TortoiseSVN Short Tutorial

This tutorial presents some basic steps for using SVN and accessing your assigned Subversion account. To get familiar with Apache Subversion see http://en.wikipedia.org/wiki/Apache_Subversion

1. Getting and Installing TortoiseSVN

1. Download the last version of TortoiseSVN from this link:

    http://tortoisesvn.net/downloads.html

2. Choose the 32-bit or 64-bit version depending on your operating system (most of you will have a 32 bit OS version, either MS Windows XP or MS Windows 7). Fig. 1 shows a snapshot of a part of the download page for TortoiseSVN.

Figure 1. A snapshot of a part of the download page for TortoiseSVN

During the installation process you may rely on the default settings.

2. Using TortoiseSVN

Create a SVN Repository

1. Create a folder.

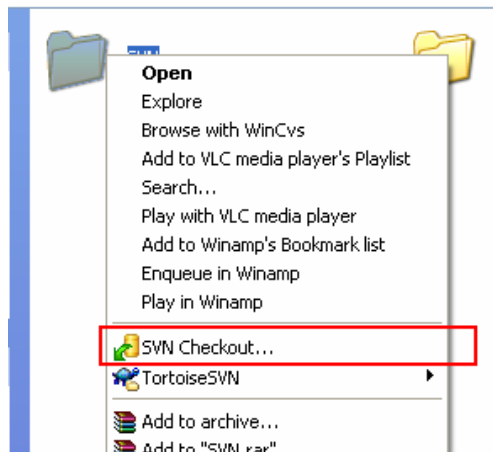2. Right-click the newly created folder → SVN check out (cf. Fig. 2)

Figure 2. Choosing SVN checkout

3. In the "**URL of repository**" field, copy the one of the below URLs:

    - To access repository from outside T.U. Cluj-Napoca network (e.g. from home or hostel):

      https://os.obs.utcluj.ro:22443/<user>

    - To access repository from INSIDE T.U. Cluj-Napoca network (e.g. from the laboratories):

      https://10.158.0.45:443/<user>

Note: You should replace <user> with your given username. See Figure 3. In Fig. 3 the placeholder <user> is symbolized by USERNAME.
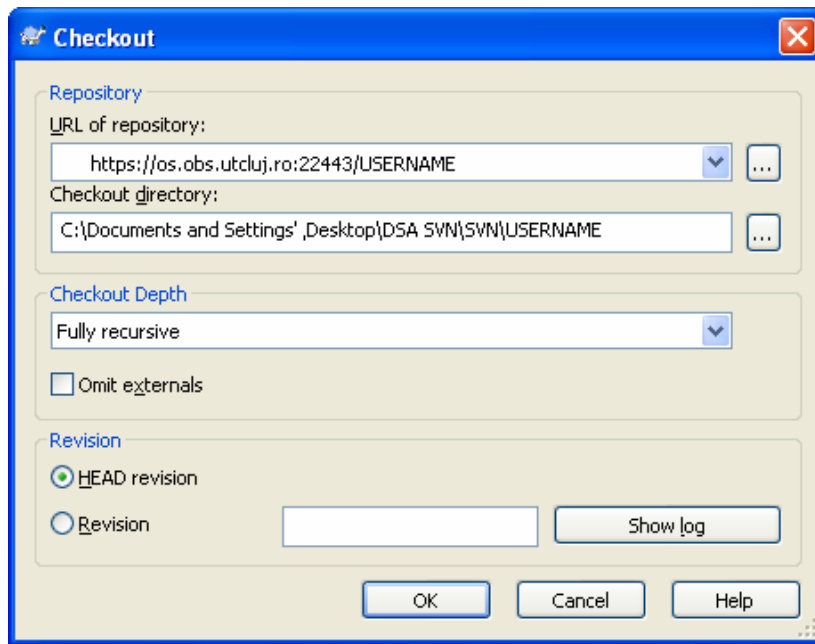

4. Press OK

Figure 3. Checking out a repository.

