Numeric function:

1. Absolute function abs – The absolute function returns the distance of a number from zero.

Eg : abs(5)

5

Abs(-5)

5

1. Ceil Function – To use this function we need to import the module

Import math

math.ceil(35.74)

36

Ceiling function basically returns next higher integer.

1. The next function is the exp function

math.e

2.71….

Math.exp(7)

1096.6331 ----- here 7 is the power of 7 for exponent.

4. The floor function : It returns the next lower integer value.

math.floor(16.14)

16

1. Sqrt(): This is nothing but the square root of the number

math.sqrt(25)

5

1. Log Function - it is used to compute the natural logarithm of numbers same to use this function we need to import the math module.

Eg: math.log(5)

1.6094

Now if we want to find out the log with base 10 then

Math.log10(2)

0.3010

Math.log10(10)

1

1. The next function is the max function and we don’t need to use import math module for this

Eg: max(10,15,45,-1)

45

min(10,-253,15,7,4)

-253

7. The next function is the round function

round(17.457,2) ----- here the second number indicates that to how many numbers you want to round up

17.46

8. The next function is the modf function so what this function does is you passed to it a fractional number and it will turns to an two item tuple and it gives you the integer part of the number and the fractional part of the number as separate item but for this function we need to import the math module

Import math

Math.modf(11.971)

(0.9710000001, 11.0)

9. Power method pow - Eg: math.pow(4,2) --------- this is 4 to the power of 2

16

10. The next function is hypot which is nothing but hypotheuse

hypot(3,4) ---------------- 3 as a base and 4 as perpendicular

5

11. Degrees method : The degrees it actually returns the angle value in degrees for angle past in radius

Eg: math.pi

3.141

Suppose if we want to find the degree of a pie we use

Eg: math.degrees(math.pi)

180

String function : 1. Capitalized string function

Basically this function returns a string with the first letter capitalized

Eg: str1 = “hi this is Ravi”

str1.capitalize()

“Hi this is Ravi”

2. Count method : This method is used to calculate the number of times string exists in another string

str1 = """ Tom is a good guy

Tom is hardworking

Tom is honest

Tom is a team player

Tom is a party pooper

Tom sleeps early

Tom works out """

str1

' Tom is a good guy\nTom is hardworking\nTom is honest\nTom is a team player\nTom is a party pooper\nTom sleeps early\nTom works out '

str1.count("Tom")

7

3. The next method is the ends with method and this method checks if the string that’s passed as an argument to the function is actually the last part of the calling object string or not

Eg str1 = "i lovetennis.com"

str1.endswith(".com")

True

str1.endswith(".org")

False

4. The next method is the fine method and this method checks if the string that passed as an argument to the function exists in the calling string or not and if it exists then it will turn returns the index position of the first character of the argument that you have passed and if doesn’t exist it simply returns minus 1

str1 = "Catch me if you can"

str1.find("you")

12

str1.find("along")

-1

4. Is lower method() : This method checks whether all characters in the calling string are in the lower case or not

str1 = "Hello World"

str1.islower()

False

str1="hello world"

str1.islower()

True

5. IsUpper method : This function checks whether all characters in a string are in the upper case or not

str1 = "Hello World"

str1.isupper()

True

str1="hello world"

str1.isupper()

False

6 The next function is the len() function and it basically return the number of characters in a string

str1 = "Hello World"

len(str1)

11

1. The next method is the lower method and this method changes all the upper case character in the string of lower case character.

str1.lower()

1. The next method is the L strip basically this method removes characters from the left side of the string and that’s why its called L strip

str1 = "!!!!!!!! What's up buddy?"

str1.lstrip("!")

" What's up buddy?"

Lly we will have R strip

1. The next method is the upward method and what this function does is it changes the case of all characters to uppercase right so it’s counterpart to lower method
2. Replace Method: Basically the method replaces a part of a string or an entire string with a new string

str1 = "Fox is king of the forest"

str1

'Fox is king of the forest'

str1.replace('Fox','Lion')

'Lion is king of the forest'

1. The next method is the split method this method splits the string on the occurrence of an optional de limiter found as an argument

str1 = "Tom Cruise"

str1.split()

['Tom', 'Cruise']