

STYLEBASE FOR ECLIPSE

Advanced Installation and Configuration Guide

Most users maintain a local database for themselves and use VTT's global pattern repository over internet as a remote database. These users do NOT need to read this document. These instructions are intended for those who want to install they own remote database, for example to maintain a company-wide pattern repository.

Prerequisites

MySQL 5.0 Database Server



Stylebase can store and retrieve architectural styles and patterns that are stored into MySQL database. MySQL is the most widely-used free / open source database management system. You can download MySQL Server Community Edition at <http://dev.mysql.com/downloads/mysql/5.0.html/>. To make managing your database easier, you may want to download MySQL Query Browser and other GUI tools at <http://dev.mysql.com/downloads/gui-tools/5.0.html/>. This guide supposes that you have MySQL Query Browser installed. You do not need any additional software on the client side.

Creating your own database

Create a new database on your MySQL server and create the tables with the script "CREATE.SQL". There are many ways to do this. The following is an easy way:

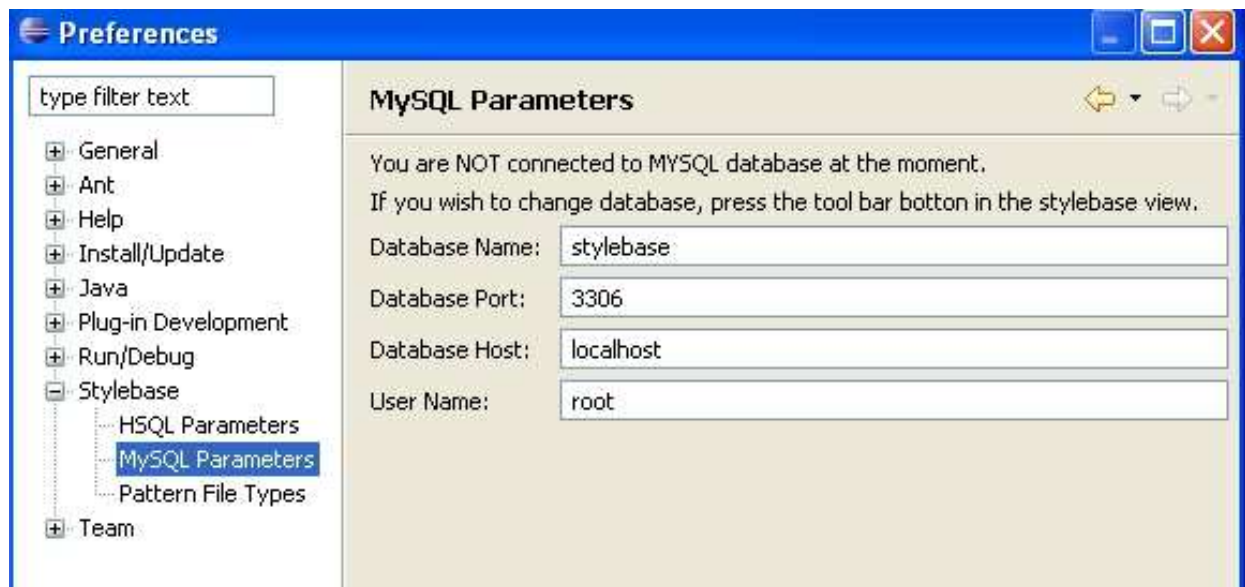
- Connect to the database with MySQL Query Browser. Do not specify a default schema at this stage, just ignore the warning.
- Go to tab "Schema Data", right click and select menu item "Create New Schema". Enter a name for your schema when prompted. Make your new schema as a default schema by double-clicking (schema name should be bolded).
- Go to File → Open Script and select the script file called "create.sql". Run the script by pressing "Execute".

Please note that the script run only on MySQL 5.0 or higher. If you are using an older version of MySQL, please contact our support for help.

