

1.00/1.001 HowTo: Install Eclipse

Spring 2008

1.00/1.001 will use the Eclipse Integrated Development Environment (IDE) to create, compile, and run Java programming assignments. Eclipse version 3.3.1.1 is the IDE supported by the 1.00 staff.

This document contains step-by-step instructions for installing Eclipse on a Microsoft Windows computer.

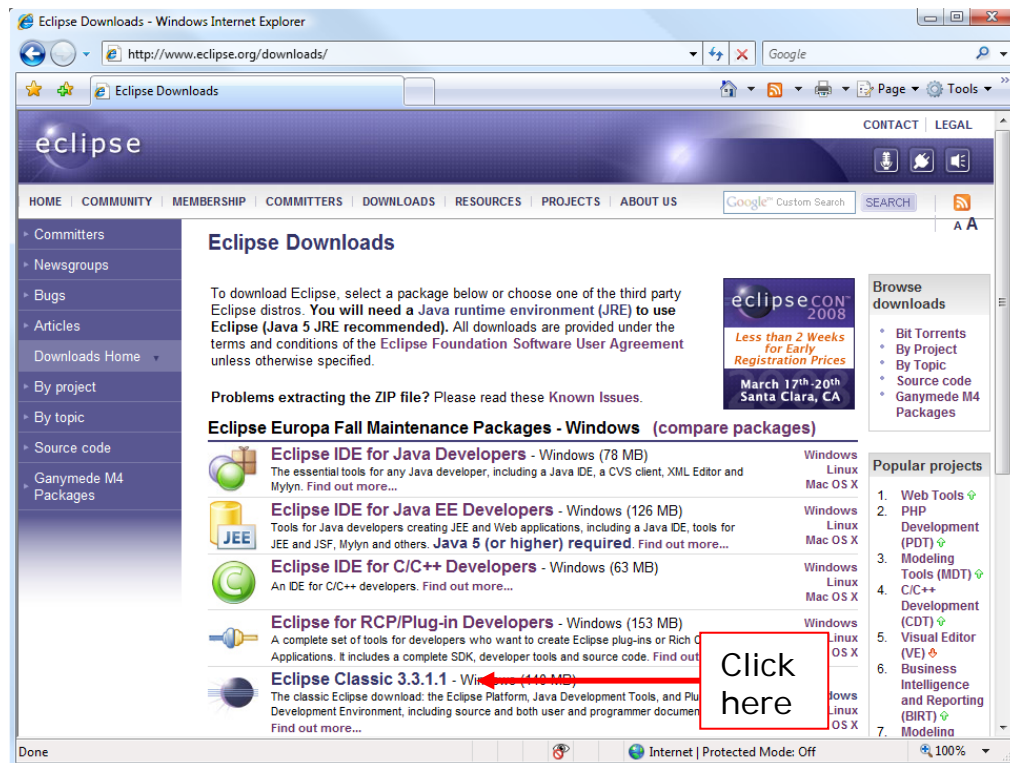
Do not install Eclipse until you have installed JDK 6u4 (or JDK 5.0 and higher). Please refer to *1.00/1.001 HowTo: Install Java & Documentation* for details on how to proceed.

Step 1: Downloading Eclipse

Eclipse can be downloaded from the following website:

