# 1 Create a list of the 10 elements of four different types of Data Type like int, string, complex and float.

"""

x= [1,2,3,4,"Paul","Nikki",7.9,8.9,9.9,9+1j]

count=0 for i in x: print(i)

count=count+1 print(count)

#2. Create a list of size 5 and execute the slicing structure

x= [1,2,3,4,"Peter"] print(x[1:5])

print(x[0:4])

print(x[0:5:2])

#3 Write a program to get the sum and multiply of all the items in a given list. '''

x= [1,2,3,4,5]

print(sum(x)) y= 1

for i in x: y=i\*y

print(y)

# 4 Find the largest and smallest number from a given list. x= [1,2,3,4,5]

print(max(x))

print(min(x))

#5. Create a new list which contains the specified numbers after removing the even numbers from a predefined list.

x= [1,2,3,4,5,6,11,28,32,34,44,45] y=[]

for i in x:

if i%2!=0: (y.append(i))

print(y)

#6. Create a list of first and last 5 elements where the values are square of numbers between 1 and 30 (both included).

x= []

for i in range(1,31): x.append(i\*i)

print(x[:5])

print(x[-5:])

'''

7. Write a program to replace the last element in a list with another list. Sample data: [[1,3,5,7,9,10],[2,4,6,8]]

Expected output: [1,3,5,7,9,2,4,6,8]

x= [1,3,5,7,9,10]

y= [2,4,6,8]

x.remove(10) x.extend(y) print(x)

8. Create a new dictionary by concatenating the following two dictionaries:

a={1:10,2:20}

b={3:30,4:40}

Expected Result: {1:10,2:20,3:30,4:40}

a={1:10,2:20}

b={3:30,4:40}

a.update(b) print(a)

9. Create a dictionary that contains a number (between 1 and n) in the form(x,x\*x). Sample data (n=5)

Expected Output: {1:1,2:4,3:9,4:16,5:25}

y={}

for x in range(1,6): y.update({x:x\*x})

print(y)

10. Write a program which accepts a sequence of comma-separated numbers from console and generate a list and a tuple which contains every number. Suppose the following input is supplied to the program:

34,67,55,33,12,98

The output should be: [‘34’,’67’,’55’,’33’,’12’,’98’]

(‘34’,’67’,’55’,’33’,’12’,’98’)

user\_input = input("enter the no: ") xlist = user\_input.split(",")

xtuple = tuple(xlist )

print(xlist) print(xtuple)

"""