

- 1) Write a program lab4.c to perform the following:
 - a. Using two consecutive fork system calls, fork three processes from main
 - b. differentiate child 2 (C2) of the main process with **Is -1 /home/username** using execl()
 - Note: child 2 is one of the direct descendants of main that does not fork another process. Child 1 (C1) is the other direct descendant of main that forks another process (the grandchild (GC) of main)
 - c. The grandchild process must change the working directory to /home/username/lab4 and create a file sample.txt with permissions 0777 (Assume that /home/username/lab4 is already present)
 - d. Process C1 must wait for its child process (GC) to complete execution and must differentiate and print the contents of /home/username/lab4 using execv() from its present working directory only upon the normal exit of the grandchild process

Appropriate messages should be printed to demonstrate the run of the program.

Submission:

Upload lab4.c