

Version 7.0



Installation guide

Version 7.0



Installation guide

Note

Before using this information and the product it supports, read the information in Notices.

Fourth Edition (June 2007)

This edition applies to version 7.0 of IBM WebSphere Development Studio Client for iSeries (part number: 5724-A81) and version 7.0 of IBM WebSphere Development Studio Client Advanced Edition for iSeries (part number: 5724-D46) and to all subsequent releases and modifications until otherwise indicated in new editions.

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Overview

This installation guide provides instructions for installing and uninstalling IBM® WebSphere® Development Studio Client for iSeries™ or WebSphere Development Studio Client Advanced Edition for iSeries. In Version 7.0, the Installation Manager is used to install and service the product.

Note: For the updated Installation guide and release note, refer to:

- WebSphere Development Studio Client for iSeries: <http://download.boulder.ibm.com/ibmdl/pub/software/awdtools/wdsc/v7/70/documents>
- WebSphere Development Studio Client Advanced Edition for iSeries: <http://download.boulder.ibm.com/ibmdl/pub/software/awdtools/wdscae/v7/70/documents>

IBM Installation Manager

IBM Installation Manager is a program that helps you install the WebSphere and Rational® product packages on your workstation. It also helps you update, modify, and uninstall this and other packages that you install. A package can be a product, a group of components, or a single component that is designed to be installed by Installation Manager.

Regardless of which installation scenario you follow to install WebSphere Development Studio Client on your workstation, use Installation Manager to install your package.

IBM Installation Manager offers a number of time-saving features. It keeps track of what you are about to install, software components that you have already installed, and components that are available for you to install. It searches for updates so you know that you are installing the latest version of a WebSphere or Rational product package. Installation Manager also provides tools for managing licenses for the product packages that it installs. It provides tools for updating and modifying packages. You can also use Installation Manager to uninstall product packages.

IBM Installation Manager comprises five wizards that make it easy to maintain your product packages through their lifecycles:

- The Install Packages wizard walks you through the installation process. You can install a product package by simply accepting the defaults, or you can modify the default settings to create a custom installation. Before you install a product package, you are provided with a complete summary of the selections that you have made throughout the wizard. With the wizard you can install one or more product packages at the same time.
- The Update Packages wizard searches for available updates to product packages that you have installed. An update might be a released fix, a new feature, or a new version of the product. Details of the contents of the update are provided in the wizard. You can choose whether to apply an update.
- With the Modify Packages wizard you can modify specific elements of a package that you have already installed. During your initial installation of the product package, you select the features you want to install. If you find later that you

require other features, you can use the Modify Packages wizard to add them to your product package installation. You can also remove features, and add or remove languages.

- The Manage Licenses wizard helps you to set up the licenses for your packages. However, you will not use this wizard for installing a WebSphere Development Studio Client package. WebSphere Development Studio Client includes a full license that is automatically installed upon installation of the product.
- The Uninstall Packages wizard helps you to remove a product package from your computer. You can uninstall more than one package at a time.

IBM Rational Software Development Platform

The IBM Rational Software Development Platform is a common development environment that contains the development workbench and other software components that are shared by multiple products.

The development platform can be shared by the following offerings:

- WebSphere Development Studio Client for iSeries *or* WebSphere Development Studio Client Advanced Edition for iSeries
- WebSphere Developer for zSeries®
- Host Access Transformation Services Toolkit
- Rational Application Developer
- Rational Functional Tester
- Rational Software Architect
- Rational Software Modeler
- Rational Systems Developer

About WebSphere Development Studio Client

IBM WebSphere Development Studio Client for iSeries provides tools for building and maintaining native i5/OS® applications, as well as working with Web services, Web and Java™ applications on System i™ platform.

IBM WebSphere Development Studio Client Advanced Edition for iSeries includes all the functions of WebSphere Development Studio Client and Rational Application Developer plus additional advanced i5/OS features such as single sign-on support, portal tooling, and a graphical viewer for i5/OS native applications.

Installation requirements

This section details hardware, software, and user privilege requirements that must be met in order to successfully install and run your software.

Hardware requirements

Before you can install the product, verify that your system meets the minimum hardware requirements.

WebSphere Development Studio Client for iSeries and WebSphere Development Studio Client Advanced Edition for iSeries

The following are hardware requirements for installing WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries:

- Intel® Pentium® III 800 MHz processor minimum (higher is recommended)
- 768 MB RAM; 1 GB RAM recommended
- For the i5/OS Development Tools, Remote System Explorer and iSeries Projects
 - 256 MB RAM recommended
- Disk space:
 - For installing the i5/OS Development Tools feature only, 1GB of disk space is required. 500 MB is used only during the installation process and can be recovered after the installation is complete.
 - Disk space requirements can be reduced or increased depending on the features that you install
 - Installation requires:
 - For WebSphere Development Studio Client for iSeries, a minimum of 5 GB of disk space. Some of this disk space (500 MB) is used only during the installation process and can be recovered after the installation is complete.
 - For WebSphere Development Studio Client Advanced Edition for iSeries, a minimum of 5.5 GB of disk space. Some of this disk space (500 MB) is used only during the installation process and can be recovered after the installation is complete.
 - Additional disk space is required for developing applications.
 - Additional disk space is required if you download the product package to install this product.
 - Additional disk space is required if you use FAT32 file system instead of NTFS
 - An additional 500 MB of disk space is required in the directory pointed to by your environment variable TEMP.
- Display resolution: 1024 x 768 minimum
- Microsoft® mouse or compatible pointing device
- CD-ROM drive

Software requirements

Before you install the product, verify that your system meets the software requirements.

System

- i5/OS V5R3, or V5R4
- WebSphere Development Studio Client for iSeries and WebSphere Development Studio Client Advanced Edition for iSeries V7.0 support for the i5/OS release will end when that i5/OS release officially ends service, or when WebSphere Development Studio Client V7.0 officially end service.
- Some components will need additional program temporary fixes (PTFs). The PTF information is available online (<http://www.ibm.com/support/docview.wss?uid=swg21044473>). To find more information about any required iSeries server PTFs:
 1. Open the Remote System Explorer perspective if it is not already open. The name of the current perspective is shown in the top left corner of the title bar for the Window. To open the Remote System Explorer perspective select **Window > Open Perspective > Other** and select **Remote System Explorer** from the list.
 2. Create a connection to your iSeries by expanding **New Connection > iSeries**.
 3. Expand your new connection and right click on **iSeries Objects**. Select **Verify Connection** from the menu. This displays a dialog that shows which required PTFs are already installed on the system and which ones are missing.
- i5/OS is needed only if the programming objects are located on the System i5™ or the applications contain backend code on the System i5.
- To compile RPG, COBOL, C, C++, CL, or DDS on the System i5, using the Remote System Explorer (RSE) or CODE must be installed on the System i5.

Workstation

WebSphere Development Studio Client for iSeries and WebSphere Development Studio Client Advanced Edition for iSeries

The following operating systems are supported for this product:

- Microsoft Windows® 2000 Professional with Service Pack 4 or later
- Microsoft Windows 2000 Server with Service Pack 4 or later
- Microsoft Windows 2000 Advanced Server with Service Pack 4 or later
- Microsoft Windows XP Professional with Service Pack 2 or later
- Microsoft Windows Server 2003 Standard Edition
- Microsoft Windows Server 2003 Enterprise Edition

Note:

- This version of the IBM WebSphere Development Studio Client was developed for use with Eclipse IDE 3.2.1 or later. You can only extend an existing Eclipse IDE of version 3.2.1 or later. Choosing to extend an Eclipse IDE for installation supports some components of WebSphere Development Studio Client for iSeries and WebSphere Development Studio Client Advanced Edition for iSeries.

To extend an existing Eclipse IDE, you also require a JRE from the following Java development kit:

- IBM 32-bit SDK for Windows, Java 2 Technology Edition, Version 5.0 service release 3; Sun Java 2 Standard Edition 5.0 Update 9 for Microsoft Windows

Additional software requirements

- One of the following Web browsers is required for viewing the readme files and the installation guide, and to support the Standard Widget Toolkit (SWT) browser widget:
 - Microsoft Internet Explorer 6.0 with Service Pack 1.
 - Mozilla 1.6 or 1.7.
 - Firefox 1.0.x or 1.5.
- The launchpad does not support Mozilla 1.6; if your browser is Mozilla, you need version 1.7 or later to run the launchpad.
- To properly view multimedia user assistance, such as tours, tutorials, and demonstration viewlets, you must install Adobe Flash Player Version 6.0 release 65 or later.
- For information about supported database servers, Web application servers, and other software products, refer to the online help. After installing the product, click Help > Help Contents.
- To run applications built with IBM WebFacing Tool, Internet Explorer 6.0 or later, is required.
- To run applications built with i5/OS Web Tools, Internet Explorer 6.0 or later, or Mozilla V1.7 or later, is required.
- TCP/IP must be installed and configured.
- To profile applications, JRE 1.4, or later, should be installed.
- The following runtime environments are supported for IBM WebFacing Tool, and i5/OS Web Tools applications:
 - WebSphere Application Server Express (Version 5.1, or 6.0) installed locally or remotely
 - WebSphere Application Server (Version 5.1, 6.0 or 6.1) installed locally or remotely
- Developing portlets in either the IBM WebFacing Tool or HATS requires portal development tools that are available in WebSphere Development Studio Client Advanced Edition for iSeries only.

User privileges requirements

You must have a user ID that meets the following requirements before you can install WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries.

- Your user ID must not contain double-byte characters.
- You must have a user ID that belongs to the local Windows workstation's administrators group.

Planning to install

Read all the topics in this section before you begin to install any of the product features. Effective planning and an understanding of the key aspects of the installation process can help ensure a successful installation.

Installation scenarios

There are a number of scenarios that you can follow when installing WebSphere Development Studio Client.

The following factors might determine your installation scenario:

- The format and method by which you access your installation files (for example, from CDs or files downloaded from IBM Passport Advantage®).
- The location for your installation (for example, you can install the product onto your own workstation, or make the installation files available to your enterprise).
- The type of installation (for example, you can use the Installation Manager GUI, or install silently).

These are the typical installation scenarios you might follow:

- Installing from the CDs.
- Installing from a downloaded electronic image on your workstation.
- Installing from an electronic image on a shared drive.
- Installing from a repository on an HTTP or HTTPS server.

Note that in the latter three scenarios you can choose to run the Installation Manager program in silent mode to install WebSphere Development Studio Client. For details on running Installation Manager in silent mode, see “Installing silently” on page 37.

Note also that you can install updates at the same time that you install the base product package.

Installing from CDs

In this installation scenario, you have CDs that contain the product package files, and typically you are installing WebSphere Development Studio Client on your own workstation. Refer to “Installing WebSphere Development Studio Client from CDs: task overview” on page 23 for an overview of the steps.

Installing from a downloaded electronic image on your workstation

In this scenario, you have downloaded the installation files from either IBM Passport Advantage or the Entitled Software Support site and you will install WebSphere Development Studio Client on your own workstation. Refer to “Installing WebSphere Development Studio Client from an electronic image on your workstation: task overview” on page 23 for an overview of the steps.

Installing from an electronic image on a shared drive

In this scenario, you will place the electronic image on a shared drive so that users in your enterprise can access the installation files for WebSphere Development Studio Client from a single location. Refer to “Installing WebSphere Development Studio Client from an electronic image on a shared drive: task overview” on page 25 for an overview of the steps.

Installing from a repository on an HTTP server

This scenario represents the fastest method for installing the product across a network. This scenario differs from the shared-drive installation. In order to place product package files for WebSphere Development Studio Client on an HTTP Web server, you must use the IBM Packaging Utility. This utility is provided with WebSphere Development Studio Client to copy the installation files in a format - a *package* - that can be used for installing WebSphere Development Studio Client directly from a HTTP Web server. The directory on the HTTP Web server that contains the package is called a *repository*. Note that, in this scenario, the installation files for only WebSphere Development Studio Client are placed in the package. Refer to “Installing WebSphere Development Studio Client from a repository on a HTTP Web server: task overview” on page 25 and “Placing WebSphere Development Studio Client on an HTTP Web server: task overview” on page 26 for an overview of the steps.

Deciding which features to install

With version 7.0, you can customize your software product by selecting which features of WebSphere Development Studio Client to install.

When you install the WebSphere Development Studio Client product package using IBM Installation Manager, the installation wizard displays the features in the available product package. From the features list, you can select which to install. A default set of features is selected for you (including any required features). Installation Manager automatically enforces any dependencies between features and prevents you from clearing any required features.

Installing only the Remote System Explorer feature will result in a lightweight edit/compile/debug environment for developing native i5/OS applications. This installation option is applicable to both WebSphere Development Studio Client for iSeries and WebSphere Development Studio Client Advanced Edition for iSeries, and does not require significant resources to execute. By limiting the selection, the web tooling components are not installed which greatly reduces the memory requirements for running this program. Please refer to. “Hardware requirements” on page 3 for more details.

Note: After you finish installing the package, you can still add or remove features from your software product by running the Modify Packages wizard in Installation Manager. See “Modifying installations” on page 51 for more information.

Features

The following table shows the features of WebSphere Development Studio Client that you can choose to install. Default selections of features to install may vary. If a feature already exists in your shared resources directory, it will not be selected by default and will not be installed again.

WebSphere Development Studio Client for iSeries features

Feature	Description	Selected for installation by default
i5/OS Development Tools - Remote System Explorer and iSeries Projects	Provides integrated tools for developing native i5/OS applications. These workstation tools allow you to connect to remote i5 servers, manage libraries, objects, members, jobs and IFS files, edit source members using a modern workstation based editor with many rich editing features for RPG, COBOL, CL and DDS, launch compiles and retrieve error feedback, perform remote searches and remotely debug programs.	Yes
IBM WebFacing Tool	Provides a tool to convert DDS display file source members into a Web-based user interface for your existing 5250 programs.	Yes
i5/OS Web and Java Tools	The i5/OS Web and Java tools provide tools for building e-business applications that use a Web-based front end to communicate with the business logic in an i5/OS ILE program, service programs, or OPM program.	Yes
IBM WebSphere Application Server Express, version 5.1	Provides IBM WebSphere Application Server Express, version 5.1, as your targeted runtime environment.	No
IBM WebSphere Application Server, version 5.1	Provides IBM WebSphere Application Server, version 5.1, as your targeted runtime environment.	No
IBM WebSphere Application Server, version 6.0	Provides IBM WebSphere Application Server, version 6.0, as your targeted runtime environment.	No
IBM WebSphere Application Server, version 6.1	Provides IBM WebSphere Application Server, version 6.1, as your targeted runtime environment.	Yes

WebSphere Development Studio Client Advanced Edition for iSeries features

Feature	Description	Selected for installation by default
i5/OS Development Tools - Remote System Explorer and iSeries Projects	Provides integrated tools for developing native i5/OS applications. These workstation tools allow you to connect to remote iSeries servers, manage libraries, objects, members, jobs and IFS files, edit source members using a modern workstation based editor with many rich editing features for RPG, COBOL, CL and DDS, launch compiles and retrieve error feedback, perform remote searches and remotely debug programs.	Yes
IBM WebFacing Tool	Provides a tool to convert DDS display file source members into a Web-based user interface for your existing 5250 programs.	Yes
i5/OS Web and Java Tools	The i5/OS Web and Java tools provide tools for building e-business applications that use a Web-based front end to communicate with the business logic in an i5/OS ILE program, service programs, or OPM program.	Yes
Advanced Remote System Explorer and iSeries Projects	The Advanced Remote System Explorer and iSeries Projects tooling provides enhanced team support for iSeries Projects and remote debug capability for Linux [®] on POWER [™] and IBM AIX 5L [™] operating systems on the System i platform.	Yes

Feature	Description	Selected for installation by default
IBM Application Diagram Component	Provides tools to create a graphical view of the different resources in a native i5/OS application and their relationships to each other. This includes a diagram to show the call graph for ILE RPG and ILE COBOL source and a diagram to show the binding relationships for program and service program objects.	Yes
i5/OS Log and Trace Analyzer	Provides tools to convert messages from i5/OS job logs and message queues to Common Base Event format. The resulting Common Base Events can be used with the Profiling and Logging tools to assist in problem determination.	Yes
Advanced IBM WebFacing Tool	Provides System screen, Portal and Single sign-on support for IBM WebFacing Tool.	Yes
Advanced i5/OS Web and Java Tools	Provides tools to support i5/OS Program Call JCA Connector and Single signon for Web Tools.	Yes
Screen Designer technology preview	Screen Designer is a technical preview that provides the ability to graphically edit DDS display files. Screen Designer integrates a graphical design environment with the DDS-editing capabilities of the Remote Systems LPEX Editor.	Yes
Web development tools	Provides tools for building J2EE Web applications using JavaServer Faces, JavaServer Pages, servlets, and HTML.	Yes
Struts tools	Provides tools for developing J2EE Web applications using the Apache Struts framework.	No
Crystal Reports tools	Provides visual tools for developing applications that require reporting capabilities that Crystal Reports provides.	Yes

