OCS Server
for Java Compatible Systems

Administrator's Guide

v1.0

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Prefix

Organisational trends show that companies are increasing the availability of networked computing. Teamwork is becoming commonplace in the working environment. As technology continues to expand a method for supporting tasks that are carried out in groups needs to be satisfied. Groupware has emerged as a technology that can be used to support this.

The OCS software is designed to allow programmers to work on collaborative programming tasks together. The OCS package allows version controlling on system files to overcome collaborative consistency problems. It also prevents awareness problems by not allowing multiple users access to the same source code while working on a project. Communication methods such as task assignment and online chat facilities have been implemented to overcome presence awareness problems.

The manual describes how to use the OCS Server software.

Contact Information

The project is hosted at SourceForge. "SourceForge is a free service to Open Source developers offering easy access to the best in CVS, mailing lists, bug tracking, message boards/forums, task management, site hosting, permanent file archival, full backups, and total web-based administration."[SF01].

The SourceForge address is -

        http://www.sourceforge.net/projects/openocs/

 The project also has a home page for general information for this project at -

        http://www.openOCS.org

The author can be contacted at -

        gary@openOCS.org

[SF01] SourceForge homepage at http://www.sourceforge.net

Installation

The follow guides the installation process of the OCS Client application and how to connect to an OCS Server.

Java Runtime Environment

To use the OCS Client program you must install Java Runtime Environment Standard Version 1.3. The JRE is available for Windows, Solaris and Linux operating systems. The JRE is available to download from the following site -

http://java.sun.com/j2se/1.3/jre/

If you're operating system is not supported by JRE 1.3, contact your vendor, they may provide a port of the JRE that is not supported by Java.

Web Administration

The following components need to be installed for the web administrator software to operate.

- Apache (http://www.apache.org/)
- PHP (http://www.php.net)

Follow the instructions provided with these packages to allow them to interoperate. Make sure that the MySQL option is enabled when configuring PHP (see PHP documents for more information).

The PHP files stored with in this package will need modifying to operate with the database and web server. The PHP files have comments showing how they should be modified.

Database Administration

The following DBMS will need to be installed

- MySQL (http://www.mysql.com)

Follow the instructions provided with the documentation on setting up MySQL.

When the package is installed create a new database called openocs with –

```
CREATE DATABASE openocs;
CONNECT openocs;
```

Then create table and table entries with the database.txt file included in this package.

When the package is installed create a database user for the OCS Server/Connection Server to use when connecting to the database.

OCS Server

The OCS server side implementation requires two servers to be running. The connection server and the OCS server.

The connection server provides access control for the OCS server. It controls the amount of logins that can be attempted from a host. It also provides security for the user. The connection server provides a certificate from the login and password the user enters. The certificate generated by the connection server is then used to access the server. The certificate will expire once the user logs in from another terminal.

The connection server is found in `connectionServer.jar` and is executed with the following parameters

```
java -jar connectionServer.jar [port] [db host] [db login] [db password] ?[enabled]
```

- `[port]` - The port that the connection server should bind to
- `[db host]` - Internet hostname of the MySQL database server
- `[db login]` - The login for the MySQL database
- `[db password]` - The password for the MySQL database
- `?[enabled]` - (Optional) true=enabled false=disabled (Default) true

The OCS server provides the majority of the functionality of the system. The generated certificate from the connection server authenticates the user. The OCS server implements all the commands found in the OCS Protocol.

The OCS server is stored in `ocsServer.jar` and is executed with the following parameters

```
java -jar ocsServer [port] [unix base] [db host] [db login] [db password]
```

- `[port]` - The port the OCS server should bind to. Cannot be same as connectionServer
- `[unix base]` - The base directory for the group files. This is where the data for the group files will be stored and should be the same on each execution of the server.
- `[db host]` - Internet hostname of the MySQL database server
- `[db login]` - The login for the MySQL database
`[db password]` - The password for the MySQL database

Administration Test

Once the system is setup login to the system with the following information –

Username: Administrator
Password:
Group: openocs

The system will then ask you to change the password for the system. This is the administration account for the openocs group.