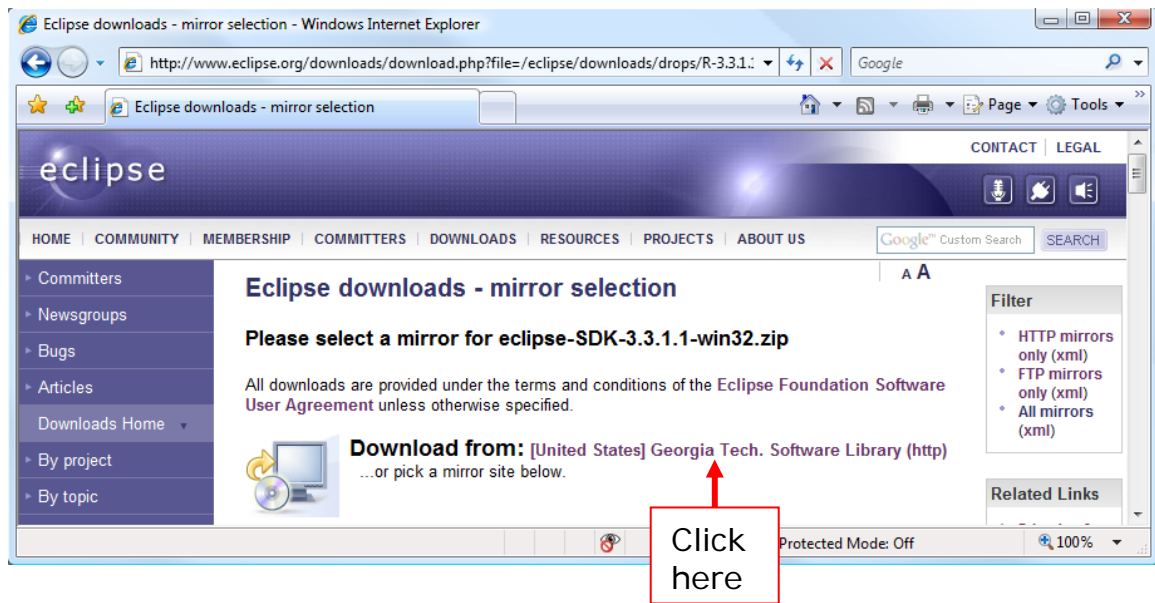
<http://www.eclipse.org/downloads/>

Click on the “Eclipse Classic” link to initiate the download.



(This page changes frequently, so what you see may be slightly different).

You will be redirected to a page of download mirrors:



Click the pre-selected download link that follows the big bold words “Download from: ...” (If a file download box does not appear, try clicking another link that is geographically close to you)

A **File Download** dialog box will appear. The Name of the file you are downloading should be “eclipse-SDK-3.3.1.1-win32.zip” Select “**Save.**”

Step 2: Installing Eclipse

Click here

Once you have obtained the Eclipse zip file, right-click it and choose **Extract All...** to begin the extraction process.

Note: If you don't have a zip utility, you can try 100Zip, a Java based zip utility available under Materials->Resources on the 1.00 Stellar site. To use 100Zip simply download and double click on “100Zip.jar” then choose “UnZip”.

You may extract the archive to any arbitrary destination, but we recommend you move the extracted “eclipse” folder to:

C:\Program Files\eclipse

Once you have extracted and moved the eclipse folder to its destination, you can create a shortcut to Eclipse. There are several ways to do this. One way is to navigate to “C:\Program Files\eclipse,” right click on “eclipse.exe,” and select “Create Shortcut.” You may then drag this shortcut to your Desktop or Start Menu.

Step 3: Running Eclipse

Double-click on eclipse.exe or the Eclipse shortcut you created on your desktop.

Each time you run Eclipse, you will be prompted to select a workspace. The default workspace is:

For XP: **C:\Documents and Settings\<<username>\workspace**

For Vista: **C:\Users\<<username>\workspace**

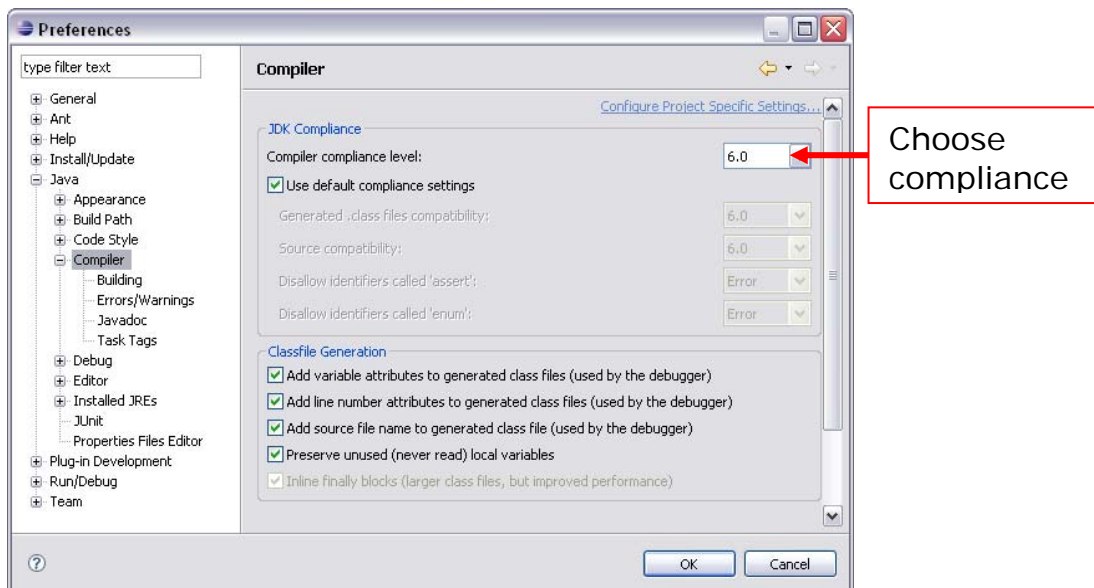
Important! Steps 4-6 will guide you through setting up Eclipse. The changes you will make to Eclipse are saved in the workspace. Each time you create a **new** workspace you will have to repeat steps 4-6.

