

ASF 3.3 with CICS Document Connect for ASF

Installation on AIX Server
Using WebSphere Application Server V6

Server-to-Host Connection using
CICS Transaction Gateway

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1 Prerequisites

1. WebSphere Application Server (WAS) V6 has been installed, is operational, and has been started.

Note: The installation path is assumed to be
`/usr2/WebSphere/AppServer60`

2. IBM HTTP Server (Version 1.3.26, or later) has been installed, is operational, and has been started.

Note: The installation path is assumed to be
`/usr/IBMHttpServer1328`

3. The CICS Transaction Gateway (Version 5.1 or later) has been installed on z/OS and the connections to the host (CICS) are available. The CICS ECI Resource Adapter (cicsecl.rar file coming with the CICS Transaction gateway) is available on AIX.

4. Document Connect for ASF (DC4ASF) war file has been downloaded.

Note: The path where the war file `dc4asf.war` resides is assumed to be
`/usr/swrepository/dc4asf/was60/war/1.2.2.1/`

2 Installation of the application

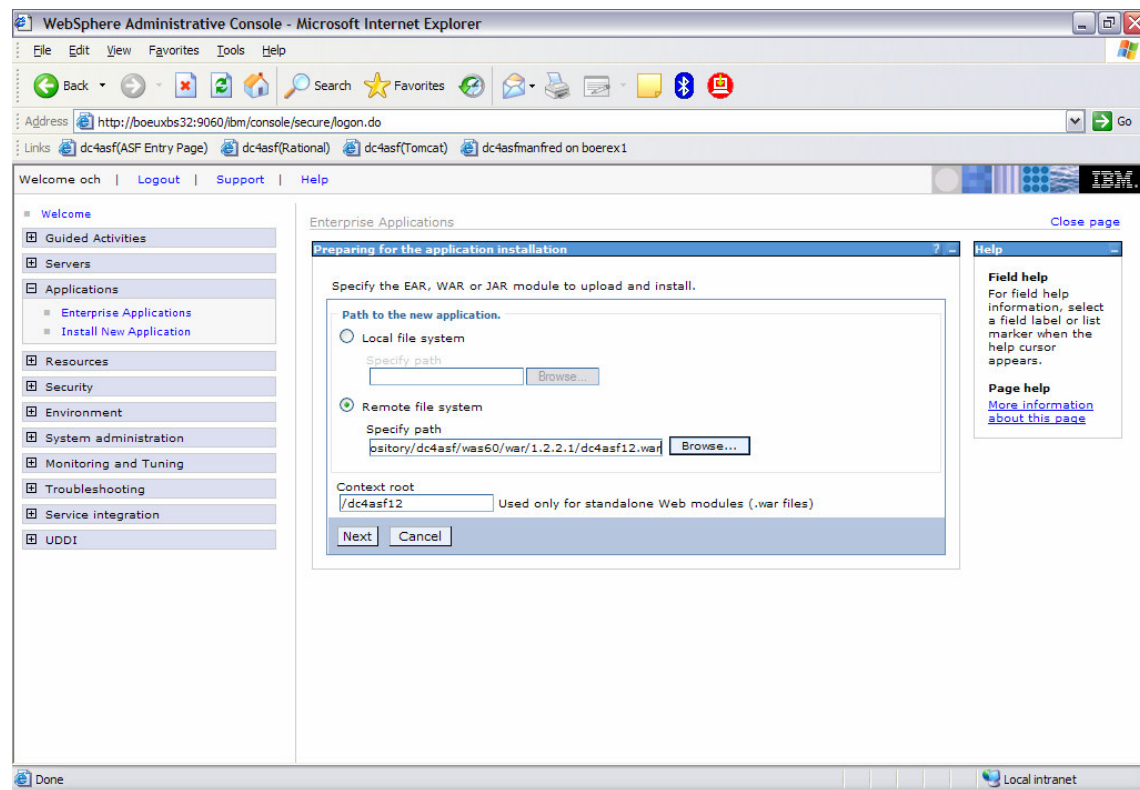
Preparing for the application installation

Open [Application](#) > [Install New Application](#)

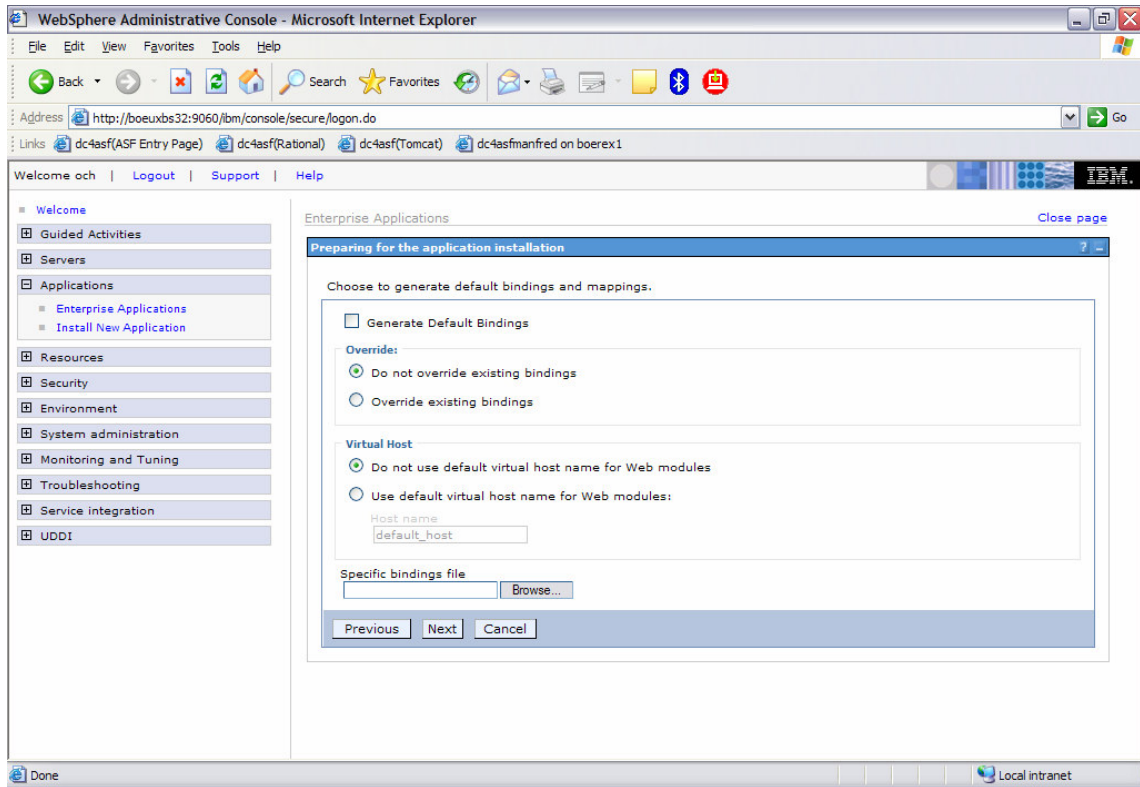
Enter the path where the DC4ASF war file is located:

