BEA WebLogic Portal™

MobileAware Interaction Server Installation Guide

Version 8.1 with Service Pack 3 (MobileAware Version 1.0)
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MobileAware Interaction Server Installation Guide

About This Manual

This document describes the process for installing and configuring the MobileAware Interaction Server, BEA WebLogic Edition.

Please read this document before commencing installation to ensure you comply with the installation pre-requisites and have access to relevant installation configuration information.

The document is split into two parts:

Installing the MobileAware Interaction Server on Microsoft Windows 2000

This section describes the installation and configuration of:

1. The MobileAware Interaction Server, BEA WebLogic Edition, including the Mobility Extension for BEA WebLogic Workshop 8.1 on Microsoft Windows 2000.
2. A BEA Sample Workshop Mobility Project used to illustrate how to use the features provided by the Mobility Extension.
3. A BEA Sample Mobility Portal Project for BEA WebLogic Platform 8.1, demonstrating the features of MobileAware's Mobilized BEA WebLogic Portal Framework solution.

The section also describes:

- Configuration of device emulators in BEA WebLogic Workshop
- Creating the necessary Domains and Applications required for importing the sample projects using the BEA Configuration Wizard

- Importing the Sample Projects into BEA WebLogic Workshop
- Installing the MobileAware Device Database with BEA WebLogic Workshop

Installing the MobileAware Interaction Server on Sun Solaris, RedHat Linux, or HP-UX

This section describes the installation and configuration of:

1. The MobileAware Interaction Server, BEA WebLogic Edition on Sun Solaris, RedHat Linux and HP-UX
2. The MobileAware Device Database

Installing the MobileAware Interaction Server on Microsoft Windows 2000

This section explains the installation procedure for installing the MobileAware Interaction Server, BEA WebLogic Edition for BEA WebLogic Platform 8.1 on Microsoft Windows 2000.

Introduction

The BEAMAInteractionServer81-win.exe installation program is used to install the MobileAware Interaction Server, BEA WebLogic Edition on Microsoft Windows 2000.

It also installs the MobileAware Mobility Extension for BEA WebLogic Workshop 8.1 and places copies of the Sample Projects for BEA WebLogic Platform 8.1 on your hard drive so that they can later be imported into BEA WebLogic Workshop Applications.

License

You must update your BEA License with the MobileAware Interaction Server, BEA WebLogic Edition product component details. The required product component information is available for download from the BEA Web Site at the same location as the software installers.

Once you have updated your license, you will be able to develop and test mobile-device ready content. If you have a developer or evaluation BEA License, the software installers will install an evaluation version of the MobileAware Device Database enabling testing on a number of popular device emulators as well as a number of popular mobile and PDA devices. A production license must be present to install and utilise the full MobileAware Device Database. Note: An invalid license will result in HTML being delivered.

Please contact a BEA or MobileAware sales representative if you wish to extend your evaluation or developer license or upgrade to a production license.

Installation Pre-requisites

Software Pre-Requisites

The following software must be installed prior to installing the MobileAware Interaction Server, BEA WebLogic Edition:

- BEA WebLogic Platform 8.1SP2 or SP3, including:
  - BEA WebLogic Application Server
  - BEA Workshop
  - PointBase database
- Internet Browser:
  - Netscape 4.75 or higher, or
  - Internet Explorer 5 or higher
- Windows 2000

Administration Rights

This installation program requires administration rights on the machine in order to complete the installation.

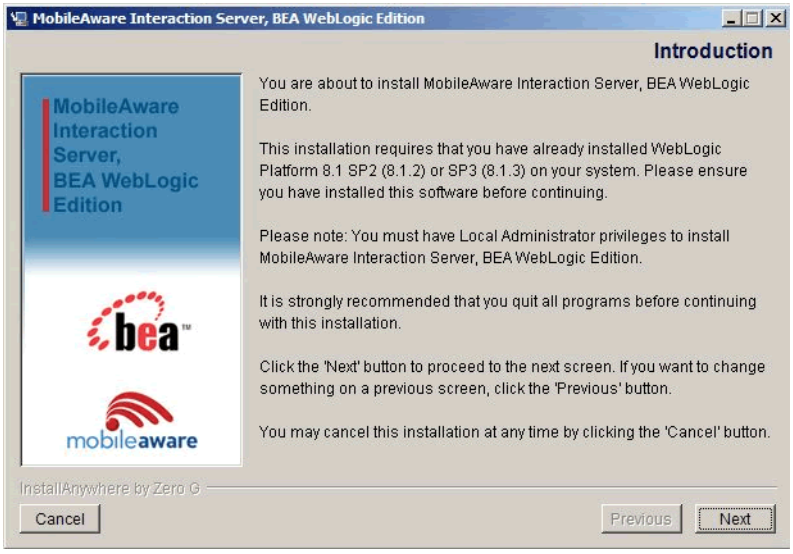
License

Ensure that you have updated your BEA License with the MobileAware Interaction Server, BEA WebLogic Edition product component details. The required license component information can be downloaded from the same download page as the software installer.

Installation Procedure for Windows

1. Run the BEAMAInteractionServer81-win.exe installation program
2. When the “Introduction” screen is shown. Click **Next** to continue.

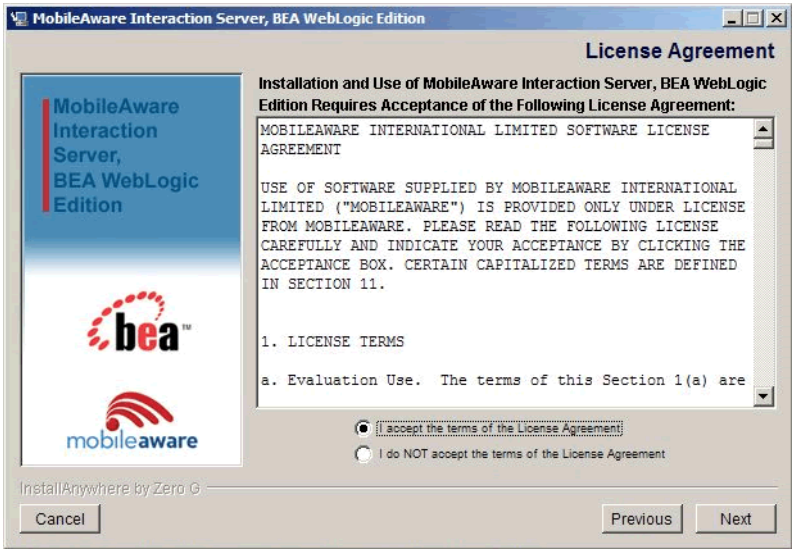
Figure 1 MobileAware Interaction Server Introduction Screen



3. On the “License Agreement” screen, read the license agreement and select the I accept the terms of the License Agreement radio button if you are satisfied with the terms. Click Next to continue with the install.

Note: The Next button is unavailable if the terms are not accepted.

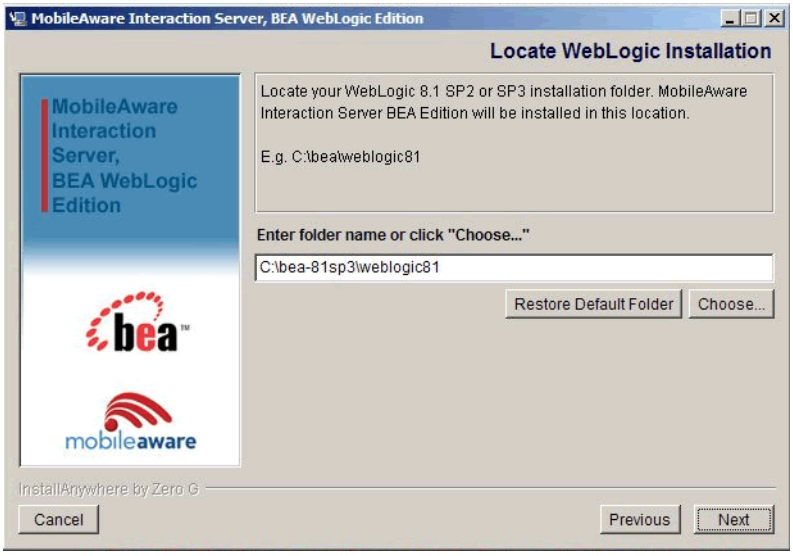
Figure 2 License Agreement Screen



4. On the “Locate WebLogic Installation” screen, enter the location of your WebLogic 8.1 Installation or click Choose to browse to the location.. This is where the MobileAware Interaction Server, BEA WebLogic Edition and the MobileAware Mobility Extension for BEA WebLogic Workshop 8.1 will be installed.

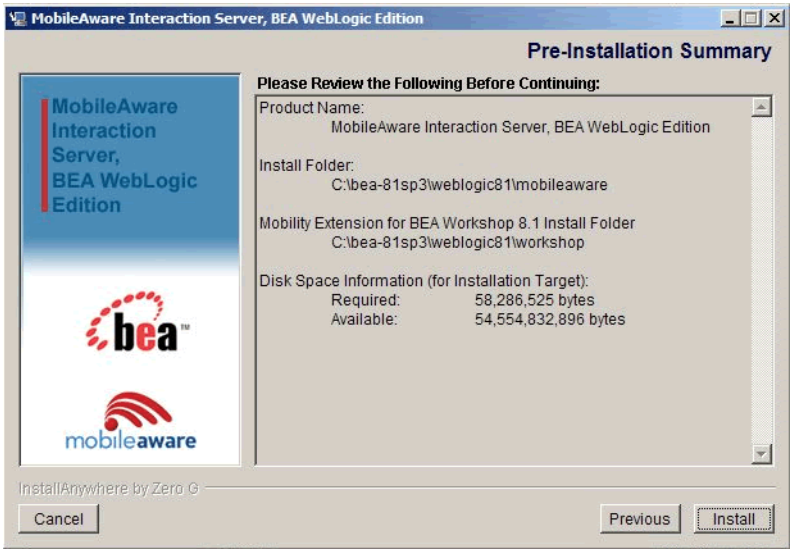
5. Once you have indicated the install folder, click Next to continue.

Figure 3 Location WebLogic Installation Screen



6. On the “Pre-Installation Summary Screen”, review the installation configuration information. If the information is correct, click Install. Otherwise, click Previous to go back through the screens and modify the provided information.

Figure 4 Pre-Installation Summary Screen



7. You will now see a series of “Installing MobileAware Interaction Server” screens followed by an “Updating Workshop” screen while the installation and configuration of the MobileAware Interaction Server completes.

Figure 5 Installing MobileAware Interaction Server Screen 1

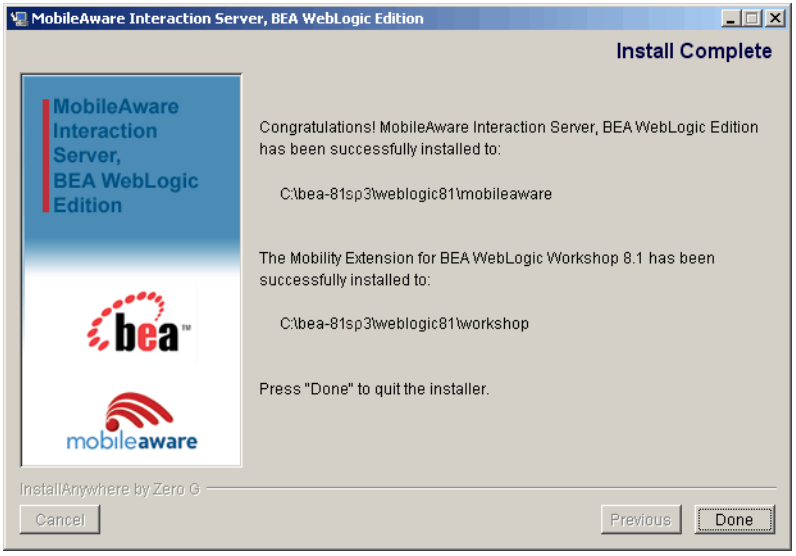
Figure 6 Installing MobileAware Interaction Server Screen 2

Figure 7 Please Wait, Updating Workshop Screen

8. The “Install Complete” screen will be displayed following a successful install. Click Done to exit the installer.

   Note: It really does take several minutes to update the Workshop help files!

Figure 8 Installation Complete Screen



Configuring the MobileAware Interaction Server

Introduction

The location of the MobileAware Interaction Server installation was pre-configured during the installation to <bea installation directory>\weblogic81\mobileaware.

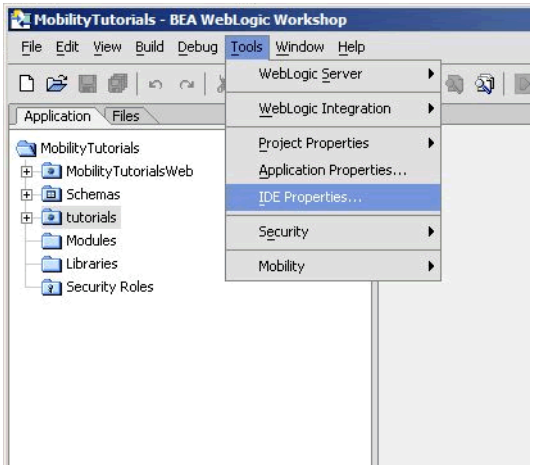
For advanced users who may have multiple installations of the MobileAware Interaction Server, this section describes how to re-configure the MobileAware Interaction Server location for use with the MobileAware Sample Projects for BEA Workshop and BEA Portal.