Step 4: Setting Compiler Compliance

With Eclipse running:

- a. Choose Window -> Preferences from the Eclipse toolbar.
- b. In the "Preferences" window, in the navigation tree, expand the "Java" option and click the "Compiler" option.
- c. In the "Compiler" panel, set the "Compiler compliance level" to 6.0.
- d. Click OK to save your changes.

Note: If you installed JDK 5.0 you should set the compiler compliance level to 5.0.

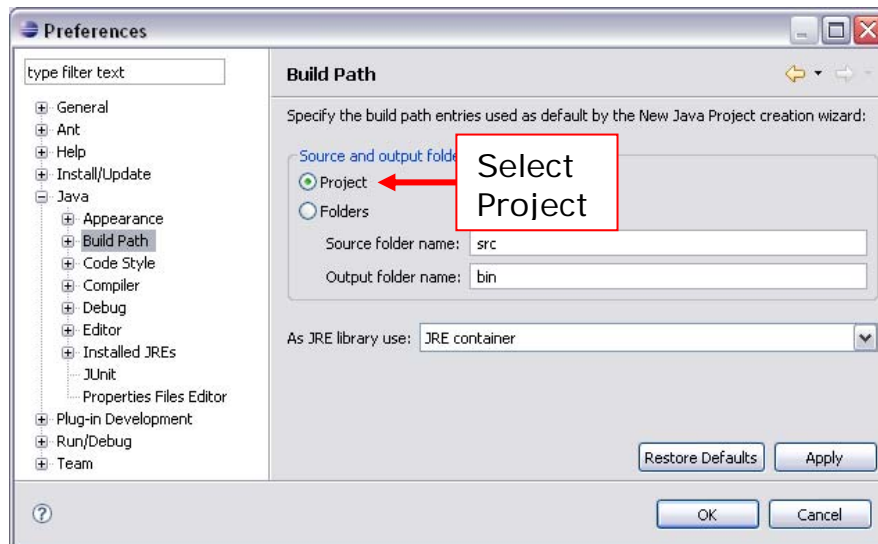


Step 5: Setting the Output

The files you will be creating via Eclipse can be organized in several ways. For simplicity, we will set Eclipse to organize the files via “project” output. This means .java, and .class files will be stored directly in the project folder instead of in a src/bin directory structure.

With Eclipse running:

- Choose Window -> Preferences from the Eclipse toolbar.
- In the "Preferences" window, in the navigation tree, expand the "Java" option and click the “Build Path” option.
- In the "Build Path" panel, select the “Project” radio button.
- Click OK to save your changes.

