Sample Input

10

20

Sample Output

Your total refund will be $6.00.

For example:

Input	Result
20 20	Your total refund will be $7.00.

Ex. No.   :   1.5   **Date:**

Register No.:   230701363   Name: THEEPAK PALANI KUMAR D

Deposits

In many jurisdictions, a small deposit is added to drink containers to encourage people to recycle them. In one particular jurisdiction, drink containers holding one liter or less have a $0.10 deposit and drink containers holding more than one liter have a $0.25 deposit. Write a program that reads the number of containers of each size(less and more) from the user. Your program should continue by computing and displaying the refund that will be received for returning those containers. Format the output so that it includes a dollar sign and always displays exactly two decimal places.

Program:

a=int(input())

b=int(input())

s=a*.1

t=b*.25

v=s+t

print("Your total refund will be $""%.2f'%v,".",sep=**")**

Sample Input:

450

Sample Output:

weekdays 10.38

weekend 0.38

For example:

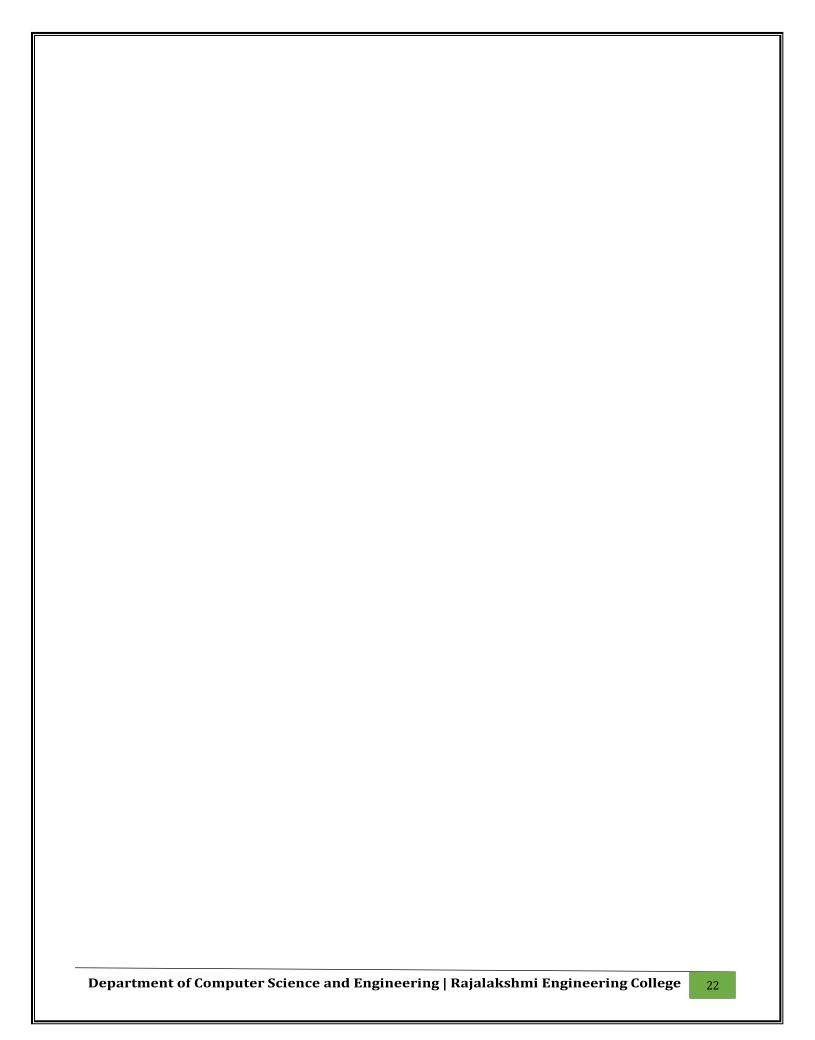| Input	Result
450	weekdays 10.38 weekend 0.38

