System commands:

1.cp

(base) MSMLs-iMac:~/Desktop$ cat > copy.txt
This is the source file.....
^C
(base) MSMLs-iMac:~/Desktop$ cp copy.txt dest.txt
(base) MSMLs-iMac:~/Desktop$ cat dest.txt
This is the source file.....
(base) MSMLs-iMac:~/Desktop$ cp -p copy.txt dest1.txt
(base) MSMLs-iMac:~/Desktop$ cat dest1.txt
This is the source file.....
(base) MSMLs-iMac:~/Desktop$ cat > copy1.txt
this is new source file...
^C
(base) MSMLs-iMac:~/Desktop$ cp -n copy1.txt dest.txt
(base) MSMLs-iMac:~/Desktop$ cat dest.txt
This is the source file.....
(base) MSMLs-iMac:~/Desktop$ cp -s copy.txt dest2.txt
(base) MSMLs-iMac:~/Desktop$ cat dest2.txt
This is the source file.....
(base) MSMLs-iMac:~/Desktop$ cp -u copy1.txt dest.txt
(base) MSMLs-iMac:~/Desktop$ cat dest.txt
this is new source file...

2. mv

(base) MSMLs-iMac:~$ cat > move.txt
This is source file to be moved......
^C
(base) MSMLs-iMac:~$ mv move.txt dest.txt
(base) MSMLs-iMac:~$ cat dest.txt
This is source file to be moved......
(base) MSMLs-iMac:~$ cat move.txt
cat: move.txt: No such file or directory

(base) MSMLs-iMac:~/Desktop/OS$ mv -i src mv1/dest
mv: overwrite 'mv1/dest'? 1

(base) MSMLs-iMac:~/Desktop/OS$ mv -f src mv1/dest
(base) MSMLs-iMac:~/Desktop/OS$ cd mv1
(base) MSMLs-iMac:~/Desktop/OS/mv1$ cat dest
This is source!!
3. ls

(base) MSMLs-iMac:~/Desktop$ ls
OS   Session1_Recursion_1086.zip session2_me_1086.zip
Session1_Recursion_1034 session2

(base) MSMLs-iMac:~/Desktop$ ls -l
total 20

```
drwxr-xr-x 3 MSML MSML 4096 Jan 12 08:32 OS
drwxr-xr-x 3 MSML MSML 4096 Jan  9 03:39 Session1_Recursion_1086
-rw-r--r-- 1 MSML MSML 3590 Jan  9 03:38 Session1_Recursion_1034.zip
drwxr-xr-x 3 MSML MSML 4096 Jan  9 09:35 session2
-rw-r--r-- 1 MSML MSML 2184 Jan  9 09:35 session2_me_1086.zip

(base) MSMLs-iMac:~/Desktop$ ls -a
.  Session1_Recursion_1034     session2_me_1086.zip
.. Session1_Recursion_1034.zip
OS  session2

(base) MSMLs-iMac:~/Desktop$ ls -ai
160420 .   161210 Session1_Recursion_1086     161234 session2_me_1086.zip
160383 ..  160803 Session1_Recursion_1086.zip
666635 OS  161357 session2
```

4. grep

```
(base) MSMLs-iMac:~/Desktop/OS/mv1$ grep '[aeiou]' dest
This is source!!

(base) MSMLs-iMac:~/Desktop/OS/mv1$ cat > new
ae
asu gip
^C
(base) MSMLs-iMac:~/Desktop/OS/mv1$ grep -w '[aeiou]*' new
ae
(base) MSMLs-iMac:~/Desktop/OS/mv1$ grep -vw '[aeiou]*' new
asu gip
(base) MSMLs-iMac:~/Desktop/OS/mv1$ grep -i '[aeiou]*' new
ae
asu gip
```

5.chmod

```
(base) MSMLs-iMac:~/Desktop$ chmod -w -c new
mode of 'new' changed from 0644 (rw-r--r--) to 0444 (r—r--r--)

(base) MSMLs-iMac:~/Desktop$ chmod +x -v new
mode of 'new' changed from 0444 (r--r--r--) to 0555 (r-xr-xr-x)
```

6. cat

```
(base) MSMLs-iMac:~/Desktop/OS/mv1$ cat > doc
This is new document
^C

(base) MSMLs-iMac:~/Desktop/OS/mv1$ cat doc
This is new document

(base) MSMLs-iMac:~/Desktop/OS/mv1$ cat >> doc
add a line
^C
(base) MSMLs-iMac:~/Desktop/OS/mv1$ cat -n doc
```

```
   1 This is new document
   2 add a line
   3
   4 dis
   5
   6 ss
   7
(base) MSMLs-iMac:~/Desktop/OS/mv1$ cat -b doc
   1 This is new document
   2 add a line

   3 dis

   4 ss
(base) MSMLs-iMac:~/Desktop/OS/mv1$ cat -E doc
This is new document$
add a line$
$
dis$
$
ss$
$
```