Configuring the MobileAware Interaction Server Location

To configure the MobileAware Interaction Server location:

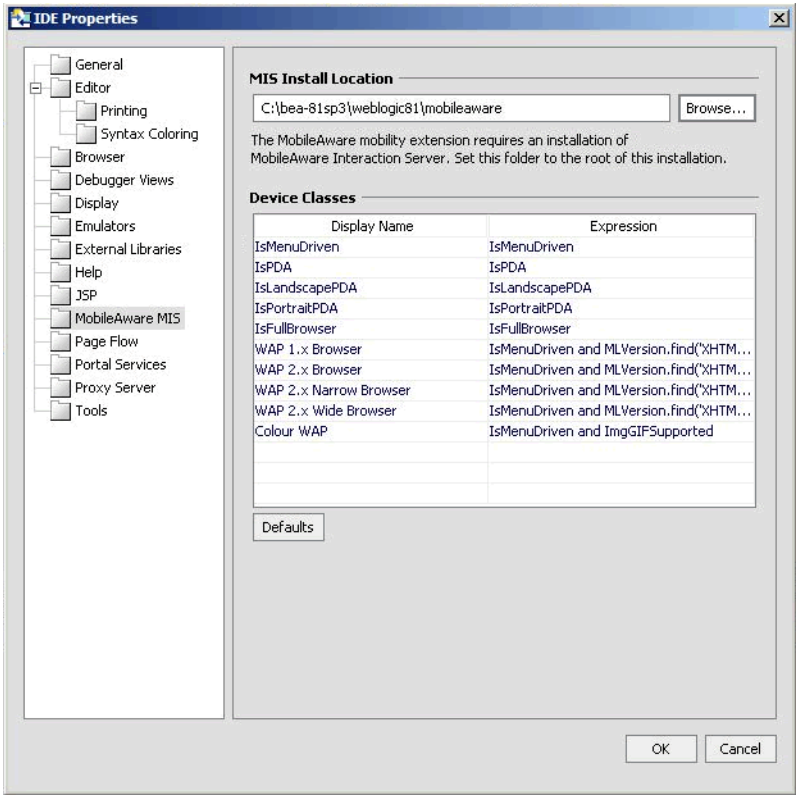
1. Select the MobileAware MIS tab from the IDE Properties within your BEA Workshop Environment (Choose Tools > IDE Properties) and click OK.

Figure 9 IDE Properties



2. he location of the MobileAware Interaction Server installation was pre-configured during the installation to <bea installation directory>\weblogic81\mobileaware. To change the location to point at a different MobileAware Interaction Server installation, enter the location of the MobileAware Interaction Server installation in the MIS Install Location field or click Browse to browse to the location. This will enable access to device diagnostic and device management tools from within BEA WebLogic Workshop.

Figure 10 MobileAware Interaction Server Location



Creating the Workshop Domain and Installing the Sample Workshop Projects

Introduction

This section describes creating a BEA Workshop Domain, creating a new application, and then importing the provided Sample Workshop Projects into the newly created domain.

Create Mobility Domain

To create the Mobility Domain:

1. Launch the BEA WebLogic Configuration wizard from the Windows Start menu.

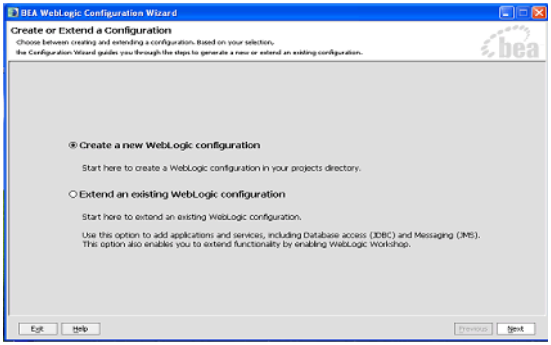
   Choose Start > Programs > <BEA install directory> > Configuration Wizard

   If you have BEA Workshop open, you can also launch it from the tools menu.

   Choose Tools > WebLogic Server > Configuration Wizard

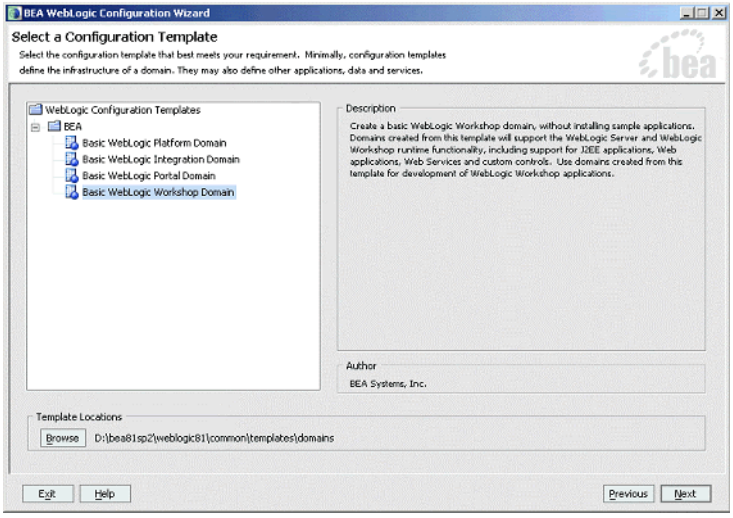
2. Select “Create a new WebLogic configuration” and click Next.

Figure 11 Configuration Wizard – Create a new WebLogic Configuration



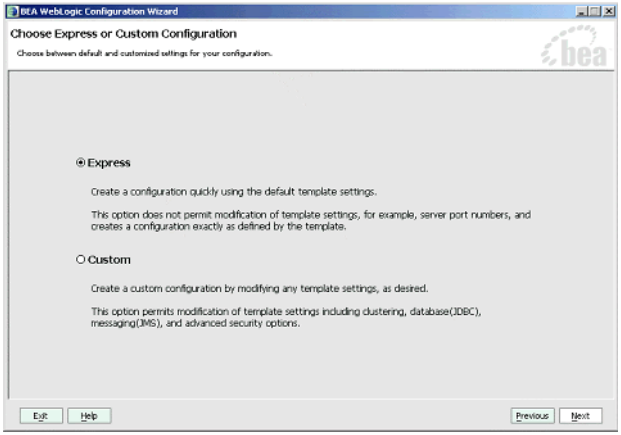
3. In the “Select a Configuration Template screen”, select “Basic WebLogic Workshop Domain” and click **Next**.

Figure 12 Configuration Wizard – Basic WebLogic Workshop Domain



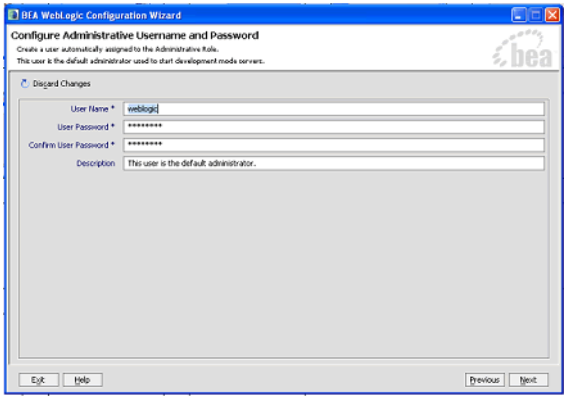
4. On the “Choose Express or Custom Configuration” screen, select “Express” and click Next.

Figure 13 Configuration Wizard – Express Configuration



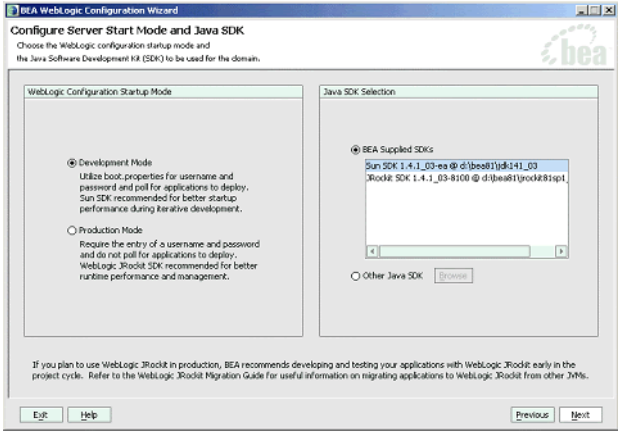
5. On the “Configure Administrative Username and Password” screen enter “weblogic” for username and “weblogic” for password and click Next.

Figure 14 Configuration Wizard – User Name and Password



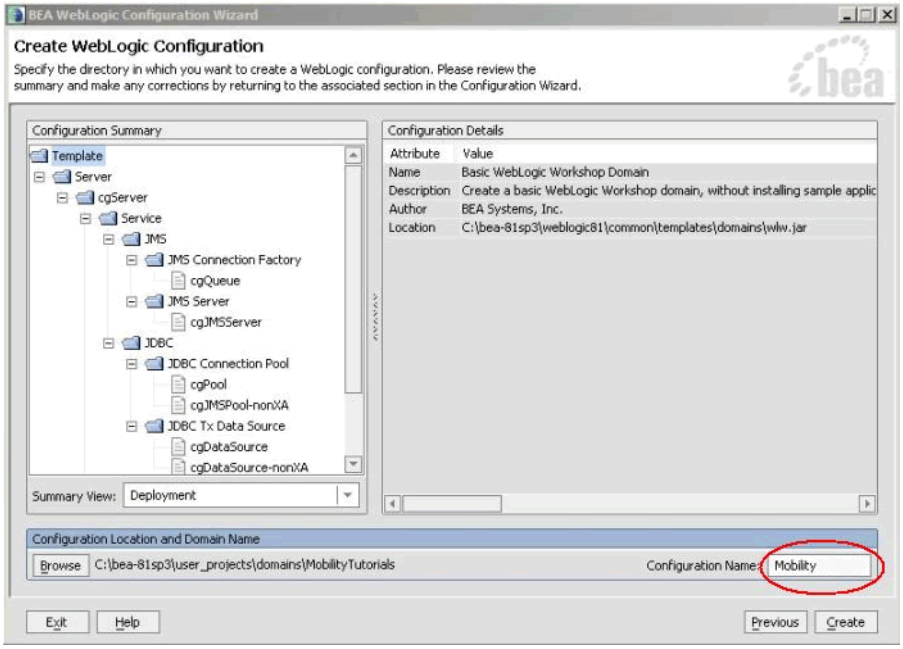
6. On the “Configure Server Start Mode and Java SDK” screen, select Development Modeh within the WebLogic Configuration Startup Mode box.
7. Select the Sun JDK within the Java SDK Selection area and click **Next**.

Figure 15 Configuration Wizard – Start Mode



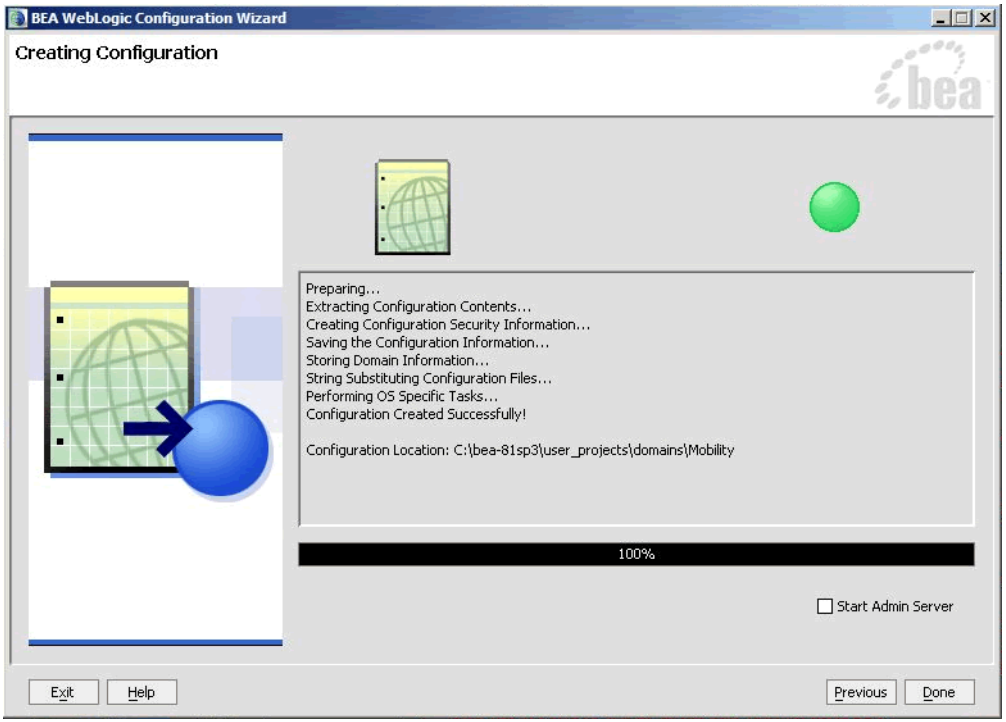
8. On the Create WebLogic Configuration screen, enter Mobility in the Configuration Name field and click Create.

Figure 16 Configuration Wizard – Mobility



9. The configuration wizard will now create the domain. When it completes, click Done on the Creating Configuration screen.

Figure 17 Configuration Wizard – Creating Configuration



Note: When you create a domain using the BEA WebLogic Configuration Manager, a default PointBase database is installed. The MobileAware Device Database will be installed into this database as described in Installing the MobileAware Device Database.

