

PROGRAMMING ASSIGNMENT

CSC474/574 CN SPRING 2025

1. OBJECTIVES

Understand the TCP and Socket programming.

2. OVERVIEW

Implement a cloud/network file system where the end user can create directories, store files, and move files to/from a directory.

3. REQUIREMENTS

Your file system must function with the user's read, write, and list the files in a directory.

Your file system should be able to serve multiple users.

Your file system must be remotely accessible from anywhere on the Internet

4. PROJECT MANAGEMENT TOOL

Select a project management tool of your preference, e.g., SVN, Git, etc.

Read the manual of your preferred project management tool.

5. WHAT TO TURN IN?

Submit a zip file (filename: **CSC474/574_ProAssgn1_YourName.zip**) that is expected to include the following files:

- ☐ Your source and header (if any) files (e.g., 'c' or 'cpp', and 'h' files)
- ☐ A makefile (if any)
- ☐ All other supplemental files that are needed to run your program
- ☐ A report that describes briefly about how to run your program
- ☐ Submit your zip file to the **Dropbox on D2L**

6. EVALUATION CRITERIA

DOCUMENTATION. 20% - your report clearly describes how to run your program and how you addressed the program requirements.

COMPILATION. 15% - your code can be compiled without errors or warnings.

CORRECTNESS. 60% - your program satisfies all the program requirements.

READABILITY AND MISC. 5% - your source code must be well commented. Your submitted zip file name complies with the instructions in Section 4. Your zip file contains all files that are needed to run your program.

USEFUL RESOURCES

<https://www.geeksforgeeks.org/network-file-system-nfs/>
<https://people.cs.rutgers.edu/~pxk/416/notes/18-nfs.html>
<https://github.com/dmonaldo/simple-network-file-system>