`/usr/swrepository/dc4asf/was60/war/1.2.2.1/dc4asf12.war`

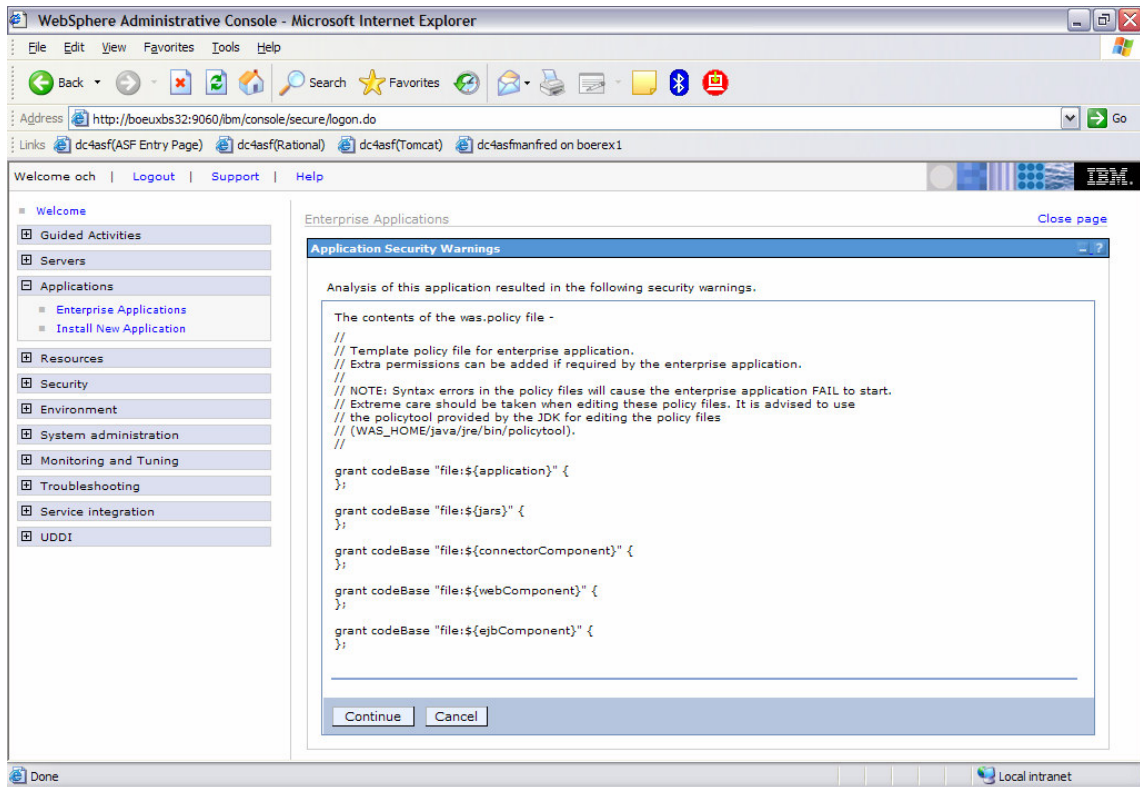
Enter the context root, for example “/dc4asf12”



Select [Next](#). The file “dc4asf12.war” is now loaded on the server.



Select [Next](#).



Select [Continue](#).

Install new application (Step 1)

Fill in the required fields (installation directory, application name, class reloading).

[Directory to install application:](#)

If you do not enter an installation directory, WAS will install the application under the default directory:

