

If the Last incremental run for XY not found error message is displayed, you need to manually create a synchronization marker. For more information, see Generate initial synchronization markers.

## HTTP errors

HTTP error	Possible cause
401 403	The user is not authorized. In ReadSoft Supplier Portal, check the user credentials and the user settings.
407	A proxy authentication is required. Check with the local
408	IT team.  The request has timed out, possibly due to a slow
	connection. Check with the local IT team.
5xx	Usually indicates that ReadSoft Supplier Portal has a technical issue. Check with SP Operations.
Other	Needs to be investigated on a case by case basis.

## Edit the error queue

The error queue displays the documents that failed to synchronize. These documents will be processed again in another incremental synchronization.

To edit the list of documents in the error queue, complete the following steps.

- 1. In the IMG, on the **Supplier Portal Customizing** menu, click **Manage**.
- 2. Next to the Edit error queue entry, lick the IMG Activity (1) button.
- 3. In the Supplier Portal error queue window, click the **Display -> Change** button.
- 4. In change mode, click **New Entries**.
- **5.** Edit the document list, as required. For a detailed description of each parameter, see Edit error queue in the IMG reference.
- **6.** Click the **Save** | button.