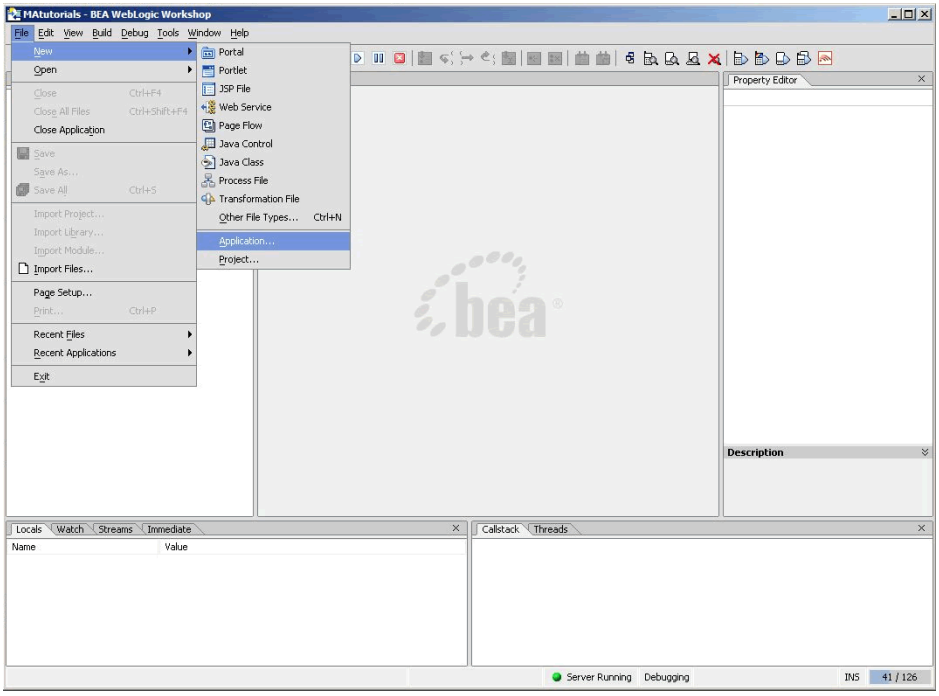
Create Mobility Application

To create the Mobility application:

1. To create a new application in Workshop:

   Choose file > new > application

Figure 18 Create New Application



2. From the New Application window:

   a. Select Default Application

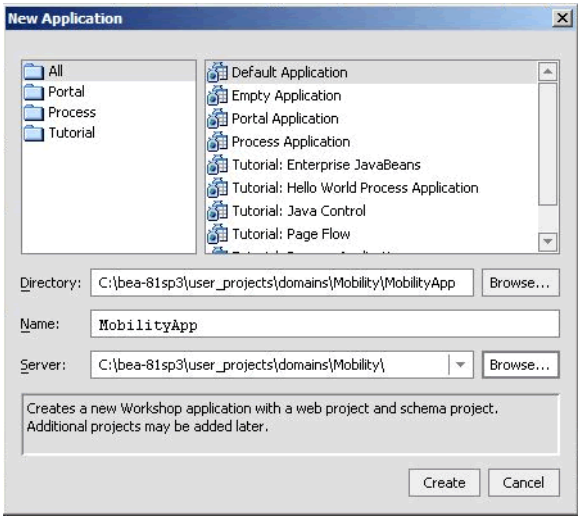
   b. Click Browse next to the Directory field and browse the Domains directory, selecting your newly created Mobility domain.

   c. Enter MobilityApp in the Name field – this is the application where you will import the sample mobility application.

   d. Click Browse next to the Server field and select the config.xml file inside the newly created Mobility domain.

3. Once you have filled in the fields as above, click Create and the application will be created.

Figure 19 New Application Dialog



Now that you have created a new Domain and a new Application, you can import the sample Workshop mobility project.

Importing the Sample Workshop Mobility Project

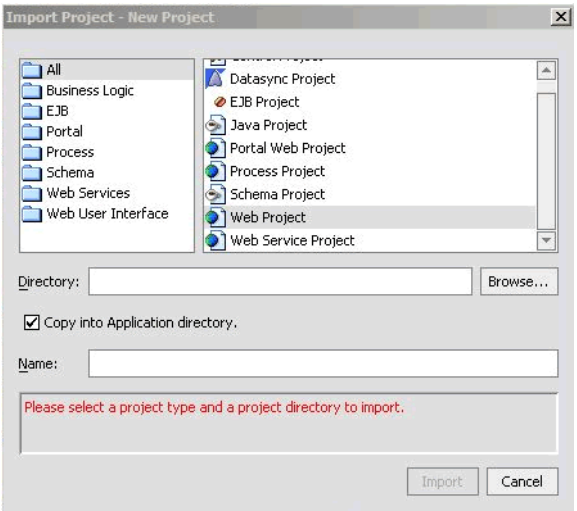
The sample Workshop Mobility project is located in the <bea>\weblogic81\mobileaware\samples\BEAWorkshop directory.

Two versions of the project called restaurantWeb and restaurantWeb_After were installed during the Mobility Extension installation. The restaurantWeb project has not yet been mobilized, while the restaurantWeb_After project has already been fully mobilized.

You can install the restaurantWeb project as described below and then follow the steps described in the BEA Sample Workshop Mobility Project Guide to mobilize it.

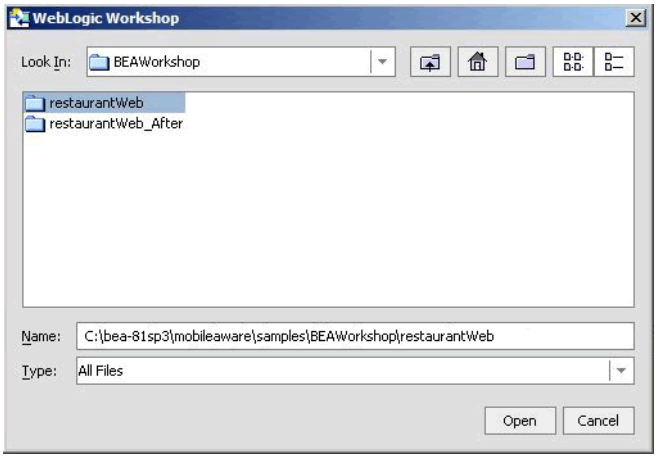
1. Right click the newly created MobilityApp application in the Application tree window.
2. Select Import Project.
3. On the Import Project – New Project screen, click Browse next to the Directory: field and browse to the <bea>\weblogic81\mobileaware\samples\BEAWorkshop\ directory.

Figure 20 Import New Project



4. Select restaurantWeb and click Open.

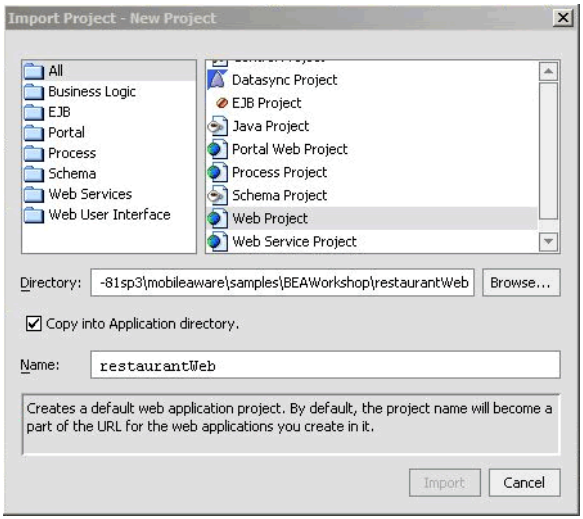
Figure 21 Locate restaurantWeb



5. Back on the Import Project - New Project screen, the Directory will now be filled in, with a default Name for the application set to restaurantWeb . Select Web Project from the right hand pane.

6. Make sure that Copy into Application Directory is checked.
7. Click Import.

Figure 22 Import restaurantWeb project



You can also choose to import the restaurantWeb_After project to see the final version. The BEA Sample Workshop Mobility Project Guide document explains the steps to mobilize the restaurantWeb project to reach the same results as in the restaurantWeb_After project.

Creating the Portal Domain and Importing the Sample Mobility Portal Project

Introduction

This section describes creating a BEA Portal Domain, creating a new application, and then importing the provided Sample Mobility Portal Project into the newly created domain.

Create MobilityPortal Domain

To create the MobilityPortal Domain:

1. Launch the BEA WebLogic Configuration wizard from the Windows Start menu.

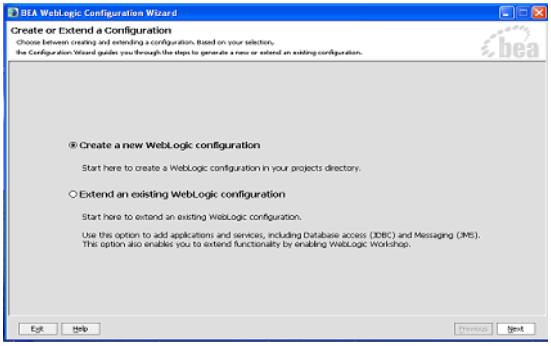
Choose Start > Programs > <BEA install directory> > Configuration Wizard

If you have BEA Workshop open, you can also launch it from the tools menu.

Choose Tools > WebLogic Server > Configuration Wizard

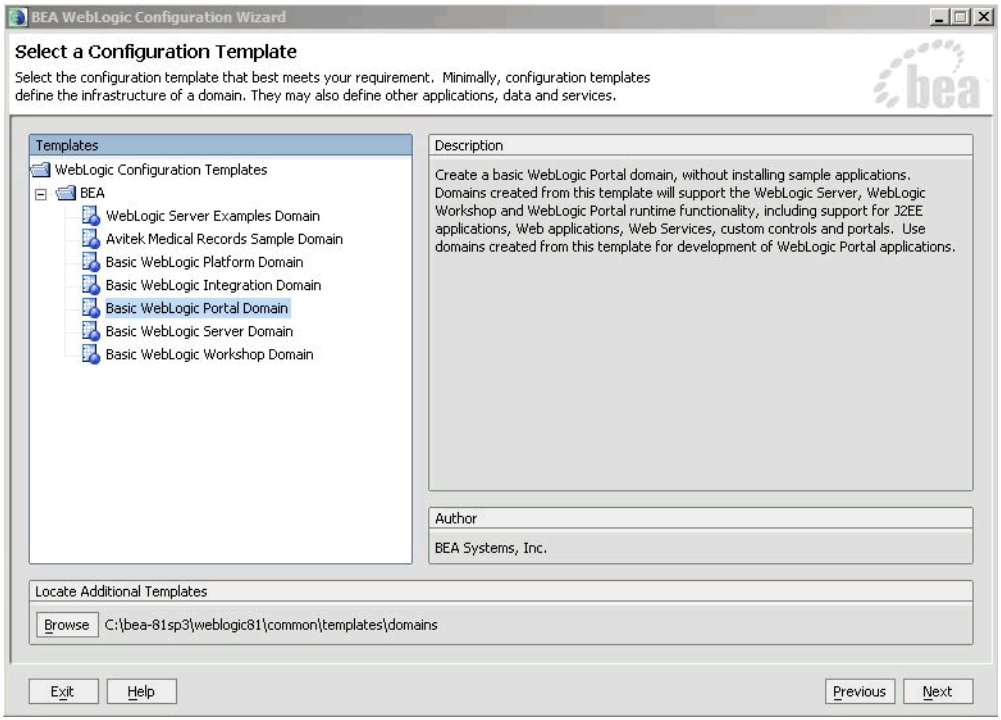
2. Select Create a new WebLogic configuration and click **Next.**

Figure 23 Configuration Wizard – Create a new WebLogic Configuration



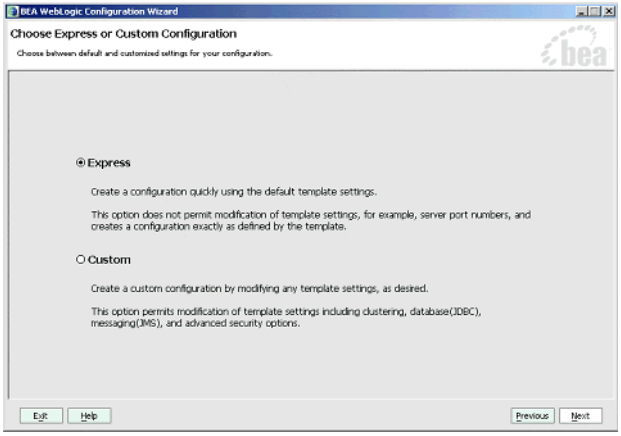
3. On the Select a Configuration Template screen , select Basic WebLogic Portal Domain and click Next.

Figure 24 Configuration Wizard – Basic WebLogic Portal Domain



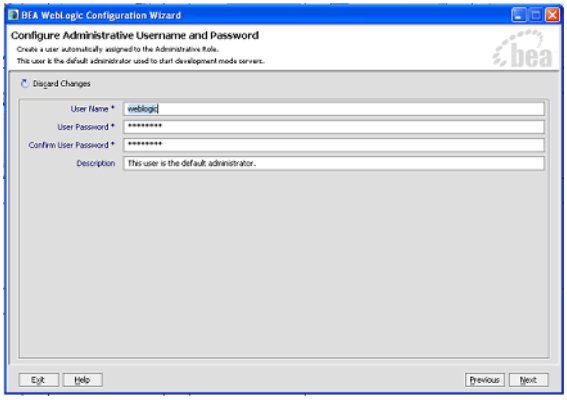
4. On the Choose Express or Custom Configuration screen, select Express and click Next.

Figure 25 Configuration Wizard – Express Configuration



5. On the Configure Administrative Username and Password screen enter weblogic for username and weblogic for password and click Next.

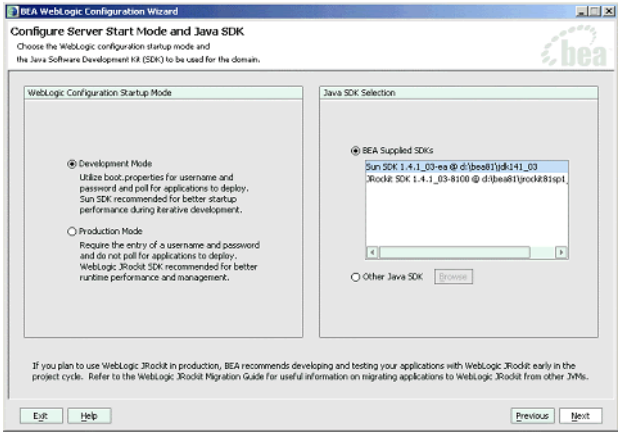
Figure 26 Configuration Wizard – User Name and Password



6. In the Configure Server Start Mode and Java SDK screen, select ÅgDevelopment ModeÅh within the WebLogic Configuration Startup Mode box.