APP_INSTALL_ROOT/xxxxx/dc4asf12.ear

where

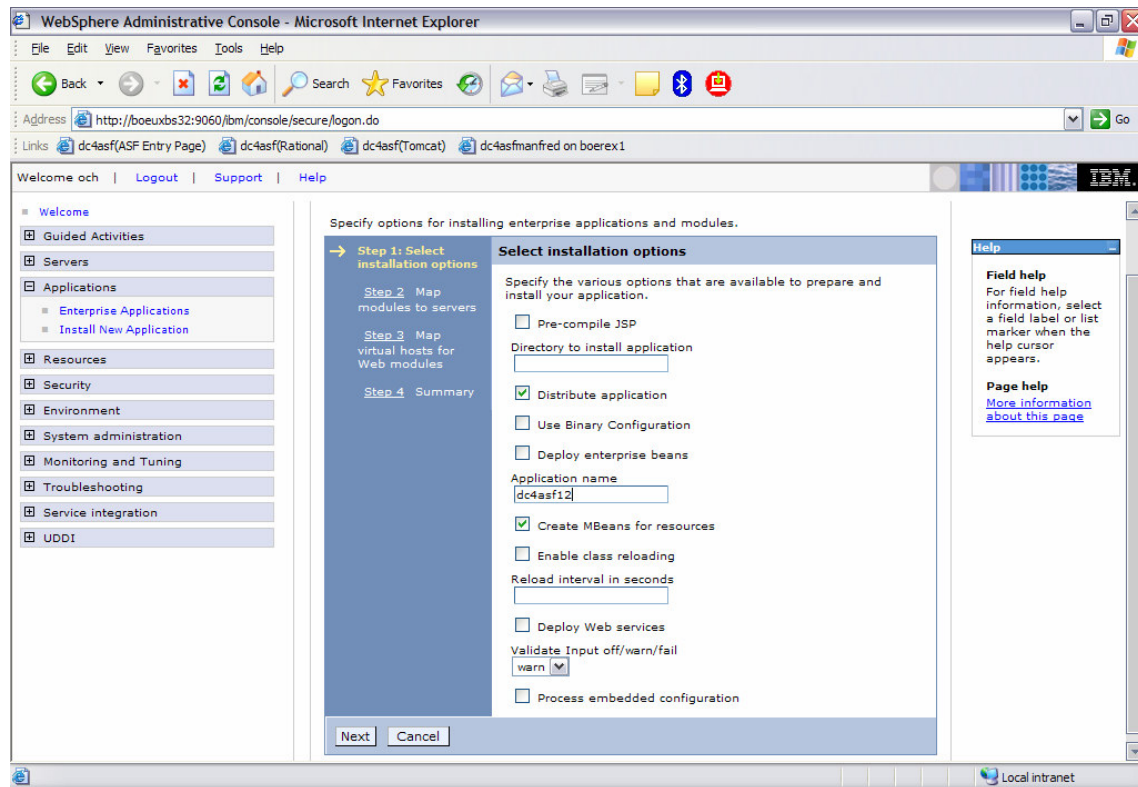
- APP_INSTALL_ROOT is a path map variable which for example is set to
/usr2/WebSphere/AppServer60/profiles/server1/installedApps/
- 'xxxxx' is the cell name and
- 'dc4asf12' is the application name.

[Application Name:](#)

Specify a unique name, for example 'dc4asf12'.

[Class Reloading:](#)

Do not enable class reloading.



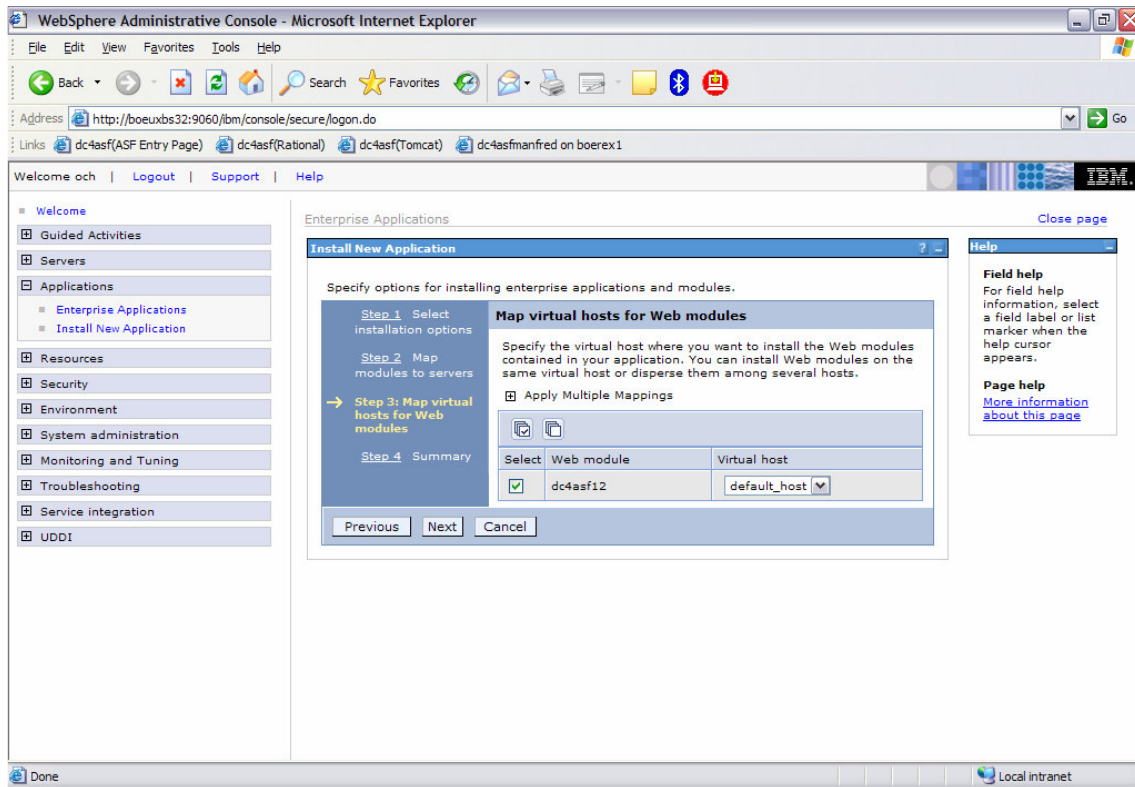
Select [Next](#) to finish Step 1 and go to Step 2.

