

# Python\_2

April 7, 2023

## Operator

```
[1]: # Operator are the symbol that is used to perform various operation based on ↵  
    ↪ the value of the operands.
```

```
[2]: # +,-,*,/,//,% are the example of arithmetic operators.
```

```
[3]: 1+1
```

```
[3]: 2
```

```
[4]: print(1+1)
```

2

```
[5]: print(1-1)
```

0

```
[6]: print(1*1)
```

1

```
[7]: print(1/1)
```

1.0

```
[8]: print(1//1)
```

1

```
[9]: # // is used to get integer value of the division of two numbers.
```

```
[10]: print(2**2)
```

4

```
[11]: # ** is used to raised the second number over first number.
```

```
[12]: print(2*2+2/2-2)
```

3.0

```
[13]: print(4//3)
```

1

```
[14]: # this happen because // only return integer values.
```

```
[15]: print(11%3)
```

2

```
[16]: # % is used to return remainder values.
```

```
[17]: print("Hello" + "Ajeet")
```

HelloAjeet

```
[18]: print("hello","Ajeet")
```

hello Ajeet

```
[21]: print(4*"Ajeet Kumar ")
```

Ajeet Kumar  
Ajeet Kumar  
Ajeet Kumar  
Ajeet Kumar

```
[22]: # \n is a new line character that is used to return the value in multiple line.
```

## Input Function

```
[23]: # input() is a inbuilt python function that is used to take the value from user.  
# input() function always takes the value as string data type, otherwise you  
↳ have to specifies the data type of the variable.
```

```
[25]: print('What is your name:')
```

What is your name:

```
[26]: print(input("What is your name:"))
```

What is your name: Ajeet Kumar  
Ajeet Kumar

```
[27]: name= print(input("What is Your name:"))
```

What is Your name: Ajeet Kumar Sahu

Ajeet Kumar Sahu

```
[33]: name= print("Hello",input("What is Your name:"))
```

What is Your name: Ajeet

Hello Ajeet

```
[35]: name=input("What is your name:")  
print("Hello" ,name)
```

What is your name: Ajeet

Hello Ajeet

```
[38]: FName= input("What is your first name:")  
LName= input("What is your last name:")  
print("Your Full name is",FName,LName)
```

What is your first name: Ajeet

What is your last name: Kumar

Your Full name is Ajeet Kumar

### 0.0.1 Problem

1. Write a program that uses input to prompt a user for their name and then prints to the console the number of characters in the inputted name.

Example:

Input : "Elshad" Output : 6

```
[39]: YourName=input("What is Your name:")  
print(len(YourName))
```

What is Your name: Ajeet Kumar

11

### Type Error and Type conversions

```
[40]: # len() is the inbuilt function that is used to count the number of character  
      ↪ in the value of the given variable.
```

```
[41]: print(len("Ajeet Sahu"))
```

10

```
[42]: print(len("1234"))
```

4

```
[45]: name=input("What is your current age:")
```

What is your current age: 19

```
[47]: print(type(name))
```

<class 'str'>

```
[49]: print('Your age after 5 year will be',5+int(name))
```

Your age after 5 year will be 24

```
[50]: a=123
      print(type(a))
```

<class 'int'>

```
[51]: a=float(a)
```

```
[52]: print(type(a))
```

<class 'float'>

### Comment

```
[61]: # It is the statement that is used to increase the understandability of code.
      # This is the part of code that is not going to execute by interpreter.
```

```
[54]: # '#' is used for single line comment.
```

```
[57]: # ''' This is used for multiline comment.'''
```

```
[60]: # print("Hello World")
```

### Variable naming

```
[64]: user_name=input("What is your birth place")
```

What is your birth place Rosera

```
[65]: name1="Book"
      print(name1)
```

Book

2. Write a program that converts number of years to the weeks. if the input was 2, then the output should be  $2 * 52 = 104$ , because we have 52 weeks in 1 year. Example Input

2 Example Output

$2 * 52 = 104$

There are 104 weeks in 2 years

```
[74]: year= int(input("Enter Number of year:"))
      TotalWeek=52* year
      print("There are "+str(TotalWeek)+" weeks in "+str(year)+"")
```

Enter Number of year: 5

There are 260 weeks in 5

### f-String

```
[75]: year=int(input("Enter Number of year:"))
      TotalWeek=52* year
      print(f"There are {TotalWeek} weeks in {year} years.")
```

Enter Number of year: 5

There are 260 weeks in 5 years.

```
[76]: # f-string is used to avoid the repetitive type conversion.
```

### Round Function

```
[78]: # Without round function
```

```
[77]: print(10/3)
```

3.3333333333333335

```
[79]: # With Round function
```

```
[81]: print(round(10/3))
```

3

```
[82]: print(round(10/3,2))
```

3.33

```
[84]: print(round(23354.453452342,2))
```

23354.45