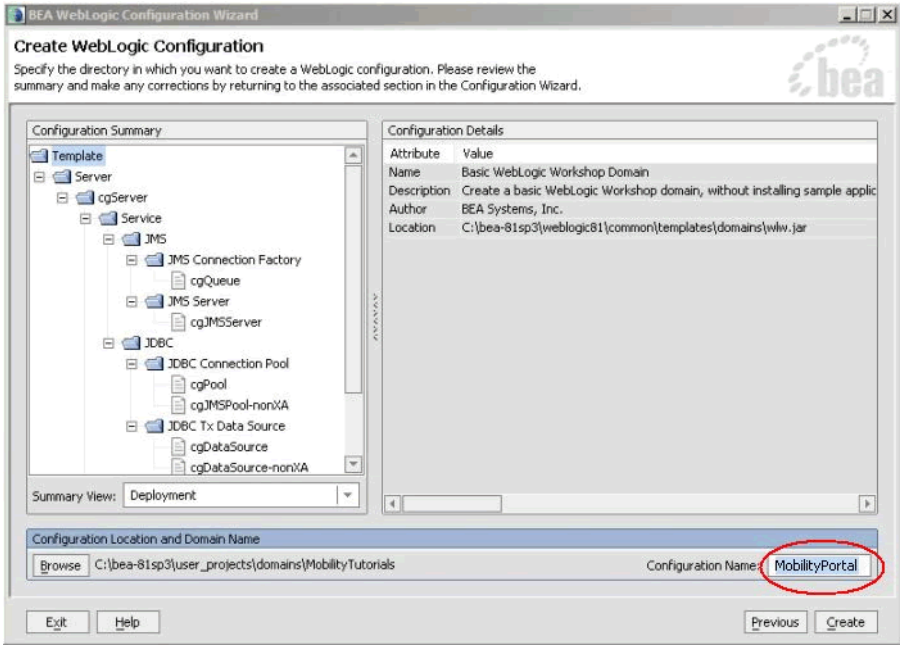
7. Select the Sun JDK within the Java SDK Selection area and click Next.

Figure 27 Configuration Wizard – Start Mode



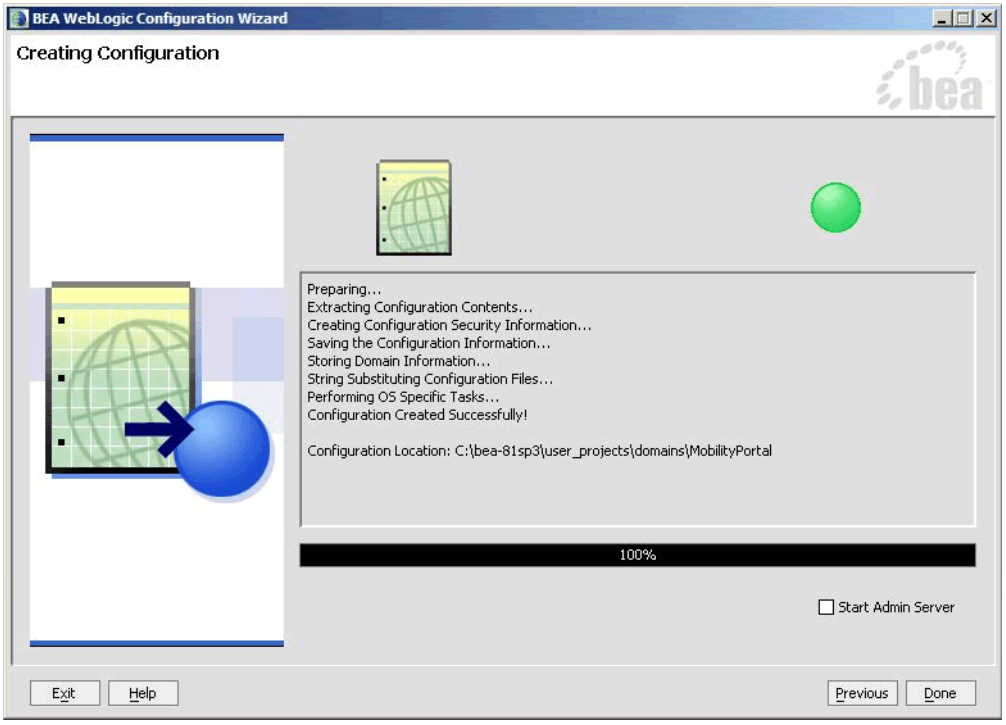
8. On the Create WebLogic Configuration screen, set the Configuration Name to MobilityPortal and click Create.

Figure 28 Configuration Wizard – Mobility Portal



9. The configuration wizard will now create the domain. When it completes, click Done on the Creating Configuration screen.

Figure 29 Configuration Wizard – Creating MobilityPortal Configuration



Note: When you create a domain using the BEA WebLogic Configuration Manager, a default PointBase database is installed. The MobileAware Device Database will be installed into this database as described in Installing the MobileAware Device Database.

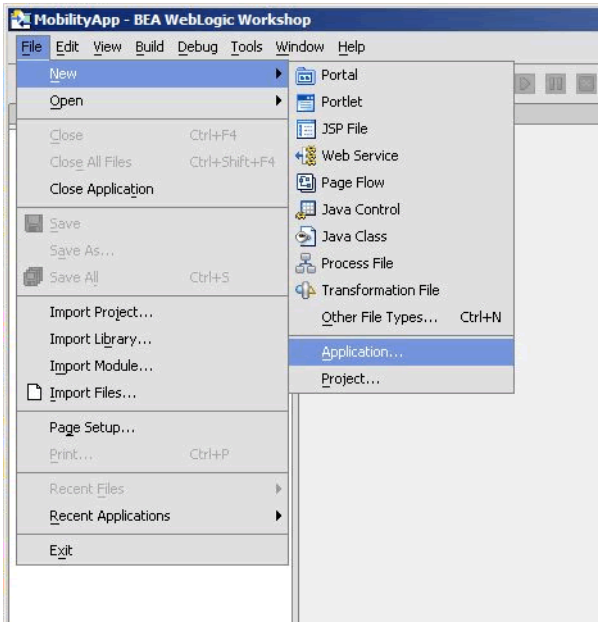
Create the MobilityPortalApp Application

To create the MobilityPortalApp application:

1. To create a new application in Workshop, choose

   file > new > application

Figure 30 Create New Application



2. From the New Application window:

   a. Select Portal Application

      Note: Do not select Default Application as done earlier.

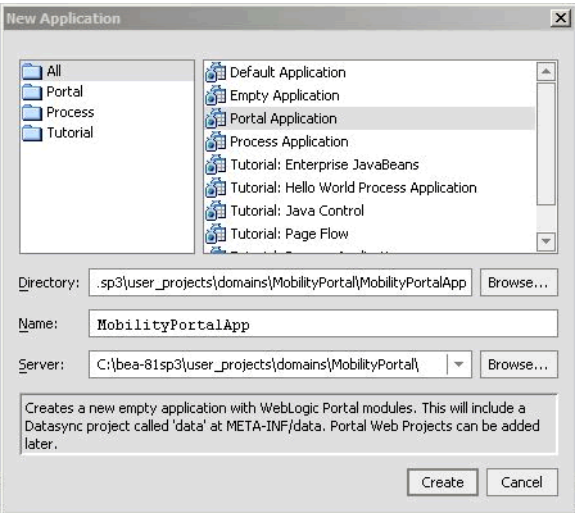
   b. Click Browse next to the Directory field and browse the Domains directory, selecting your newly created MobilityPortal domain.

   c. Enter MobilityPortalApp in the Name field – this is the application where you will import the sample mobility portal application.

   d. Click Browse next to the Server field and select the config.xml file inside the newly created MobilityPortal domain.

3. Once you have filled in the fields as above, click **Create** and the application will be created.

Figure 31 Create Portal Application Dialog



Now that you have created a new Domain and a new Portal Application, you can import the sample Workshop mobility portal project.

Importing the Sample Workshop Mobility Portal Project

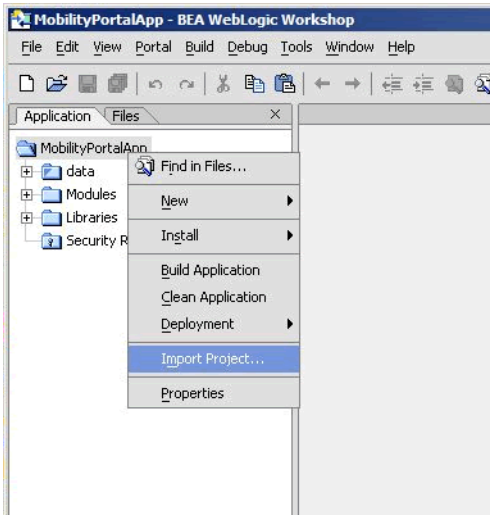
The sample Workshop mobility portal project is located in the <bea>\weblogic81\mobileaware\samples\BEAPortal directory.

A sample mobility portal project called maportal was installed during the Mobility Extension installation.

Import the maportal project as described below and then refer to the BEA Sample Mobility Portal Guide for an explanation of the features of the sample portal.

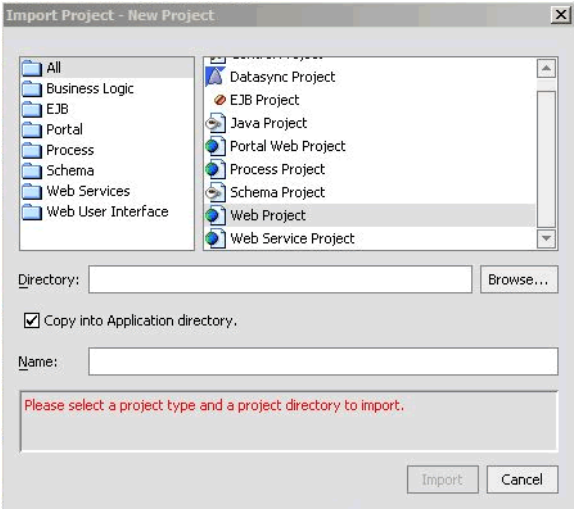
1. Right click the newly created MobilePortalApp application in the Application tree window.
2. Select Import Project.

Figure 32 Import Portal Project



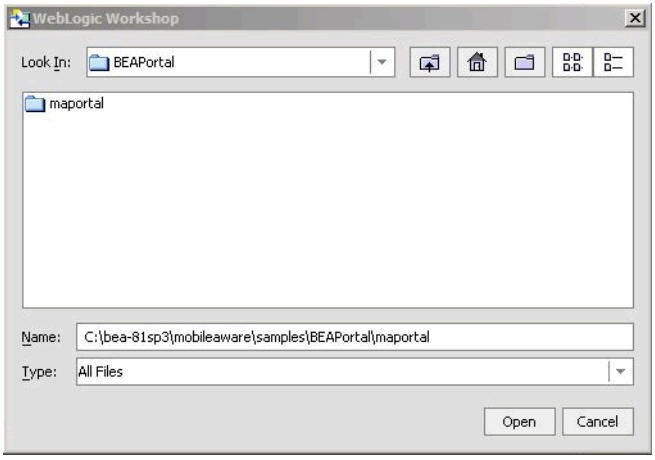
3. On the Import Project – New Project screen, click **Browse** next to the Directory: field and browse to <bea>\weblogic81\mobileaware\samples\BEAPortal\ directory.

Figure 33 Import New Project



4. Select maportal and click Open.

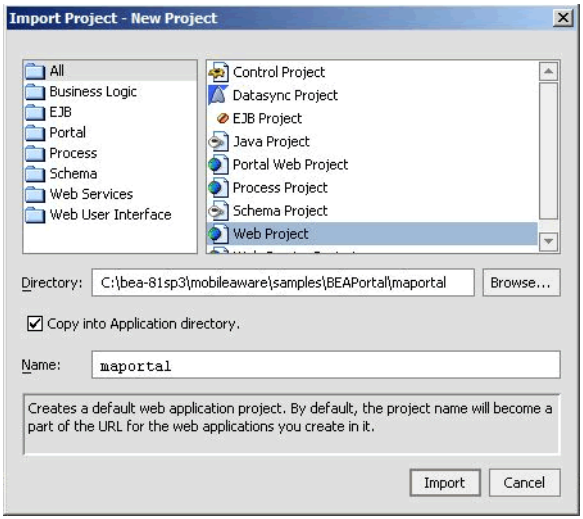
Figure 34 Locate maportal Project



5. Back on the Import Project - New Project screen, the Directory will now be filled in, with a default Name for the application set to maportal .
6. Select Web Project from the right hand pane.

   Note: Do not select Portal Web Project.
7. Make sure that Copy into Application Directory is checked.
8. Click Import.

Figure 35 Import maportal project



The BEA Sample Mobility Portal Guide document explains the features of the maportal sample project.