Install new application (Step 2)

The screenshot shows the WebSphere Administrative Console in Microsoft Internet Explorer. The browser address bar displays `http://boeuxbs32:9060/ibm/console/secure/login.do`. The console interface includes a left-hand navigation menu with categories like 'Welcome', 'Guided Activities', 'Servers', 'Applications', 'Resources', 'Environment', 'System administration', 'Monitoring and Tuning', 'Troubleshooting', 'Service integration', and 'UDDI'. The main content area is titled 'Enterprise Applications' and shows the 'Install New Application' wizard. The current step is 'Step 2: Map modules to servers'. The wizard instructions state: 'Specify targets such as application servers or clusters of application servers where you want to install the modules contained in your application. Modules can be installed on the same application server or dispersed among multiple application servers. Also, specify the Web servers as targets that will serve as routers for requests to the application. The plug-in configuration file (plugin-cfg.xml) for each Web server is generated based on the application configuration and the targets specified here.' Below the instructions, there is a text area for 'Clusters and Servers' containing the following entries:
`WebSphere:cell=boeuxbs32Node01Cell,node=boeuxbs32Node01,server=server1`
`WebSphere:cell=boeuxbs32Node01Cell,node=webserv1_node,server=webserv1`
An 'Apply' button is located to the right of these entries. Below the text area is a table with columns 'Select', 'Module', 'URI', and 'Server'. The table contains one row with a checked checkbox in the 'Select' column, the module name 'dc4asf12', the URI 'dc4asf12.war,WEB-INF/web.xml', and the server name 'WebSphere:cell=boeuxbs32Node01Cell,node=boeuxbs32Node01Cell,server=server1'. At the bottom of the wizard, there are 'Previous', 'Next', and 'Cancel' buttons.

Select [Next](#) to finish Step 2 and go to Step 3.

Install new application (Step 3)



No updates are required for Step 3. Select [Next](#) to finish Step 3 and go to Step 4.

Install new application (Step 4)

The screenshot shows the WebSphere Administrative Console in Microsoft Internet Explorer. The browser address bar displays `http://boeuxbs32:9060/ibm/console/secure/logon.do`. The console interface includes a navigation menu on the left with categories like Welcome, Guided Activities, Servers, Applications, Resources, Security, Environment, System administration, Monitoring and Tuning, Troubleshooting, Service integration, and UDDI. The main content area is titled 'Enterprise Applications' and contains a sub-section 'Install New Application'. This section is divided into four steps: Step 1 (Select installation options), Step 2 (Map modules to servers), Step 3 (Map virtual hosts for Web modules), and Step 4 (Summary), which is currently selected. The 'Summary' section provides a table of installation options and their values.

Options	Values
Use Binary Configuration	No
Create MBeans for resources	Yes
Cell/Node/Server	Click here
Reload interval in seconds	30
Enable class reloading	Yes
Process embedded configuration	No
Application name	dc4asf12
Validate Input off/warn/fail	warn
Directory to install application	
Distribute application	Yes
Deploy Web services	No
Pre-compile JSP	No
Deploy enterprise beans	No

Below the table, a warning icon and text state: "No application modules were mapped to Web servers. The plug-in configuration file (plugin-cfg.xml) for each Web server is generated based on the application modules which are mapped to it, therefore no Web server will route requests to this application."

On the right side of the console, there is a 'Help' panel with 'Field help' and 'Page help' sections. The 'Page help' section includes a link: [More information about this page](#).

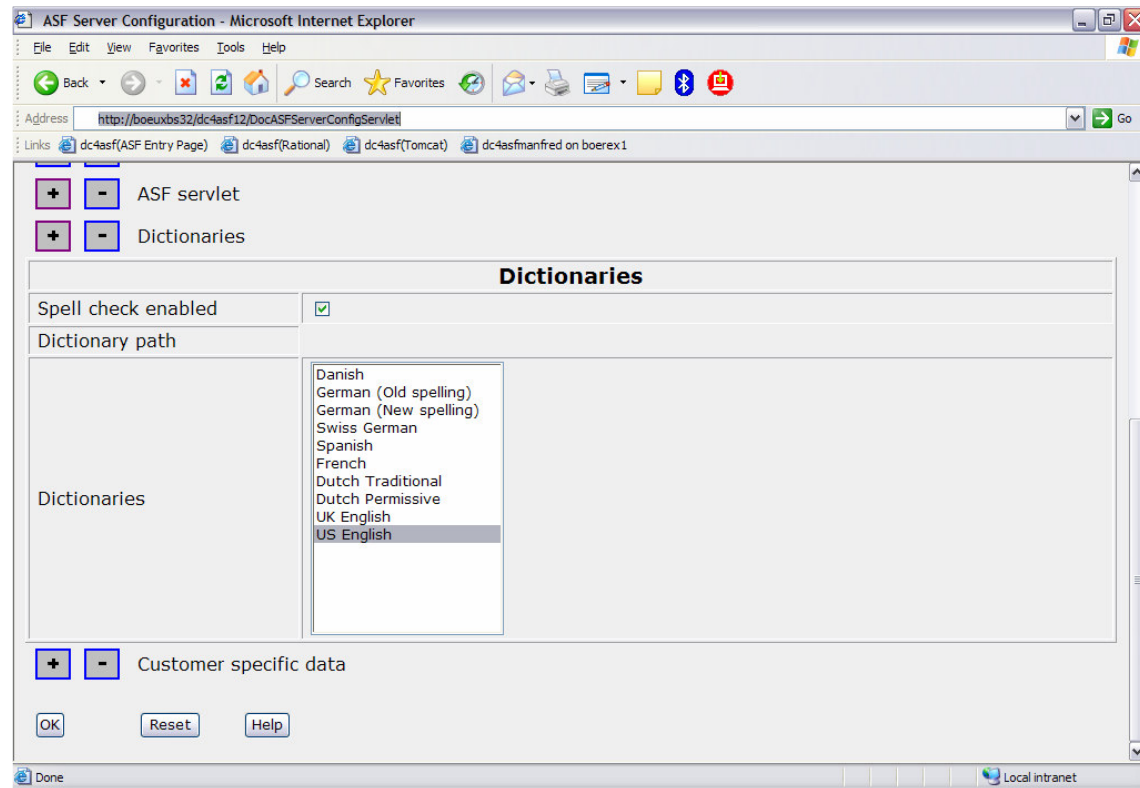
Check the settings on this page and select **Finish** to start the installation of your application. When the installation of the application has been completed it must be **saved** in the master configuration.

