

# Remote connection to CSL Linux machines

## CS Computer Labs:

The computer labs for use by students are located on the *first floor of the Computer Sciences* building during the hours *from 7 am - 1 am every day*.

For locations look for the *Linux machines* listed in the "[Computer Systems Lab Instructional Facilities](https://csl.cs.wisc.edu/services/instructional-facilities)" (<https://csl.cs.wisc.edu/services/instructional-facilities>) page.

## Connecting remotely

You may also remotely log into these machines. To access the machines remotely, connect to best-linux.cs.wisc.edu (this will connect you to the linux machine in the CS labs that currently has the fewest number of other users logged in to it). If your computer gives you a warning about spoofing, try connecting to royal-NN.cs.wisc.edu where NN is a 2 digit number between 01 and 30).

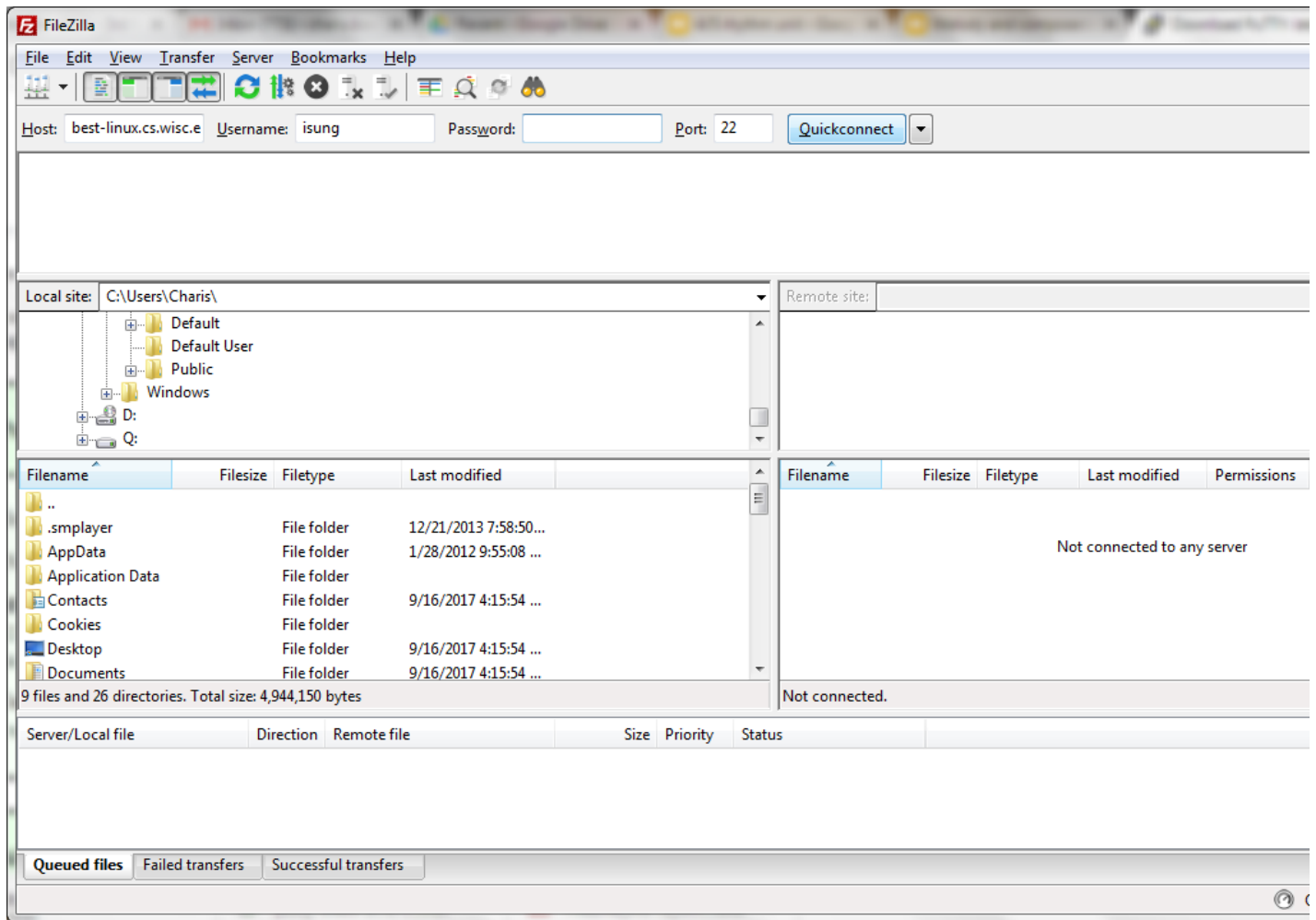
See the "[Remote Access to CSL Computers](https://csl.cs.wisc.edu/services/remote-access-csl-computers)" (<https://csl.cs.wisc.edu/services/remote-access-csl-computers>) page for more information about remote access.