Installing the MobileAware Device Database

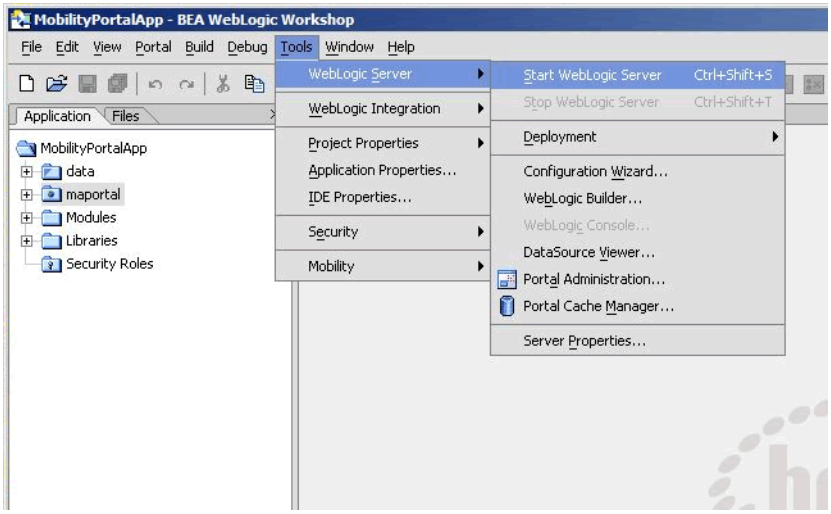
The MobileAware Interaction Server requires a database, the MobileAware Device Database, to store device profile information. The Mobility Extension for BEA WebLogic Workshop enables installation of the Device Database directly into a local PointBase database from the Tools menu in BEA WebLogic Workshop.

Installing the Device Database from BEA Workshop Tools Menu

When you created the Mobility and MobilityPortal domains using the BEA WebLogic Configuration Manager, a PointBase database was installed. The MobileAware Device Database can be installed in this database as follows:

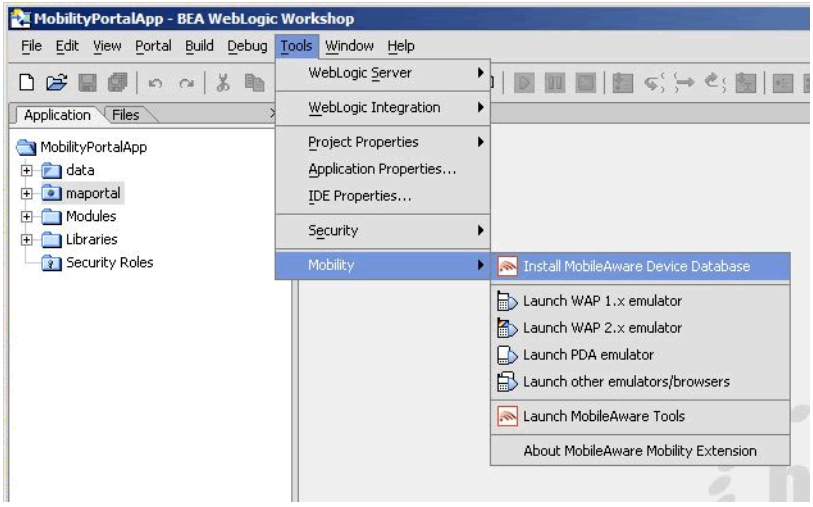
1. Start the WebLogic server for this domain:
   Choose Tools > WebLogic Server > Start WebLogic Server

Figure 36 Start BEA WebLogic Server



2. Once the server has started, install the MobileAware Device Database: Choose Tools > Mobility > Install MobileAware Device Database

Figure 37 Install MobileAware Device Database



3. A confirmation pop-up box will be presented, read and click OK to continue.

4. Once successfully installed a popup window will appear with "The MobileAware Device database has been installed ", click OK to continue.

Next, you will need to configure device emulators into your Workshop environment. This is described in the next section.

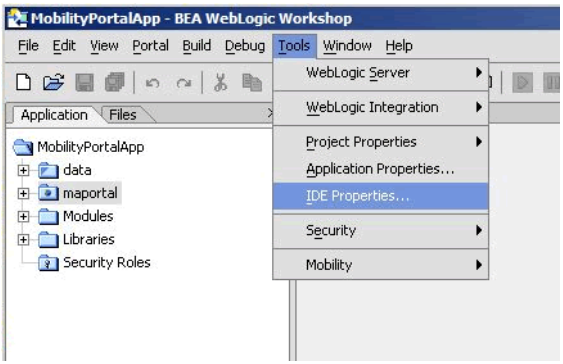
Configuring the Device Emulators

Introduction

This section describes how to configure the emulators for use within BEA Workshop. You can use the device emulators to see how the mobilized content will look on a particular device (for example phones, PDAs). Several emulators are available for download free of charge on the Internet. This section describes how to configure the emulators for use within BEA Workshop.

1. To configure the tools and emulators for usage within the BEA Workshop environment, select IDE properties from the Tools Menu.
   Choose Tools > IDE Properties

Figure 38 Select IDE Properties



2. Now configure the emulators:

   a. Select the Emulators tab.

   b. Select WAP1.x emulator by browsing to the appropriate emulator executable file.

      Note: MobileAware recommends using the Openwave Emulator, which can emulate WAP 1.x and XHTML-MP devices. However, emulators from Nokia, Ericsson, or others can also be utilised. If using an Openwave Emulator, select the

OSDK62http.exe (for version 6.2) or the OSDK61http.exe (for version 6.1) in the installation directory where you have installed the emulator, for example C:\Program Files\Openwave\SDK 6.1\program\http.

c. Select WAP2.0 emulator by browsing to the appropriate emulator executable file.

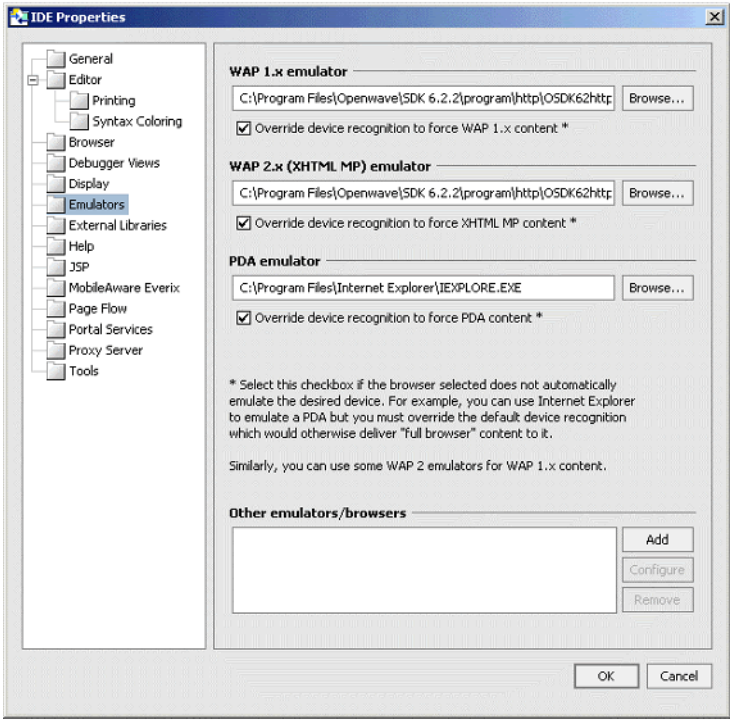
d. Select PDA emulator by browsing to the appropriate emulator executable file.

– You can find a MobileAware PDA emulator at

<bea>\weblogic81\mobileaware\tools\emulators\mobileaware\PDA.exe.

– Alternatively, to set up Microsoft Internet Explorer to function as a PDA emulator, browse to your iexplore.exe in the PDA emulator text box as can be seen in the diagram below and check the box next to Override device recognition to force PDA content .

Figure 39 Setting up Internet Explorer as a PDA Emulator



Next Steps

Now that you have successfully installed the MobileAware Interaction Server, BEA WebLogic Edition, you are almost ready to begin mobilizing your own web applications and portal projects.

Before you do, it is recommended that you go through the BEA Sample Workshop Mobility Project Guide and the BEA Sample Mobility Portal Guide. The BEA Sample Workshop Mobility Project Guide provides a step-by-step exercise in mobilizing a sample workshop application, while the BEA Sample Mobility Portal Guide illustrates the features of a Mobilized BEA Portal Framework.

Installing the MobileAware Interaction Server on Sun Solaris, RedHat Linux, or HP-UX

This section explains the installation procedure for installing the MobileAware Interaction Server, BEA WebLogic Edition for BEA WebLogic Platform 8.1 on Sun Solaris, Redhat Linux 2.1, and HP-UX 11.

Introduction

The BEAMAInteractionServer81-<platform>.bin installation program is used to install the MobileAware Interaction Server, BEA WebLogic Edition on.

- For RedHat Linux, use the BEAMAInteractionServer81-linux.bin installer.
- For Sun Solaris, use the BEAMAInteractionServer81-solaris.bin installer.
- For HP-UX, use the BEAMAInteractionServer81-hpux.bin installer.

The installer installs the MobileAware Interaction Server, BEA WebLogic Edition into an existing BEA WebLogic installation at <bea_home>/weblogic81/mobileaware.

License

You must update your BEA License with the MobileAware Interaction Server, BEA WebLogic Edition product component details. The required product component information is available for download from the BEA Web Site at the same location as the software installers.

Once you have updated your license, you will be able to develop and test mobile-device ready content. If you have a developer or evaluation BEA License, the software installer will install an evaluation version of the MobileAware Device Database enabling testing on a number of popular

device emulators as well as a number of popular mobile and PDA devices. A production license must be present to install and utilise the full MobileAware Device Database. **Note**: An invalid license will result in HTML being delivered.

Please contact a BEA or MobileAware sales representative if you wish to extend your evaluation or developer license or upgrade to a production license.

Installation Pre-requisites

Software Pre-Requisites

The following software must be installed prior to installing the MobileAware Interaction Server, BEA WebLogic Edition:

- supported Operating System, from the following list:
  - Sun Solaris 8, 9
  - RedHat Linux 2.1
  - HP-UX 11
- BEA WebLogic Platform 8.1SP2 or SP3
- A Database, from the following list:
  - Oracle 9i
  - PointBase
  - SQL Server 2000
  - Postgres 7.3.2+
- Internet Browser:
  - Netscape 4.75 or higher, or
  - Internet Explorer 5 or higher

License

Ensure that you have updated your BEA License with the MobileAware Interaction Server, BEA WebLogic Edition product component details. The required license component information can be downloaded from the same download page as the software installer.

Installation Procedure for Sun Solaris, RedHat Linux, and HP-UX

1. Download the appropriate platform installer:
   - For RedHat Linux, use the BEAMAInteractionServer81-linux.bin installer.
   - For Sun Solaris, use the BEAMAInteractionServer81-solaris.bin installer.
   - For HP-UX, use the BEAMAInteractionServer81-hpux.bin installer.
2. Open an xterm, telnet, or console window and run the appropriate platform MobileAware Interaction Server installation program as identified above.
3. The first stage of the installation is the Introduction. Please read the text and ensure that the installation environment meets the stated requirements. Press <Enter> to continue.
4. Next is the License Agreement. Read the license agreement text and enter the value Y if you accept the terms of the license agreement, or the value N if you do not.
   Note: this will cancel the installation after prompting you to confirm cancellation.
5. When Locate WebLogic Installation is shown, you must enter an absolute path to the location of the BEA WebLogic installation where the MobileAware Interaction Server should be installed. If BEA WebLogic is already installed, the installer will display the most recent <bea_home> by default. Press <Enter> to accept the default location as shown.

   Alternatively, if you want to install the MobileAware Interaction Server into a different BEA WebLogic installation, enter the absolute path to the location of the appropriate BEA WebLogic installation and press <Enter>.
   Note: You must have write and execute permissions for the chosen installation folder.
6. Next is the Pre-Installation Summary. Review the displayed installation configuration settings to ensure they are correct. If you are satisfied with the configuration settings, press <Enter> to continue. Otherwise, type back to return to a previous step and modify the configuration settings.
7. The Installation Complete message will be displayed following a successful install. Press <Enter> to exit the installer.

Installing the MobileAware Device Database

Please refer to the section Installing the Device Database with the Device Installer for instructions on installing the MobileAware Device Database.

Configuration of a MobileAware Interaction Server-Enabled Web Application

Please refer to Deploying an Application in the MobileAware Interaction Server, BEA WebLogic Edition Administration Guide for details on:

- Creating the deployment environment for a mobilized web application
- Configuring the MobileAware Interaction Server servlet filter
- Configuring the web application's Web Deployment Descriptor (web.xml file) for the MobileAware Interaction Server servlet filter

Post-Installation Configuration and Use of the Administration Tools

Please refer to Administration Console in the MobileAware Interaction Server, BEA WebLogic Edition Administration Guide for a description of how to use the Administration Console to manage device profiles in the MobileAware Device Database.

Please refer to Working With Diagnostics in the MobileAware Interaction Server, BEA WebLogic Edition User Guide for information on configuring and using the Diagnostics tools.

Installing the Device Database

Introduction

The MobileAware Interaction Server requires a database, the MobileAware Device Database, to store device profile information. Currently, the MobileAware Device Database supports Oracle, MySQL, Postgres, PointBase, and SQL Server databases.

The following installation procedures assume an Oracle, MySQL, Postgres, PointBase database has already been installed and the administrator performing the installation is familiar with database creation.

For installation on SQL Server, please refer to Installing the Device Database for SQL Server.

After completing the MobileAware Device Database installation below, configure the mis.properties settings as described in the next chapter.

About the Device Installer Tool

MobileAware has developed a GUI tool called the Device Installer that is used to perform both initial installations of the MobileAware Device Database, as well as installations of the MobileAware provided quarterly updates to the MobileAware Device Database.

Note: Individual additions and modifications to an installed MobileAware Device Database are made using the Administration Console, which is documented in the MobileAware Interaction Server, BEA WebLogic Edition Administration Guide.