Start the application

Open [Applications](#) > [Enterprise Application](#), select your dc4asf12 application and select **Start** to start the application.

3 Activation of Dictionaries for Spellchecking

To activate the dictionaries for spellchecking invoke the servlet application “DocASFServerConfigServlet”, using the Microsoft Internet Explorer. Ask the ASF administrator(s) which dictionaries should be active.



Select **OK**.

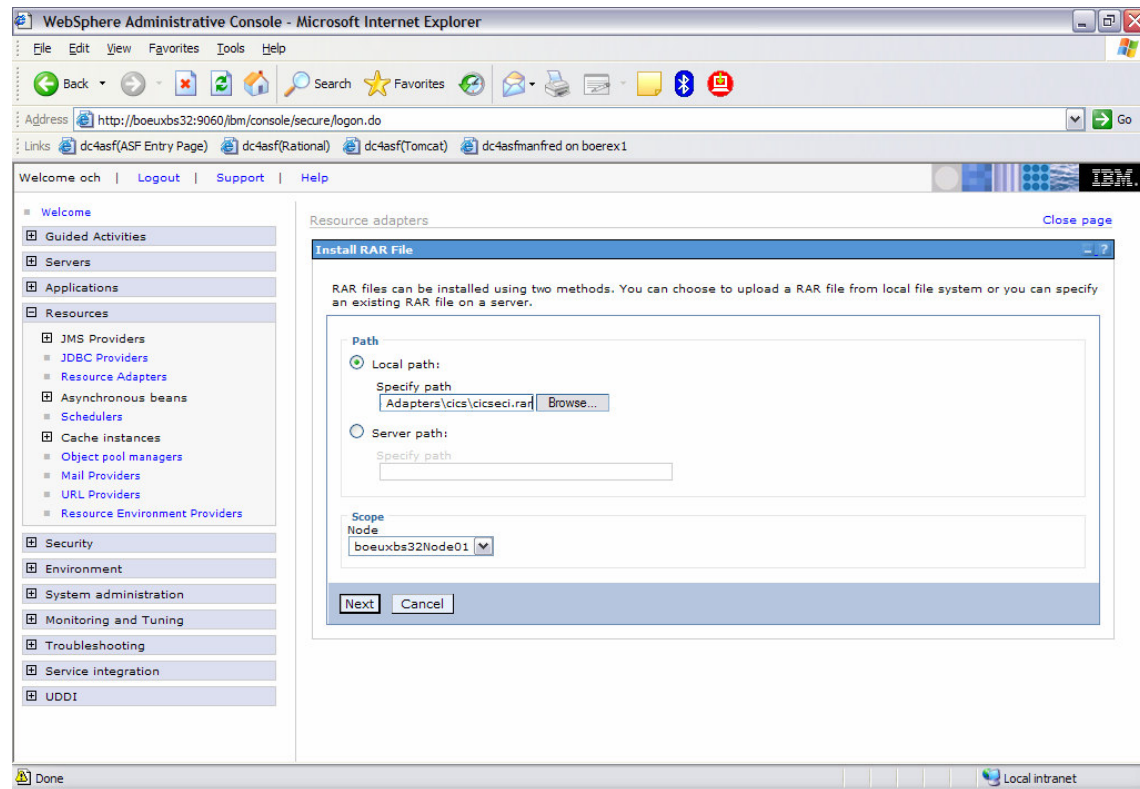
Stop and **Start** your application using the WebSphere Administrative Console.

4 Enable CICS Transaction Gateway Connection

To enable the CICS Transaction Gateway connection between server and host you must deploy the CICS ECI Resource Adapter (RAR file) coming with the CICS Transaction Gateway 5.1 or later.

Open [Resources](#) > [Resource Adapters](#) > [Install RAR File](#)

Enter the location of the CICS ECI Resource Adapter
(for example E:\Resource Adapters\cics\cicseci.rar).



Press button **Next** first, enter a name for example “CICS ECI Resource Adapter” and then press button **OK**.

Save the changes to the master configuration.

After installing the resource adapter, you must stop and restart WebSphere Application Server.

5 Web Server Changes

Using the IBM HTTP Server

5.1.1 Configure the WebSphere PLUGIN

Using Shared Object library " mod_ibm_app_server_http.so "

Make sure you have installed the Shared Object (SO) library [mod_ibm_app_server_http.so](#). This SO is usually installed with WAS by selecting the HTTP server installation. It resides in the bin directory of the WAS installation.

Generate the configuration file "plugin6-cfg.xml"

Generate the plugin configuration file "plugin6-cfg.xml" using the WebSphere Administrative Console. For more information refer to

<http://publib.boulder.ibm.com/infocenter/ieduasst/v1r1m0/index.jsp>

chapter "Create Web Server Definition and Map Applications"

5.1.2 Configure the IBM HTTP Server

You need to configure your IBM HTTP Server to run properly with DC4ASF. Proceed as follows:

- a) Open the HTTP server configuration file "httpd.conf". Usually it is located in the conf directory of the HTTP server installation.
- b) Verify that the Shared Object (SO) library points to the configuration file "plugin6-cfg":

```
LoadModule was_ap20_module /usr2/WebSphere/Plugins60/bin/mod_was_ap20_http.so
WebSpherePluginConfig
/usr2/WebSphere/AppServer60/profiles/server1/config/cells/boeuxbs32Node01Cell/nodes/webserver1_node/servers/webserver1/plugin-
cfg.xml
```

- c) If you changed the file "httpd.conf" then restart the HTTP server to activate the changes.