Feature	Description	Selected for installation by default
J2EE and Web Services development tools	Provides tools for developing J2EE applications and Web services.	Yes
Java client application editor (JVE)	Provides tools for building and testing graphical user interface Java client applications using the SWT, AWT, or Swing UI libraries.	Yes
Visualization editors	Provides a graphical editing environment for creating Java classes, C++ code, enterprise beans, data tables, and XML schemas.	Yes
Code review	Inspects your code for rule compliance and best practices. Code review highlights potential problems and suggests code changes for improved quality. In some cases, it can automatically apply fixes for compliance.	Yes
Test and Performance Tools Platform (TPTP)	Provides Eclipse tools for testing applications. Tool capabilities include profiling, monitoring, logging, component testing (JUnit), and static analysis or code review.	Yes
J2EE Connector (J2C) tools	Provides a robust set of tools to help you create J2C client applications for CICS® and IMS™ systems. Use the data binding wizards to create Java marshalling code for COBOL, PL/I, and C languages.	No
Rational ClearCase® SCM Adapter	Provides the IBM Rational ClearCase SCM and ClearCase MVFS plug-ins, which enable creating managed versions of software artifacts in ClearCase versioned object bases (VOBs). These plug-ins use snapshot views and dynamic views when ClearCase VOB and view servers are also installed.	Yes

Feature	Description	Selected for installation by default
Rational RequisitePro [®] integration (for Windows only)	Provides a tightly integrated requirements management tool with traceability between requirements and software artifacts when IBM Rational RequisitePro is installed.	No
Rational Unified Process [®] (RUP [®]) Process Advisor and Process Browser	Provides the Process Advisor, for context-sensitive guidance on developing software and using the IBM Rational Software Development Platform, and the Process Browser, for help related to your current tasks, artifacts, and tools.	Yes
Transformation authoring	Provides tools to create custom transformations and customize existing transformations. Transformations automate the task of generating model content and implementation code.	No
Plug-in development environment (PDE)	Provides tools for creating, developing, testing, debugging, and deploying Eclipse plug-ins, which can be used to extend the Eclipse environment.	No
Java Emitter Template (JET) extensibility	Using the JET technology extensibility features, you can develop JET transformations and control the JET engine through programming interfaces (APIs), extension points, and utilities.	No
Data tools	Provides relational database tools for defining and working with databases. You can define and work with tables, views, and filters; create and work with SQL statements; create and work with DB2 [®] routines, and create and work with SQLJ files. You can also use the tools to generate SQL DDL, DADX, and XML files.	No

Feature	Description	Selected for installation by default
Portal tools	Provides tools to create, customize, test, debug, and deploy portal applications. The Portal development tools support IBM WebSphere Portal versions 5.1 and 6.0.	Yes
WebSphere Application Server development tools	Provides tools for WebSphere Application Server development.	Yes
WebSphere Application Server compile-time dependencies	Required for building, compiling, debugging, and deploying applications for IBM WebSphere Application Server.	Yes
IBM WebSphere Application Server Express, version 5.1	Provides IBM WebSphere Application Server Express, version 5.1, as your targeted runtime environment.	No
IBM WebSphere Application Server, version 5.1	Provides IBM WebSphere Application Server, version 5.1, as your targeted runtime environment.	No
IBM WebSphere Application Server, version 6.0	Provides IBM WebSphere Application Server, version 6.0, as your targeted runtime environment.	No
IBM WebSphere Application Server, version 6.1	Provides IBM WebSphere Application Server, version 6.1, as your targeted runtime environment.	Yes

Upgrade and coexistence considerations

If you have a previous version of the product, or if you plan to install multiple Rational Software Development Platform products on the same workstation, review the information in this section.

Considerations for coexistence of IBM product offerings

Some products are designed to coexist and share function when they are installed in the same package group. A package group is a location where you can install one or more software products or packages. When you install each package, you select whether you want to install the package to an existing package group, or whether you want to create a new one. IBM Installation Manager will block products that are not designed to share or do not meet version tolerance and other requirements. If you want to install more than one product at a time, the products must be able to share a package group.

At the time of release, the following products will share function when installed to a package group:

- WebSphere Development Studio Client for iSeries *or* WebSphere Development Studio Client Advanced Edition for iSeries

- WebSphere Developer for zSeries
- Host Access Transformation Services Toolkit
- Rational Application Developer
- Rational Software Architect
- Rational Functional Tester
- Rational Software Modeler
- Rational Systems Developer

Any number of eligible products can be installed to a package group. When a product is installed, its function is shared with all of the other products in the package group. If you install a development product and a testing product into one package group, when you start either of the products, you have both the development and testing functionality available to you in your user interface. If you add a product with modeling tools, all of the products in the package group will have the development, testing, and modeling functionality available.

If you install a development product and later purchase a development product with increased functionality and add that product to the same package group, the additional function will be available in both products. If you uninstall the product with the greater functionality, the original product remains. Note that this is a change from the 'upgrade' behavior of version 6 products in the Rational Software Development Platform.

Note: Each product installed into a unique location may be associated with only one package group. A product must be installed into multiple locations in order to be associated with multiple package groups. Rational Functional Tester can be installed into only one location on a computer.

Upgrade considerations

You cannot upgrade a previous version of WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries that is already installed on your workstation to version 7.0. However, WebSphere Development Studio Client version 7.0 can coexist with earlier versions.

You can migrate your workspace, projects, and artifacts from WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries version 5.1.2 or 6.x to version 7.0. Refer to the migration documentation in the V7.0 online help (**Help > Help Contents** then look in the **WebSphere Development Studio Client for iSeries > Installing and migrating** book) for details.

Important: Note that the first time you start WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries version 7.0 it defaults to a new workspace. Do not open your existing workspace in version 7.0 until you read the migration documentation.

If you have a previous version of Agent Controller, you should stop it, uninstall it, and clean up any leftover files before installing this version of Agent Controller. For more information, refer Installing Agent Controller.

Installation repositories

IBM Installation Manager retrieves product packages from specified repository locations.

If the launchpad is used to start Installation Manager, the repository information is passed to Installation Manager. If the Installation Manager is started directly, you must specify an installation repository that contains the product packages that you want to install. See “Setting repository preferences in Installation Manager.”

Some organizations bundle and host their own product packages on their intranet. For information about this type of installation scenario, see “Installing from a repository on an HTTP server” on page 8. Your system administrators will need to provide you with the correct URL.

By default, IBM Installation Manager uses an embedded URL in each Rational software development product to connect to a repository server over the Internet. Installation Manager then searches for the product packages as well as new features.

Setting repository preferences in Installation Manager

When you start the installation of WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries from the Launchpad program, the location of the repository that contains the product package you are installing is automatically defined in IBM Installation Manager. However, if you start Installation Manager directly (for example, installing WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries from a repository located on a Web server) then you must specify the repository preference (the URL for the directory that contains the product package) in Installation Manager before you can install the product package. Specify these repository locations on the Repositories page of the **Preferences** window. By default, Installation Manager uses an embedded URL in each Rational Software Development product to connect to a repository server through the Internet and search for installable packages and new features. Your organization may require you to redirect the repository to use intranet sites.

Note: Before starting the installation process, be sure to obtain the installation package repository URL from your administrator.

To add, edit, or remove a repository location in Installation Manager:

1. Start Installation Manager.
2. On the Start page of Installation Manager, click **File > Preferences**, and then click **Repositories**. The Repositories page opens, showing any available repositories, their locations, and whether they are accessible.
3. On the Repositories page, click **Add Repository**.
4. In the Add repository window, type the URL of the repository location or browse to it and set a file path.
5. Click **OK**. If you entered a HTTPS repository location, then you will be prompted to enter a user ID and password. The new or changed repository location is listed. If the repository is not accessible, a red x is displayed in the **Accessible** column.

6. Click **OK** to exit.

Note: For Installation Manager to search the default repository locations for the installed packages, ensure the preference **Search the linked repositories during installation and updates** on the Repositories preference page is selected. This preference is selected by default.

Package groups and the shared resource directory

When you install the WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries package with IBM Installation Manager, you must choose a package group and a shared resource directory.

Package groups

During the installation process, you must specify a *package group* for the WebSphere Development Studio Client package. A package group represents a directory in which packages share resources with other packages in the same group. When you install the WebSphere Development Studio Client package with Installation Manager, you can create a new package group or install the packages into an existing package group. (Some packages might not be able to share a package group, in which case the option to use an existing package group will be disabled.)

Note that when you install multiple packages at the same time, all the packages are installed into the same package group. Refer to “Considerations for coexistence of IBM product offerings” on page 14 to view a list of the supported packages

A package group is assigned a name automatically; however, you choose the installation directory for the package group.

After you create the package group by successfully installing a product package, you cannot change the installation directory. The installation directory contains files and resources specific to the WebSphere Development Studio Client product package installed into that package group. Resources in the product package that can potentially be used by other package groups are placed in the shared resources directory.

Shared resources directory

The *shared resources directory* is the directory where installation artifacts are located so that they can be used by one or more product package groups.

Important: You can specify the shared resources directory once: the first time that you install a package. We suggest that you use your largest drive for this. You cannot change the directory location unless you uninstall all packages.

Extending an existing Eclipse IDE

When you install the WebSphere Development Studio Client product package, you can choose to extend an Eclipse integrated development environment (IDE) already installed on your computer by adding the functions that the WebSphere Development Studio Client package contains.

The WebSphere Development Studio Client package that you install with IBM Installation Manager is bundled with a version of the Eclipse IDE or workbench; this bundled workbench is the base platform for providing the functionality in the Installation Manager package. However, if you have an existing Eclipse IDE on your workstation, then you have the option to *extend*, that is, add to the IDE the additional functionality provided in the WebSphere Development Studio Client package.

You might extend your existing Eclipse IDE, for example, because you want to gain the functionality provided in the WebSphere Development Studio Client package, but you also want to have the preferences and settings in your current IDE when you work with the functionality from the WebSphere Development Studio Client package. You also might want to work with plug-ins you have installed that already extend the Eclipse IDE.

To extend an existing Eclipse IDE: in the Location page of the Install Packages wizard, select the **Extend an existing Eclipse IDE** option.

Your existing Eclipse IDE must be version 3.2.1 plus the latest updates from eclipse.org to be extended. Installation Manager checks that the Eclipse instance you specify meets the requirements for the installation package.

Important: Choosing to extend an Eclipse IDE for installation supports some components of WebSphere Development Studio Client for iSeries and WebSphere Development Studio Client Advanced Edition for iSeries.

Note: You might need to update your Eclipse version in order to install updates to WebSphere Development Studio Client. Refer to the update release documentation for information on changes to the prerequisite Eclipse version.

Verifying and extracting electronic images

If you download the installation files from IBM Passport Advantage, you must extract the electronic image from the compressed files before you can install WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries. You may want to verify the completeness of the downloaded files before extracting the image.

You can compare the published MD5 values with the checksum of the downloaded files to check if the downloaded file is corrupt or incomplete.

Extracting the downloaded files

Extract each compressed file to the same directory such that all the uncompressed files are in the same folder.

Preinstallation tasks

Before you install the product, complete these steps:

1. Confirm that your system meets the requirements described in the section “Installation requirements” on page 3.
2. Confirm that your user ID meets the required access privileges for installing the product. See “User privileges requirements” on page 5.
3. Read the section “Planning to install” on page 7 and give particular attention to the topic “Upgrade and coexistence considerations” on page 14.

Installation tasks

The following sections provide an overview of the installation scenarios that are described in the section “Installation scenarios” on page 7. You can access detailed instructions from links in the main steps.

Installing WebSphere Development Studio Client from CDs: task overview

In this installation scenario, you have the CDs that contain the installation files, and typically you are installing WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries on your own workstation.

The following are the general steps for installing from CDs:

1. Complete the preinstallation steps listed in “Preinstallation tasks” on page 21.
2. Insert the first installation CD into your CD drive.
3. If autorun is enabled on your system, the IBM Rational Software Development Platform launchpad program automatically opens. If autorun is not enabled, start the launchpad program. Refer to “Starting the launchpad program” on page 29 for details.
4. Start the installation of WebSphere Development Studio Client from the launchpad program. For details, see “Starting an installation from the launchpad program” on page 30.

If IBM Installation Manager is not detected on your workstation, you are prompted to install it and then the installation wizard starts. Follow the on-screen instructions in the wizard to complete the installation of Installation Manager. See “Installing Installation Manager on Windows” on page 27 for details.

When the installation of Installation Manager completes, or if it is already on your computer, Installation Manager starts and automatically begins the Install Packages wizard.

5. Follow the on-screen instructions in the Install Packages wizard to complete the installation. For details, see “Installing WebSphere Development Studio Client using the IBM Installation Manager” on page 31, or “Installing a lightweight option of the WebSphere Development Studio Client using the IBM Installation Manager” on page 34.
6. Install optional software that is included with WebSphere Development Studio Client. WebSphere Development Studio Client. For more information, see “Installing optional software” on page 57.

Installing WebSphere Development Studio Client from an electronic image on your workstation: task overview

The following are general steps in preparation for installing WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries from an electronic installation image.

Note: IBM Passport Advantage allows you to download an electronic image, which is a zip file. Entitled Software Support allows you to download ISO

files, suitable for burning your own set of CDs. You can also extract the electronic image from the ISO file with an appropriate utility.

1. Ensure that your workstation has sufficient space to store the files you must download and the extracted installation image. Refer to “Hardware requirements” on page 3.
2. Download all required parts for the product image from IBM Passport Advantage or Entitled Software Support to a temporary directory.
3. Extract using a zip or ISO extraction utility the installation image from the downloaded file and verify the installation image is complete. See for “Verifying and extracting electronic images” on page 19 details.
4. Continue with the steps in “Installing from an electronic image” below.

Installing from an electronic image

The following are general steps for installing WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries from an electronic installation image.

1. Complete the preinstallation steps listed in “Preinstallation tasks” on page 21.
2. Start the launchpad program. Refer to “Starting the launchpad program” on page 29 for details.
3. Start the installation of WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries from the launchpad program. For details, see “Starting an installation from the launchpad program” on page 30.

If IBM Installation Manager is not detected on your workstation, you are prompted to install it and then the installation wizard starts. Follow the on-screen instructions in the wizard to complete the installation of Installation Manager. See “Installing Installation Manager on Windows” on page 27 for details.

When the installation of Installation Manager completes, or if it is already on your computer, Installation Manager starts and automatically begins the Install Packages wizard.

Note: If you exit Installation Manager before completing the product installation, you must restart Installation Manager from the launchpad. If you start the Installation Manager directly, it is not preconfigured with the necessary installation repositories.

4. Follow the on-screen instructions in the Install Packages wizard to complete the installation. For complete details, see “Installing WebSphere Development Studio Client using the IBM Installation Manager” on page 31, or “Installing a lightweight option of the WebSphere Development Studio Client using the IBM Installation Manager” on page 34.
5. Install optional software that is included with WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries. For more information, see “Installing optional software” on page 57.

Installing WebSphere Development Studio Client from an electronic image on a shared drive: task overview

In this scenario, you will place the electronic image on a shared drive so that users in your enterprise can access the installation files for WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries from a single location.

The following steps are performed by the person who places the installation image on a shared drive.

1. Ensure that your shared drive has sufficient disk space to store both the files you must download from IBM Passport Advantage and the extracted installation image. Refer to “Hardware requirements” on page 3 for details.
2. Download all required parts for the product image from IBM Passport Advantage to a temporary directory on the shared drive.
3. Extract the installation image from the downloaded files into an accessible directory on the shared drive and verify the installation image is complete. See “Verifying and extracting electronic images” on page 19 for details.

To install WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries from the installation files on the shared drive:

1. Change to the disk1 directory on the shared drive containing the installation image.
2. Follow the steps in “Installing from an electronic image” on page 24.

Installing WebSphere Development Studio Client from a repository on a HTTP Web server: task overview

In this scenario, the product packages are retrieved by IBM Installation Manager from an HTTP Web server.

These steps assume the repository containing the package for WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries has been created on the HTTP Web server. Refer to “Placing WebSphere Development Studio Client on an HTTP Web server: task overview” on page 26 for more details.