7. mkdir

```
(base) MSMLs-iMac:~/Desktop$ mkdir -m=r dir
(base) MSMLs-iMac:~/Desktop$ cd dir
bash: cd: dir: Permission denied

(base) MSMLs-iMac:~/Desktop$ mkdir dir1
(base) MSMLs-iMac:~/Desktop$ cd dir1

(base) MSMLs-iMac:~/Desktop/dir1$ mkdir -p parent

(base) MSMLs-iMac:~/Desktop$ mkdir -v newdir
mkdir: created directory 'newdir'
```

8. rm

```
(base) MSMLs-iMac:~/Desktop/OS/mv1$ rm -i new
rm: remove regular file 'new'? 1

(base) MSMLs-iMac:~/Desktop/OS/mv1$ rm doc

(base) MSMLs-iMac:~/Desktop/OS/mv1$ rm -v dest
removed 'dest'

(base) MSMLs-iMac:~/Desktop/OS$ rm -d mv1
```

9. rmdir

```
(base) MSMLs-iMac:~/Desktop$ rmdir -v OS
rmdir: removing directory, 'OS'
```

10. wc

(base) MSMLs-iMac:~/Desktop$ wc -c new
4 new

(base) MSMLs-iMac:~/Desktop$ wc -l new
1 new

(base) MSMLs-iMac:~/Desktop$ wc -m new
4 new

11. who

(base) MSMLs-iMac:~/Desktop$ who -a
         system boot 2020-01-12 09:03
         run-level 5 2020-01-12 09:03
MSML   ? :0   2020-01-12 09:04   ?   1504 (:0)

(base) MSMLs-iMac:~/Desktop$ who -b
         system boot 2020-01-12 09:03

(base) MSMLs-iMac:~/Desktop$ who -H
NAME   LINE   TIME   COMMENT
MSML   :0   2020-01-12 09:04 (:0)

(base) MSMLs-iMac:~/Desktop$ who -q
MSML
users=1

12. pipe

(base) MSMLs-iMac:~/Desktop$ ls | wc -w
9

(base) MSMLs-iMac:~/Desktop$ ls -l | wc -l
10

13. head,tail

(base) MSMLs-iMac:~/Desktop$ head -v newfile
==> newfile <==
Open just about any book, and you'll find plenty of short paragraphs. If direct speech is used, there'll be a new parag
raph every time a new speaker starts to talk. News writers also like using short paragraphs. They have to present info
rmation in a succinct way and hold the reader's attention.
Commercial writers know that most people don't want to read 1,000 words of closely-spaced text in order to see wh

at they are writing about, so they also like to keep sentences and paragraphs short. They'll even use lots of sub-head
ers so you can see what each paragraph is about before you read it.

(base) MSMLs-iMac:~/Desktop$ head -n 5 newfile
Open just about any book, and you'll find plenty of short paragraphs. If direct speech is used, there'll be a new parag
raph every time a new speaker starts to talk. News writers also like using short paragraphs. They have to present info
rmation in a succinct way and hold the reader's attention.

(base) MSMLs-iMac:~/Desktop$ tail -n 4 newfile
     tail(1)

     of closely-spaced text in order to see what they are writing about, so they also like to keep sentences and paragr
aphs short. They'll even use lots of sub-headers so you can see what each paragraph is about before you read it.

14. nl

(base) MSMLs-iMac:~/Desktop$ nl -bt newfile
1 Open just about any book, and you'll find plenty of short paragraphs.   2If direct speech is used, there'll be a new
paragraph every time a new 3speaker starts to talk. News writers also like using short paragraphs. They 4have to pre
sent information in a succinct way and hold the reader's 5attention.
6Commercial writers know that most people don't want to read 1,000 7words of closely-spaced text in order to see
what they are writing about, 8so they also like to keep sentences and paragraphs short. They'll even use 9lots of sub-
headers so you can see what each paragraph is about before 10you read it.

15. awk,sed

(base) MSMLs-iMac:~/Desktop/tutorial8$ cat file1.txt
hi this is ssn
cse dept
os lab
good day

(base) MSMLs-iMac:~/Desktop/tutorial8$ sed 'a\ ' file1.txt
hi this is ssn
 cse dept

os lab
good day

(base) MSMLs-iMac:~/Desktop$ seq 1 10 | sed -n '1!G;h;$p'
10
9
8
7
6
5
4
3
2
1

(base) MSMLs-iMac:~/Desktop/unix$ cat > new

hi
this is me
i am from cse
^C