Using the Microsoft Internet Information Server (IIS)

6 Configure the Connections

To define the server-host connections in DocNetworkConfiguration.xml invoke the servlet application “DocASFNetworkConfigServlet”, using the Microsoft Internet Explorer.

Specify the URL where the CICS Transaction Gateway resides (TCP/IP address and the port, for example [tcp://boerexx.boeblingen.de.ibm.com:2006](http://boerexx.boeblingen.de.ibm.com:2006)), the CICS server name as defined in the CICS Transaction Gateway, the CICS program name (must be FSNWRFC), the defined User ID used for CICS logon and the corresponding password.

Press button **OK** to save your changes.

Note:

- The password specified will be encrypted and stored in file “hnp.txt” in the /config subdirectory.

Additional connections
V 1.2.2.1.1601
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Host nickname	Host connection data
CiDB2ctgHost	Connection type: CICS
	CICS URL: tcp://boerexx.boeblingen.de.ibm.c
	CICS server name: IPVAXCIB
	CICS program: FSNWRFC
	RACF user ID: Ciuser
	New Password:
	Confirm new password:

OK Reset Help

Applet configpasswordapplet started Local intranet

Stop and **Start** your application in the WebSphere Administrative Console.

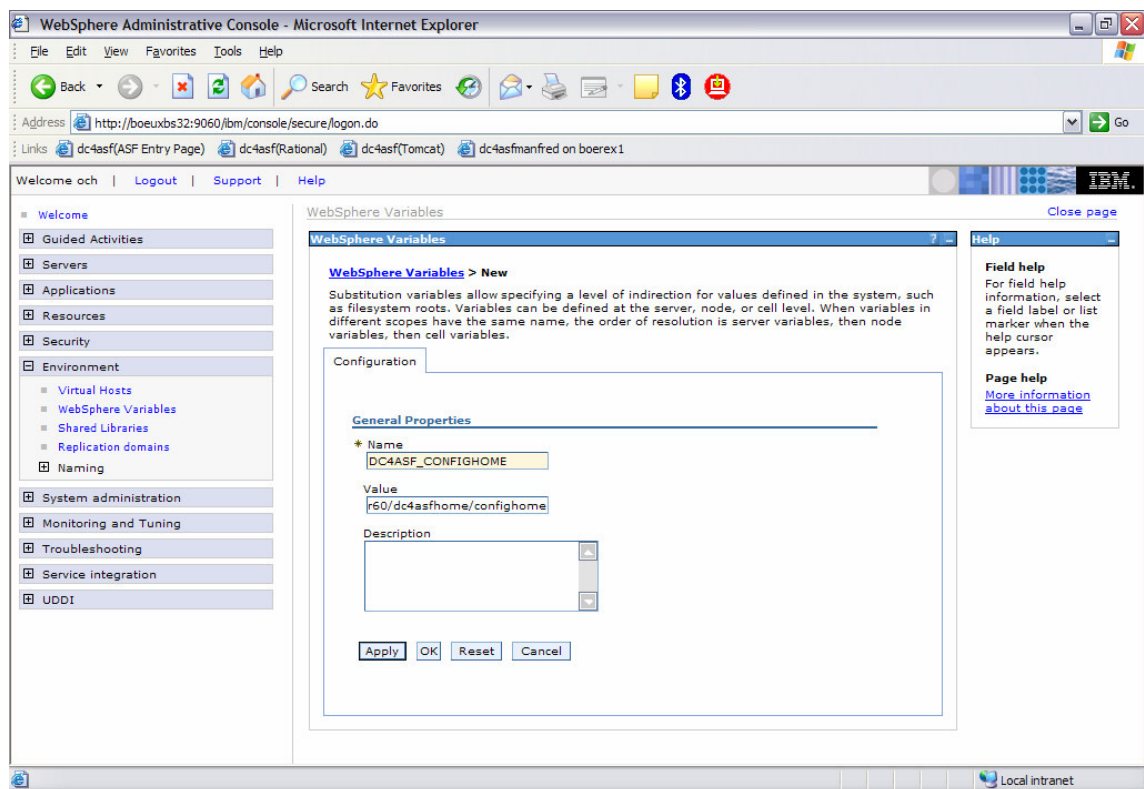
7 Single Configuration File

If you are running DC4ASF in a multi-node environment or you have more than one instance of DC4ASF but you want to have only one set of configuration files, perform the following steps:

- Create two WebSphere variables

Open [Environment](#) > [WebSphere Variables](#) > [New](#)

Create the variables DC4ASF_CONFIGHOME and DC4ASF_DATAHOME and set the values for example to /usr2/WebSphere/AppServer60/dc4asfhome/confighome and /usr2/WebSphere/AppServer60/dc4asfhome/datahome



- Create the three directories

```
$(CONFIG_HOME)      like /usr2/WebSphere/AppServer60/dc4asfhome/confighome
$(DATA_HOME)/log    like /usr2/WebSphere/AppServer60/dc4asfhome/datahome/log
$(DATA_HOME)/preview like /usr2/WebSphere/AppServer60/dc4asfhome/datahome/preview
```

- Copy the configuration files

```
DocConfiguration.xml
DocNetworkConfiguration.xml
DocXSLConversion.xml
DocSpellCheckConfiguration.xml
hnp.txt
```

From `$(APP_INSTALL_ROOT)/boeuxbs32Node01Cell/dc4asf12.ear/dc4asf12.war/internals/config` to `$(CONFIG_HOME)`

- Change the configuration.xml as follows:

```
<Network>
  <ConfigFile>$(CONFIG_HOME)/DocNetworkConfiguration.xml</ConfigFile>
</Network>

<XSLConversion>
  <HTMLPath>xsl</HTMLPath>
  <ConfigFile>$(CONFIG_HOME)/DocXSLConversion.xml</ConfigFile>
</XSLConversion>

<Logging enable="Y">
  <GenericName>$(DATA_HOME)/log/logfile</GenericName>
  <Extension>.log</Extension>
  <NumberOfGenerations>10</NumberOfGenerations>
  <Filesize>3096</Filesize>
  <Recordlength>330</Recordlength>
</Logging>

<Tracing enable="Y" sessiontrace="N">
  <GenericName>$(DATA_HOME)/log/trcfile</GenericName>
  <Extension>.trc</Extension>
  <Recordlength>3300</Recordlength>
```

8 Protect access to the Configuration Servlets

To restrict the access to the configuration servlets for DC4ASF two prerequisites must be met:

- “Global Security” of the WebSphere Application Server (WAS) is enabled.