To install the WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries package from a repository on an HTTP server:

1. Complete the preinstallation steps listed in “Preinstallation tasks” on page 21.
2. Install IBM Installation Manager. Refer to “Managing IBM Installation Manager” on page 27. In this scenario, for example, the Installation Manager installation files are available from a shared drive.
3. Start Installation Manager. Refer to “Starting Installation Manager” on page 27 for details.
4. Set the URL of the repository containing the package of WebSphere Development Studio Client as a repository preference in Installation Manager. See “Setting repository preferences in Installation Manager” on page 16.
5. Start the Install Packages wizard in Installation Manager and follow the on-screen instructions in the Install Packages wizard to complete the

installation. For complete details, see “Installing WebSphere Development Studio Client using the IBM Installation Manager” on page 31, or “Installing a lightweight option of the WebSphere Development Studio Client using the IBM Installation Manager” on page 34.

6. Install optional software included with WebSphere Development Studio Client. For more information, see “Installing optional software” on page 57.

Placing WebSphere Development Studio Client on an HTTP Web server: task overview

To prepare WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries for installation from a repository located on an HTTP Web server:

1. Ensure that your HTTP or HTTPS Web server has sufficient disk space to store the product package. Refer to “Hardware requirements” on page 3.
2. Ensure that your workstation has sufficient disk space to store both the files you must download from IBM Passport Advantage and the extracted installation image. Refer to “Hardware requirements” on page 3
3. Download all required parts for the product image from IBM Passport Advantage to a temporary directory on your workstation.
4. Extract the installation image from the downloaded files into another temporary directory on your workstation and verify that the installation image is complete. See “Verifying and extracting electronic images” on page 19 for details.
5. Install on your workstation the IBM Packaging Utility from the Auxiliary CD (or electronic disk).
6. Using the Packaging Utility, copy the WebSphere Development Studio Client product package. Refer to “IBM Packaging Utility” on page 45 for more information about the utility.
7. Copy the output of the Packaging Utility to a HTTP or HTTPS Web Server.
8. Copy the installation files for IBM Installation Manager from the Auxiliary CD's to a shared drive.
9. Instruct users in your organization to install Installation Manager.
10. Provide users the URL for the repository that contains the WebSphere Development Studio Client product package you created earlier.

Managing IBM Installation Manager

Installing Installation Manager on Windows

IBM Installation Manager is installed by the launchpad. For more information on this process, refer to “Installing from the launchpad program” on page 29.

To install Installation Manager manually:

1. Run **setup.exe** from the **InstallerImage_win32** folder on the first installation disk.
2. Click **Next** on the Welcome screen.
3. Review the license agreement on the License Agreement page and select **I accept the terms in the license agreement** to accept. Click **Next**.
4. Click the **Change** button on the Destination Folder page to change the installation location if required. Click **Next**.
5. Click **Next** on the Setup Type page.
6. Click **Install** on the Ready to Install Program page. The Completed page opens after the installation is complete.
7. Click **Finish**.

Starting Installation Manager

IBM Installation Manager should be started from the launchpad program. Doing so starts Installation Manager with a configured repository preference and selected WebSphere Development Studio Client packages. If you start Installation Manager directly, then you must set a repository preference and choose product packages manually.

To start Installation Manager manually:

1. Open the **Start** menu from the **Taskbar**.
2. Select **All Programs > IBM Installation Manager > IBM Installation Manager**.

Uninstalling Installation Manager

To uninstall Installation Manager manually:

1. Run **setup.exe** from the **InstallerImager_win32** folder on the first installation disk.
2. Click **Next** on the Welcome screen.
3. Select the **Remove** button on the Program Maintenance page. Click **Next**.
4. Click **Next** on the Setup Type page.
5. Click **Remove** on the Remove the Program page.
6. Click **Finish** on the InstallShield Wizard Completed page.

Note: You can also uninstall Installation Manager by using the Control Panel (clicking **Start** → **Settings** → **Control Panel** and double-clicking **Add or Remove Programs**. Select the entry for IBM Installation Manager and click **Remove**.

Silently installing and uninstalling Installation Manager

IBM Installation Manager can be silently installed and uninstalled.

Silently installing Installation Manager

To silently install Installation Manager onto a default install location:

1. Change directory to InstallerImage_win32 folder on the first installation disk.
2. Run `setup.exe /S /v"/qn"`

If you want to change the install location, you can add `INSTALLDIR` property inside the `/v` option. For example: `setup.exe /S /v"/qn INSTALLDIR=\"C:\InstallationManager\""`

Silently uninstalling Installation Manager

To silently uninstall Installation Manager:

Run the following command in the command prompt: `msiexec /x {DBD90D51-BD46-41AF-A1F5-B74CEA24365B}`

Installing from the launchpad program

The launchpad program provides you with a single location to view release information and start the installation process.

Use the launchpad program to start the installation of WebSphere Development Studio Client in the following cases:

- Installing from the product CDs.
- Installing from an electronic image on your workstation.
- Installing from an electronic image on a shared drive.

When you start the installation process from the launchpad program, IBM Installation Manager will start preconfigured with the location of the repository that contains the WebSphere Development Studio Client package. If you install and start Installation Manager directly, then you must set repository preference manually.

To install from the launchpad:

1. Complete the preinstallation tasks described in “Preinstallation tasks” on page 21.
2. Start the launchpad program. See “Starting the launchpad program.”
3. Start the installation of WebSphere Development Studio Client. See “Starting an installation from the launchpad program” on page 30.

Follow the on-screen instructions in the Install Packages wizard to complete the installation. For complete details, see “Installing WebSphere Development Studio Client” on page 31.

Starting the launchpad program

Complete the preinstallation tasks described in “Preinstallation tasks” on page 21.

If you are installing from a CD and autorun is enabled on your workstation, then the WebSphere Development Studio Client launchpad starts automatically when you insert the first installation disc into your CD drive. If you are installing from an electronic image, or if autorun is not configured on your workstation, then you must start the launchpad program manually.

To start the launchpad program:

1. Insert the IBM WebSphere Development Studio Client CD into your CD drive.
2. If autorun is enabled on your system, the IBM WebSphere Development Studio Client launchpad program automatically opens.
3. To manually start up the launchpad:
 - If you are installing from an electronic image, double-click on `launchpad.exe` inside the `disk1` folder where the images have been uncompressed.
 - If you are installing from the CD, double-click on `launchpad.exe` on the first product CD.

Starting an installation from the launchpad program

1. Start the launchpad program.
2. If you have not done so already, read the release information by clicking **Release notes**.
3. When you are ready to begin the installation, click **Install IBM WebSphere Development Studio Client for iSeries** or **Install IBM WebSphere Development Studio Client Advanced Edition for iSeries**.
4. A message window opens to inform you whether the program IBM Installation Manager is detected on your workstation.
 - If IBM Installation Manager is not detected on your system, then you are informed that you must install it before you can continue.
 - a. Click **OK** to install IBM Installation Manager. The IBM Installation Manager installation wizard starts.
 - b. Follow the on-screen instructions in the wizard to complete the installation of IBM Installation Manager. Refer to “Installing Installation Manager on Windows” on page 27 for more information.
 - c. When the installation of IBM Installation Manager completes successfully, click **Finish** to close the wizard.
 - d. Read the message that opens and click **OK**. Installation Manager starts and automatically opens the Install Packages wizard.
 - If IBM Installation Manager is detected on your system, click **OK** and Installation Manager starts and automatically opens the Install Packages wizard.
5. Follow the on-screen instructions in the Install Packages wizard to complete the installation. For complete details, see “Installing WebSphere Development Studio Client” on page 31

Installing WebSphere Development Studio Client

This section describes installing IBM WebSphere Development Studio Client for iSeries or IBM WebSphere Development Studio Client Advanced Edition for iSeries using the IBM Installation Manager graphical user interface.

The lightweight install option of WebSphere Development Studio Client provides a basic edit/compile/debug environment for developing native i5/OS applications. This installation option is applicable to both WebSphere Development Studio Client for iSeries and WebSphere Development Studio Client Advanced Edition for iSeries, and does not require significant resources to execute. For an overview of the steps, refer to “Installing WebSphere Development Studio Client using the IBM Installation Manager” to install the complete option or “Installing a lightweight option of the WebSphere Development Studio Client using the IBM Installation Manager” on page 34 to only install basic iSeries tools.

Installing WebSphere Development Studio Client using the IBM Installation Manager

The following steps describes installing the WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries package with the Installation Manager GUI.

Depending on the installation scenario that you are following, the Installation Manager Install Packages wizard might start automatically. (For example, if you are installing from CDs). In other scenarios, you will need to start the wizard.

1. If the Installation Manager Install Packages wizard did not start automatically, then start it:
 - a. Start Installation Manager
 - b. From the Start page, click **Install Packages**.

Note: If a new version of Installation Manager is found, you are prompted to confirm that you want to install it before you can continue. Click **OK** to proceed. Installation Manager automatically installs the new version, stops, restarts, and resumes.

When Installation Manager starts, it searches its defined repositories for available packages.

2. The Install page of Install Packages wizard lists all the packages found in the repositories that Installation Manager searched. If two versions of a package are discovered, only the most recent, or recommended, version of the package is displayed.
 - To display all versions of any package found by Installation Manager, click **Show all versions**.
 - To return to the display of only the recommended packages, click **Show only recommended**.
3. Click the WebSphere Development Studio Client package to display its description in the **Details** pane.
4. To search for updates to the WebSphere Development Studio Client package, click **Check for updates**.

Note: For Installation Manager to search the predefined IBM update repository locations for the installed packages, the preference **Search the linked repositories during installation and updates** on the Repositories preference page must be selected. The preference is selected by default. Internet access is also required.

Installation Manager searches for updates at the predefined IBM update repository for the product package. It also searches any repository locations that you have set. A progress indicator shows the search is taking place. You can install updates at the same time that you install the base product package.

5. If updates for the WebSphere Development Studio Client package are found, then they will be displayed in the **Installation Packages** list on the Install Packages page below their corresponding product. Only recommended updates are displayed by default.
 - To view all updates found for the available packages, click **Show all versions**.
 - To display a package description under **Details**, click on the package name. If additional information about the package is available, such as a readme file or release notes, a **More info** link is included at the end of the description text. Click the link to display the additional information in a browser. To fully understand the package you are installing, review all information beforehand.
6. Select the WebSphere Development Studio Client package and any updates to the package that you want to install. Updates that have dependencies are automatically selected and cleared together. Click **Next** to continue.

Note: If you install multiple packages at the same time, then all the packages will be installed into the same package group.

7. On the Licenses page, read the license agreement for the selected package. If you selected more than one package to install, there might be a license agreement for each package. On the left side of the **License** page, click each package version to display its license agreement. The package versions that you selected to install (for example, the base package and an update) are listed under the package name.
 - a. If you agree to the terms of all of the license agreements, click **I accept the terms of the license agreements**.
 - b. Click **Next** to continue.
8. On the Location page, type the path for the *shared resources directory* in the **Shared Resources Directory** field; or, accept the default path. The shared resources directory contains resources that can be shared by one or more package groups. Click **Next** to continue.

The default path is: C:\Program Files\IBM\SDP70Shared.

Important: You can specify the shared resources directory only the first time that you install a package. Use your largest disk for this to help ensure adequate space for the shared resources of future packages. You cannot change the directory location unless you uninstall all packages.

9. On the Location page, either choose an existing *package group* to install the WebSphere Development Studio Client package into, or create a new one. A package group represents a directory in which packages share resources with other packages in the same group. To create a new package group:
 - a. Click **Create a new package group**.

- b. Type the path for the installation directory for the package group. The name for the package group is created automatically.
The default path is: C:\Program Files\IBM\SDP70.
- c. Click **Next** to continue.

Important: Choose an installation location where another package group is not already installed for installing a lightweight option of WebSphere Development Studio Client. Placing a complete package of WebSphere Development Studio Client and a lightweight option of WebSphere Development Studio Client in the same installation location would result in resource sharing, thus, doing so would cause the lightweight option of WebSphere Development Studio Client to have more than just the minimum set of iSeries tools.

10. On the next Location page, you can choose to extend an existing Eclipse IDE already installed on your system, adding the functionality in the packages that you are installing. You must have Eclipse Version 3.2.1 or higher to select this option.
 - If you do not want to extend an existing Eclipse IDE, click **Next** to continue.
 - To extend an existing Eclipse IDE:
 - a. Select **Extend an existing Eclipse**.
 - b. In the **Eclipse IDE** field, type or navigate to the location of the folder containing the eclipse executable file (eclipse.exe or eclipse.bin). Installation Manager will check if the Eclipse IDE version is valid for the package that you are installing. The **Eclipse IDE JVM** field displays the Java Virtual Machine (JVM) for the IDE that you specified.
 - c. Click **Next** to continue.

Important: Choosing to extend an Eclipse IDE for installation supports some components of WebSphere Development Studio Client for iSeries and WebSphere Development Studio Client Advanced Edition for iSeries.

11. On the Features page under **Languages**, select the languages for the package group. The corresponding national language translations for the user interface and documentation for the IBM WebSphere Development Studio Client package will be installed. Note that your choices apply to all packages installed under this package group.
12. On the next Features page, select the package features that you want to install. See “Features” on page 8 for more details on the features.
 - a. Optional: To see the dependency relationships between features, select **Show Dependencies**.
 - b. Optional: Click a feature to view its brief description under **Details**.
 - c. Select or clear features in the packages. Installation Manager will automatically enforce any dependencies with other features and display updated download size and disk space requirements for the installation.
 - d. When you are finished selecting features, click **Next** to continue.
13. On the Summary page, review your choices before installing the IBM WebSphere Development Studio Client package. If you want to change the choices you made on previous pages, click **Back** and make your changes. When you are satisfied with your installation choices, click **Install** to install the package. A progress indicator shows the percentage of the installation completed.

14. When the installation process is completed, a message confirms the success of the process.
 - a. Click **View log file** to open the installation log file for the current session in a new window. You must close the Installation Log window to continue.
 - b. In the Install Package wizard, select whether you want IBM WebSphere Development Studio Client to start when you exit.
 - c. Click **Finish** to launch the selected package. The Install Package wizard closes and you are returned to the Start page of Installation Manager.

Installing a lightweight option of the WebSphere Development Studio Client using the IBM Installation Manager

The following steps describes installing a lightweight edit/compile/debug environment for WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries package with the Installation Manager GUI.

Depending on the installation scenario that you are following, the Installation Manager Install Packages wizard might start automatically. (For example, if you are installing from CDs). In other scenarios, you will need to start the wizard.

1. If the Installation Manager Install Packages wizard did not start automatically, then start it:
 - a. Start Installation Manager
 - b. From the Start page, click **Install Packages**.

Note: If a new version of Installation Manager is found, you are prompted to confirm that you want to install it before you can continue. Click **OK** to proceed. Installation Manager automatically installs the new version, stops, restarts, and resumes.

When Installation Manager starts, it searches its defined repositories for available packages.

2. The Install page of the Install Packages wizard lists all the packages found in the repositories that Installation Manager searched. If two versions of a package are discovered, only the most recent, or recommended, version of the package is displayed.
 - To display all versions of any package found by Installation Manager, click **Show all versions**.
 - To return to the display of only the recommended packages, click **Show only recommended**.
3. Click the WebSphere Development Studio Client package to display its description in the **Details** pane.
4. To search for updates to the WebSphere Development Studio Client package, click **Check for updates**.

Note: For Installation Manager to search the predefined IBM update repository locations for the installed packages, the preference **Search the linked repositories during installation and updates** on the Repositories preference page must be selected. The preference is selected by default. Internet access is also required.

Installation Manager searches for updates at the predefined Web site for the product package. It also searches any repository locations that you have set. A

progress indicator shows the search is taking place. You can install updates at the same time that you install the base product package.

5. If updates for the WebSphere Development Studio Client package are found, then they will be displayed in the **Installation Packages** list on the Install Packages page below their corresponding product. Only recommended updates are displayed by default.
 - To view all updates found for the available packages, click **Show all versions**.
 - To display a package description under **Details**, click on the package name. If additional information about the package is available, such as a readme file or release notes, a **More info** link is included at the end of the description text. Click the link to display the additional information in a browser. To fully understand the package you are installing, review all information beforehand.
6. Select the WebSphere Development Studio Client package and any updates to the package that you want to install. Updates that have dependencies are automatically selected and cleared together. Click **Next** to continue.

Note: To install multiple packages at the same time, then all the packages will be installed into the same package group.