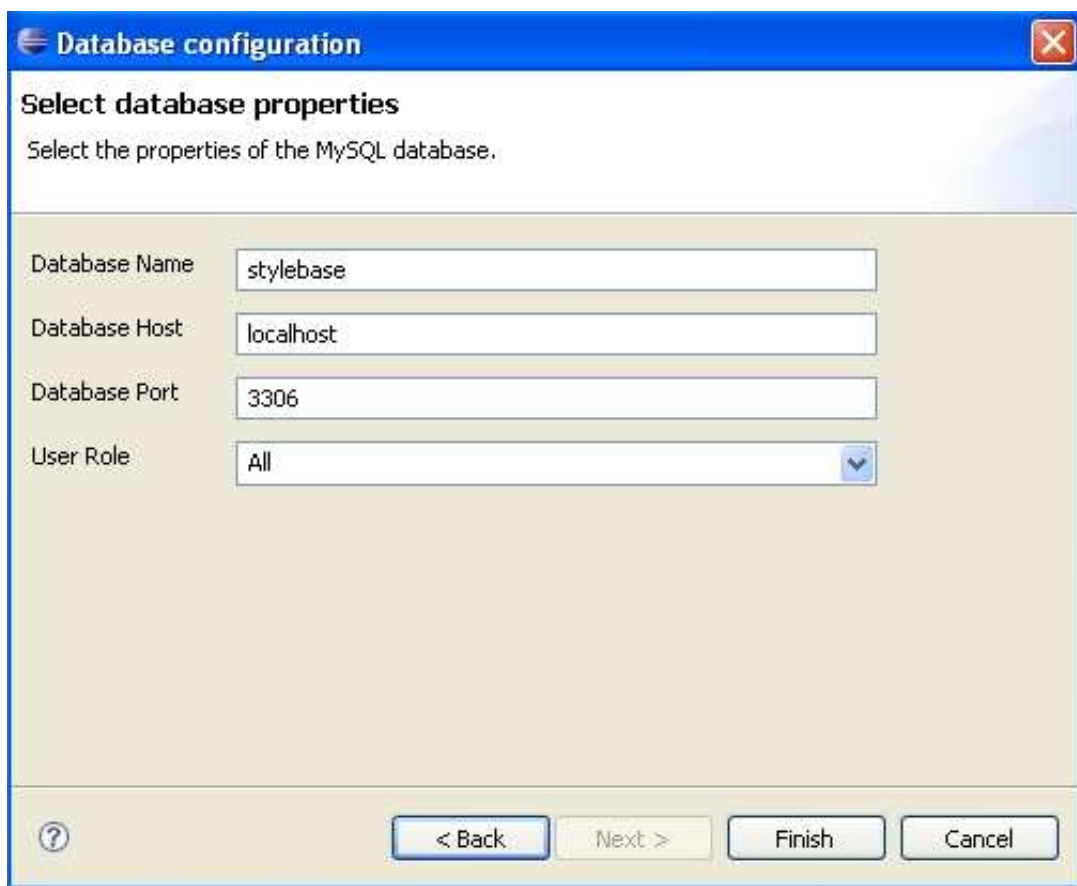
Configuring Database Connection

To reconfigure the database connection information, go to **Windows → Preferences → Stylebase**. If are install If you have installed your own database, you have to reset the values for the following fields:

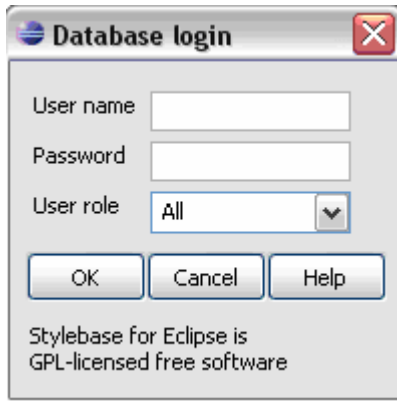
- **Database Name:** name of the database containing the tables for the Stylebase plug-in
- **Database Port:** port used by MySQL server (MySQL uses port 3306 by default)
- **Database Host:** name or IP-address of the database server (e.g. localhost)
- **User Name:** default user name for connecting to the database (the field can also be left blank, in which case, you have to write the user name on each login).



