**Set Coding Assignments**

1. Add a list of elements to a set

l=[1,2,33,6,4,53]

s=set(l)

print(s)

**Output**

{1, 2, 33, 4, 6, 53}

1. Return a new set of identical items from two sets

a={1,2,3}

b={2,3,4}

c=a&b

print(c)

**Output**

{2, 3}

1. Write a Python program to return a new set with unique items from both sets by removing duplicates.

a={1,2,3,4}

b={3,4,6,5}

c=(a|b)

print(c)

**Output**

{1, 2, 3, 4, 5, 6}

1. Update the first set with items that exist in the second set

a={1,2,3,4,6,7}

b={6,7,8,9,10}

a.intersection\_update(b)

print(a)

**Output**

{6, 7}

1. Update the first set with items that don’t exist in the second set

a={1,2,3,4,6,7}

b={6,7,8,9,10}

a.difference\_update(b)

print(a)

**Output**

{1, 2, 3, 4}

1. Return a set of elements present in Set A or B, but not both

a={1,2,3,4,6,7}

b={6,7,8,9,10}

c=(a|b)-(a&b)

print(c)

**Output**

{1, 2, 3, 4, 8, 9, 10}

1. Check if two sets have any elements in common. If yes, display the common elements

a={1,2,34,7}

b={5,63,53,3}

if(len(a&b) >0):

print(a&b)

else:

print("There is no common elements")

**Output**

There is no common elements

1. Update set1 by adding items from set2, except common items

a={1,2,5,86}

b={7,4,23,64,86}

a.symmetric\_difference\_update(b)

print(a)

**Output**

{64, 1, 2, 4, 5, 7, 23}

1. Remove items from set1 that are not common to both set1 and set2

a={1,24,68,76545,346,78}

b={1,57,43,23}

c=(a|b)-(a&b)

a.difference\_update(c)

print(c)

**Output**

{76545, 68, 43, 78, 23, 24, 57, 346}

1. Write a Python program to find maximum and the minimum value in a set

a={6,4,4,8656,45,75,34,654,64}

print("Maximum:",max(a))

print("Minimun:",min(a))

**Output**

Maximum: 8656

Minimun: 4

1. Write a Python program to check if two given sets have no elements in common

a={6,4,4,8656,45,75,34,654,64}

b={'a','b','c'}

if(len(a&b) >0):

print("There is common element")

print(a&b)

else:

print("There is no common element")

**Output**

There is no common element

1. Write a Python program to remove the intersection of a 2nd set from the 1st set

**a={1,2,3,4}**

**b={3,4,5,6}**

**a.difference\_update(a&b)**

**print(a)**

**Output**

**{1, 2}**