Carpenter

Justin is a carpenter who works on an hourly basis. He works in a company where he is paid Rs 50 for an hour on weekdays and Rs 80 for an hour on weekends. He works 10 hrs more on weekdays than weekends. If the salary paid for him is given, write a program to find the number of hours he has worked on weekdays and weekends.
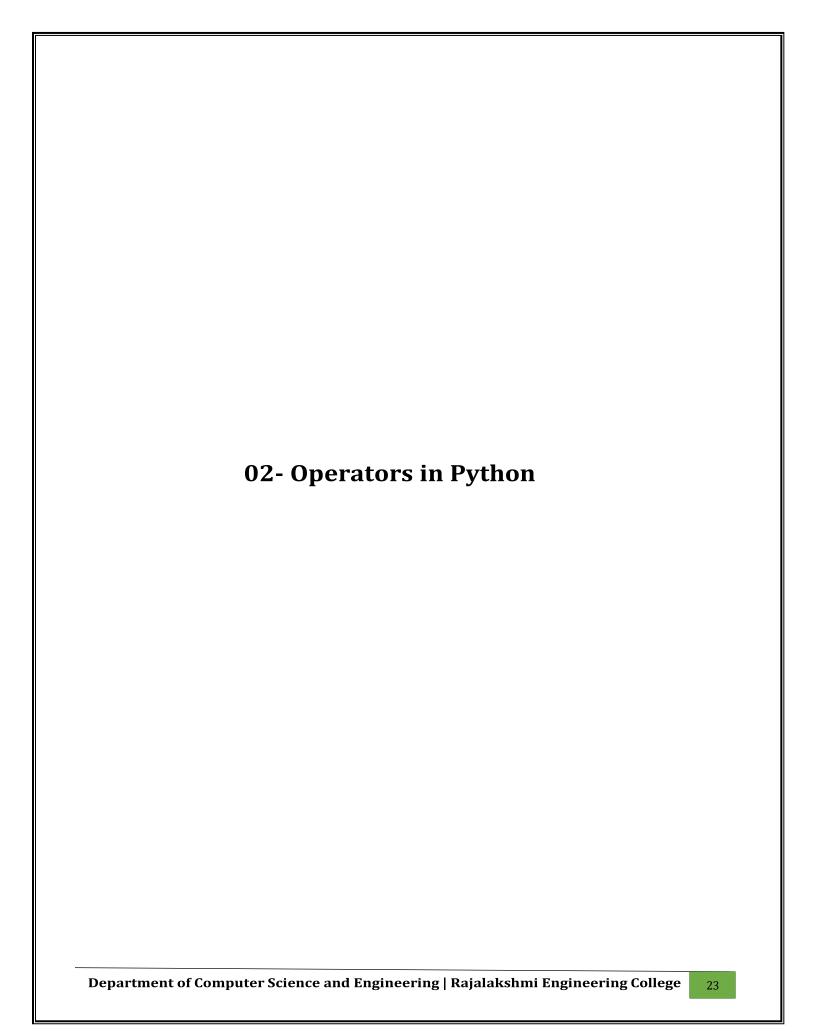
Hint:

If the final result(hrs) are in -ve convert that to +ve using abs() function

The abs() function returns the absolute value of the given number.

```
number = -20
absolute_number = abs(number)
print(absolute_number)
# Output: 20
```
Program:
```
g=int(input())
h=(g-500)/130
i=abs(h)
j=i+10
print("weekdays","%.2f"%j)
print("weekend","%.2f"%i)
```

02- Operators in Python

Sample Input

10

20

Sample Output

The total weight of all these widgets and gizmos is 2990 grams.

For example:

Input	Result
10 20	The total weight of all these widgets and gizmos is 2990 grams.

Widgets and Gizmos

An online retailer sells two products: widgets and gizmos. Each widget weighs 75 grams. Each gizmo weighs 112 grams. Write a program that reads the number of widgets and the number of gizmos from the user. Then your program should compute and display the total weight of the parts.

Program:

a=eval(input())

```
b=eval(input())
p=a*75
q=b*112
print("The total weight of all these widgets and gizmos is",p+q,"grams.")
```

Sample Input

10

Sample Output

True

Explanation:

Since 10 is an even number and a number between 0 and 100, True is printed

Doll Sings

In London, every year during Dasara there will be a very grand doll show. People try to invent new dolls of different varieties. The best-sold doll's creator will be awarded with a cash prize. So people broke their heads to create dolls innovatively. Knowing this competition, Mr.Lokpaul tried to create a doll that sings only when an even number is pressed and the number should not be zero and greater than 100.

 IF Lokpaul wins print true, otherwise false.

Program:

```
n=eval(input())
if n%2==0:{
    print("True")
}
else:{
    print("False")
}
```

Input Given:

N-No of friends

P1,P2,P3 AND P4-No of chocolates

OUTPUT:

 "True" if he can buy that packet and "False" if he can't buy that packet.

