

In-Lab Questions:

- 1) Write a C or C++ program that accepts a file name as command line argument and prints the file's contents on console. If the file does not exist, print some error on the screen.
- 2) Write a C or C++ program that accepts a list of integers as command line arguments sorts the integers and print the sorted integers on the screen.
- 3) Create the following classes in separate files (using .h and .cpp files) Student, Teacher, Course.
 - a. A student has a list of courses that he is enrolled in. A teacher has a list of courses that he is teaching.
 - b. A course has a list of students that are studying it, and a list of teachers that are teaching the course. Create some objects of all classes in main function and populate them with data. Now compile all classes using makefile.

Post-Lab Questions:

- 1) Write a C/C++ program that takes 10 inputs as integers from the command line and sort it using any sorting algorithm and output the final array to a text file via the >> command.
- 2) Write a C/C++ program that takes some integers and constructs a Doubly Linked List. Once the list is constructed your task would be to sort the list using any sorting method. After sorting concatenate the above tasks output with the output from this task into a new file.
- 3) Write a C/C++ program that reads file in which there are integers related to series and store them in array than compute the missing element from that series and output that missing element to file. 4) Create the following classes in separate files (using .h and .cpp files) LetterCount, WordCount, LineCount.
 - a. LetterCount counts number of letters in a text file.
 - b. WordCount counts number of words in a text file.
 - c. LineCount counts number of lines in a text file.

Create some objects of all classes in main function and populate them with data.

Now compile all classes using makefile.