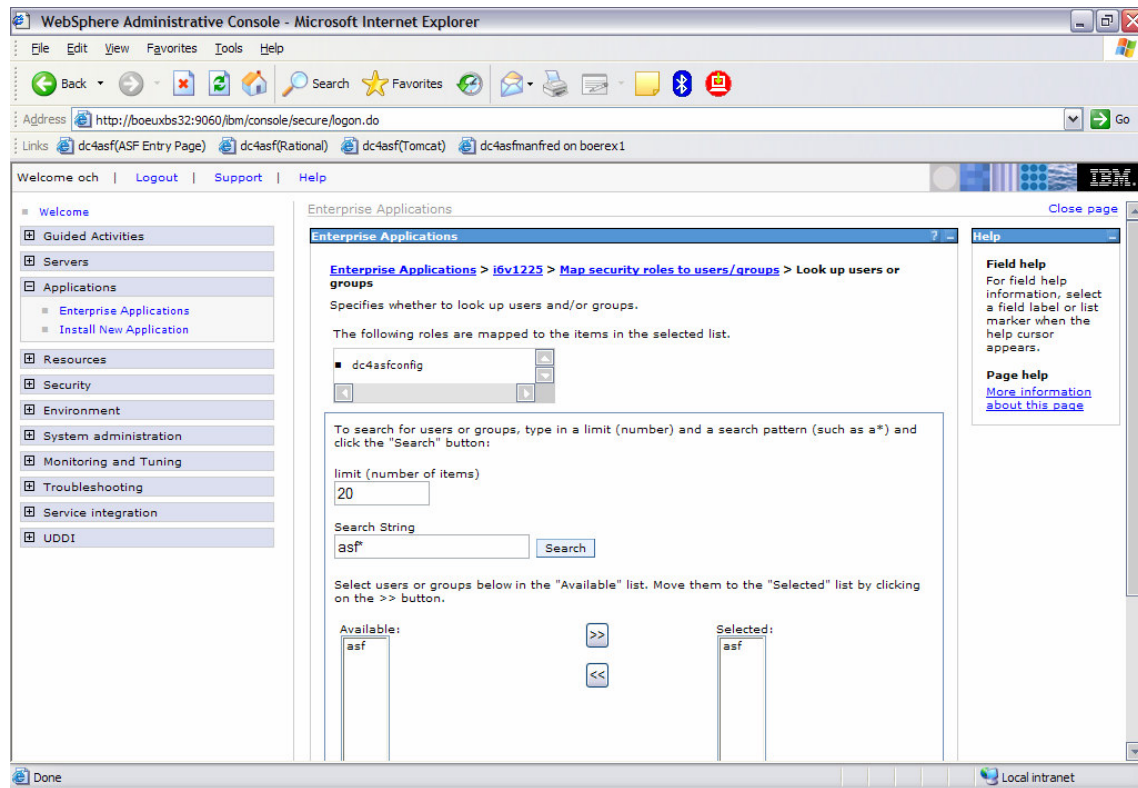
For more information refer on “Global Security” visit the online help of the WebSphere Application Server.

- At least DC4ASF maintenance level 1.2.2.5 is installed.

If the prerequisites are met, follow the steps below:

Open [Applications](#) > [Enterprise Applications](#) > [dc4asf12](#) > [Additional properties](#) > [Map security roles to users/groups](#)

Select the role “dc4asfconfig” and click the button [Lookup users](#). Type in a limit and a search pattern for users and click the button [Search](#). Select the users and click on the button with the arrows to move them to the “Selected” list. Press [OK](#). Then click the button [Lookup groups](#). Type in a limit and a search pattern for groups and click the button [Search](#). Select those groups to whom the selected users belong to and click on the button with the arrows to move them to the “Selected” list. Press [OK](#). Press again [OK](#).



[Save](#) the changes to the master configuration, then [Stop](#) and [Start](#) the WebSphere Application Server.

To verify the successful implementation of security launch both the DC4ASF configuration servlet DocASFServerConfigServlet and the DC4ASF network configuration servlet DocASFNetworkConfigServlet. You will be prompted to enter your user ID and password.

9 AFP Resources

To make the AFP resources (page segments and overlays) available on the server for resolution during “Print Preview” requests process perform the following steps:

- Copy the page segments from the host system (for example via ftp) into the directory

`$(APP_INSTALL_ROOT)/boeuxbs32Node01Cell/dc4asf12.ear/dc4asf12.war/AFPResources/pseg`

The page segments must have the extension “**psg**” (lower case and the names must be in upper case).

- Copy the overlays from the host system (for example via ftp) into the directory

`$(APP_INSTALL_ROOT)/boeuxbs32Node01Cell/dc4asf12.ear/dc4asf12.war/AFPResources/ovl`

The overlays must have the extension “**oly**” (lower case and the names must be in upper case).

- To define the server URL in DocConfiguration.xml invoke the servlet application “DocASFServerConfigServlet”, using the Microsoft Internet Explorer. Specify your transformation path and the server URL in the Preview AFP Section.