The Device Installer tool itself allows customers to:

- Create a new MobileAware Device Database from a MobileAware provided flat DeviceRepository.xml file
- Backup a customer's existing MobileAware Device Database to an XML file
- Update a customer's existing MobileAware Device Database with the MobileAware provided quarterly updates (the quarterly updates are also provided as a flat DeviceRepository.xml file)

When using the Device Installer tool to install the MobileAware provided quarterly updates, the tool:

- Backs up the customer's existing device database to an XML file
- Detects and stores customer modifications to their existing device database
- Installs the new MobileAware provided device database
- Presents the customer with a list of modifications and allows the customer to re-apply each of them or accept the values provided in the device database update

Locating the Device Installer Tool

The Device Installer tool can be found under the installation directory that was selected during the installation:

- For windows, this will be:

  <install_directory>\applications\DeviceInstaller\MISDeviceInstaller.exe

- For unix, this will be:

  <install_directory>/applications/DeviceInstaller/MISDeviceInstaller

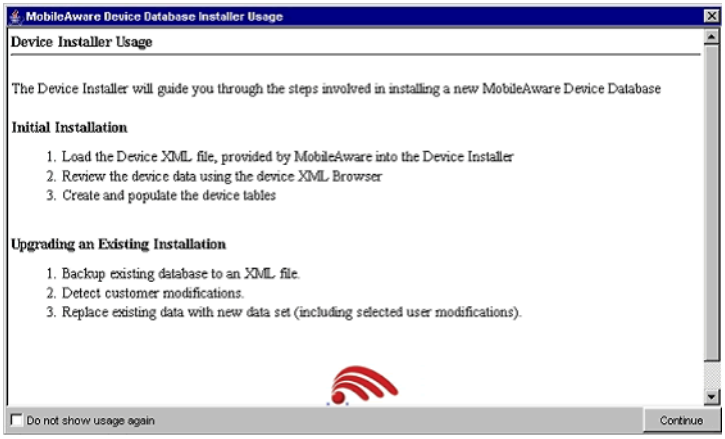
The Install Complete screen at the end of the MobileAware Interaction Server installation contained the full path name for the install directory for reference.

Device Installer Scenario 1: Installing a New MobileAware Device Database

The steps used to install a new MobileAware Device Database are shown below, along with sample screenshots:

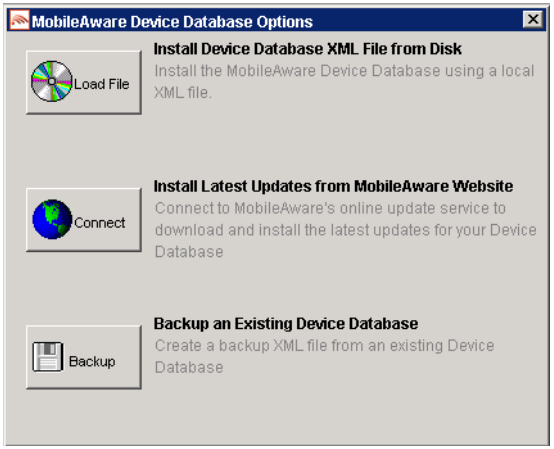
1. Create a database for the MobileAware Device Database and note the connection details. To complete the device database installation, you will need the database type, the database URL, and a valid user name and password for accessing the database.
2. Run MISDeviceInstaller.exe (Windows) or MISDeviceInstaller (Unix/Linux platforms) and the Device Installer Usage screen will appear. Click Continue.

Figure 40 Device Installer Usage Screen



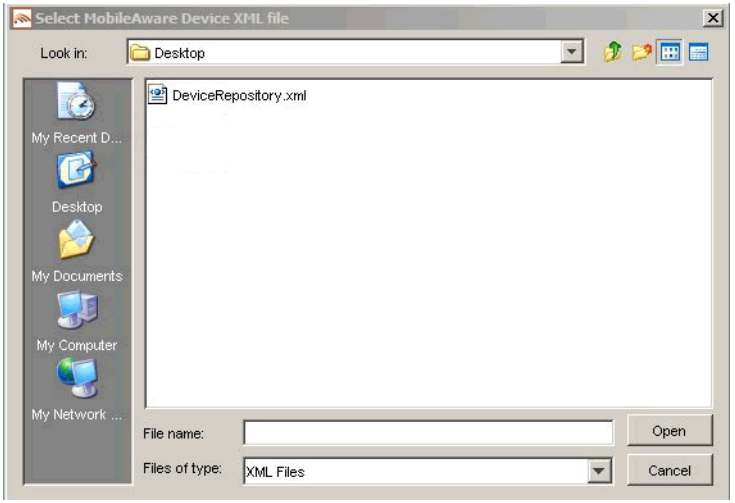
3. The MobileAware Device Database Options screen will appear. Click Load File to install the MobileAware Device Database from the DeviceRepository.xml file included with the MobileAware Interaction Server installer.

Figure 41 MobileAware Device Database Options



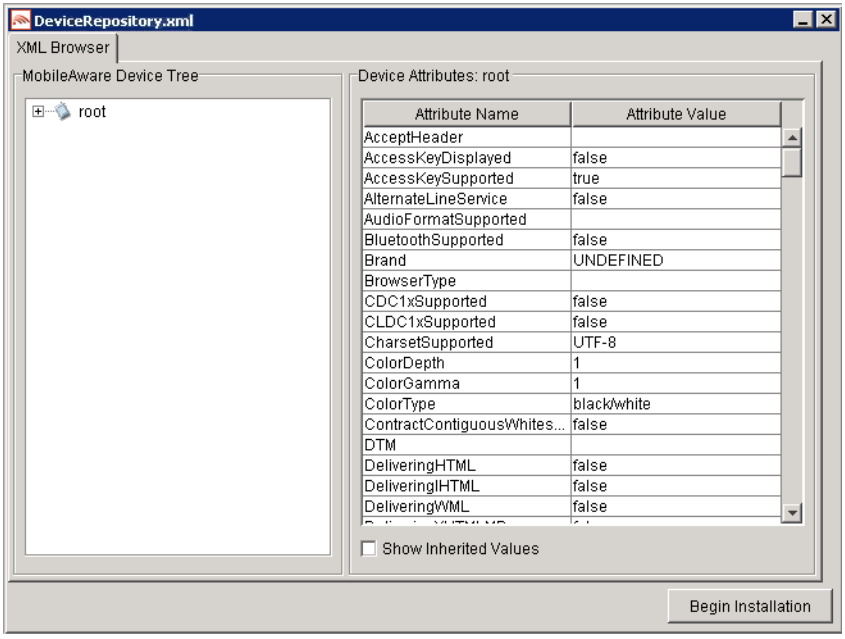
4. When the Select MIS Device XML file screen appears, choose a DeviceRepository.xml file to install and click Open. The DeviceRepository.xml file included with the MobileAware Interaction Server installer will be shown as the default for a new installation.

Figure 42 Select MobileAware Device XML File Screen



5. The DeviceRepository.xml screen shows the DeviceRepository.xml to be installed. The file has been converted into a hierarchical structure and provided as a preview of the MobileAware Device Database to be installed. Inherited values for each device can also be displayed by checking the show inherited values box. Click Begin Installation to proceed.

Figure 43 DeviceRepository.xml Screen



6. In the Database Connection Details screen, select the type of database from the Database Type drop down menu and enter the database connection details in the format shown. The Database URL, User Name, and Password should be available from your Database Administrator (DBA). The format for these URL's is displayed in the dialog and is also described below:

   – For Oracle, set to:

     jdbc:oracle:thin:@<oracle_host>:<oracle_port>:<oracle_database_name>

   – For MySQL, set to:

     jdbc:mysql://<mysql-server-ip:port>/
     <db-name>?user=<connect-user>&password=<connect-password>

   – For Postgres, set to:

jdbc:postgresql://<postgres_machine>:<postgres_port>/<postgres_database_name>

– For PointBase, set to:

jdbc:pointbase:server://<ip_address>:<port>/<SID>

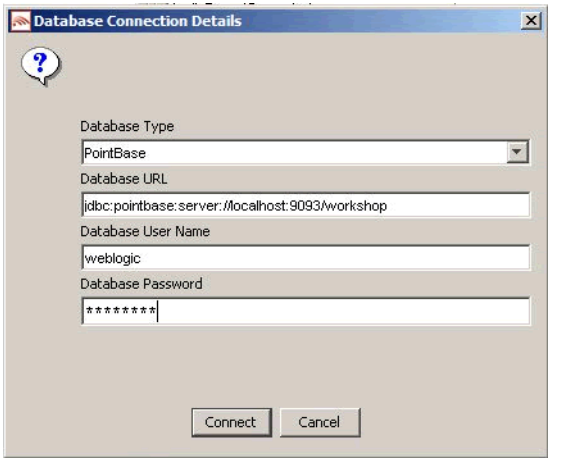
– When using WebLogic database connection pool, set to:

jdbc:weblogic:pool:<poolname>

– Example: deviceDB.url: jdbc:oracle:thin:@oracle_host:1521:mySID

7. Click Connect. Once a successful connection is made the details are stored and will be remembered the next time the tool is run.

Figure 44 Example of PointBase Connection Details screen

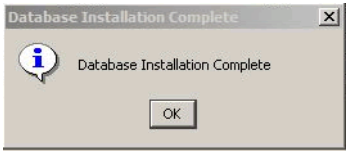


8. A progress bar shows the progress of the data installation.

Figure 45 Creating Device Table Progress Bar

9. Click OK on the Database Installation Complete screen and then click Exit on the Device Installer screen to close the tool.

Figure 46 Database Installation Complete



Device Installer Scenario 2: Using MobileAware's Online Update Service to Update the MobileAware Device Database

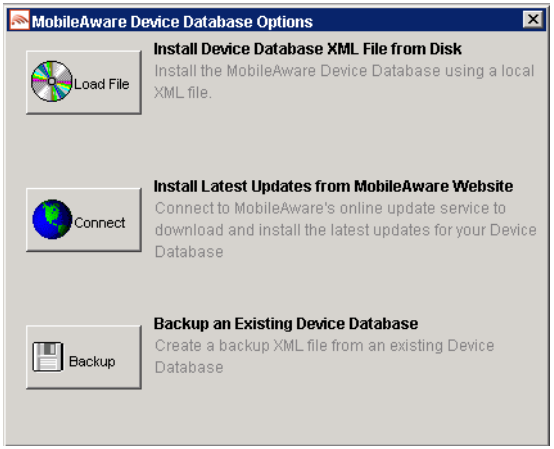
The steps used to connect to MobileAware's Online Update Service to update an existing MobileAware Device Database are described below.

1. Run MISDeviceInstaller.exe (Windows) or MISDeviceInstaller (Unix/Linux platforms) and the Device Installer Usage screen will appear. Click Continue.

Figure 47 Device Installer Usage Screen

2. The MobileAware Device Database Options screen will appear. Click Connect to connect to MobileAware's online update service for the latest available DeviceRepository.xml file.

Figure 48 MobileAware Device Database Options



3. On the Database Connection Details screen, select the type of database from the Database Type drop down menu and enter the database connection details in the format shown. The Database URL, User Name, and Password should be available from your Database Administrator (DBA). The format for these URL's is displayed in the dialog and is also described below:

- For Oracle, set to:

  jdbc:oracle:thin:@<oracle_host>:<oracle_port>:<oracle_database_name>

- For MySQL, set to:

  jdbc:mysql://<mysql-server-ip:port>/
  <db-name>?user=<connect-user>&password=<connect-password>

- For Postgres, set to:

  jdbc:postgresql://<postgres_machine>:<postgres_port>/<postgres_database_name>

- For PointBase, set to:

  jdbc:pointbase:server://<ip_address>:<port>/<SID>

- When using WebLogic database connection pool, set to:

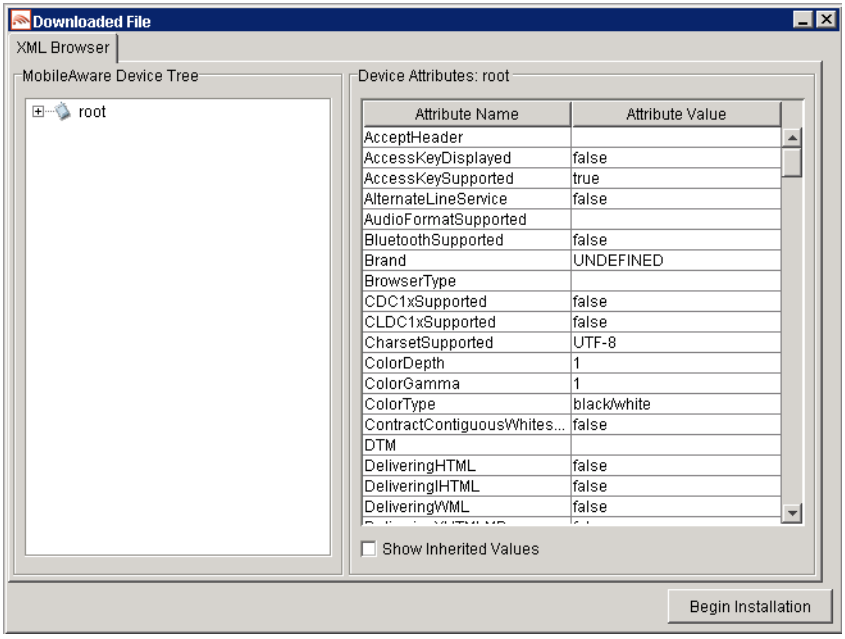
  jdbc:weblogic:pool:<poolname>

- Example: deviceDB.url: jdbc:oracle:thin:@oracle_host:1521:mySID

4. Click Connect. Once a successful connection is made the details are stored and will be remembered the next time the tool is run.

5. If you successfully connect and are authorized to receive the latest DeviceRepository.xml file, it will be downloaded and the next screen you will see is the Downloaded File screen shows the DeviceRepository.xml to be installed. The file has been converted into a hierarchical structure and provided as a preview of the MobileAware Device Database to be installed. Inherited values for each device can also be displayed by checking the show inherited values box. Click Begin Installation to proceed.

