CS 2413 Test 1

1. **[10]** Write a sed command which will delete all **blank** lines in the file `in.data` and write the results into the file `out.data`. The command should be entirely on the command line.

2. **[15]** Write a sed script which will

   (a) In all lines starting with "*XCOMM" replace the string "*XCOMM" with '/*' characters and end the line with '*/'.

   (b) In the lines which started with "*XCOMM" replace "X11R6" with "XFree86".

   (c) Do not replace X11R6 in any other lines.

3. **[15]** An ISP (Internet Service Provider) has a data file which contains information about user's connect times and bandwidth usage as well as storage usage. There are two types of lines in the file, a connect line which has 5 fields containing the login, start and stop times as well as the bandwidth usage broken into the number of bytes in versus the number of bytes out.

   ```
   <user name> <start time> <stop time> <bytes in> <bytes out>
   maynard        1378         2463        12379894    34563
   ```

   and a storage usage line which contains the number of bytes of disk space currently being used by the user which has the following format:

   ```
   *storage*   <user name> <bytes of storage>
   *storage*      maynard        2784643
   ```

   Write an awk script to find the total amount of connect time used by the user **maynard**, the total amount of bandwidth consumed (both in and out) as well as the maximum amount of storage used during this period. The output should look like:

   ```
   maynard
   Connect Time = 1085
           Bandwidth    = 12314457
           Storage      = 2784643
   ```

4. **[15]** Write a perl script which will print out the pathnames of all text files which are under any of the directories in the file whose name is given on the command line.