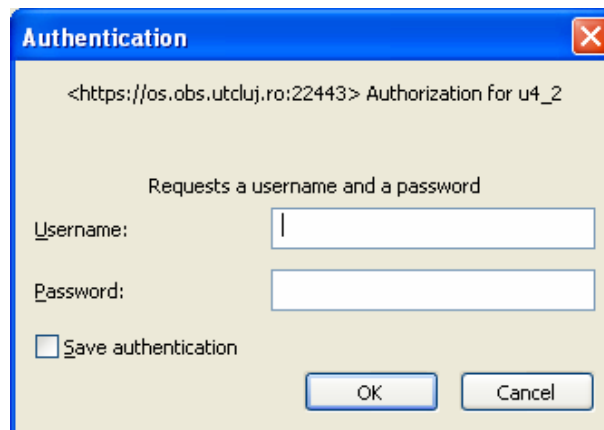An authentication dialog will appear (cf. Fig. 4) : fill in your assigned username and password

Figure 4. Authentication dialog.

After Check out, you should have the content from server stored in your local folder.

Update

An update operation is used for getting a repository version of your work from a SVN server down to your computer. To perform an Update:

5. Right click in our folder → SVN Update (see Fig.)

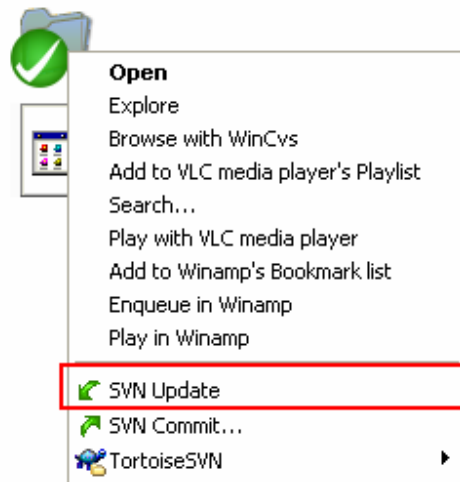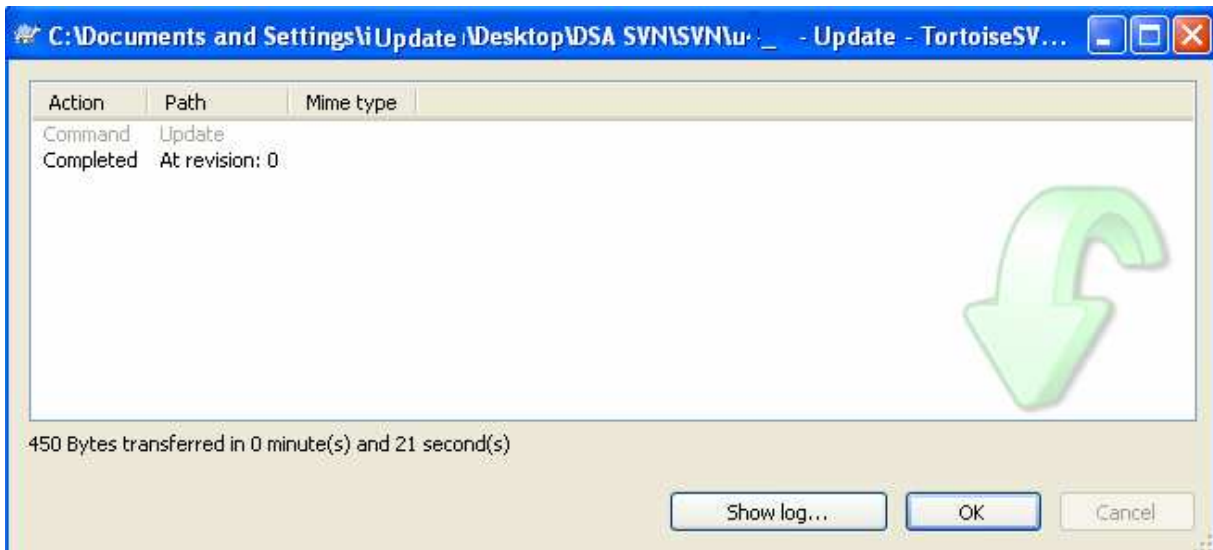The local copy will be updated from the repository.