Figure 49 Downloaded File Screen



6. Re-enter Database Connection Details (may not be required):

   On the Database Connection Details screen, select the type of database from the Database Type drop down menu and enter the database connection details in the format shown. The Database URL, User Name, and Password should be available from your Database Administrator (DBA). The format for these URL's is displayed in the dialog and is also described below:

- For Oracle, set to:

jdbc:oracle:thin:@<oracle_host>:<oracle_port>:<oracle_database_name>

- For MySQL, set to:

  jdbc:mysql://<mysql-server-ip:port>/
  <db-name>?user=<connect-user>&password=<connect-password>

- For Postgres, set to:

  jdbc:postgresql://<postgres_machine>:<postgres_port>/<postgres_database_name>

- For PointBase, set to:

  jdbc:pointbase:server://<ip_address>:<port>/<SID>

- When using WebLogic database connection pool, set to:

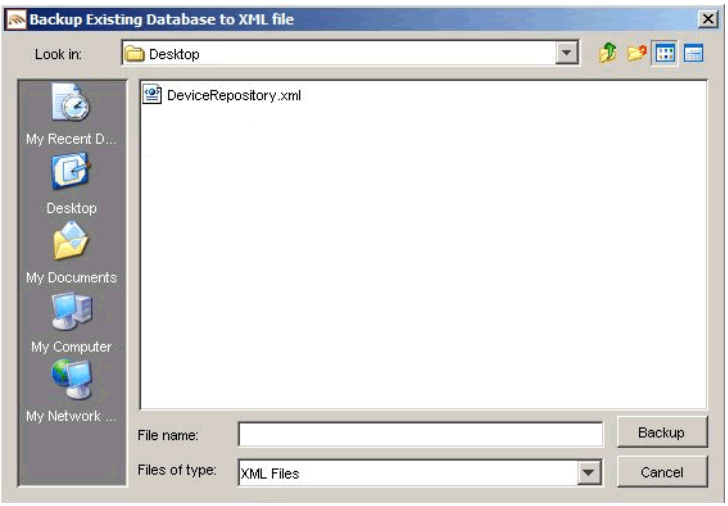
  jdbc:weblogic:pool:<poolname>

- Example: deviceDB.url: jdbc:oracle:thin:@oracle_host:1521:mySID

7. Click Connect. Once a successful connection is made the details are stored and will be remembered the next time the tool is run.

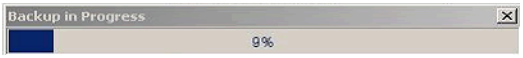
8. If an existing MobileAware Device Database is detected, the Backup Existing Database to XML file screen is shown and you are required to backup the existing device database to an XML file before proceeding. The created backup XML file will have the same structure as the DeviceRepository.xml file. This backup XML file will be used for detecting modifications later in the upgrade process. Enter a name for the XML file and click Backup.

Figure 50 Backup Existing Device Database Screen



9. A progress bar monitors the progress of the backup process. This may take up to 2 minutes depending on the connection.

Figure 51 Backup Progress Bar



10. Detect Custom Devices/Attributes:

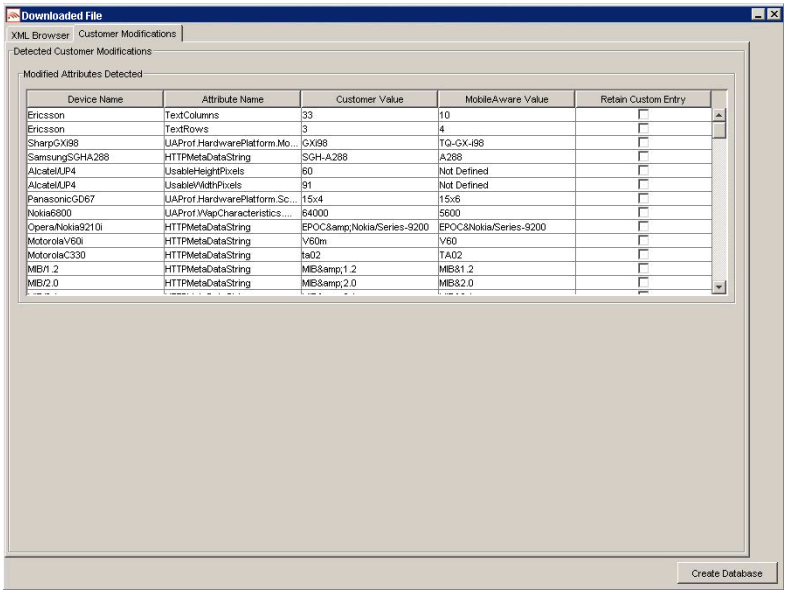
    The backupDeviceRepository.xml and DeviceRepository.xml files are compared to allow a list of modifications to be presented to the user.

    If no modifications are identified, the existing database will be replaced with the selected Device XML file. When the Device Installation Compete window appears, click OK and then click Exit to close the DeviceInstaller tool.

11. If odifications are detected, you will be asked to review the modifications before proceeding with the installation.

12. Once the detection process completes, a dialog box similar to the one shown below will appear showing the delta between the DeviceRepository.xml file to be installed and the existing MobileAware Device Database. You can now choose to re-apply any modifications that have been detected in the existing MobileAware Device Database by selecting the appropriate Retain Custom Entry checkboxes.

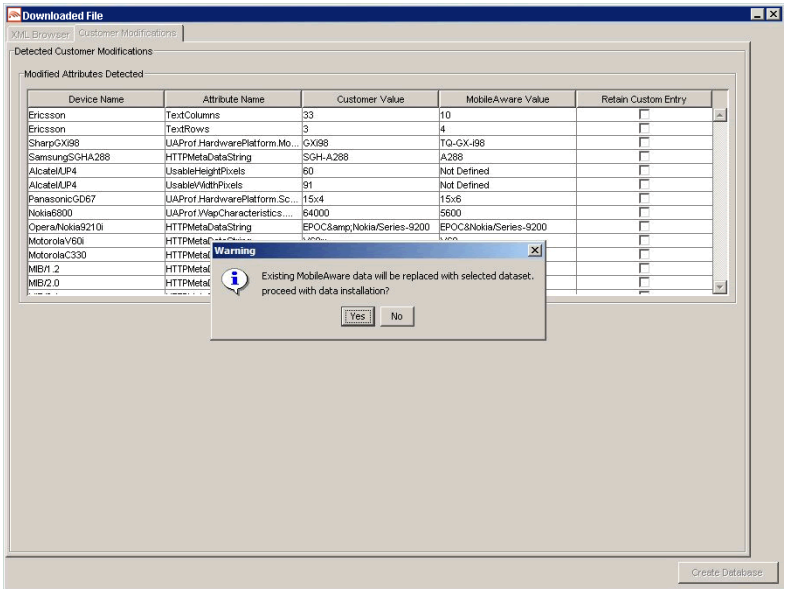
Figure 52 Comparison of Existing Download Data with New Data



13. Create the database

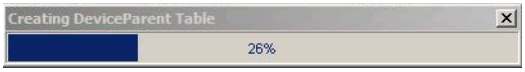
    After selecting any data that you wish to retain, click **Create Database**. You will see a Warning dialog box indicating that the MobileAware Device Database data will be replaced with the selected data set. Click **Yes** button to proceed with the installation.

Figure 53 Overwrite Data Screen



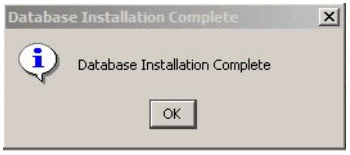
14. A progress bar shows the progress of the data installation.

Figure 54 Creating Device Table Progress Bar



15. Click OK on the Database Installation Complete screen and then click Exit on the Device Installer screen to close the tool.

Figure 55 Database Installation Complete

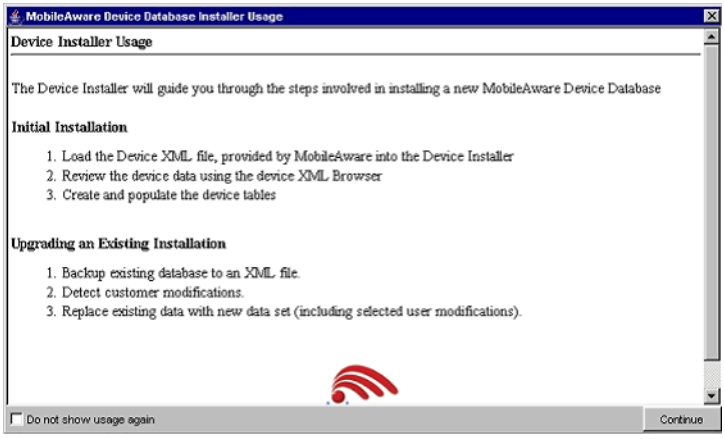


Device Installer Scenario 3: Updating an Existing MobileAware Device Database from an XML File

The steps used to update an existing MobileAware Device Database from an XML file are shown below, along with sample screenshots:

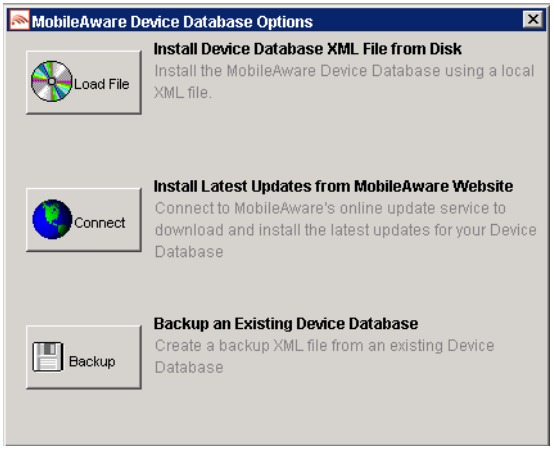
1. Run MISDeviceInstaller.exe (Windows) or MISDeviceInstaller (Unix/Linux platforms) and the Device Installer Usage screen will appear. Click Continue.

Figure 56 Device Installer Usage Screen



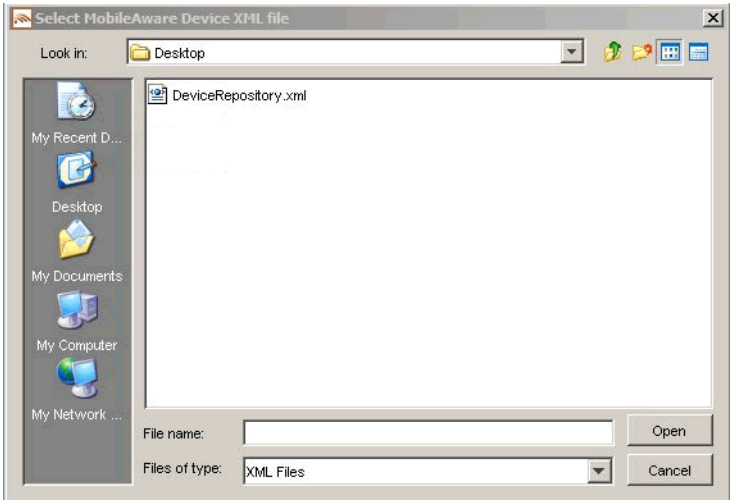
2. The MobileAware Device Database Options screen will appear. Click Load File to install the MobileAware Device Database from a local DeviceRepository.xml.

Figure 57 MobileAware Device Database Options



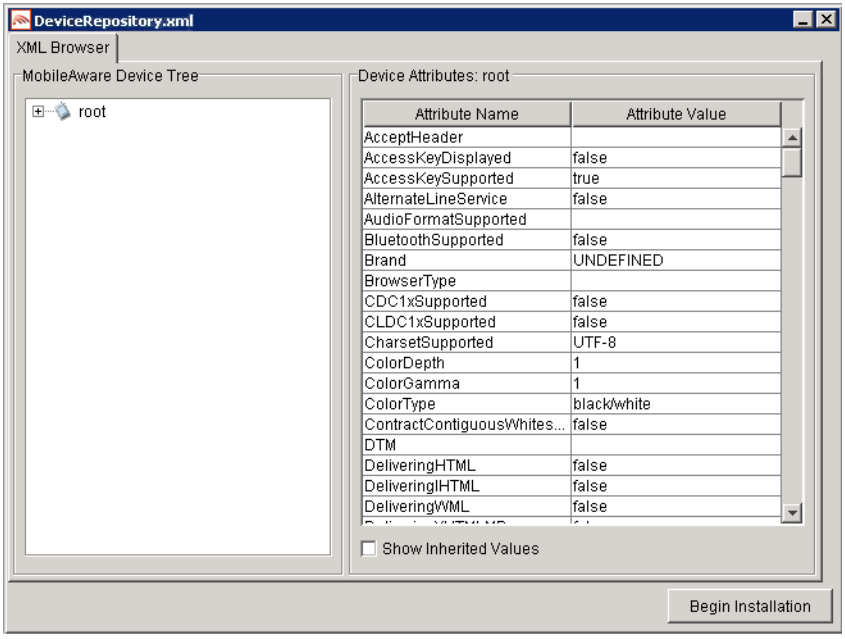
3. Then the Select MIS Device XML file screen appears, choose a DeviceRepository.xml file to install and click Open. The DeviceRepository.xml file included with the MobileAware Interaction Server installer will be shown as the default for a new installation.

Figure 58 Select MobileAware Device XML File Screen



4. The DeviceRepository.xml screen shows the DeviceRepository.xml to be installed. The file has been converted into a hierarchical structure and provided as a preview of the MobileAware Device Database to be installed. Inherited values for each device can also be displayed by checking the show inherited values box. Click Begin Installation to proceed.