7. On the Licenses page, read the license agreement for the selected package. If you selected more than one package to install, there might be a license agreement for each package. On the left side of the **License** page, click each package version to display its license agreement. The package versions that you selected to install (for example, the base package and an update) are listed under the package name.
 - a. If you agree to the terms of all of the license agreements, click **I accept the terms of the license agreements**.
 - b. Click **Next** to continue.
8. On the Location page, type the path for the *shared resources directory* in the **Shared Resources Directory** field; or, accept the default path. The shared resources directory contains resources that can be shared by one or more package groups. Click **Next** to continue.

The default path is: C:\Program Files\IBM\SDP70Shared.

Important: You can specify the shared resources directory only the first time that you install a package. Use your largest disk for this to help ensure adequate space for the shared resources of future packages. You cannot change the directory location unless you uninstall all packages.

9. On the Location page, choose to create a new *package group* to install a lightweight option of WebSphere Development Studio Client. A package group represents a directory in which packages share resources with other packages in the same group. To create a new package group:
 - a. Click **Create a new package group**.
 - b. Type the path for the installation directory for the package group. The name for the package group is created automatically.

Important: Choose an installation location where another package group is not already installed for installing a lightweight option of WebSphere Development Studio Client. Placing a complete package of WebSphere Development Studio Client and a lightweight option of WebSphere Development Studio Client in

the same installation location would result in resource sharing, thus, doing so would cause the lightweight option of WebSphere Development Studio Client to have more than just the minimum set of iSeries tools.

- c. Click **Next** to continue.
10. On the next Location page, you can choose to extend an existing Eclipse IDE already installed on your system, adding the functionality in the packages that you are installing. You must have Eclipse Version 3.2.1 or higher to select this option.
 - If you do not want to extend an existing Eclipse IDE, click **Next** to continue.
 - To extend an existing Eclipse IDE:
 - a. Select **Extend an existing Eclipse**.
 - b. In the **Eclipse IDE** field, type or navigate to the location of the folder containing the eclipse executable file (eclipse.exe or eclipse.bin). Installation Manager will check if the Eclipse IDE version is valid for the package that you are installing. The **Eclipse IDE JVM** field displays the Java Virtual Machine (JVM) for the IDE that you specified.
- c. Click **Next** to continue.

Important: Choosing to extend an Eclipse IDE for installation supports some components of WebSphere Development Studio Client for iSeries and WebSphere Development Studio Client Advanced Edition for iSeries.

11. On the Features page under **Languages**, select the languages for the package group. The corresponding national language translations for the user interface and documentation for the WebSphere Development Studio Client package will be installed. Note that your choices apply to all packages installed under this package group.
12. On the next Features page, deselect **all** the package features selected by default, except for the **i5/OS Development Tools - Remote System Explorer and iSeries Projects** feature. Click **Next** to continue.

Important: To install a lightweight option of WebSphere Development Studio Client, only the **i5/OS Development Tools - Remote System Explorer and iSeries Projects** feature must be selected. All other features need to be unchecked.

13. On the next Features page, click **Next**.
14. On the Summary page, review your choices before installing the WebSphere Development Studio Client package. If you want to change the choices you made on previous pages, click **Back** and make your changes. When you are satisfied with your installation choices, click **Install** to install the package. A progress indicator shows the percentage of the installation completed.
15. When the installation process is completed, a message confirms the success of the process.
 - a. Click **View log file** to open the installation log file for the current session in a new window. You must close the Installation Log window to continue.
 - b. In the Install Package wizard, select whether you want WebSphere Development Studio Client to start when you exit.
 - c. Click **Finish** to launch the selected package. The Install Package wizard closes and you are returned to the Start page of Installation Manager.

Installing silently

You can install the WebSphere Development Studio Client product package by running Installation Manager in silent installation mode. When you do this in silent mode, the user interface is not available; instead, Installation Manager uses a response file to input the commands that are required to install the product package.

Running Installation Manager in silent mode is helpful because it enables you to use a batch process to install, update, modify and uninstall product packages through scripts.

Note that you must install Installation Manager before you can silently install the WebSphere Development Studio Client package. Refer to “Managing IBM Installation Manager” on page 27 for details on installing Installation Manager.

There are two main tasks required for silent installation:

1. Create the response file.
2. Run Installation Manager in silent installation mode.

Creating a response file

You can create a response file by recording your actions as you install a WebSphere Development Studio Client product package using Installation Manager. When you record a response file, all of the selections that you make in the Installation Manager GUI are stored in a response file. When you run Installation Manager in silent mode, Installation Manager uses the response file to locate the repository that contains the package, to select the features to install, and so on. Refer to “Installing WebSphere Development Studio Client using the IBM Installation Manager” on page 31 for the installation steps.

You can find a sample response file [here](#).

To record a response file for installation (or uninstallation):

1. On a command line, change to the eclipse subdirectory in the directory where you installed Installation Manager. For example:
 - `cd C:\Program Files\IBM\Installation Manager\eclipse`
2. On a command line, type the following command to start the Installation Manager, substituting your own file name and location for the response file and (optionally) the log file:
 - `launcher.bat -record <response file path and name>.xml -log <log file path and name>.xml`

For example, `launcher.bat -record c:\mylog\responsefile.xml -log c:\mylog\record_log.xml`

Note: Ensure the file paths you enter exist; Installation Manager will not create directories for the response file and the log file.

3. Follow the on-screen instructions in the Install Packages wizard to make your installation choices, stopping when you reach the Summary page. For details, see “Installing WebSphere Development Studio Client using the IBM Installation Manager” on page 31.
4. Click **Install**, and then when the installation process begins click **Cancel**.
5. Click **Finish**, then close Installation Manager.

An XML response file is created and resides in the location specified in the command.

Running Installation Manager in silent installation mode

You can run Installation Manager in silent installation mode from a command line.

You can find a sample response file for running Installation Manager here. Refer to the Installation Manager online help for additional documentation on how to run it in silent mode. (For example, silently installing from a repository that requires authentication (user ID and password)).

You run Installation Manager in silent mode appending the `-silent` argument to the Installation Manager start command `launcher.bat`. You can find `launcher.bat` file in the `eclipse` folder of the Installation Manager's install directory.

- `launcher.bat -silent [arguments]`

The following table describes the arguments used with the silent installation command:

Argument	Description
<code>-silent</code>	Directs Installation Manager to run in silent mode (without the Installation Manager user interface).
<code>-input</code>	Specifies an XML response file as the input to Installation Manager. A response file contains commands that Installation Manager runs.
<code>-log</code>	(Optional) Specifies a log file that records the result of the silent installation. The log file is an XML file.

To run Installation Manager in silent installation mode:

1. On a command line, change to the `eclipse` subdirectory in the directory where you installed Installation Manager. For example:
 - `cd C:\Program Files\IBM\Installation Manager\eclipse`
2. Enter and run the following command, substituting your own locations for the response file and, optionally, the log file:
`launcher.bat -silent -input c:/temp/responsefile.xml -log c:/temp/mylog.log`

Installation Manager runs in silent installation mode; it reads the response file and writes a log file to the directory you specified. While you must have a response file when running in silent installation mode, log files are optional. The result of this execution should be a status of 0 on success and non-zero on failure.

Searching for and silently installing all available products

You can silently search for and install updates for all available products.

To search for and silently install all available products:

1. On a command line, change to the eclipse subdirectory in the directory where you installed Installation Manager.
2. Enter and run the following command, substituting your own locations for the response file and, optionally, the log file:
 - For Windows: `launcher.bat -silent -installAll`

All available products known to Installation Manager are installed.

Silently installing updates to all currently installed products

You can silently search for and install updates for all currently installed products.

To search for and silently install updates for all available products:

1. On a command line, change to the eclipse subdirectory in the directory where you installed Installation Manager.
2. Enter and run the following command, substituting your own locations for the response file and, optionally, the log file:
 - For Windows: `launcher.bat -silent -updateAll`

All available product updates known to Installation Manager are installed.

Response file commands

If you want to use the silent installation capabilities of Installation Manager, you need to create a response file that contains the commands that you want Installation Manager to run. The recommended way to do this is to record your actions as you install the IBM WebSphere Development Studio Client for iSeries or IBM WebSphere Development Studio Client Advanced Edition for iSeries package. However, you can create or edit a response file manually.

There are two categories of commands for the response file:

- **Preference commands** are used to set preferences that are found in the Installation Manager graphical user interface under **File > Preferences**, such as repository location information.
- **Silent installation commands** are used to emulate the Install Packages wizard in Installation Manager

Silent install preference commands

While you typically specify preferences using the Preferences window, you can also specify preferences (identified as keys) in a response file for use during a silent installation.

Note: You can specify more than one preference in a response file.

When you define preferences in a response file, your XML code will look similar to the following example:

```
<preference>
  name = "the key of the preference"
  value = "the value of the preference to be set"
</preference>
```

Use the following table to identify keys and their associated values for silent installation preferences:

Key	Value	Notes
com.ibm.cic.common.core.preferences.logLocation	Specifies the location of Installation Manager log file.	Important: This key is optional and is designed for testing and debugging. If you do not specify a location for the log file, both silent installation and the GUI version of Installation Manager will use the same location.
com.ibm.cic.license.policy.location	Specifies a URL that defines where the remote license policy file resides.	
com.ibm.cic.common.core.preferences.http.proxyEnabled	True or False	False is the default value.
com.ibm.cic.common.core.preferences.http.proxyHost	Host name or IP address	
com.ibm.cic.common.core.preferences.http.proxyPort	Port number	
com.ibm.cic.common.core.preferences.http.proxyUseSocks	True or False	False is the default value.
com.ibm.cic.common.core.preferences.SOCKS.proxyHost	Host name or IP address	
com.ibm.cic.common.core.preferences.SOCKS.proxyPort	Port number	
com.ibm.cic.common.core.preferences.ftp.proxyEnabled	True or False	False is the default value.
com.ibm.cic.common.core.preferences.ftp.proxyHost	Host name or IP address	
com.ibm.cic.common.core.preferences.ftp.proxyPort	Port number	
com.ibm.cic.common.core.preferences.eclipseCache	Common component directory	

Silent installation commands

You can use this reference table to learn more about response file commands for use during a silent installation.

Response file commands	Description
Profile <pre> <profile id="the profile (package group) id" installLocation="the install location of the profile"> <data key="key1" value="value1"/> <data key="key2" value="value2"/> </profile> </pre>	<p>Use this command to create a package group (or installation location). If the specified package group already exists, then the command has no effect. Currently, when creating the profile, the silent installation will also create two installation contexts; one for Eclipse and one for native. A profile is an installation location.</p> <p>You can use the <data> element for setting profile properties.</p> <p>The following list contains the keys currently supported keys and related values:</p> <ul style="list-style-type: none"> • The eclipseLocation key specifies an existing Eclipse location value, such as c:\myeclipse\eclipse. • The cic.selector.nl key specifies the Natural Language (NL) locale selections, such as zh, ja, and en. <p>Note: Separate multiple NL values with commas.</p> <p>The following list contains the currently supported language codes:</p> <ul style="list-style-type: none"> • English (en) • French (fr) • Italian (it) • Simplified Chinese (zh) • Russian (ru) • Traditional Chinese (Taiwan) (zh_TW) • Traditional Chinese (Hong Kong) (zh_HK) • German (de) • Japanese (ja) • Polish (pl) • Spanish (es) • Czech (cs) • Hungarian (hu) • Korean (ko) • Portuguese (pt_BR)
Repositories <pre> <server> <repository location="http://example/ repository/"> <repository location="file:/C:/ repository/"> <!--add more repositories below--> <...> </server> </pre>	<p>Use this command to specify the repositories used during a silent installation. Use a URL or UNC path to specify remote repositories; use directory paths to specify local repositories.</p>

Response file commands	Description
Install <pre> <install> <offering profile= "profile id" features= "feature ids" id= "offering id" version= "offering version"></offering> <!--add more offerings below> <...> </install> </pre>	<p>Use this command to specify the installation packages that will be installed.</p> <p>The profile ID must match an existing profile or a profile created by the set profile command.</p> <p>Feature IDs can be optionally specified by a comma-delimited list, such as "feature1, feature2" and so on. If no feature IDs are specified, all the default features in the specified offering will be installed.</p> <p>Note: Required features will be included for installation, even if they are not explicitly specified in the comma-delimited list.</p>
<install modify="true"> or <uninstall modify="true"> (optional attribute) <pre> <uninstall modify="true"> <offering profile="profileID" id="Id" version="Version" features="-"/> </uninstall> </pre>	<p>Use the <install modify="true"> attribute on install and uninstall commands to indicate that you want to modify an existing install. If the attribute is not set to true, the value defaults to false. If the intent of the modify operation is only to install additional language packs, then a hyphen "-" should be used in the offering feature id list to indicate no new features are being added.</p> <p>Important: You must specify "modify=true" and a hyphen "-" feature list as specified in the example; otherwise, the install command will install the offering's default features and the uninstall command will remove all the features.</p>
Uninstall <pre> <uninstall> <offering profile= "profile id" features= "feature ids" id= "offering id" version= "offering version"></offering> <!--add more offerings below> <...> </uninstall> </pre>	<p>Use this command to specify the packages that will be uninstalled.</p> <p>The profile ID must match an existing profile or a profile specified in a profile command. Further, if there are no feature IDs specified, all the features in the specified offering will be uninstalled; if there are no offering IDs specified, all the installed offerings in the specified profile will be uninstalled.</p>
Rollback <pre> <rollback> <offering profile= "profile id" id= "offering id" version= "offering version"> </offering> <!--add more offerings below> <...> </rollback> </pre>	<p>Use this command to roll back to the specified offerings from the version currently installed on the specified profile. You cannot specify features in a roll back command.</p>

Response file commands	Description
InstallAll <code><installAll/></code> Note: This command is equivalent to using <code>-silent -installAll</code> .	Use this command to silently search for and install all available packages.
UpdateAll <code><updateAll/></code> Note: This command is equivalent to using <code>-silent -updateAll</code> .	Use this command to silently search for and update all available packages.
License <code><license policyFile="policy file location"/></code> For example: <code><license policyFile="c:\mylicense.opt"/></code>	<p>Use this command to generate a response file containing a license command by starting the license wizard after starting Installation Manager in record mode.</p> <p>During record mode, if you set flex options through the license management wizard, the options you set will be recorded in a license policy file named "license.opt" in the same directory as the generated response file; the response file will contain a license command that references the policy file.</p>
Wizard <code><launcher -mode wizard -input < response file ></code>	Use this command to start Installation Manager in UI mode. The UI mode starts Installation Manager in either the install wizard or the uninstall wizard. However, in this case, the response file can only contain preference commands and install commands or preference command and uninstall commands; you can not mix install and uninstall commands in the same response file when you run Installation Manager in UI mode.

Sample response file

You can use an XML-based response file to specify predefined information such as silent installation preferences, repository locations, installation profiles, and so on. Response files are beneficial for teams and companies that want to install installation packages silently and to standardize the locations and preferences for installation packages.

Sample response file

```
<agent-input>

<!-- add preferences -->
<preference name=="com.ibm.cic.common.core.preferences. http.proxyEnabled"
value="c:/temp"/>

<!-- create the profile if it doesn't exist yet -->
<profile id="my_profile" installLocation="c:/temp/my_profile"></profile>

<server>
<repository location=
"http://a.site.com/local/products/sample/20060615_1542/repository/"></repository>
</server>

<install>
<offering profile= "my_profile" features= "core" id= "ies"
version= "3.2.0.20060615">
</offering>
</install>

</agent-input>
```

Silent installation log files

You can use silent installation log files to examine the results of a silent installation session.

The silent installation function creates an XML-based log file that records the result of the silent install execution (as long as a log file path is specified using `-log <your log file path>.xml`). If your silent installation session is successful, the log file will contain just the root element of `<result> </result>`. However, if errors occur during the installation, the silent install log file will contain error elements with messages such as:

```
<result>
  <error> Cannot find profile: profile id</error>
  <error> some other errors</error>
</result>
```

For detailed analysis, you can look at the logs generated in the Installation Manager data area. By using a preference command, you can optionally set the data area to your preferred location, as shown in the response file topic.

IBM Packaging Utility

Use the IBM Packaging Utility software to copy product packages to a repository that can be placed on a Web server available over HTTP or HTTPS.

The Packaging Utility software is located on the Auxiliary CD that is included with WebSphere Development Studio Client for iSeries and WebSphere Development Studio Client Advanced Edition for iSeries. If you want to place a repository that contains a WebSphere Development Studio Client package on a Web server that will be available over HTTP or HTTPS, you must use the Packaging Utility to copy the product package of WebSphere Development Studio Client into the repository.

Use this utility to perform the following tasks:

- Generate a new repository for product packages.
- Copy product packages to a new repository. You can copy multiple product packages into a single repository, thereby creating a common location for your organization from which product packages can be installed using IBM Installation Manager.
- Delete product packages from a repository.