When you install the Stylebase plug-in on a new client computer, you can also set MySQL parameters in the configuration wizard. The wizard is launched automatically when you open the main Stylebase view for the first time. The view is opened by selecting **Window** → **Show View** → **Other..** → **Stylebase** → **Stylebase**.



Once you have configured the MySQL properties, check the status bar of the Stylebase for Eclipse. If the leftmost toolbar button shows a folder and globe icon, you are connected to the local database. Press that button to establish connection to the remote database. A login dialog appears which prompts you to enter user name and password. This is the account and password configured on your MySQL server¹.



If Stylebase user authentication fails, try to connect to the database with another tool, e.g. MySQL Query Browser, with the same user name and password. The option "user role" does not affect the authentication, but determines the types of patterns you see. If you specify no role, you will see all pattern types. Architect will only see conceptual patterns while designer will only see concrete patterns. For information on how to set pattern type, see "Edit pattern properties" later on.

Populating the database

You have now opened the main view of the Stylebase for Eclipse. It is empty because there are no patterns in the database. You now have to start populating the database by inserting (1) patterns and (2) quality attribute definitions.

1. Inserting patterns

Download sample patterns (design_patternsXX.zip and architecture_patternsXX.zip) from the following address: http://sourceforge.net/project/showfiles.php?group_id=178714&package_id=208519. Extract the packages into the folder which is defined by the **Pattern Root** parameter in the Stylebase Preferences (see subtitle "Configuring the plug-in). Bring this folder to your work space as follows.

- Open the Navigator Window by selecting **Window → Show View → Navigator**. The Navigator shows all projects and files in your Eclipse workspace.
- Select an existing project in the Navigator window or create a new one (**File → New → Project → Java Project**).
- Go to **File → New → Folder → Advanced**, tick the check box entitled "**Link to a folder in the file system**" and point to the folder which is specified as Pattern Root and now stores the sample patterns.

The pattern files should now be visible in your pattern Window. To insert pattern into the database, select a pattern in Stylebase view and press the button "**Add pattern**" (an icon with green plus sign). A simple dialog box appears and you are prompted to enter name for the new pattern. Please note that, when entering sample patterns, a **pattern name** given in this dialog **must correspond exactly to a folder name** in your pattern root folder. Once you press "ok", a new pattern is created and a dialog window for editing the pattern's properties is opened. For more information, please see User Guide or use the "Help" button of the respective dialog windows.

2. Inserting quality attributes

¹ -For instructions on how to manage user accounts on a MySQL database, please see <http://dev.mysql.com/doc/refman/5.0/en/user-account-management.html>. Should the user authentication fail, try to connect to the database with another tool, e.g. MySQL Query Browser, with the same user name and password.

Associating pattern with quality attributes is an important feature of the Stylebase plug-in. If you wish to take advantage of this feature, you have to insert quality attribute definitions into the database. If you wish to use our definitions, you can load them from a file called "attributes.txt" which is included in the Stylebase for Eclipse package.

If you have Eclipse and the Stylebase plug-in installed on the server, you can do as follows. Press the correct toolbar button to open the dialog window "Edit Attributes". Press the button "Load from file...". When prompted, locate the file "attributes.txt".

Alternatively, you can load the attribute definitions with MySQL Query Browser as follows:

- Connect to the database with MySQL Query Browser. Remember to specify the correct default schema.
- Enter the following statement into Query Browser: `LOAD DATA INFILE 'C:/eclipse/attributes.txt' INTO TABLE attribute_definitions;` as presented in the below figure. Run it by pressing "Execute". Modify the path of "attributes.txt" as appropriate.