Figure 59 DeviceRepository.xml Screen



5. On the Database Connection Details screen, select the type of database from the Database Type drop down menu and enter the database connection details in the format shown. The Database URL, User Name, and Password should be available from your Database Administrator (DBA). The format for these URL's is displayed in the dialog and is also described below:

- For Oracle, set to:

  jdbc:oracle:thin:@<oracle_host>:<oracle_port>:<oracle_database_name>

- For MySQL, set to:

  jdbc:mysql://<mysql-server-ip:port>/
  <db-name>?user=<connect-user>&password=<connect-password>

- For Postgres, set to:

  jdbc:postgresql://<postgres_machine>:<postgres_port>/<postgres_database_name>

- For PointBase, set to:

  jdbc:pointbase:server://<ip_address>:<port>/<SID>

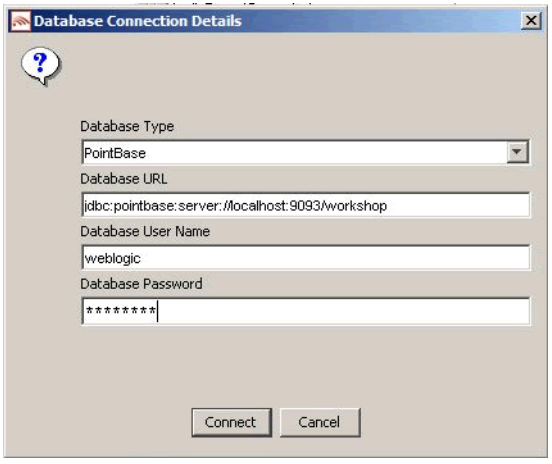
- When using WebLogic database connection pool, set to:

  jdbc:weblogic:pool:<poolname>

- Example: deviceDB.url: jdbc:oracle:thin:@oracle_host:1521:mySID

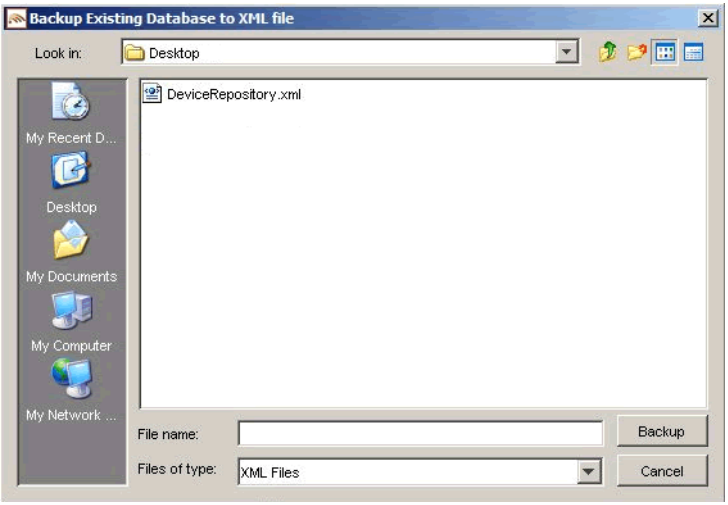
6. Click Connect. Once a successful connection is made the details are stored and will be remembered the next time the tool is run.

Figure 60 Example of PointBase Connection Details screen



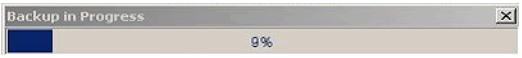
7. If an existing MobileAware Device Database is detected, the Backup Existing Database to XML file screen is shown and you are required to backup the existing device database to an XML file before proceeding. The created backup XML file will have the same structure as the DeviceRepository.xml file. This backup XML file will be used for detecting modifications later in the upgrade process. Enter a name for the XML file and click Backup.

Figure 61 Backup Existing Device Database Screen



8. A progress bar monitors the progress of the backup process. This may take up to 2 minutes depending on the connection.

Figure 62 Backup Progress Bar



9. Detect Custom Devices/Attributes:

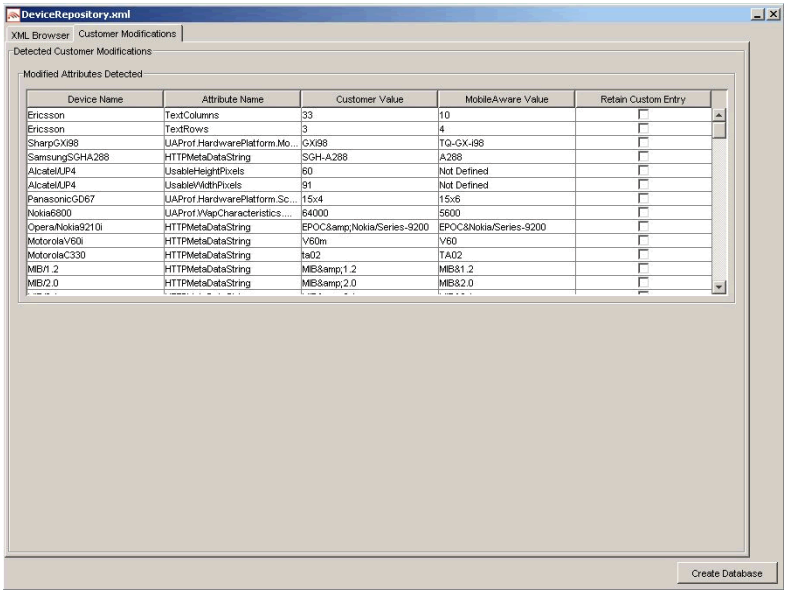
   The backupDeviceRepository.xml and DeviceRepository.xml files are compared to allow a list of modifications to be presented to the user.

   If no modifications are identified, the existing database will be replaced with the selected Device XML file. When the Device Installation Compete window appears, click OK and then click Exit to close the DeviceInstaller tool.

10. If modifications are detected, you will be asked to review the modifications before proceeding with the installation.

11. Once the detection process completes, a dialog box similar to the one shown below will appear showing the delta between the DeviceRepository.xml file to be installed and the existing MobileAware Device Database. You can now choose to re-apply any modifications that have been detected in the existing MobileAware Device Database by selecting the appropriate Retain Custom Entry checkboxes.

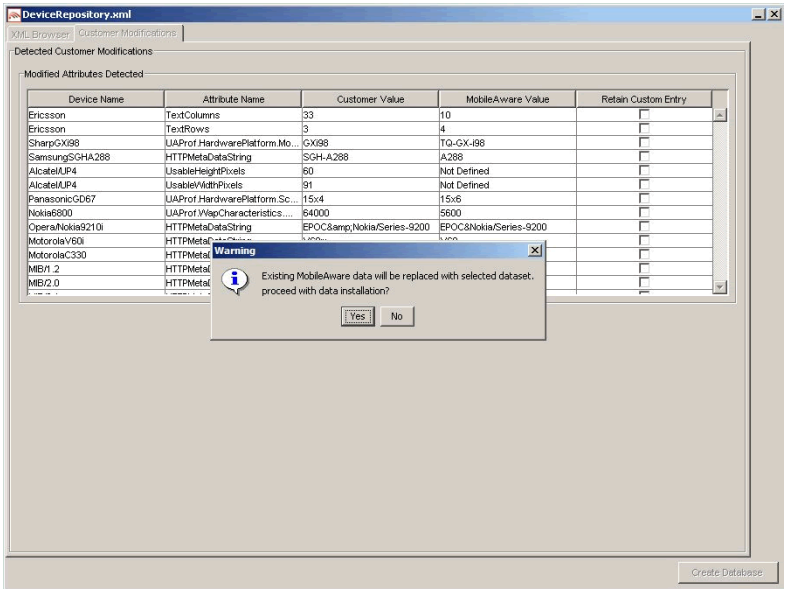
Figure 63 Comparison of Existing Data with New Data



12. Create the database

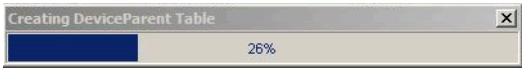
    After selecting any data that you wish to retain, click Create Database. You will see a Warning dialog box indicating that the MobileAware Device Database data will be replaced with the selected data set. Click **Yes** button to proceed with the installation.

Figure 64 Overwrite Data Screen



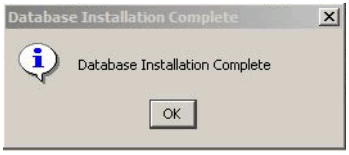
13. A progress bar shows the progress of the data installation.

Figure 65 Creating Device Table Progress Bar



14. Click OK on the Database Installation Complete screen and then click Exit on the Device Installer screen to close the tool.

Figure 66 Database Installation Complete

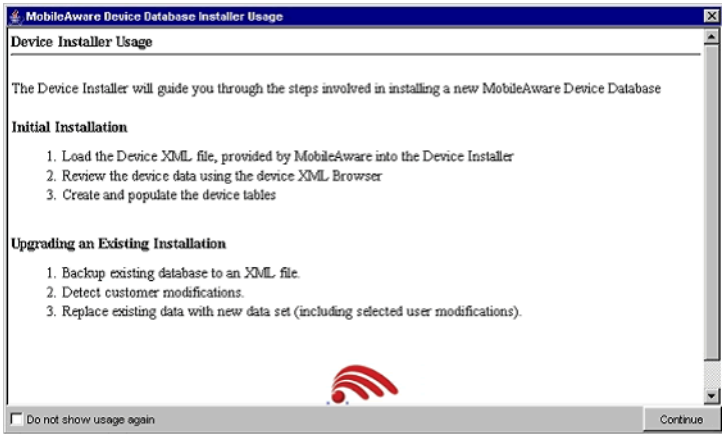


Device Installer Scenario 4: Backup an Existing MobileAware Device Database to an XML File

The steps used to backup an existing MobileAware Device Database are shown below, along with sample screenshots:

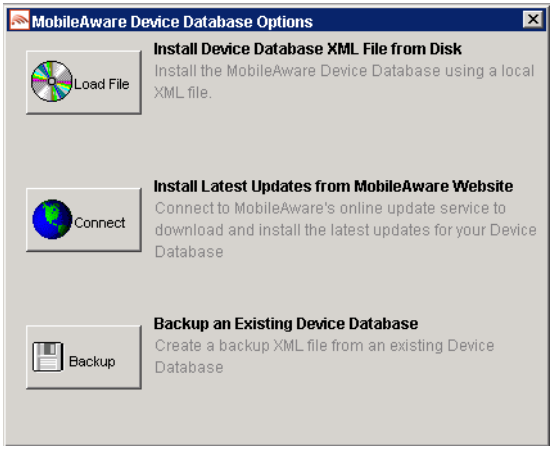
1. Run MISDeviceInstaller.exe (Windows) or MISDeviceInstaller (Unix/Linux platforms) and the Device Installer Usage screen will appear. Click Continue.

Figure 67 Device Installer Usage Screen



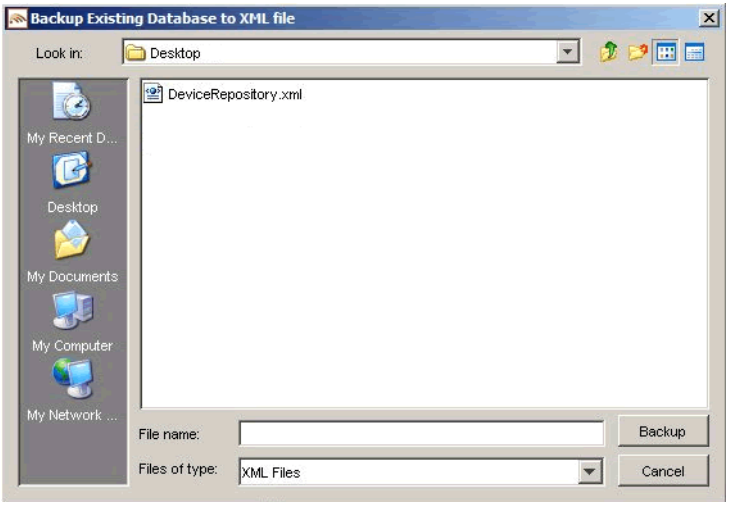
2. The MobileAware Device Database Options screen will appear. Click **Backup** to backup the installed MobileAware Device Database to an XML file.

Figure 68 MobileAware Device Database Options



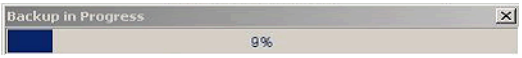
3. On the Backup Existing Database to XML file screen, enter a name for the XML file and click Backup to backup the existing device database to an XML file.

Figure 69 Backup Existing Device Database Screen



4. progress bar monitors the progress of the backup process. This may take up to 2 minutes depending on the connection.

Figure 70 Backup Progress Bar



5. When the backup completes, exit the tool by select File | Exit.

Installing the MobileAware Device Database on SQL Server

Due to issues with the Microsoft JDBC Drivers for SQL Server, it is necessary to install the MobileAware Device Database on SQL Server using the MobileAware Device Database SQL Scripts.

To install the MobileAware Device Database on SQL Server, follow the steps below.

1. Using a tool like SQL Enterprise Manager, create a SQL Server database for the MobileAware Device Database.
2. Using a tool like SQL Query Analyzer, connect to the new database and run the provided Schema-SQLServer.sql script located in the <install_directory>/database/ directory.
3. Run the provided SQLScript.sql script located in the <install_directory>/database/ directory.
4. Configure the MobileAware Device Database connection details in the mis.properties file. For SQL Server running with BEA WebLogic, the deviceDB.driver and deviceDB.url properties should be configured to:

- deviceDB.driver: weblogic.jdbc.sqlserver.SQLServerDriver
- deviceDB.url: jdbc:bea:sqlserver://<sqlserver_host>:<sqlserver_port>;databaseName=<sqlserver_database_name>
- deviceDB.user:sqlserver_login
- deviceDB.password.sqlserver_login_password

Next Steps

Now that you have successfully installed the MobileAware Interaction Server, BEA WebLogic Edition, you are almost ready to begin mobilizing your own web applications and portal projects.

Before you do, it is recommended that you go through the BEA Sample Workshop Mobility Project Guide and the BEA Sample Mobility Portal Guide. The BEA Sample Workshop Mobility

Project Guide provides a step-by-step exercise in mobilizing a sample workshop application, while the BEA Sample Mobility Portal Guide illustrates the features of a Mobilized BEA Portal Framework.