Figure 5. Updating a local copy

Note: **If a red line is shown, then there is a conflict between the repository version and the local copy. Conflicts must be solved with great attention, as they may cause undesired changes**.

Commit

Commit is used for storing your local copy to the SVN repository. To achieve this:

1. Right click → SVN Commit. A windows similar to the one shown in Fig. pops up.
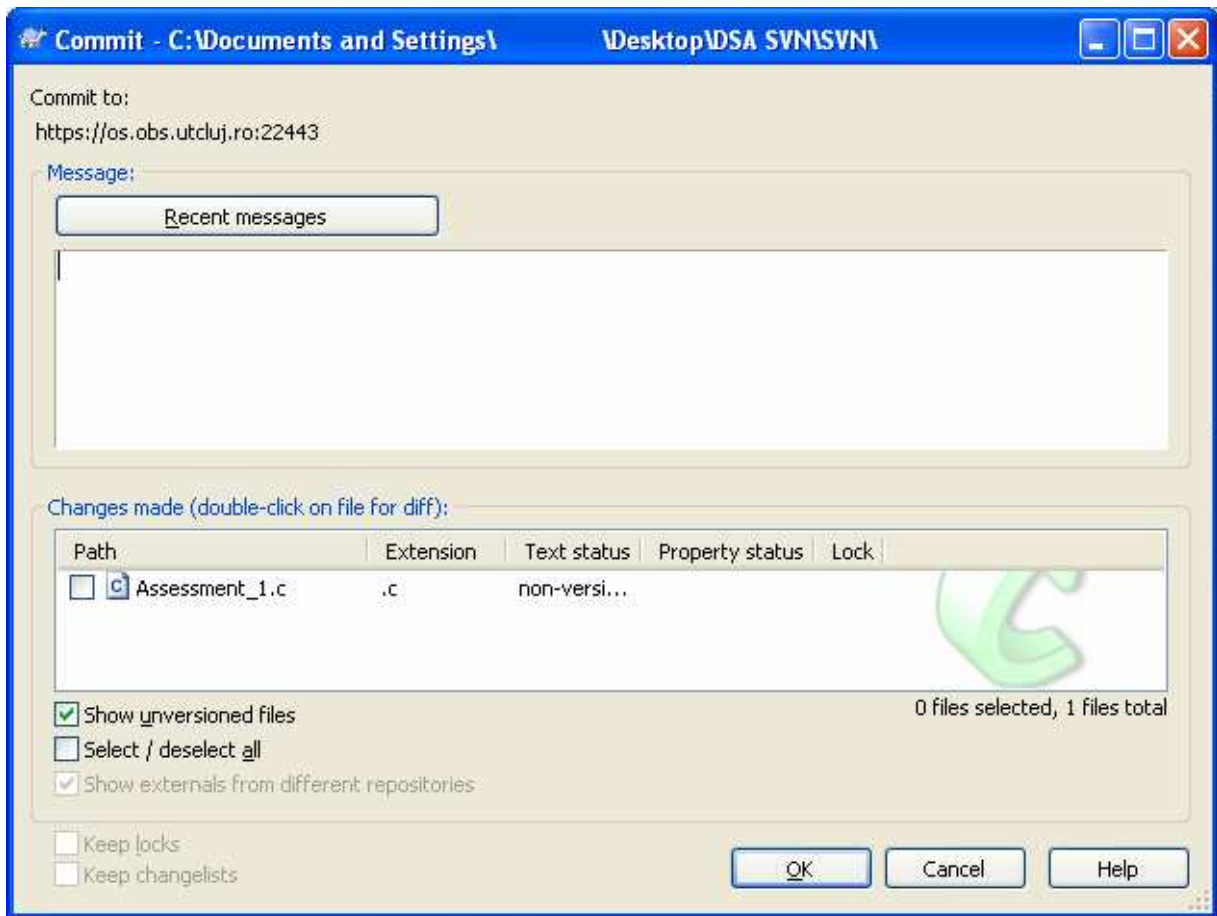
Figure 6. A commit window.

