1. Add the current date to the text file today.txt as a string.

ANS:

# importing datetime module

import datetime

# datetime.datetime.now() to get

# current date as filename.

filename = datetime.datetime.now()

# create empty file

def create\_file():

    # Function creates an empty file

    # %d - date, %B - month, %Y - Year

    with open(filename.strftime("%d %B %Y")+".txt", "w") as file:

        file.write("")

# Driver Code

create\_file()

2. Read the text file today.txt into the string today\_string

#open text file in read mode

text\_file = open("D:/data.txt", "r")

#read whole file to a string

data = text\_file.read()

#close file

text\_file.close()

print(data)

3. Parse the date from today\_string.

ANS:

from datetime import datetime

date\_time\_str = ‘29/04/23 8:55:09’

date\_time\_obj = datetime.strptime(date\_time\_str ‘%d%m%y %H:%M:%S’)

print(“The type of the date is now” type(date\_time\_obj))

print(“The date is”, date\_time\_obj)

4. List the files in your current directory

ANS:

import os

# Get the list of all files and directories

path = "[C://Users//Vanshi//Desktop//gfg](file:///C:\Users\Vanshi\Desktop\gfg)"

dir\_list = os.listdir(path)

print("Files and directories in '", path, "' :")

# prints all files

print(dir\_list)

5. Create a list of all of the files in your parent directory (minimum five files should be available).

ANS:

def show\_directories(dir\_list, path):

    """ A function that lists the directories """

    import os

    s = "%s%d%s"%("\n", len(dir\_list), " directories of " + os.path.abspath(path))

    l = len(s)

    print s

    print "="\*l

    for index, dir in enumerate(dir\_list):

        print str(index+1) + ") ", dir

def show\_files(file\_list, path):

    """ A function that lists the files """

    import os

    s = "%s%d%s"%("\n", len(file\_list), " files of " + os.path.abspath(path))

    l = len(s)

    print s

    print "="\*l

    for index, file in enumerate(file\_list):

        print str(index+1) + ") ", file

def show\_cwd\_contents( path="." ):

    # A function that calls 2 functions to separately

    # listing out directories and files.

    # It takes a default argument as cwd(.). We can

    # pass other paths too.

    import os

    f\_list = []

    d\_list = list()

    try:

        for f in os.listdir(path):

            if os.path.isfile(os.path.join(path, f)):

                f\_list.append(f)

            else:

                if os.path.isdir(os.path.join(path, f)):

                    d\_list.append(f)

    except:

        print "\nError, once check the path"

        return

    show\_files(f\_list, path)

    show\_directories(d\_list, path)

if \_\_name\_\_ == "\_\_main\_\_":

    # If this module is imported in other module then

    # we need to separately call show\_cwd\_contents() Or

    # show\_cwd\_contents(path).

    show\_cwd\_contents()

    show\_cwd\_contents("/Users/admin/projects/Python/PythonFiles")

6. Use multiprocessing to create three separate processes. Make each one wait a random number of seconds between one and five, print the current time, and then exit.

ANS:

import multiprocessing,time,datetime

import zoo

# def process1():

# t1 = random.randint(1,5)

# print("Waiting for "+str(t1)+" seconds")

# time.sleep(t1)

# print(datetime.datetime.now())

start = time.time()

process1 = zoo.process1()

process2 = zoo.process1()

process3 = zoo.process1()

print(datetime.datetime.now())

if \_\_name\_\_=="\_\_main\_\_":

p1 = multiprocessing.Process(target=process1)

p2 = multiprocessing.Process(target=process2)

p3 = multiprocessing.Process(target=process3)

p1.start()

p2.start()

p3.start()

p1.join()

p2.join()

p3.join()

end = time.time()

print("It takes " +str(end-start)+" seconds")

7. Create a date object of your day of birth.

ANS:

import datetime  
  
x = datetime.datetime(2020, 5, 17)  
  
print(x)

8. What day of the week was your day of birth?

ANS:

sunday

9. When will you be (or when were you) 10,000 days old?

ANS: 27 years, 4 months, and 25 days old!