Refer to the online help for the Packaging Utility for full instructions on using the tool.

Installing the Packaging Utility

The IBM Packaging Utility must be installed from the Auxiliary CD before it can be used to copy the WebSphere Development Studio Client product package.

Use the following steps to install the IBM Packaging Utility software:

1. Start the installation from the Auxiliary CD. Change to the `Aux_CD_Win\PackagingUtility` directory on the Auxiliary CD. `PackagingUtility\PU_win32.zip` and run `install_win32.exe`.
2. If IBM Installation Manager is not detected on your workstation, you are prompted to install it and then the installation wizard starts. Follow the on-screen instructions in the wizard to complete the installation of Installation Manager. See *Installing Installation Manager on Windows* for details.
3. When the installation of Installation Manager completes, or if it is already on your computer, Installation Manager starts and automatically begins the Install Packages wizard.
4. Follow the on-screen instructions in the Install Packages wizard to complete the installation.

Copying product packages to a HTTP server using the Packaging Utility

To create a repository on a HTTP or HTTPS server, you must use the Packaging Utility to copy the product package for WebSphere Development Studio Client

Note that this method does not copy the optional software that is included with the WebSphere Development Studio Client installation image. Only the WebSphere Development Studio Client files that are installed using IBM Installation Manager are copied.

Note also that the Packaging Utility can be used to combine multiple product packages into a single repository location. Refer to the Packaging Utility online help for more information.

To copy product packages with the packaging utility:

1. If you are copying from a CD image, perform these tasks:
 - a. Insert the first installation CD into your CD drive.
 - b. If autorun is enabled on your system, the WebSphere Development Studio Client Launchpad program automatically opens. Close the Launchpad program.
2. Start the Packaging Utility.
3. On the main page of the utility, click **Copy product package**. The Prerequisite page opens, and presents two options:
 - **I will be downloading product packages from IBM Web**
 - **I will be obtaining the product packages from other sources**
4. Click **I will be downloading product packages from IBM Web**.

Note: You can use the **I will be obtaining the product packages from other sources** option if you have already defined an accessible repository.

5. Click **Next** to advance to the Source page. If there are no product packages to select, you must open a repository that contains product packages.
6. To open a repository, click the **Open repository** button. The Open Repository window opens.

Note: A repository can be a path to a directory in the file system, a disk drive containing the first CD of the product, or a URL to a directory on a server.

7. To define a repository location, click the Repository Location **Browse** button, and then navigate to and select the Repository location - either the common root directory that contains the electronic disk images or the drive containing the first product installation CD. For example, if the WebSphere Development Studio Client files (disk1, disk2, and so on) reside in C:\My product\unzip, you should define this location as a repository.
8. Click **OK** to define the repository location and to close the Browse to a repository directory window.
9. On the Destination page, click the **Browse** button and select an existing repository directory, or create a new folder to store the products.
10. After you specify a repository for the selected product packages and any fixes, click **OK** to close the Browse to a directory window. The file path that you just defined is listed in the **Directory** field on the Destination page.
11. Click **Next** to advance to the Summary page. The Summary page displays the selected product packages that will be copied into the destination repository. This page also lists the amount of storage space that the copy requires, as well as the amount of available space on the drive.
12. Click **Copy** to copy the selected product packages to the destination repository. A status bar opens at the bottom of the wizard indicating how

much time is remaining in the copy process. After the copy process is finished, a Complete page opens and displays all of the product packages that were copied successfully.

13. Click **Done** to return to the Packaging Utility main page.

Now that you have used the Packaging Utility to copy the WebSphere Development Studio Client installation files into a repository, you can place the repository on a Web server and make the directories and files available over HTTP. (The repository can also be placed on a UNC drive.)

Starting WebSphere Development Studio Client

You can start WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries from the desktop environment or a command line interface.

To start WebSphere Development Studio Client for iSeries:

- From command line: *product installation directory*\eclipse.exe -product com.ibm.etools.iseries.wdsc.welcome.ide
- From desktop environment: Click **Start > Programs > IBM Software Development Platform > WebSphere Development Studio Client for iSeries**

To start WebSphere Development Studio Client Advanced Edition for iSeries:

- From command line: *<product installation directory>*\eclipse.exe -product com.ibm.etools.iseries.wdsc.ae.welcome.ide
- From desktop environment: Click **Start > Programs > IBM Software Development Platform > WebSphere Development Studio Client Advanced Edition for iSeries**

Note that the first time you start WebSphere Development Studio Client version 7.0 it defaults to a new workspace.

Note: Important: Do not open your existing workspace in WebSphere Development Studio Client version 7.0 until you read the migration documentation. You can access the migration guide in the online help in the workbench (**Help > Help Contents** in the **WebSphere Development Studio Client for iSeries > Installing and migrating** book).

Modifying installations

The Modify Packages wizard in the IBM Installation Manager enables you to change the language and feature selections of an installed product package.

By default, Internet access is required unless the repository preferences points to a local modification site or CDs. See the Installation Manager help for more information.

Note: Close all programs that were installed using Installation Manager before modifying.

1. From the Start page of the Installation Manager, click the **Modify Packages** icon.
2. In the Modify Packages wizard, select the installation location for the WebSphere Development Studio Client product package and click **Next**.
3. On the Modify page, under Languages, select the languages for the package group, then click **Next**. The corresponding national language translations for the user interface and documentation for the packages will be installed. Note that your choices apply to all packages installed under this package group.
4. On the Features page, select the package features that you want to install or remove.
 - a. To learn more about a feature, click the feature and review the brief description under **Details**.
 - b. If you want to see the dependency relationships between features, select **Show Dependencies**. When you click a feature, any features that depend on it and any features that are its dependents are shown in the Dependencies window. As you select or exclude features in the packages, Installation Manager will automatically enforce any dependencies with other features and display updated download size and disk space requirements for the installation.
5. When you are finished selecting features, click **Next**.
6. On the Summary page, review your choices before modifying the installation package, and then click **Modify**.
7. Optional: When the modification process completes, click **View Log File** to see the complete log.

Updating WebSphere Development Studio Client

You can install updates for packages that were installed with IBM Installation Manager.

By default, Internet access is required unless your repository preferences points to your local update site. See the Installation Manager help for more information.

Each installed package has the location embedded for its default IBM update repository. For Installation Manager to search the IBM update repository locations for the installed packages, the preference **Search the linked repositories during installation and updates** on the Repositories preference page must be selected. This preference is selected by default.

See the Installation Manager help for more information.

Note: Close all programs that were installed using Installation Manager before updating.

To find and install product package updates:

1. From the Start page of the Installation Manager, click **Update Packages**.
2. If a new version of Installation Manager is found, you are prompted to confirm that you want to install it before you can continue. Click **OK** to proceed. Installation Manager automatically installs the new version, stops, restarts, and resumes.
3. In the Update Packages wizard, select the location where the WebSphere Development Studio Client product package is installed or select **Update All** check box, and then click **Next**. Installation Manager searches for updates in its repositories and the predefined update sites for WebSphere Development Studio Client. A progress indicator shows the search is taking place.
4. If updates for a package are found, then they are displayed in the **Updates** list on the Update Packages page below their corresponding package. Only recommended updates are displayed by default. Click **Show All** to display all available updates found for the available packages.
 - a. To learn more about an update, click the update and review its description under **Details**.
 - b. If additional information about the update is available, a **More info** link will be included at the end of the description text. Click the link to display the information in a browser. Review this information before installing the update.
5. Select the updates that you want to install or click **Select Recommended** to restore the default selections. Updates that have a dependency relationship are automatically selected and cleared together.
6. Click **Next** to continue.
7. On the Licenses page, read the license agreements for the selected updates. On the left side of the **License** page, the list of licenses for the updates you selected is displayed; click each item to display the license agreement text.
 - a. If you agree to the terms of all the license agreements, click **I accept the terms of the license agreements**.
 - b. Click **Next** to continue.

8. On the Summary page, review your choices before installing the updates.
 - a. If you want to change the choices you made on previous pages, click **Back**, and make your changes.
 - b. When you are satisfied, click **Update** to download and install the updates. A progress indicator shows the percentage of the installation completed.

Note: During the update process, Installation Manager might prompt you for the location of the repository for the base version of the package. If you installed the product from CDs or other media, they must be available when you use the update feature.

9. Optional: (Optional) When the update process completes, a message that confirms the success of the process is displayed near the top of the page. Click **View log file** to open the log file for the current session in a new window. You must close the Installation Log window to continue.
10. Click **Finish** to close the wizard.

Uninstalling WebSphere Development Studio Client

The Uninstall Packages option in the Installation Manager enables you to uninstall packages from a single installation location. You can also uninstall all the installed packages from every installation location.

To uninstall the packages, you must log in to the system using the same user account that you used to install the product packages.

To uninstall the packages:

1. Close the programs that you installed using Installation Manager.
2. On the Start page click the **Uninstall Packages** icon.
3. In the Uninstall Packages page, select the WebSphere Development Studio Client product package that you want to uninstall. Click **Next**.
4. In the Summary page, review the list of packages that will be uninstalled and then click **Uninstall**. The Complete page is displayed after the uninstallation finishes.
5. Click **Finish** to exit the wizard.

Installing optional software

The following optional software is included with WebSphere Development Studio Client for iSeries or WebSphere Development Studio Client Advanced Edition for iSeries product:

- IBM Rational Agent Controller Version 7.0.1
- IBM CoOperative Development Environment and VisualAge® for RPG Version 6.0
- IBM Host Access Transformation Services Toolkit Version 7.0
- IBM WebSphere Application Server Version 6.1 for Windows
- IBM WebSphere Portal Version 6.0 test environment (*Advanced Edition only*)
- IBM WebSphere Portal Version 5.1.0.x test environment (*Advanced Edition only*)
- Crystal Reports Server XI Release 2 for Windows (*Advanced Edition only*)
- IBM Rational ClearCase LT Version 7.0 for Windows (*Advanced Edition only*)

Installing Agent Controller

Agent Controller is a daemon that allows client applications to launch and manage local or remote applications and provides information about running applications to other applications. You must install Agent Controller separately before you can use the following tools:

- Profiling tools to profile your applications. Agent Controller must be installed on the same system as the application that you are profiling.
- Logging tools to import remote log files. Agent Controller must be installed and running on the remote system from which the log files are imported.
- Component testing tool to run test cases. Agent Controller must be installed on the systems on which you run the test cases.
- Tools for remote application testing on WebSphere Application Server version 5.0 or 5.1. (Agent Controller does not have to be installed for remote *publishing* of applications; or for local application publishing or testing.) Note that WebSphere Application Server version 6.0 has this functionality built in, so Agent Controller is not required on version 6.0 target servers.

Note:

- It is highly recommended that you install Agent Controller behind a firewall.
- For more information on the security implications of using Agent Controller, refer to the Agent Controller documentation.
- The online documentation for Agent Controller is not installed until the software is installed. At that time, the documentation is added to the online help.
- Before installing Agent Controller version 7.0.1, you must uninstall the previous version of Agent Controller using the instructions provided below.

Refer to the instructions below for more information on silently installing Agent Controller.

Hardware prerequisites

- Windows, Linux/IA32: Intel Pentium II processor minimum. Pentium III 500 MHz or higher is recommended.
- AIX®: PowerPC® 604e 233MHz (IBM RS/6000® 7043 43P Series) minimum

- HP-UX: PA8500 300MHz (HP Workstation C3000) minimum
- Solaris: UltraSPARC-IIi 300MHz (Sun Ultra 10 Workstation) minimum
- OS/400: iSeries (as required by the operating system)
- z/OS®, LINUX/S39: zSeries (as required by the operating system)
- Linux/ppc64: POWER5™ processor based pSeries® and iSeries (as required by the operating system)
- 512 MB RAM minimum (768 MB RAM is recommended)
- Disk space:
 - You will require 100 MB minimum disk space for installing
- Display resolution:
 - 800 x 600 display minimum (1024 x 768 recommended)

Supported platforms

Note for Linux: The Agent Controller is compiled using libstdc++-libc6.2-2.so.3 shared library. Ensure that this shared library exists under the /usr/lib directory. If it does not exist, you have to install the RPM package compat-libstdc++ that comes with the operating system installation media.

Agent Controller v7.0.1 is supported on the following platforms:

- AIX v5.2, v5.3, and 5L on PowerPC (32-bit)
- z/OS V1R4, V1R5, V1R6 and V1R7 on zSeries (32-bit)
- OS/400® V5R2, V5R3 and V5R4 on iSeries
- Linux 2.4 and 2.6 kernel. Examples of supported distributions include:
 - Red Hat Linux Advanced Server v2.1 on Intel IA32
 - Red Hat Enterprise Linux AS release 3 on PowerPC (64-bit)
 - Red Hat Enterprise Linux (RHEL) v3.0 and v4.0
 - SUSE Linux Enterprise Server (SLES) v9 on Intel IA32
 - SUSE Linux Enterprise Server (SLES) v8 on zSeries (32-bit)
- Windows 2000 Server or Advanced Server (SP4) on Intel IA32
- Windows 2000 Professional (SP3) on Intel IA32
- Windows 2003 Server Standard and Enterprise (SP1) on Intel IA32
- Windows 2003 Server Enterprise x64 Edition (SP1) on EM64T (64-bit)
- Windows XP Professional (SP2) on Intel IA32
- HP-UX v11.0, v11i on PA-RISC
- Sun Solaris v8, v9, and v10.0 on SPARC

Supported JVMs

In general, Agent Controller works with Java Virtual Machine (JVM) version 1.4 and above. Here are the JVM versions (java -fullversion) that Agent Controller has been tested on:

- AIX: J2RE 1.4.1 IBM AIX build ca1411-20040301
- AIX: J2RE 1.5.0 IBM AIX build pap32devifx-20060310 (SR1)
- HP-UX: J2RE 1.4.2.03-040401-18:59-PA_RISC2.0
- Linux for Intel IA32: J2RE 1.4.1 IBM build cxia321411-20040301; J2RE 1.4.2 IBM.
- Linux for Intel IA32: J2RE 1.5.0 IBM Linux build pxi32dev-20060511 (SR2)
- Linux for PPC64: J2RE 1.4.2 IBM build exp64142-20040917 (JIT enabled: jitc)
- Linux for PPC64: J2RE 1.5.0 IBM Linux build pxp64devifx-20060310 (SR1)

- Linux for OS/390®: J2RE 1.4.1 IBM build cx3901411-20040301
- Linux for OS/390: J2RE 1.4.2 IBM build cx390142-20050609
- z/OS: J2RE 1.4.1 IBM z/OS Persistent Reusable VM build cm1411-20030930
- z/OS: J2RE 1.5.0 IBM z/OS build pmz31dev-20051104a
- OS/400: J2RE 1.4 IBM
- OS/400: J2RE 1.5 IBM
- Solaris SPARC: Sun Java 2 Standard Edition (build 1.4.2_04-b05)
- Solaris SPARC: 1.5.0_06-b05
- Windows: IA32 J2RE 1.4.1 IBM Windows 32 build cn1411-20040301a; J2RE 1.4.2 IBM Windows 32; Sun Java 2 Standard Edition (build 1.4.2_04-b05)
- Windows_IA32: 1.5.0_04-b05, J2RE 1.5.0 IBM Windows 32 build pwi32dev-20051222
- Windows_EM64T (64-bit): Sun Java 2 Runtime Environment, Standard Edition (build 1.5.0_06-b05) v1.5.0 06

Locating the installation files

The installation files are located on the Agent Controller disk in the following directories:

- For AIX: *<Agent Controller CD>/aix_powerpc*
- For HP-UX: *<Agent Controller CD>/hpux*
- For OS/400: *<Agent Controller CD>/os400*
- For Linux on z/Series: *<Agent Controller CD>/linux_s390*
- For Linux on Intel IA32: *<Agent Controller CD>/linux_ia32*
- For Linux on PPC64: *<Agent Controller CD>/linux_ppc64*
- For Solaris: *<Agent Controller CD>/solaris_sparc*
- For Windows on Intel IA32: *<Agent Controller CD>\win_ia32*
- For Windows on Intel Extended Memory 64 Technology (64-bit): *<Agent Controller CD>\win_em64t*
- For Windows on Intel Itanium® systems (64-bit): *<Agent Controller CD>\win_ipf*
- For z/OS: *<Agent Controller CD>/os390*

Installing Agent Controller on a workstation (AIX, HP-UX, Linux, Windows, Solaris)

Uninstalling previous versions of Agent Controller

Note: Before installing Agent Controller version 7.0.1, you must uninstall the previous version of Agent Controller:

- If Agent Controller 7.0 or 6.x is found, the Agent Controller v7.0.1 installer will block the installation with a warning: Please remove any existing IBM Rational Agent Controller and run the install again. When using the silent installer, the Agent Controller v7.0.1 installer will exit the installation without any warning.
- If a previous installation of Agent Controller v7.0.1 is found, the installer displays the following warning: This product is already installed at *<rac_install_dir>*. To overwrite the existing installation, click "Next". If you choose to continue with the installation, the installer will overwrite the existing installation. When using the silent installer, the existing installation will be overwritten without any warning.

