**ASSIGNMENT NO 1:CREATE TWO SETS AND PERFORM VARIOUS SETS OPERATIONS**

**1:union of set**

set1={1,2,3,4,5,6,7,8,9}

set2={1,2,3,4,5,10,11,12}

set3=set1.union(set2)

print(set3)

or

set1={1,2,3,4,5,6,7,8,9}

set2={1,2,3,4,5,10,11,12}

set3=set1|set2

print(set3)

**2:Add or update a set**

my\_set = {11, 60}

my\_set.add(21)

print(my\_set)

**#To Add more than one element**

my\_set.update([20, 13, 8])

print(my\_set)

**3:Removing elements from the set**

# Initialize a set

my\_set = {10, 20, 30, 40, 50}

print(my\_set)

# Discard an element

my\_set.discard(40)

print(my\_set)

# Remove an element

my\_set.remove(60)

**4:INTERSECTION OF SETS**

# Defining the two sets

first\_set = {1, 5, 7, 4, 5}

second\_set = {4, 5, 6, 7, 8}

# Creating the intersection of the two sets

new\_set = first\_set & second\_set

print(new\_set)

**5:SET DIFFERENCE**

# Defining the two sets

first\_set = {1, 5, 7, 4, 5}

second\_set = {4, 5, 6, 7, 8}

# Creating the difference of the two sets

new\_set = first\_set - second\_set

print(new\_set)

or

# Difference of two sets

# Initialize A and B

first\_set = {1, 2, 3, 4, 5}

second\_set = {4, 5, 6, 7, 8}

# Creating the difference between the two sets

new\_set = second\_set.difference(first\_set)

print(new\_set)

**6:SYMMETRIC DIFFERENCE**

# Defining the two set

A = {1, 5, 7, 4, 5}

B= {4, 5, 6, 7, 8}

print(“symmetric difference”,A^B)