Notes:

- In the *Message* area, you have to write a description of, e.g., the changes made relative to the previous version, or, in general, a message which helps to identify that version with ease..

- In the *Changes Made* area, you choose what you want to commit by hand. It just lists all changes (and sometimes it does not include all of them).

3. Using Codeblocks with TortoiseSVN

In order to use Codeblocks with TortoiseSVN, you should take the following steps:

1. Create a new folder on your Desktop (e.g. use right-click->New folder, see Fig. 7).

Figure 7. Creating a folder on the Desktop

2.   Rename your new folder to *YourNames* (e.g MariusJoldos - see Fig. 8)

Figure 8. Renaming your newly created folder

3.   Do a *checkout* on your repository using the supplied authentication credentials as shown in Fig. 9 and Fig. 10
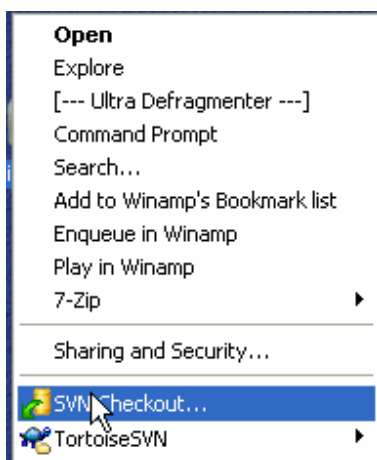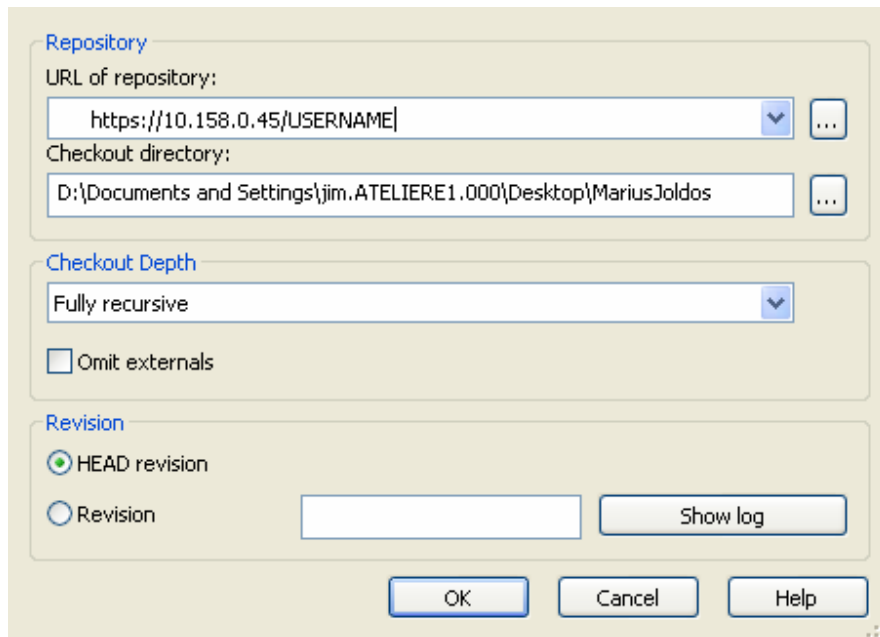

Figure 9. Selecting SVN Checkout

Figure 10. Checking out repository

A window covered by an authentication popup appeara. Type your credentials – see Fig. 11. You may choose to save authentication.

