# 1)

### ls

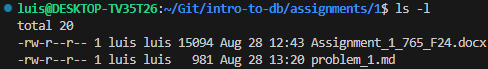
lists all unhidden contents within the current directory.

alt text

alt text

### ls -l

lists all contents with the long listing format. long list format includes file name, permissions, size, and date modified.



alt text

### ls -a

lists all unhidden and hidden contents within the current directory.

alt text

alt text

### cd tests

attempts to move to the “tests” directory, fails if “tests” does not exist.

alt text

alt text

### pwd

prints the current directory.

alt text

alt text

### mkdir example\_dir

Creates a directory with the name “example\_dir” if it doesn’t already exist.

alt text

alt text

### ls -al > out

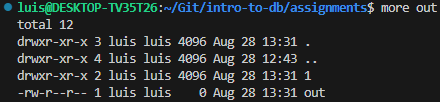
Runs the ls command with the “-a” and “-l” flags, then copies the output of that command to a file called “out”.

alt text

alt text

### more out

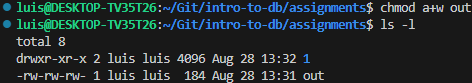
Views the file “out” within the termal, press q to stop viewing.



alt text

### chmod a+w out

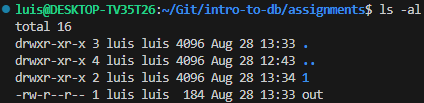
Changes the access writes of the file “out” to allow all users to write to and delete it.



alt text

### ls -al

Runs the “ls” command with the “-a” and “-l” flags which lists all unhidden and hidden files with the long listing format.



alt text

# 2)

### Code

if \_\_name\_\_ == "\_\_main\_\_":  
 usr\_num = int(input("Please enter an integer: "))  
 if usr\_num < 0:  
 raise ValueError("Invalid integer {}".format(usr\_num))  
  
 if usr\_num == 0:  
 answer = 1  
 else:  
 answer = usr\_num  
 for n in range(usr\_num-1, 0, -1):  
 answer \*= n  
  
 print("{}! = {}".format(usr\_num, answer))

### Output

