**Lab Report – 05**

1. **Implement Python String Operations.**

* **Compare Two Strings**

**Code:**

class Vehicle:

def \_\_init\_\_(self, max\_speed, mileage):

self.max\_speed = max\_speed

self.mileage = mileage

v = Vehicle(140, 20)

print(v.max\_speed, "\n", v.mileage)

* **Join Two or More Strings**

**Code:**

1. **Python program to find number of vowels in a given string.**

**Code:**

class Vehicle:

pass

1. **Python program to sort the characters in a string.**

**Code:**

str1=input("Enter the first string for searching vowels...")

str2=sorted(str1)

print(str2)

1. **Python program to remove duplicate characters from a string.**

**Code:**

### str1=input("Enter the first string for searching duplicate...")

### str2=""

### for str in str1:

### if str not in str2:

### str2 = str2+str

### print(str2)

1. **Python program to list unique characters with their count in a string.**

**Code:**

input\_string = input("Enter a string: ")

char\_count = {}

for char in input\_string:

if char in char\_count:

char\_count[char] += 1

else:

char\_count[char] = 1

for char, count in char\_count.items():

print(f"Character: {char}, Count: {count}")

1. **Python program to find number of words in a string.**

**Code:**

input\_string = input("Enter a string: ")

words = input\_string.split()

num\_words = len(words)

print(f"Number of words in the string: {num\_words}")

1. **Python program to remove all non-alphabetic characters from a string.**

**Code:**

input\_string = input("Enter a string: ")

result\_string = ""

for char in input\_string:

if char.isalpha():

result\_string += char

print("String with non-alphabetic characters removed:", result\_string)