Figure 11. Supplying authentication credentials on SVN checkout.

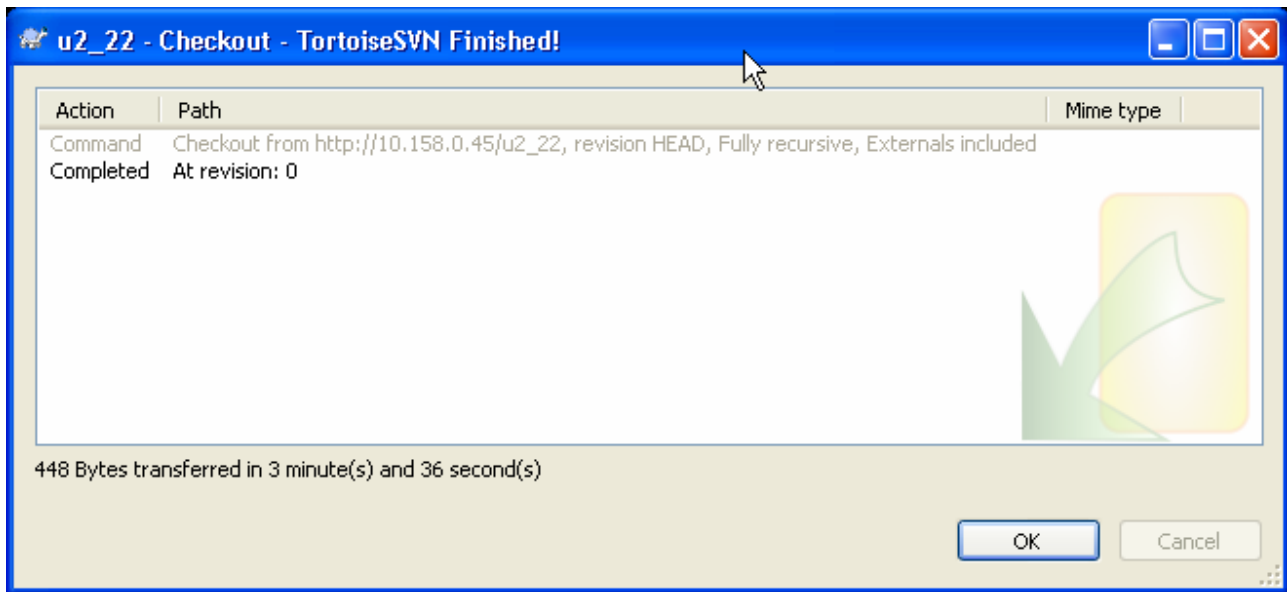On success, a window similar to the one of Fig. 12 appears.

Figure 12. Finishing checkout.

4. Run Codeblocks and create your project INSIDE the SVN repository working copy on your Desktop (see Fig. 13 and 14).
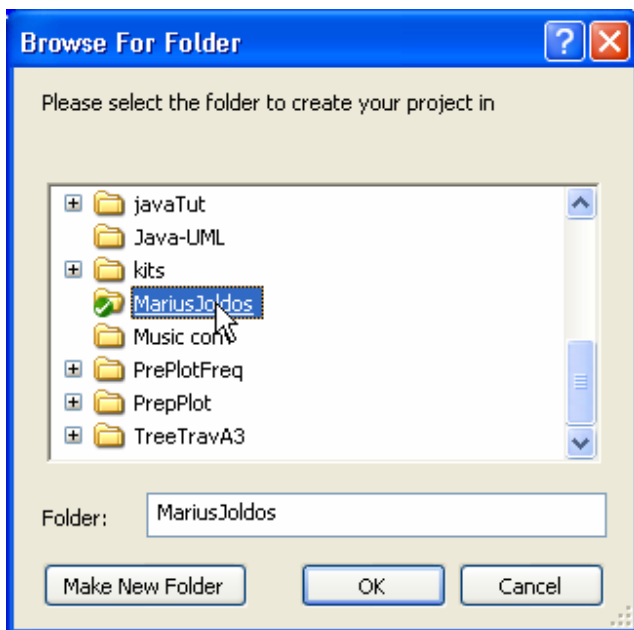