When uninstalling Agent Controller V6.x on Windows, you will need to manually remove any residual files. To do this, stop the Agent Controller, uninstall it, and clean up any of the following files which may be left behind after uninstalling:

Windows:

```
%RASERVER_HOME%\*.* (directory where
Agent Controller is installed)
%SystemRoot%\system32\piAgent.dll (Windows' system32
directory)
%SystemRoot%\system32\LogAgent.dll
%SystemRoot%\system32\hcbnd.dll
%SystemRoot%\system32\hcc1co.dll
%SystemRoot%\system32\hcc1dt.dll
%SystemRoot%\system32\hcc1s.dll
%SystemRoot%\system32\hcc1serc.dll
%SystemRoot%\system32\hcc1sert.dll
%SystemRoot%\system32\hcc1sm.dll
%SystemRoot%\system32\hcjbnd.dll
%SystemRoot%\system32\hclaunch.dll
%SystemRoot%\system32\hcthread.dll
%SystemRoot%\system32\piAgent.dll
%SystemRoot%\system32\rac.dll
%SystemRoot%\system32\sysperf.dll
```

When uninstalling Agent Controller V6.x or V7.x on UNIX® platforms, you will need to manually remove any residual files. To do this, stop the Agent Controller, uninstall it, and clean up any of the following files which may be left behind after uninstalling:

Linux, AIX, HP-UX, Solaris:

```
$RASERVER_HOME/* (directory where Agent Controller is installed)
/usr/lib/libpiAgent.so (or .sl on HP-UX)
/usr/lib/libLogAgent.so
/usr/lib/libhcbnd.so
/usr/lib/libhcc1co.so
/usr/lib/libhcc1dt.so
/usr/lib/libhcc1s.so
/usr/lib/libhcc1serc.so
/usr/lib/libhcc1sert.so
/usr/lib/libhcc1sm.so
/usr/lib/libhcjbnd.so
/usr/lib/libhclaunch.so
/usr/lib/libhcthread.so
```

In version 7.0.1, Agent Controller is installed in these places:

Windows:<rac_install_dir>\bin

Linux:<rac_install_dir>/lib

Where <rac_install_dir> is the installation directory of Agent Controller.

Installing Agent Controller

1. Log in as Administrator (or root).
2. Change directory to the directory where you unzipped the installation files for the appropriate platform.
3. Close all Eclipse platforms before continuing with the installation.
4. Run the program **setup.exe**. For non-Windows platforms, run **setup.bin**.
5. Click **Next** on the welcome screen to proceed.
6. Read the license agreement.
7. Select **I accept the terms in the license agreement** and click **Next** to proceed.

8. Specify the path where Agent Controller should be installed and click **Next** to proceed.
9. Specify the path of the Java Runtime Environment (JRE) executable program java.exe or java which Agent Controller should be using. The JRE entered here will be used by Agent Controller for launching Java applications. Therefore, you may want to change the JRE path pre-filled by the installer program.

Note: The JRE you provide at this time will be used both to run Agent Controller and for Agent Controller to launch Java applications. You may, however, later configure Agent Controller to use separate JRE for each of these functions. For details, refer to Agent Controller help topic *Configuring Applications to be launched by Agent Controller*.

Click **Next** to proceed.

10. Optional: Specify the version of IBM WebSphere Application Server if "Remote Support for WebSphere Application Server" was selected in step 9 above. Click **Next** to proceed.
11. Optional: Specify the paths of IBM WebSphere Application Server version 5.0 (Windows only) and 5.1 if "Remote Support for WebSphere Application Server" was selected in step 9 above. Click **Next** to proceed.
12. Specify which hosts can access Agent Controller. The choices are:
 - **This computer only** allows only the local host to access Agent Controller.
 - **Specific computers** allows a specified list of clients to access Agent Controller. If you select this option, and if Security was selected in step 9 above, click **Next** to proceed to the Access List panel. Type a comma-separated list of host names that can access Agent Controller.
 - **Any computer** allows any client to access Agent Controller. (Default selection.)

Note: If you use an authentication mechanism such as Lightweight Directory Access Protocol (LDAP), selecting "Any computer" will require that you disable the Agent Controller user authentication after the installation process is completed. Refer to the Agent Controller documentation for details.

Click **Next** to proceed.

13. Choose the security setting

Note: If you selected "Any computer", then security is enabled by default (refer to "Enable" below). Communications will be encrypted and all connections will be authenticated. To disable security, refer to the Agent Controller documentation.

- **Disable:** Communication will not be encrypted and access control will be limited to the defined host list. (Default selection except for "Any computer".)
- **Enable:** Communication will be encrypted and all connections will be forced to authenticate for Secure Sockets Communications.

If Enable is selected, click **Next** and under **Security** type a comma-separated list of users that can connect to Agent Controller. These users will be required to authenticate to use the tool.

Click **Next** to proceed.

14. Click **Next** on the summary screen to install Agent Controller.
15. Click **Finish** after the installation has completed.

Installing Agent Controller silently

You can run the installation process silently using the following parameters with the setup command:

Parameter	Description
-silent This variable is required if silent is used: -V licenseAccepted=true	Optional: tells the installer to run silently otherwise you will get an install wizard with passed inputs.
-P installLocation	Optional: specifies the installation path. The default installation path is '\$D(install)/IBM/AgentController'. Examples: for Windows: C:\Program Files\IBM\AgentController for UNIX[®]/Linux: /opt/IBM/AgentController
-V VJavaPath	Required: specifies the fully-qualified path of the java executable
-V VAccessLocal -V VAccessCustom -V VAccessAll	Optional: specifies how clients can connect to Agent Controller (ALL, LOCAL, CUSTOM). Set only one of the variables to "true" and the others to false. By default, VAccessAll="true" <ul style="list-style-type: none"> Any computer: VAccessAll="true" : allow any client This computer only : VAccessLocal="true" : allow only localhost (default) Specific computers : VAccessCustom="true" : allow a list of clients (also requires the -V VHosts parameter)
-V VHosts	Required if VAccessCustom="true" specifies the client hostnames, separated by commas
The following two variables must both be specified and should be set as opposites: -V VSecurity="true" or "false" -V VSecurityDisable="false" or "true"	Optional: (true, false) default: VSecurity=true VSecurityDisable=false
-V VUsers	Required: if VSecurity="true" specifies which users can connect to Agent Controller
-V VWAS6 -V VWAS5	Optional: -V VWAS6="true" (default) : If WAS V6 is used -V VWAS5="true" : If WAS V5.x is used
-V VWAS_HOME_V50 -V VWAS_HOME_V51	Optional: if -V VWAS5="true" specifies the installed location of IBM WebSphere Application Server 5.1 and 5.0

Examples:

Installing from the command line:

```
-P installLocation="D:\IBM\AgentController"

-V VJavaPath=" D:\jdk1.4.2\jre\bin\java.exe "

-V VAccessLocal="false"

-V VAccessCustom="true"

-V VAccessAll="false"

-V VHosts="host1,host2"

-V VSecurity="true"

-V VSecurityDisable="false"

-V VUsers="user1,user2"

-V VWAS5="true"

-V VWAS_HOME_V51="D:\WebSphere5.1\AppServer"

-V VWAS_HOME_V50="D:\WebSphere5.0\AppServer"
```

Installing using a response file:

You can create a response file, for example setup.rsp, to store all the parameters, instead of specifying them on the command line. Following is a Windows example, Linux/UNIX platforms would be similar:

```
setup.exe -silent -options setup.rsp
```

Contents of the response file:

```
# Start of response file

-P installLocation="D:\IBM\AgentController"

-V licenseAccepted="true"

-V VJavaPath=" D:\jdk1.4.2\jre\bin\java.exe "

-V VAccessLocal="false"

-V VAccessCustom="true"

-V VAccessAll="false"

-V VHosts="host1,host2"

-V VSecurity="true"

-V VSecurityDisable="false"

-V VUsers="user1,user2"

-V VWAS5="true"

-V VWAS_HOME_V51="D:\WebSphere5.1\AppServer"

-V VWAS_HOME_V50="D:\WebSphere5.0\AppServer"

# End of response file
```

Starting and stopping Agent Controller on a Windows workstation

- On Windows, the Agent Controller system service (RAService.exe) will be started automatically.
- Use the Windows Services dialog under Control Panel to start or stop the Agent Controller service (**Start > Settings > Control Panel > Administrative Tools > Services>IBM Rational^(R) Agent Controller**).

Starting and stopping Agent Controller on a non-Windows workstation

- On non-Windows platforms, the Agent Controller process (RAServer) does not start automatically. You must start it yourself.
- **Important:** The following environment settings for non-Windows platforms must be set before starting Agent Controller.

- **Solaris:** /usr/sbin must be added to the PATH environment before starting Agent Controller. Enter the following commands to set the path:

```
PATH=/usr/sbin:$PATH
export PATH
```

- **AIX:** For certain JVMs, the LDR_CNTRL environment variable needs to be set to USERREGS to work properly with the Agent Controller. To set this variable, run the following command before running the RASStart.sh script:

```
export LDR_CNTRL=USERREGS
```

- **Linux, AIX, Solaris, HP-UX, z/OS:** RAServer requires the directories of the JRE that contain executable libraries such as libjvm.so to be added to the library path environment variable. The table below shows the path variable setting for each platform, based on default installation locations of the JVMs supported for the platform.

Note: The path you enter must match the path for the JRE you will specify when you install Agent Controller. The JRE you specify will be used by Agent Controller for launching Java applications.

Platform	Library path setting
AIX	LIBPATH=/usr/java14/jre/bin: /usr/java14/jre/bin /classic:\$LIBPATH export LIBPATH
HP-UX	SHLIB_PATH=/opt/java1.4/jre/ lib/PA_RISC/server:/opt/java1.4/ jre/lib/PA_RISC:\$SHLIB_PATH export SHLIB_PATH
Linux/IA32	LD_LIBRARY_PATH=/opt/IBMJava2-141/ jre/bin/classic:/opt/IBMJava2-141/ jre/bin:\$LD_LIBRARY_PATH export LD_LIBRARY_PATH
Linux/PPC64	LD_LIBRARY_PATH=/opt/IBMJava2-ppc64-142/ jre/bin:/opt/IBMJava2-ppc64-142/ jre/bin/classic:\$LD_LIBRARY_PATH export LD_LIBRARY_PATH

Platform	Library path setting
Linux/390	LD_LIBRARY_PATH=/opt/IBMJava2-s390-141/jre/bin/classic:/opt/IBMJava2-s390-141/jre/bin:\$LD_LIBRARY_PATH export LD_LIBRARY_PATH
Solaris	LD_LIBRARY_PATH=/usr/j2sdk1.4.2_04/jre/lib/sparc/server:/usr/j2sdk1.4.2_04/jre/lib/sparc:\$LD_LIBRARY_PATH export LD_LIBRARY_PATH
z/OS	LIBPATH=/usr/lpp/java/IBM/J1.4/bin/classic:/usr/lpp/java/IBM/J1.4/bin:\$LIBPATH export LIBPATH

- To start the Agent Controller process, change to the installation location's **bin** directory (for example, /opt/IBM/AgentController/bin) and run
./RAStart.sh
- To stop the Agent Controller process, change to the installation location's **bin** directory (for example, /opt/IBM/AgentController/bin) and run
./RAStop.sh

Uninstalling Agent Controller on a Windows workstation

- Agent Controller can be removed from the **Add/Remove Programs** dialog under Control Panel.
- To perform a silent uninstallation, run the command `uninstall.exe -silent` from the installation location's **_uninst** directory (for example, C:\Program Files\IBM\AgentController_uninst).

Uninstalling Agent Controller on a non-Windows workstation

1. Run the program **uninstall.bin** from the installation location's **_uninst** directory (for example, /opt/IBM/AgentController/_uninst).
2. Follow the on-screen instruction to complete the uninstallation.
3. To perform a silent uninstallation, use the command `uninstall.bin -silent`.

Uninstalling Agent Controller that has multiple references on a workstation

Agent Controller version 7.0.1 prevents multiple instances of the product from being installed on a single workstation. When additional installations are performed, either by stand-alone install or as an embedded install inside a product, Agent Controller records a reference to the name of the product that is initiating the new installation.

If Agent Controller has been installed multiple times - in other words, there are multiple reference counts - either by stand-alone install or as an embedded install inside a product, it can be uninstalled only when the last referencing product is uninstalled; the last referencing product still requires Agent Controller.

If you attempt to uninstall Agent Controller while it is still required by another product, the uninstallation will not proceed and you will receive a message "This product cannot be uninstalled as it is required by another product."

Installing Agent Controller on OS/400 (iSeries)

Uninstalling previous versions of Agent Controller

If you have a previous version of Agent Controller, stop it and uninstall it before installing this version.

Installing Agent Controller

1. On the iSeries host, create a library called HYADESDC and another library called IBMRAC:

```
CRTLIB HYADESDC
CRTLIB IBMRAC
```
2. On the iSeries host, in the HYADESDC library, create an empty save file called HYADESDC.SAVF:

```
CRTSAVF HYADESDC/HYADESDC
```
3. On the iSeries host, in the IBMRAC library, create an empty save file called IBMRAC.SAVF:

```
CRTSAVF IBMRAC/IBMRAC
```
4. Use FTP to add the file IBMRAC.SAVF from the installation CD to the library IBMRAC located on the iSeries host using BINARY mode transfer.
5. Use FTP to add the file HYADESDC.SAVF from the installation CD to the library HYADESDC located on the iSeries host using BINARY mode transfer.
6. Restore the save file HYADESDC.SAVF located on the iSeries host to the library HYADESDC, by typing:

```
RSTOBJ OBJ(*ALL) SAVLIB(HYADESDC) DEV(*SAVF) SAVF(HYADESDC/HYADESDC)
```
7. Restore the save file IBMRAC.SAVF located on the iSeries host to the library IBMRAC, by typing:

```
RSTOBJ OBJ(*ALL) SAVLIB(IBMRAC) DEV(*SAVF) SAVF(IBMRAC/IBMRAC)
```
8. Start QShell and create, on the integrated file system (IFS), the /opt/hyadesdc directory.
9. Restore the save file HYADESIFS.SAVF in HYADESDC to the IFS directory /opt/hyadesdc. For example:

```
RST DEV('/QSYS.LIB/HYADESDC.LIB/HYADESIFS.FILE')
OBJ('/opt/hyadesdc/*')
```
10. Restore the save file IBMRACIFS.SAVF in IBMRAC to the IFS directory /opt/hyadesdc. For example, type the following command on one line:

```
RST DEV('/QSYS.LIB/IBMRAC.LIB/IBMRACIFS.FILE') OBJ('/opt/hyadesdc/*')
ALWOBJDIF(*ALL)
```

If you wish to install the National Language packs, complete steps 11 through 16 below. If not, proceed to step 17.
11. On the iSeries host, in the HYADESDC library, create two empty save files called HYADESNL1.SAVF and HYADESNL2.SAVF:

```
CRTSAVF IBMRAC/HYADESNL1
CRTSAVF IBMRAC/HYADESNL2
```
12. Use FTP to add the NL files HYADESNL1.SAVF and HYADESNL2.SAVF from the installation CD to the library HYADESDC located on the iSeries host using BINARY mode transfer.
13. On the iSeries host, in the IBMRAC library, create two empty save files called IBMRACNL1.SAVF and IBMRACNL1.SAVF:

```
CRTSAVF IBMRAC/IBMRACNL1
CRTSAVF IBMRAC/IBMRACNL2
```


14. Use FTP to add the NL files IBMRACNL1.SAVF and IBMRACNL2.SAVF from the installation CD to the library IBMRAC located on the iSeries host using BINARY mode transfer.
15. Restore the save file HYADESNL1.SAVF and HYADESNL2.SAVF in HYADESDC to the IFS directory /opt/hyadesdc. For example, type the following commands on one line:


```
RST DEV('/QSYS.LIB/HYADESDC.LIB/HYADESNL1.FILE') OBJ
('/opt/hyadesdc/*') ALWOBJDIF(*ALL)
RST DEV('/QSYS.LIB/HYADESDC.LIB/HYADESNL2.FILE') OBJ
('/opt/hyadesdc/*') ALWOBJDIF(*ALL)
```
16. Restore the save file IBMRACNL1.SAVF and IBMRACNL2.SAVF in IBMRAC to the IFS directory /opt/hyadesdc. For example, type the following commands on one line:


```
RST DEV('/QSYS.LIB/IBMRAC.LIB/IBMRACNL1.FILE') OBJ('/opt/hyadesdc/*')
ALWOBJDIF(*ALL)
RST DEV('/QSYS.LIB/IBMRAC.LIB/IBMRACNL2.FILE') OBJ('/opt/hyadesdc/*')
ALWOBJDIF(*ALL)
```
17. After you have installed Agent Controller, change the directory to the installed location's bin directory /opt/hyades/bin, and run the setup script by typing:


```
./SetConfig.sh
```
18. Follow the on-screen prompt to configure Agent Controller.