File transfers: You can use either the scp command or an SFTP client to transfer files from your local machine to the remote machine. One recommended client (available on all major platforms) is [FileZilla](https://filezilla-project.org/index.php) (<https://filezilla-project.org/index.php>). To connect to a machine, use [your-user-name@best-linux.cs.wisc.edu](mailto:your-user-name@best-linux.cs.wisc.edu) (<mailto:your-user-name@best-linux.cs.wisc.edu>) (or whichever machine on the \_\_.cs.wisc.edu domain is preferable) as the connection address (replacing "your-user-name" with your CS login).

File execution: SSH is the recommended protocol to connect to a remote Linux machine. For Linux and Mac users, ssh is already built-in to the OS. For Windows users, I would recommend [PuTTY](http://www.putty.org/) (<http://www.putty.org/>) as a free client.

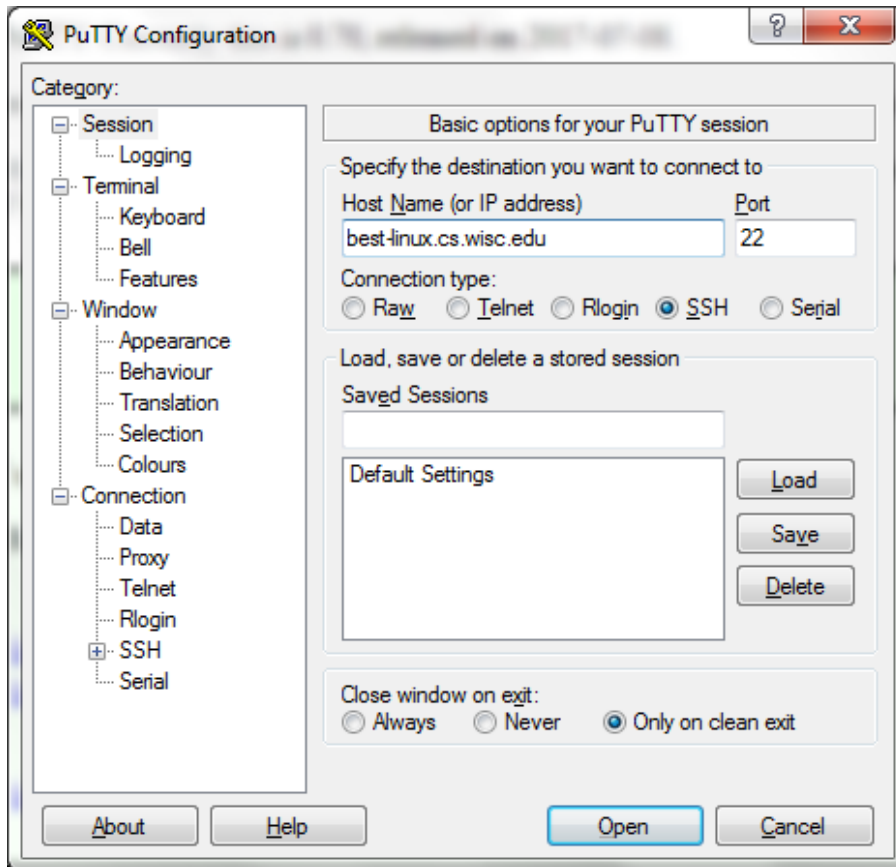
If you use Windows:

1. You may use any SFTP/ssh client, but these instructions will be for FileZilla and PuTTY. Download and install [FileZilla](https://filezilla-project.org/index.php) (<https://filezilla-project.org/index.php>) and [PuTTY](http://www.putty.org/) (<http://www.putty.org/>).
2. Open FileZilla and connect to the remote host (try best-linux.cs.wisc.edu with your CS login ID as your username). Make sure to enter 22 as the port number.



3. Copy the file you wish to submit to the remote host by clicking and dragging the file to the right location.

4. Open PuTTY and connect to the remote host.



5. Now you can follow the directions in the assignment to copy the file(s) over to the correct directory.

If you use a Unix-based OS (Mac or Linux):

1. Go to Terminal and navigate to the directory with your file(s). (See [bash commands \(https://canvas.wisc.edu/courses/63868/pages/basic-bash-commands\)](https://canvas.wisc.edu/courses/63868/pages/basic-bash-commands))

2. Enter:

```
scp <filename>.cpp <username>@best-linux.cs.wisc.edu:~
```

Replacing <filename> with the name of the file that you wish to transfer. You can also enter multiple file names for this command.

3. You may be prompted about security things... don't worry, just type in yes to add as a default. You will be prompted to enter your password at this point (your password will not show up as you type it).

4. Then, enter in Terminal:

```
ssh <username>@best-linux.cs.wisc.edu
```

where <username> is replaced with your CS login name.

Note: if your computer will not allow you to connect to best-linux.cs.wisc.edu, try connecting to royal-*NN*.cs.wisc.edu where *NN* is a 2 digit number between 01 and 30.

5. Now you can navigate, run, and copy files from command line as if you were on a computer lab Linux machine (once again, [see bash commands \(https://canvas.wisc.edu/courses/63868/pages/basic-bash-](https://canvas.wisc.edu/courses/63868/pages/basic-bash-)

[commands](#)). Follow the assignment directions to submit your file(s).

6. To logout, just type in "logout" on the command line.