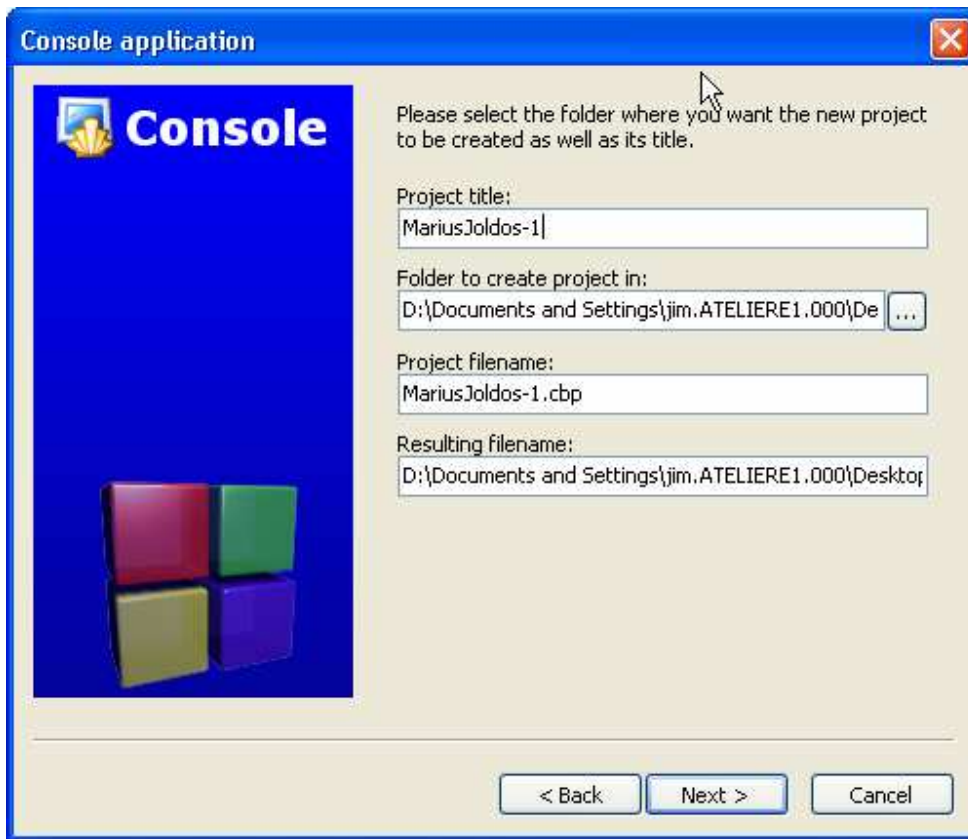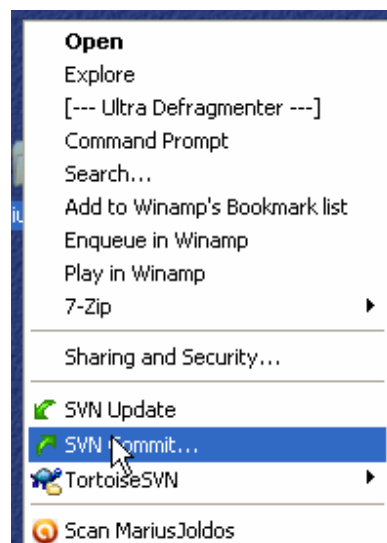**Figure 13. New Codeblocks project inside repository.**

Figure 14. Complete project data for Codeblocks. Note that project name is YourNames-1 as it will hold a solution for Assignment 1.