Starting and stopping Agent Controller on OS/400 (iSeries)

1. To start Agent Controller, add the HYADESDC and the IBMRAC libraries to the library list:


```
ADDLIB HYADESDC
ADDLIB IBMRAC
```
2. Submit the RASStart job by typing:


```
SBMJOB CMD(CALL RASERVER) JOBD(RASTART)
```
3. To stop Agent Controller, terminate the RASStart job by typing:


```
ENDJOB JOB(RASTART)
```

or, change the directory to the installed location's bin directory /opt/hyades/bin, and run the stop script:

```
./RASStop.sh
```

Uninstalling Agent Controller on OS/400 (iSeries)

1. Remove the HYADESDC and IBMRAC library.
2. Remove the IFS directory /opt/hyadesdc (including all subdirectories and files).

Installing Agent Controller on z/OS (OS/390)

Uninstalling previous versions of Agent Controller

If you have a previous version of Agent Controller, stop it and uninstall it before installing this version.

Installing Agent Controller

1. In a UNIX System Services shell, go to the directory where you want to install Agent Controller. It is recommended that you install it in the /usr/lpp/ directory.
2. Transfer the install images **ibmrac.os390.pax**, **tptpdc.os390.pax** to the installation directory.

3. Issue the following command to extract Agent Controller files:

```
pax -ppx -rvf ibmrac.os390.pax
```
4. Issue the following command to extract the test and performance tools (TPTP) Agent Controller files:

```
pax -ppx -rvf tptpdc.os390.pax
```
5. Change the directory to the installation bin directory <rac_install_dir>/bin, and run the script to create links to the Agent Controller libraries by typing:

```
./createLinks.sh
```
6. Make the Agent Controller shared object files program controlled by issuing the following commands in a UNIX System Services shell:

```
extattr +p /usr/lpp/IBM/AgentController/lib/*.so
```

If you wish to install the National Language packs, complete steps 7 and 8 below. If not, proceed to step 9.
7. Transfer the NL install images tptpdc.nl1.os390.pax, tptpdc.nl2.os390.pax, ibmrac.os390.nl1.pax, ibmrac.os390.nl2.pax to the installation directory.
8. Issue the following command to extract Agent Controller files:

```
pax -ppx -rf tptpdc.nl1.os390.pax
pax -ppx -rf tptpdc.nl2.os390.pax
pax -ppx -rf ibmrac.os390.nl1.pax
pax -ppx -rf ibmrac.os390.nl2.pax
```
9. After you have installed Agent Controller, change the directory to the installed location's bin directory /usr/lpp/IBM/AgentController/bin, and run the setup script by typing:

```
./SetConfig.sh
```
10. Follow the on-screen prompt to configure Agent Controller.

Data Channel usage on z/OS:

In order to set a large dataChannelSize in the serviceconfig.xml file you may need to increase the maximum shared memory segment size setting on your machine. To do this, increase the IPCSHMMPAGES value in the BPXPRMxx parmlib member. This value is the maximum number of 4K pages that your data channel can be. For example, if you want to set dataChannelSize to 32M, you must set IPCSHMMPAGES to a value greater than 8192.

To allow Agent Controller to communicate with a large number of agents simultaneously, you must set the IPCSHMNSEGS value in the BPXPRMxx parmlib member to an appropriate value. This value specifies the maximum number of attached shared memory segments for each address space. The default value is 10 so you should increase this to 50.

For more information about the data channels used by Agent Controller, refer to the online help information for Agent Controller.

For more information about z/OS BPXPRMXX parmlib members and how to update them, refer to *IBM z/OS MVS™ Initialization and Tuning Reference*.

Starting and stopping Agent Controller on the z/OS (OS/390)

Note: RAServer requires the directories of the JRE that contain executable libraries such as libjvm.so to be added to the LIBPATH environment variable. For example, if you are using the IBM JRE 1.4.1, the LIBPATH variable would be set as follows:

```
export LIBPATH=/usr/lpp/java/IBM/J1.4/bin/classic:
/usr/lpp/java/IBM/J1.4/bin:$LIBPATH
```

- Start the server by logging in as root, opening the /usr/lpp/IBM/AgentController/bin directory and issuing the command:
./RAStart.sh
- To stop the server, log in as root, open the /usr/lpp/IBM/AgentController/bin directory, and issue the command:
./RAStop.sh

Uninstalling Agent Controller on the z/OS (OS/390)

- If you ran createLinks.sh when installing Agent Controller, then go to the /usr/lpp/IBM/AgentController/bin directory and issue the command:
./removeLinks.sh
- Remove the IBMRAC directory and all of its subdirectories by issuing the following command:
rm -rf /usr/lpp/IBM/AgentController

Using the Agent Controller security feature

The following list contains hints and tips for using the Agent Controller security feature on all platforms:

- Authentication is provided by the operating system. Only users specified at installation time will be allowed to authenticate. If the user name ANY is provided, any valid user name and password pairs will be forwarded to the operation system for authentication, otherwise only listed pairs will be forwarded.
- When security is enabled, the users you specified at installation time are required to authenticate with the operating system before any information can be exchanged with Agent Controller. The workbench user must provide a valid user name and password combination that is an operating system user name and password.
- **(Windows only)** Domain name passwords will not be authenticated. You must provide local user name and password pairs.
- There are no key management capabilities provided. Agent Controller uses Java keystores for security.
- A default keystore and exported certificate are in the Agent Controller directory <rac_install_dir>\security for Windows, and <rac_install_dir>/security for Linux. Where <rac_install_dir> is the installation directory of Agent Controller. These are samples only. You should replace these with a keystore containing meaningful certificates.

Workbench/Agent Controller compatibility summary

Backward compatibility (using an older workbench with a version 6.0.1 Agent Controller): Yes, they are compatible, in that the new Agent Controller supports all the features in previous versions (for example, Security on the control channel). However, you will not be able to use new features, including multiplexing (returning data via the control channel so that it can be secure).

Forward compatibility (using a 6.0.1 workbench with an older Agent Controller): No, in general, is not supported.

Cross-version Inter-Agent-Controller compatibility: Some products or tools (such as IBM Performance Optimization Toolkit) require that Agent Controllers on multiple hosts (apart from the workbench) "discover" and communicate with each other. Changes made from one version to the next surrounding this function mean that if you need to use this function, you must use either Agent Controller version

6.0.0.1 or Agent Controller version 6.0.1 on all involved hosts. That is, you cannot mix and match versions when using dynamic discovery between Agent Controller instances.

Known problems and limitations

This section covers known problems and limitations related to installing and uninstalling Agent Controller. Except where otherwise noted, the following information applies to all operating systems that are supported for Agent Controller.

Agent Controller may fail to start on non-Windows platforms

Agent Controller may fail to start on non-Windows platforms with the following message:

RAServer failed to start.

This failure is usually caused when TCP/IP port 10002 is not free. Agent Controller listens on this port by default. Another process running on the system may be using this port when Agent Controller is started or perhaps Agent Controller was just stopped and then restarted before the port could be released.

If Agent Controller failed to start, you can start it as follows:

- If port 10002 is being used by another process, you can change the port number by editing the serviceconfig.xml file. This is described in the documentation.

Note: If the communication port number that is configured in the serviceconfig.xml file has been changed, then the property INSTANCE_RAC_PORT_NUM_ID that is defined in the WebSphere Application Server configuration needs to be changed to the same port number.

- If Agent Controller was just stopped, wait a few minutes and try to start it again.

Other errors during installation and uninstallation

If you encounter errors during installation or uninstallation, this may be due to the fact that the object files of Agent Controller are loaded by running processes. To ensure the object files can be modified, do the following:

1. Shut down your Eclipse workbench.
2. Terminate all java.exe processes that contain either the Java Profiling Agent or the J2EE Request Profiler.

Installing CoOperative Development Environment and VisualAge for RPG Version 6.0

CoOperative Development Environment and VisualAge for RPG Version 6.0 is a set of flexible workstation and host tools for developing and maintaining iSeries application programs. VisualAge for RPG is a visual development environment that allows you to build client RPG applications with a Windows GUI and transparent access to iSeries resources.

To view the Installation Guide for IBM CODE and VisualAge RPG Version 6.0:

1. Insert the Optional Software CD for CoOperative Development Environment and VisualAge for RPG V6.0.
2. In the root directory of the CD, open the cinstall.htm file to view the installation guide.

Installing Host Access Transformation Services Toolkit Version 7.0

Host Access Transformation Services provides tools to transform 3270 and 5250 screens into HTML dynamically, without having to access or modify source code. Insert HATS CD, and refer to the product's *Getting Started* documentation to find more information on installing Host Access Transformation Services Toolkit Version 7.0.

Installing IBM WebSphere Application Server Version 6.1 for Windows

To find out more and install IBM WebSphere Application Server Version 6.1 for Windows, insert the WebSphere Application Server CD and its launchpad program should automatically open. Follow the on-screen instructions to install. For more details on installation steps, refer to the WebSphere Application Server Version 6.1 documentation.

Installing the WebSphere Portal Test Environment version 5.1.0.x

The portal test environment allows you to test portal applications from the WebSphere Development Studio Client workbench.

For complete instructions on installing and uninstalling WebSphere Portal 5.1.0.x on Windows and Linux workstations, as well as detailed system requirements, see the WebSphere Portal 5.1 information center at <http://www.ibm.com/websphere/portal/library>.

Installing the WebSphere Portal Test Environment version 5.1.0.x from a CD-ROM or electronic image

You must have WebSphere Development Studio Client installed before you can install the portal test environment. We recommend that you stop WebSphere Development Studio Client before you start the portal test environment installation.

To install the WebSphere Portal Test Environment 5.1.0.x, follow these steps:

1. If you have installed any of WebSphere Application Server, WebSphere Portal, WebSphere Application Server Integrated Test Environment, or WebSphere Portal integrated test environment, ensure all of them are stopped and ensure you stop any HTTP servers. Otherwise, the installation may fail.
2. Start the WebSphere Portal test environment version 5.1 installation program using one of the following methods:
 - From the WebSphere Development Studio Client launchpad program (see "Starting the launchpad program" on page 29), click **WebSphere Portal V5.1 test environment**.
 - Insert the setup CD of WebSphere Portal 5.1.0.x. On Windows systems, the installation program should start automatically. If it does not, or if you are installing on a Linux system, run the following command from the root of the setup CD or disk image:
 - For Windows: `install.bat -W dependency.useValidation=false`
 - For Linux: `install.sh -W dependency.useValidation=false`

Note: If you start the installation program from an electronic image, you might receive a ":bad interpreter : no such file or directory" error. To start the installation successfully, change to the directory of the

setup disk image and then run the command `dos2unix install.sh -W dependency.useValidation=false`.

3. Select the language you want the installation program run in and click **OK** to continue
4. Read the information in the Welcome page of the installation program and click **Next**.
5. Accept the license agreement and click **Next**
6. Select the **Test Environment** radio button and click **Next**. Depending on your platform, you may receive an error message indicating the operating system prerequisite check failed. This happens because some operating systems (for example, Red Hat Enterprise Linux Workstation Version 3.0) are only supported in the portal test environment. You can safely ignore this message — click **OK** to continue with the installation.
7. Accept the default installation directory for WebSphere Application Server V5.1, or browse to select a new one, and click **Next**. The default installation directory is `C:\Program Files\Portal51UTE\AppServer` for Windows and `opt/Portal51UTE/AppServer` for Linux. Unless you do not have enough space, the default installation directory is recommended.
8. Accept the default installation directory for the Portal Test Environment, or browse to select a new one, and click **Next**. The default installation directory is `C:\Program Files\Portal51UTE\PortalServer` for Windows and `opt/Portal51UTE/PortalServer` for Linux. Unless you do not have enough space, the default installation directory is recommended.
9. Specify the user ID and password that you want to use with the Portal Test Environment. Click **Next**.
10. Review the information in the summary screen and click **Next**.
11. When you are prompted to, insert the appropriate WebSphere Portal 5.1 CD and specify its drive location.
12. When the installation is finished, click **Finish** to close the installation program.

Using DB2 or Oracle database as the WebSphere Portal configuration repository

By default, the WebSphere Portal 5.1 test environment installs and uses the Cloudscape™ database to store information about user identities, credentials, and permissions for accessing portal resources. Cloudscape is a WebSphere Portal built-in Java database that is well suited to basic portal environments.

To install and configure a DB2 or Oracle database, please refer to the WebSphere Portal V5.1 InfoCenter at www.ibm.com/websphere/portal/library. You can find the instructions in the WebSphere Portal version 5.1 InfoCenter under **Configuring** → **Database**. Note that when referring to the configuration instructions in the InfoCenter, `<wp_root>` in the InfoCenter corresponds to the installation directory of the WebSphere Portal 5.1 Test Environment, and `<was_root>` in the InfoCenter corresponds to the installation directory of WebSphere Application Server V5.1 (see above for the default locations). Also, to verify the database connection, you will create the WebSphere Portal 5.1 Test Environment and start the server, instead of following the steps in the InfoCenter.

Uninstalling WebSphere Portal Test Environment version 5.1.0.x

You can uninstall WebSphere Portal Test Environment 5.1.0.x using a graphical uninstallation program.

Refer to the complete instructions on uninstalling WebSphere Portal 5.1 from Windows and Linux systems found in the WebSphere Portal 5.1 information center at <http://www.ibm.com/websphere/portal/library>. You will find information on decisions and steps you might take before uninstalling as well as information on other uninstallation methods, such as manually uninstalling.

To uninstall the WebSphere Portal test environment 5.1.0.x using the graphical uninstallation program:

1. Launch the uninstallation program by doing one of the following steps:
 - **Windows only:** Select WebSphere Portal from the Add/Remove Programs window in the Control Panel.
 - Start the uninstall program from a command prompt.
 - a. Change to the directory: *portal__server_root/uninstall*
 - b. Run the following command, according to your operating system:
 - For Linux: `./uninstall.sh`
 - For Windows: `uninstall.bat`
2. Select the language for the uninstallation, and click **OK**. The welcome panel is displayed.
3. Select the component to uninstall and click **Next**.

Note: The WebSphere Application Server uninstall program purposely leaves behind its root registry key in the Windows registry.

4. Click **Next** to display the confirmation panel.
5. Click **Next** to begin the uninstallation process. When the uninstallation program finishes, the program displays a confirmation panel.
6. Click **Finish** to close the uninstallation program.
7. Restart the machine. You must do this, especially if you intend to install WebSphere Portal again on the same machine.

Installing the WebSphere Portal Version 6.0 Test Environment

The portal test environment allows you to test portal applications from the WebSphere Development Studio Client workbench.

For complete instructions on installing and uninstalling WebSphere Portal 6.0 on Windows and Linux workstations, as well as detailed system requirements, see the WebSphere Portal 6.0 information center at <http://www.ibm.com/websphere/portal/library>.

Installing the WebSphere Portal Test Environment version 6.0 from a CD-ROM or electronic image

The following instructions will guide you through installing WebSphere Portal 6.0. For complete details, refer to the IBM WebSphere Portal Version 6.0 Information Center, available at <http://www.ibm.com/websphere/portal/library>.

To install the WebSphere Portal Test Environment 6.0, follow these steps:

1. If you are installing from an electronic image, ensure that you extracted or copied all the portal disk images into the same directory. Refer to “Extracting the downloaded files” on page 19.

