**Q1. Write a program to calculate the electricity bill (accept number of unit from user) according to the following criteria :**

**Unit Price**

**First 100 units no charge**

**Next 100 units Rs 5 per unit**

**After 200 units Rs 10 per unit**

**(For example if input unit is 350 than total bill amount is Rs2000)**

**ANS:**

units=int(input("Enter the units of electricity bill: "))

s=1

amt=0

if units<=100:

print("No Charge")

elif 200<=(units-200):

amt=(units-100)\*5

else:

amt=(100\*5)+(units-200)\*10

print("The total amount is ", amt)



**Q2. Write a program to check whether the last digit of a number( entered by user ) is divisible by 3 or not.**

**ANS:**

**numb=int(input("Enter the number :"))**

**cnt=0**

**cnt=numb%10**

**if(cnt%3)==0:**

**print("The last digit is divisible by 3")**

**else:**

**print("The last digit is not divisible by 3")**



**Q3. Write a program to display "Hello" if a number entered by user is a multiple of five , otherwise print "Bye".**

**ANS:**

**numb=int(input("Enter the number :"))**

**if(numb%5)==0:**

**print("Hello")**

**else:**

**print("Bye")**



**Q4. A company decided to give bonus to employee according to following criteria:**

**Time period of Service                Bonus**

**More than 10 years             10%**

**>=6 and <=10                   8%**

**Less than 6 years              5%**

**Ask user for their salary and years of service and print the net bonus amount.**

**ANS:**

**sal=float(input("Enter the salary of the employee:"))**

**exp=int(input("Enter the years of service :"))**

**if exp>10:**

**print("The salary is :",(sal\*(10/100))+sal)**

**elif(exp>=6 and exp<=10):**

**print("The salary is :",(sal\*(8/100))+sal)**

**elif exp>6:**

**print("The salary is :",(sal\*(5/100))+sal)**



**Q5. Write a program to display all prime numbers within a range**

**ANS:**

st=int(input("Enter the startig range :"))

en=int(input("Enter the ending range :"))

for i in range(st,en):

if i==1:

continue

prime=True

cnt=0

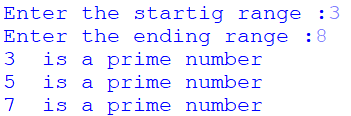
for j in range(2,int(i\*\*0.5)+1):

if(i%j==0):

prime=False

if(prime):

print(i," is a prime number ")



**Q6.**

**Write a python program that takes a number.**

* 1. **If the number is divisible by 3, it should return “Fizz”.**
  2. **If it is divisible by 5, it should return “Buzz”.**
  3. **If it is divisible by both 3 and 5, it should return “FizzBuzz”.**
  4. **Otherwise, it should return the same number.**

**ANS:**

**numb=int(input("Enter a number:"))**

**if(numb% 5==0 and numb%3==0):**

**print("FizzBuzz")**

**elif numb%3==0:**

**print("Fizz")**

**elif numb%5==0:**

**print("Buzz")**

**else:**

**print(numb)**



**Q7. Write a program for checking the speed of drivers. This function should have one parameter: speed.**

* 1. **If speed is less than 70, it should print “Ok”.**
  2. **Otherwise, for every 5km above the speed limit (70), it should give the driver one demerit point and print the total number of demerit points. For example, if the speed is 80, it should print: “Points: 2”.**
  3. **If the driver gets more than 12 points, the function should print: “License suspended”**

**ANS:**

speed = int(input("Enter the speed of the driver: "))

if speed < 70:

print("Ok")

else:

demerit\_points = (speed - 70) // 5

if demerit\_points > 12:

print("License suspended")

else:

print(f"Points: {demerit\_points}"

)