Selection	Values										
<input checked="" type="checkbox"/> AFP	<table><tr><td>Extension</td><td>afp</td></tr><tr><td>Transformation class</td><td></td></tr><tr><td>Transformation path</td><td>ll/dc4asf12.ear/dc4asf12.war/AFPResources</td></tr><tr><td>Transformation command</td><td></td></tr><tr><td>URL</td><td>http://boeuxbs32/dc4asf12/AFPResources</td></tr></table>	Extension	afp	Transformation class		Transformation path	ll/dc4asf12.ear/dc4asf12.war/AFPResources	Transformation command		URL	http://boeuxbs32/dc4asf12/AFPResources
Extension	afp										
Transformation class											
Transformation path	ll/dc4asf12.ear/dc4asf12.war/AFPResources										
Transformation command											
URL	http://boeuxbs32/dc4asf12/AFPResources										
<input type="checkbox"/> InfoPrint PDF	<table><tr><td>Extension</td><td>pdf</td></tr><tr><td>Transformation class</td><td>com.ibm.doc.util.DocInfoPrintTransform</td></tr><tr><td>Transformation path</td><td></td></tr><tr><td>Transformation command</td><td>pdfconvert.bat</td></tr></table>	Extension	pdf	Transformation class	com.ibm.doc.util.DocInfoPrintTransform	Transformation path		Transformation command	pdfconvert.bat		
Extension	pdf										
Transformation class	com.ibm.doc.util.DocInfoPrintTransform										
Transformation path											
Transformation command	pdfconvert.bat										

Press button **OK** to save your changes.

10 Installing a second Application

The steps above describe how to install the application dc4asf12 in WebSphere Application Server.

IBM recommends that you generate a second application instance of Document Connect for ASF for use by administrators, for example “[dc4asf12test](#)”.

1. Perform the steps described in “Installation of the application” with the following changes:

In the paragraph “Preparing for the application installation” specify the following context root:

[/dc4asf12test](#)

In the paragraph “Install new application (Step 1)”, use “[dc4asf12test](#)” as the application name.

2. Perform the steps described in “Configure the Connections”

11 Applying Maintenance

Download the PTF containing a new war file into directory

[/usr/swrepository/dc4asf/was60/war/1.2.2.1/ptfs](#)

Open the WebSphere Administrative Console:

[Open Application > Enterprise Application](#)

Stop the applicable application, for example “dc4asf12test”.

Select application “dc4asf12test” and enter **Update**.

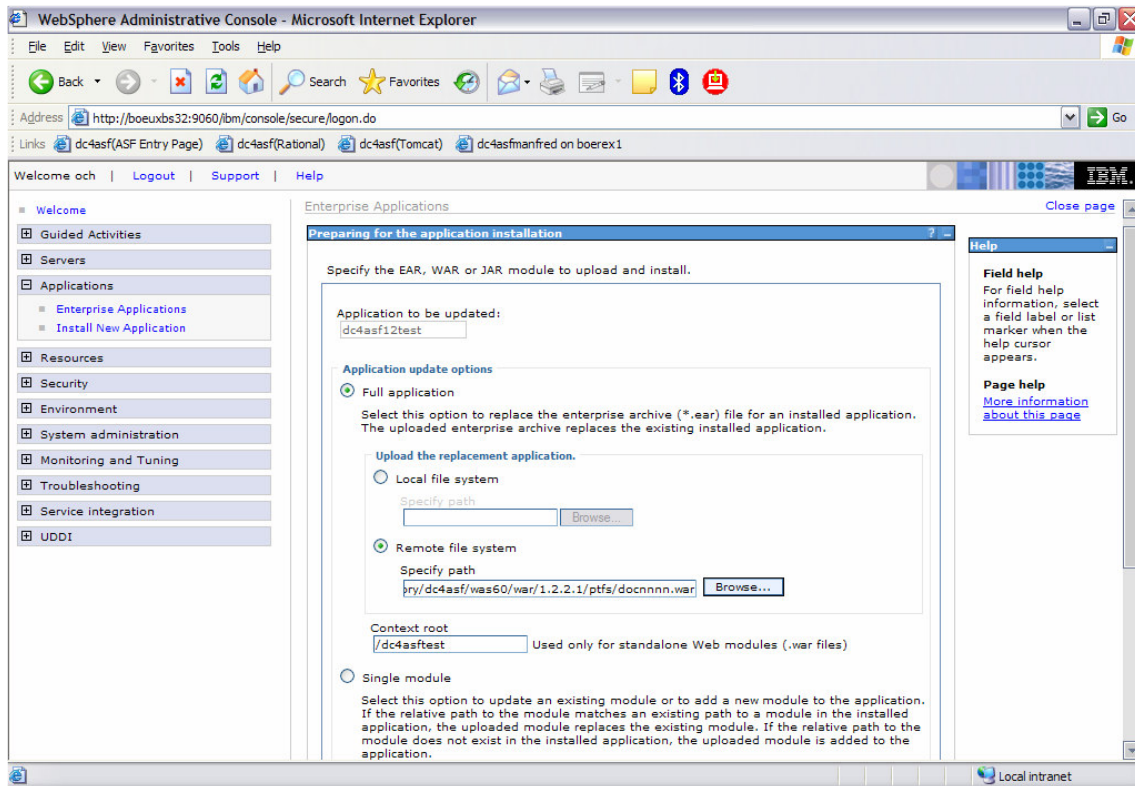
Enter the path (local path or server path) where the new DC4ASF zip file is located:

[/usr/fsn/usr/swrepository/dc4asf/was60/war/1.2.2.1/ptfs/docnnnn.war](#)

Enter the context root: “ /dc4asf12test”

Note:

The context root must be the same as the context root entered during installation (see “Preparing for the application installation”).



On each of the next panels select **Next** and finally select **Finish**. After the update of the application has been completed save the master configuration.

Open [Applications > Enterprise Application](#) and select your application dc4asf12test. Select **Start** to restart the application.