SAMPLE INPUT AND OUTPUT:

5

25

12

10

9

OUTPUT

True False True False

Ex. No.   :   **2.3**   **Date:**

Register No.: 230701363   **Name: THEEPAK PALANI KUMAR D**

Birthday Party

Mr. X's birthday is in next month. This time he is planning to invite N of his friends. He wants to distribute some chocolates to all of his friends after the party. He went to a shop to buy a packet of chocolates. At the chocolate shop, 4 packets are there with different numbers of chocolates. He wants to buy such a packet which contains a number of chocolates, which can be distributed equally among all of his friends. Help Mr. X to buy such a packet.

 Program:

```
N = int(input())
P1 = int(input())
P2 = int(input())
P3 = int(input())
P4 = int(input())
print(P1 % N == 0,end=" ")
print(P2 % N == 0,end=" ")
print(P3 % N == 0,end=" ")
print(P4 % N == 0,end=" ")
```

Sample Input

3

Sample Output:

2

Explanation:

The binary representation of 3 is 011, hence there are 2 ones in it. so the output is 2.

Ex. No.   :   2.4   **Date:**

Register No.:   230701363   **Name: THEEPAK PALANI KUMAR D**

<u>Hamming Weight</u>

Write a python program that takes a integer between 0 and 15 as input and displays the number of '1' s in its binary form.(Hint:use python bitwise operator.
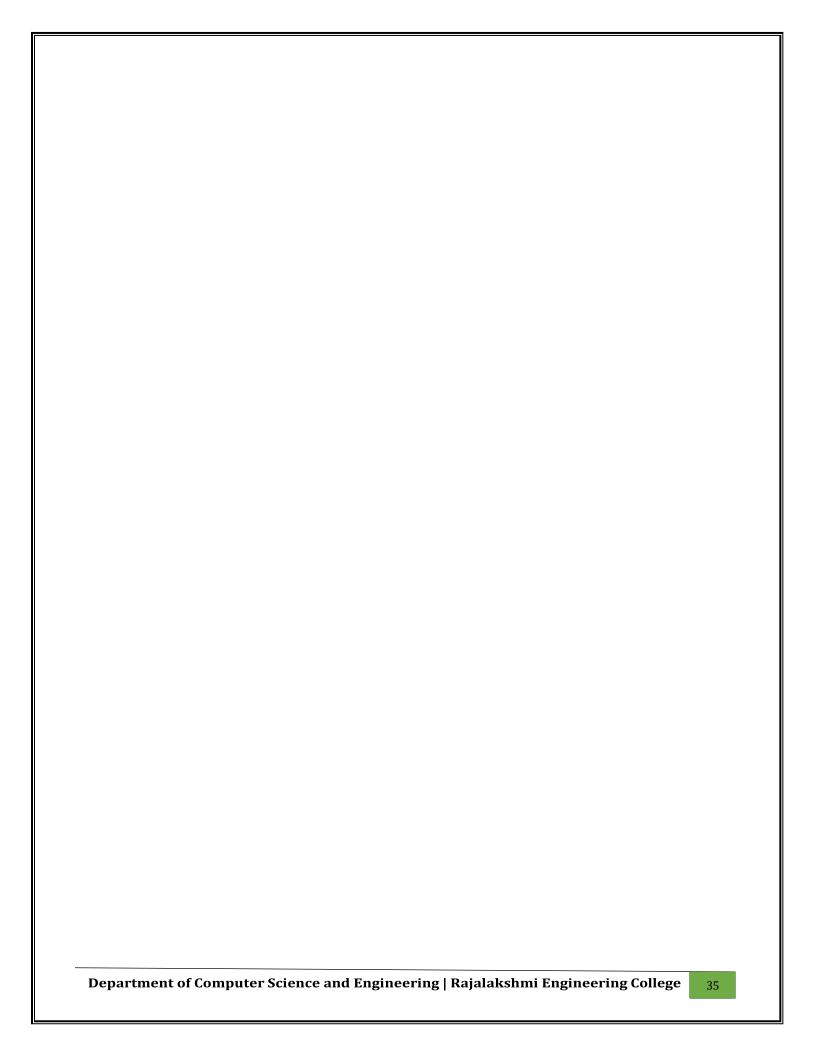
Program:

a=int(input())

b=bin(a)[2:]

c=b.count('1')

print(c)

Sample Input:

10000

Sample Output:

Balance as of end of Year 1: $10400.00.

Balance as of end of Year 2: $10816.00.

Balance as of end of Year 3: $11248.64