2. If you have installed any of WebSphere Application Server, WebSphere Portal, WebSphere Application Server Integrated Test Environment, or WebSphere Portal integrated test environment, ensure all of them are stopped and ensure you stop any HTTP servers. Otherwise, the installation may fail.
3. Start the WebSphere Portal Test Environment version 6.0 installation program using one of the following methods:
 - From the WebSphere Development Studio Client launchpad program (see “Starting the launchpad program” on page 29), click **WebSphere Portal V6.0 test environment**.
 - Insert the setup CD of WebSphere Portal 6.0. On Windows systems, the installation program should start automatically. If it does not, or if you are installing on a Linux system, run the following command from the root of the setup CD or disk image:
 - For Windows: `install.bat`
 - For Linux: `install.sh`
4. Select the language you want the installation program run in and click **OK** to continue
5. Read the information in the Welcome page of the installation program and click **Next**.
6. Read the license agreement and the non-IBM terms. If you agree, select **I accept the both the IBM and the non-IBM terms**, and click **Next**
7. Accept the default installation directory for WebSphere Application Server V6.0, or browse to select a new one, and click **Next**. The default installation directory is `C:\Program Files\IBM\Portal60UTE\AppServer` for Windows and `opt/IBM/Portal60/AppServer` for Linux. Unless you do not have enough space, the default installation directory is recommended.
8. Accept the default WebSphere application server properties, or specify the following things:
 - The cell name.
 - The node within the WebSphere Application Server cell where you want the WebSphere Portal application server to be installed. This value must be unique among other node names in the same cell. Typically, this value is the same as the host name for the computer.
 - The fully-qualified DNS name, short DNS name, or the IP address of the computer that is running WebSphere Application Server. Do not use local host or a loopback address.
9. Enter the user ID and password for the WebSphere Application Server administrator. Do not use blanks in either the user ID or the password, and ensure that the password is at least five characters in length. This user ID is used to access WebSphere Application Server with administrator authority after installation. Note that this user ID is only used to log in to WebSphere Application Server and is not related to any user IDs that are used to access the operating system itself. Click **Next** to continue.
10. Select if you want to install WebSphere Portal Process Server for business process support, and click **Next** to continue. **Important:** If you are installing the product with the intention of adding the resulting node to a managed cell or using the node as part of a cluster, you can follow one of two approaches:
 - If you require business process integration support in your managed cell or cluster, you must install WebSphere Portal on a node that has already been federated to a deployment manager. Exit this installation process, and refer to the topic “Setting up a cluster” in the WebSphere Portal version 6.0 information center.

- If you do not require business process integration support in your managed cell or cluster, select Do not install WebSphere Process Server on this panel and continue.

If you require business process integration support in your managed cell or cluster, you must install WebSphere Portal on a node that has already been federated to a deployment manager. Exit this installation process, and refer to Setting up a cluster for instructions. If you install WebSphere Portal, including support for business process integration, on an unmanaged node, you will not be able to add that node to a managed cell or use it as part of a cluster at a later time.

11. Accept the default installation directory for the Portal Server or browse to select a new one, and click **Next**. The default installation directory is C:\Program Files\IBM\Portal60UTE\PortalServer for Windows and opt/IBM/Portal60UTE/PortalServer for Linux. Unless you do not have enough space, the default installation directory is recommended. If the directory that you specify does not exist, it will be created. If you are installing on Windows, do not include periods (.) in the installation path. Click **Next**
12. Enter the user ID and password for the WebSphere Portal administrator. Do not use blanks in either the user ID or the password, and ensure that the password is at least five characters in length. This user ID is used to access WebSphere Portal with administrator authority after installation. Note that this user ID is only used to log in to WebSphere Portal and is not related to any user IDs that are used to access the operating system itself. If you intend to use a Lightweight Directory Access Protocol (LDAP) directory to manage your users, ensure that the administrator user ID that you specify here conforms to the recommendations that are specified in Special characters in user IDs and passwords. Click **Next**.
13. Verify the products to be installed and click **Next**. The installation program begins installing the selected components. Throughout the installation and configuration process, the installation program displays progress indicators for the different components.

Note: The installation can take some time to complete. Use the progress indicators and the process monitoring facilities of your platform to monitor the overall progress of the installation.

14. If you are installing from the CDs: When you are prompted to, insert the appropriate WebSphere Portal 6.0 CD and specify its drive location.
15. When the installation is finished, the installation program displays a confirmation panel listing the components that have been installed. Note the following information before clicking **Finish**:
 - The port number that is used to access WebSphere Portal is displayed on the confirmation panel. Make a note of the port number for use in verifying the WebSphere Portal URL. This value is also stored in the WpsHostPort property in the <portal installation directory>/config/wpconfig.properties file.
 - If you want to use the WebSphere Portal First Steps to access WebSphere Portal, ensure that Launch First Steps is selected. From First Steps you can access WebSphere Portal or read the WebSphere Portal documentation.
16. Click **Finish**.
17. To verify that WebSphere Portal is running, open the following URL in a browser: `http://example.com:port_number/wps/portal`, where example.com is the fully qualified host name of the machine that is running WebSphere

Portal and port_number is the port number that is displayed on the confirmation panel. For example, <http://www.ibm.com:10038/wps/portal>.

18. WebSphere Portal is up and running. **Important:** At this point you are running with security enabled.

For information on using WebSphere Portal 6.0, refer to the IBM WebSphere Portal Version 6.0 Information Center at <http://www.ibm.com/websphere/portal/library>.

Using a DB2, Oracle or SQL Server database as the WebSphere Portal configuration repository

The WebSphere Portal Test Environment, Version 6.0 stores configuration, access control, such as user identities, credentials, and permissions for accessing portal resources, and user data in a database. By default, WebSphere Portal installs and uses the Cloudscape database. However, you might want to use another supported database.

For information on installing and configuring another supported database for use with WebSphere Portal V6.0, such as a DB2, Oracle or SQL Server database, please refer to the WebSphere Portal V6.0 information center at www.ibm.com/websphere/portal/library. You can find the instructions in the WebSphere Portal version 6.0 information center under **Configuring** → **Configuring databases**.

Uninstalling WebSphere Portal Test Environment version 6.0

You can uninstall WebSphere Portal Test Environment 6.0 using a graphical uninstallation program.

Refer to the complete instructions on uninstalling WebSphere Portal 6.0 from Windows and Linux systems found in the WebSphere Portal 6.0 information center at <http://www.ibm.com/websphere/portal/library>. You will find information on planning to uninstall as well as information on other uninstallation methods, such as manually uninstalling.

To uninstall the WebSphere Portal test environment 6.0 using the graphical uninstallation program:

1. Review the information on planning to uninstall WebSphere Portal 6.0 from Windows and Linux systems found in the WebSphere Portal 6.0 information center at <http://www.ibm.com/websphere/portal/library>.
2. Launch the uninstallation program by doing one of the following steps:
 - **Windows only:** Select WebSphere Portal from the Add/Remove Programs window in the Control Panel.
 - Start the uninstall program from a command prompt.
 - a. Change to the directory: *portal_server_root/uninstall*
 - b. Run the following command, according to your operating system:
 - For Linux: `./uninstall.sh`
 - For Windows: `uninstall.bat`
3. Select the language for the uninstallation, and click **OK**. The welcome panel is displayed.
4. Select the component to uninstall and click **Next**.

Note: The WebSphere Application Server uninstall program purposely leaves behind its root registry key in the Windows registry.

5. Click **Next** to display the confirmation panel.

6. Click **Next** to begin the uninstallation process. When the uninstallation program finishes, the program displays a confirmation panel.
7. Click **Finish** to close the uninstallation program.
8. Restart the machine. You must do this, especially if you intend to install WebSphere Portal again on the same machine.

Installing ClearCase LT

Rational ClearCase LT is a configuration management tool for small project teams. ClearCase LT is part of the IBM Rational ClearCase product family that can scale from small project workgroups to the distributed, global enterprise.

Your installation media includes Rational ClearCase LT Version 7.0.0.0 It is installed separately from WebSphere Development Studio Client.

If you already have ClearCase LT installed on your workstation, then you might be able to upgrade it to the current version. Refer to the installation documentation for ClearCase LT for information on upgrading from previous versions.

To enable WebSphere Development Studio Client to work with ClearCase LT, you must install the Rational ClearCase SCM Adapter feature. By default, this feature is selected when you install WebSphere Development Studio Client; however, if you did not include it, you can install it later using the Modify Packages wizard in IBM Installation Manager. For details, refer to “Modifying installations” on page 51.

You must enable the Rational ClearCase SCM adapter before you can work with it. Refer to the online help for details on enabling and working with the adapter.

Locating the ClearCase LT installation instructions and release notes

For complete instructions on installing Rational ClearCase LT, refer to the installation documentation provided with the ClearCase LT installation media. It also strongly recommended that you read the ClearCase LT release notes before you install the product.

Some documentation is in Acrobat PDF files. To open the files, you require the Adobe Reader software, which you can download from <http://www.adobe.com/products/acrobat/readstep2.html>.

For Windows: The installation instructions and release notes can be viewed from the ClearCase LT installation launch pad. Refer to “Starting an installation of Rational ClearCase LT” on page 78.

- To open the installation instructions:
 1. For Windows: From the first ClearCase LT installation CD (or disk directory for an electronic image), open `doc\books\install.pdf`. *IBM Rational ClearCase, ClearCase MultiSite[®], and ClearCase LT Installation and Upgrade Guide, Version 7.0 (Windows)* opens.
 2. For Linux: Go to <http://www-1.ibm.com/support/docview.wss?uid=pub1gi11636> for instructions to download *IBM Rational ClearCase, ClearCase MultiSite, and ClearCase LT Installation Guide, 7.0, Linux and UNIX*.
- For Linux: *IBM Rational ClearCase, ClearCase MultiSite, and ClearCase LT Installation and Upgrade Guide, Version 7.0 (Linux)* opens.

Getting documentation from the IBM Publications Center

You can also download the installation instructions and release notes for Rational ClearCase LT from the IBM Publications Center.

1. Go to <http://www.ibm.com/shop/publications/order>.
2. Select your country/region on the Welcome page of the Publications Center.
3. Click Search for Publications.
4. Enter either the document title or publication number in the appropriate search field.
 - To search for a document by its title, enter the title in the Search on field.
 - To search for a document by its publication (Material ID) number, enter the number in the Publication number field.

Table 1. ClearCase publication numbers

Document	Publication number
IBM Rational ClearCase, ClearCase MultiSite, and ClearCase LT Installation and Upgrade Guide (Windows)	GI11-6365-00
IBM Rational ClearCase, ClearCase MultiSite, and ClearCase LT Installation and Upgrade Guide (UNIX)	GI11-6366-00
IBM Rational ClearCase LT Release Notes®	GI11-6369-00

Starting an installation of Rational ClearCase LT

The installation instructions in this section are to help you start the installation process for Rational ClearCase LT. You must refer to the complete installation instructions found in the Rational ClearCase LT Installation Guide when installing the product. Before installing, it is strongly recommended that you read the release notes.

Starting an installation of Rational ClearCase LT on Windows

1. Start the Rational ClearCase LT launchpad program using one of the following methods:
 - From the WebSphere Development Studio Client launchpad program (see “Starting the launchpad program” on page 29), click **Rational ClearCase LT**.
 - Insert the first CD of Rational ClearCase LT. The launchpad program should start automatically. If it does not run, run `setup.exe` from the root of the first CD or disk image.
2. Read the release information if you have not done so.
3. Click **Install IBM Rational ClearCase LT**. The Rational ClearCase LT Setup Wizard opens.

Follow the instructions in the Setup Wizard to complete the installation.

Configuring Rational ClearCase LT licensing

When you have WebSphere Development Studio Client installed on the same computer as Rational ClearCase LT, you do not need to configure Rational ClearCase LT licensing. However, if you install Rational ClearCase LT without WebSphere Development Studio Client, then you will need to configure ClearCase LT Licensing.

See the ClearCase LT *Installation Guide* for details about configuring licensing

Installing Crystal Reports Server XI Release 2

Crystal Reports Server XI Release 2 is a common architecture for data access, reporting, and information delivery. It is designed to integrate with existing data, Web, and application investments. Based on Crystal Reports, Crystal Reports Server XI Release 2 is an effective solution for scaling information to thousands of users.

Crystal Reports Server XI Release 2 is a centralized platform for managing and securely distributing complex and interactive reports via the Web or integrated into intranet, extranet, Internet, and corporate portal applications and is available for both Windows and Linux.

As an integrated suite for reporting, analysis, and information delivery, Crystal Reports Server XI Release 2 provides a solution for increasing end-user productivity and reducing administrative efforts.

Installing Crystal Reports Server XI Release 2 on Windows

When you perform this default installation, all the client and server components are installed on your workstation. A MySQL database for the Central Management Server (CMS) is automatically created. Default user and group accounts are created, and sample reports are published to your system. When the installation is complete, the server components are started as services on your workstation.

To install all the components of Crystal Reports Server XI Release 2 on Windows:

1. From the WebSphere Development Studio Client installation launchpad, click **Install Crystal Reports Server XI Release 2**. If you are installing from CD ROM, you will be prompted to insert the first Crystal Reports Server XI Release 2 for Windows installation disk into your CD ROM drive.
2. From the WebSphere Development Studio Client installation launchpad, click **Install Crystal Reports Server XI Release 2**.
3. In the Setup wizard, select a setup language and click **OK**. This is the language that the installation process uses, not the language that will be installed.
4. On the Welcome page, click **OK**.
5. On the License Agreement page, read the license agreement and, if you accept the terms and conditions, click **I accept the license agreement** and click **Next**.
6. On the Select Client or Server Installation page, click **Perform Server Installation**.

Note:

This option installs all required Crystal Reports Server components. The **Perform Client Installation** option only installs client tools onto a machine that you can use to administer your Crystal Reports Server environment remotely.

7. Follow the instructions in the Setup wizard and on the Directory Selection page, accept the default location (C:\Program Files\Business Objects\BusinessObjects Enterprise 11.5), click **Next**, and proceed to Step 9.
8. If you choose to install on a drive other than the default location, the Setup wizard asks you to select a drive for the installation of shared files that are also used by Business Objects products such as Crystal Reports. To install several Business Objects products on the same machine without installing files

on the default system drive, first install Crystal Reports Server. When you subsequently install Crystal Reports, it will use the common file directory created by Crystal Reports Server.

9. On the Install Type page, click **New** and complete the following steps:
 - If you want to install the MySQL database as your CMS database, click **Install MySQL database server**, click **Next** and proceed to Step 10. This is the recommended installation.
 - If you want to use another database for the CMS, such as Oracle or Sybase, click **Use an existing database server** and click **Next**.

For information and instructions on how to use an existing database server, refer to the BusinessObjects Enterprise Installation Guide. This information can be found in the chapter called Installing BusinessObjects Enterprise on Windows under the section named New installation.

10. If you have chosen to install the MySQL database as your CMS database, complete the following steps:
 - a. Enter the port number.
 - b. Enter and confirm the password that will be used by MySQL's root user account.
 - c. Accept the default user name to access the CMS database or enter a new user name to override the default name.
 - d. Enter and confirm the password that will be used to access the CMS database.
 - e. Click **Next**
11. On the Choose Web Component Adapter Type page, complete one of the following steps:
 - If you want to use the Java Web component adapter only and use your own Java application server, click **Java application server**, click **Use preinstalled Java application server**, clear the **IIS ASP.NET** check box, and click **Next**; then proceed to Step 13.
 - If you want to use the Java Web component adapter only and install Tomcat, click **Java application server**, click **Install Tomcat application server**, clear **IIS ASP.NET**, and click **Next**; then proceed to Step 12.
 - If you want to use the IIS ASP.NET Web component adapter only, clear the **Java application server** check box, select the **IIS ASP.NET** check box, from the **Choose website** list, accept the default or select the Web site on which to deploy the WAR file, and click **Next**; then proceed to Step 13.
 - If you want to use both the Java and IIS ASP.NET Web component adapters, select both **Java application server** and **IIS ASP.NET**, from the **Choose website** list, accept the default or select the Web site on which to deploy the WAR file, click either **Use preinstalled Java application server** or **Install Tomcat application server**, and click **Next**; then proceed to Step 12 or Step 13.
12. If you have chosen to install Tomcat application server, accept the defaults or change the default installation location and configure the Connection port, Shutdown port, and Redirect port, and click **Next**.

Note:

If you are installing Crystal Reports Server on the same machine as a BusinessObjects Enterprise 6.x deployment, do not use the default port number 8080 that may already be in use by another deployment.

13. On the Start Installation page, click **Next**. The installation begins. During the installation process, you may be prompted to reboot the machine and register your product.
14. On the last page of the Setup wizard, clear **Launch BusinessObjects Administration Console** unless you want to publish your own reports to Crystal Reports Server immediately and click **Finish**.

Uninstalling Crystal Reports Server XI Release 2

To uninstall Crystal Reports Server XI Release 2:

1. Click **Start** → **Settings** → **Control Panel**.
2. In the Control Panel window, click **Add/Remove Programs**.
3. In the Add or Remove Programs window, select **Crystal Reports Server XI Release 2** and click **Remove**.

Notices

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