5. Do your work with Codeblocks. Save your work and leave Codeblocks.

6. Commit the changes to the server. Do this with right-click on the folder and selecting "SVN Commit" (see Fig. 15). In a window similar to Fig. 16 select what you desire to submit (e.g. use "Select all" checkbox). Press OK.

A window shows that you are done (Fig. 17).
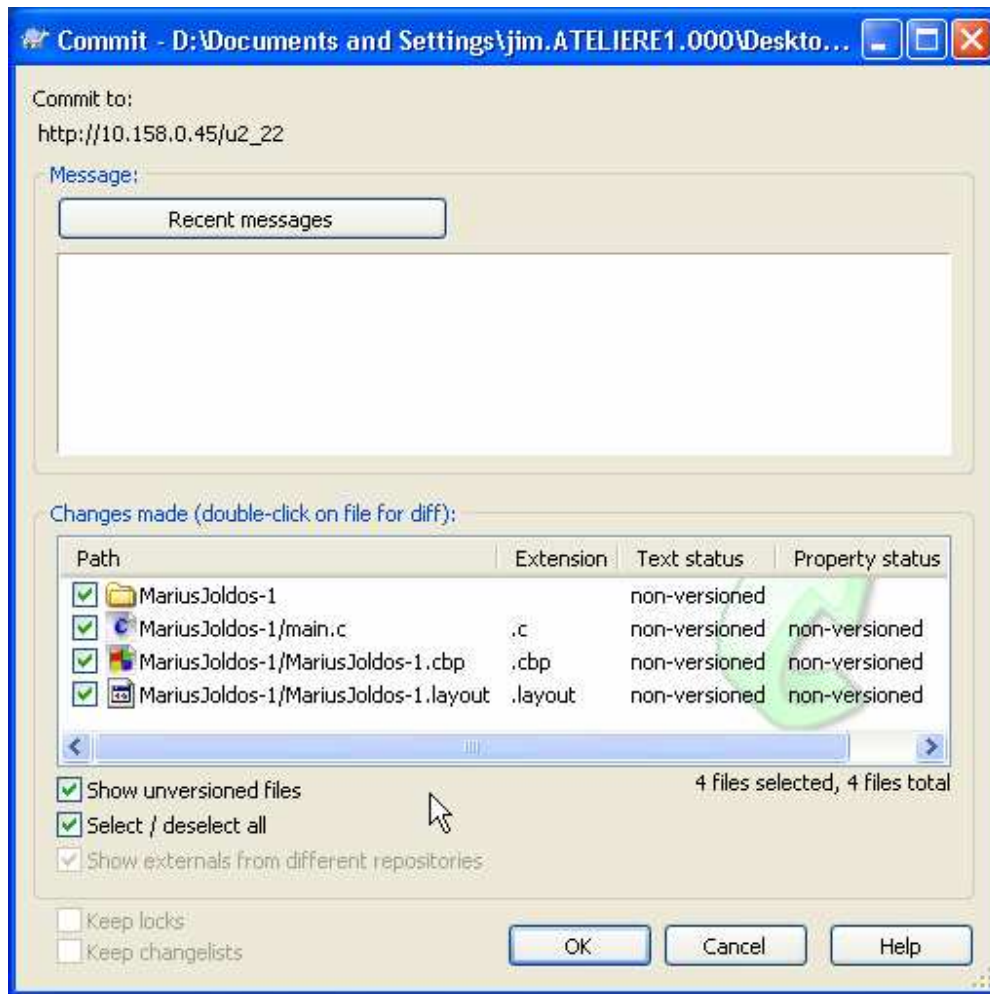
Figure 15. Choosing Commit

Figure 16. Selecting what to commit.

Figure 17. Commit done.

You may now check that your changes are on the server using a browser and the same URL.