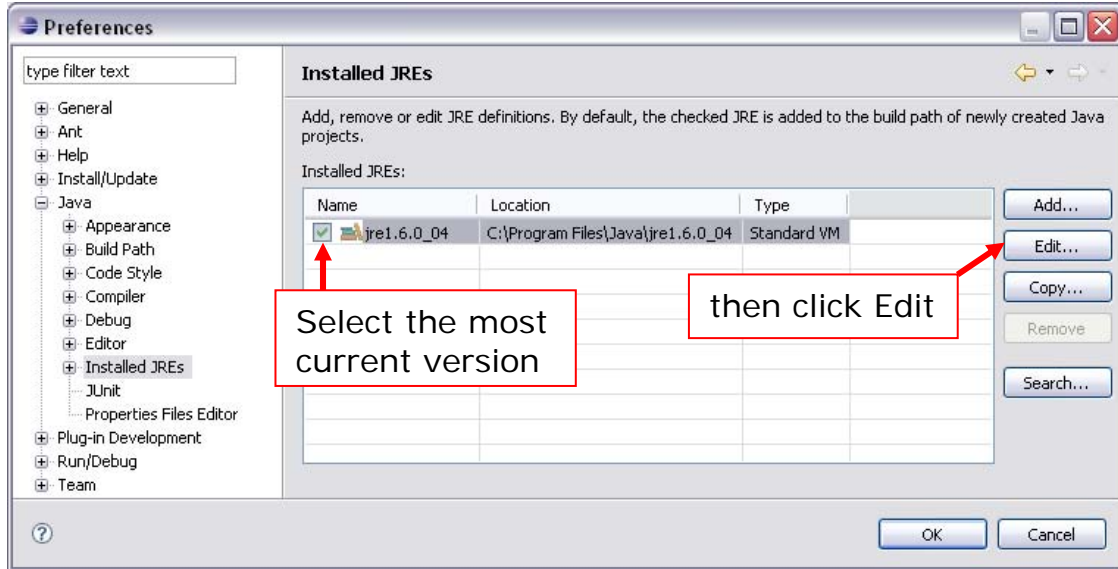


Step 6 (Optional): Connecting Java SE 6 Documentation with Eclipse.

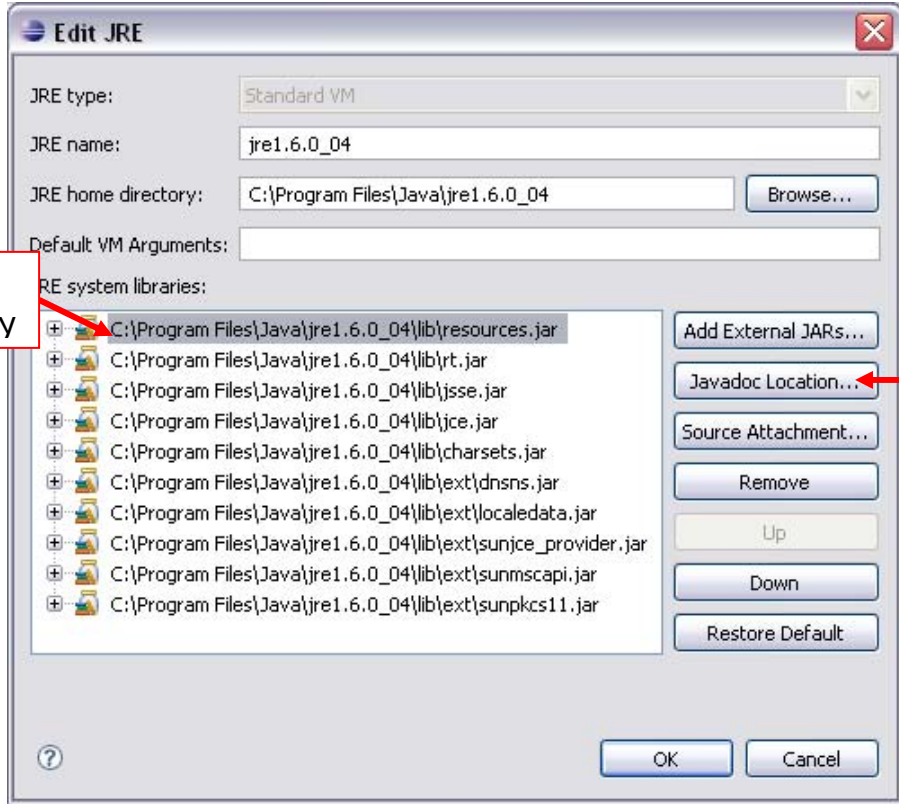
If you have downloaded and ‘installed’ the Java SE 6 Documentation (Step 3 in *1.00/1.001 HowTo: Install Java & Documentation*) this step will allow Eclipse to use that documentation to generate tips while you are not connected to the internet.

With Eclipse running:

- Choose Window -> Preferences from the Eclipse toolbar.
- In the "Preferences" window, in the navigation tree, expand the "Java" option and click the “Installed JREs” option.
- In the "Installed JREs" panel, make sure the most current version of Java is checked (should be jre1.6.0_04). Select it and click “Edit”.

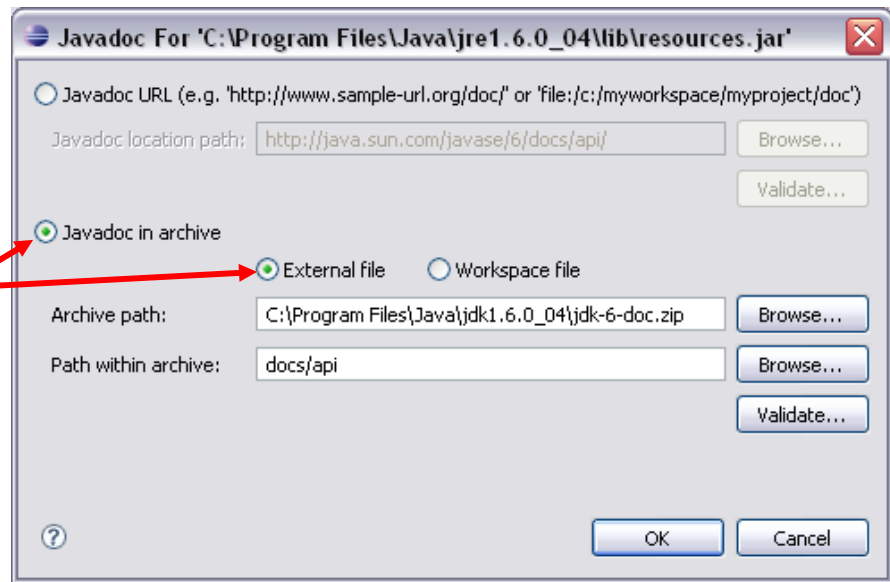


- d. An “Edit JRE” window will open. You will now need to set the Javadoc location for *each* JRE system library.
- e. To set the Javadocs for *one* JRE System library:
 - Select a system library (...jar)
 - Click the button “Javadoc Location...”
 - A “Javadoc For ...” window will appear.
 - Select “Javadoc in archive”
 - Select “External file”
 - For “Archive Path”, enter:
 C:\Program Files\Java\jdk1.6.0_04\jdk-6-doc.zip
 or the file path of wherever you saved the documentation zip file.
 - For “Path within archive”, enter:
 docs/api
 - If you click the “Validate” button you should get a prompt that says the location is likely valid.
 - When done, click OK and repeat with the next system library.



Select a JRE system library

Then click Javadoc Location...



Select

Running Eclipse: Tips

1. *Where does Eclipse store my projects/files?*

If you do not specify otherwise, Eclipse will create a default workspace in your Windows user directory:

For XP: **C:\Documents and Settings\<>username>\workspace**

For Vista: **C:\Users\<>username>\workspace**

This workspace directory is used as the default storage area for your projects as well as for holding any required information about your Eclipse projects.

2. *How do we run shared/multi-workspace installs?*

This is only required in special cases; see the TAs if you need a shared environment.

For shared or multi-workspace installs you must explicitly specify the location for your workspace using the "-data" command line argument; for example,

```
eclipse -data C:\myworkspace -vm "C:\Program Files\Java\jdk1.6.0_04\jre\bin\javaw"
```

To create a Windows shortcut to an installed Eclipse and a particular workspace (e.g., **C:\myworkspace**):

1. Navigate to **eclipse.exe** in Windows Explorer and use Create Shortcut on the content menu.
2. Select the shortcut and edit its Properties. In the Target: field append the -data option followed by the location of the workspace (e.g., "-data c:\myworkspace").

Opening this shortcut launches Eclipse on the specified workspace.