**ASSIGNMENT-01**

**1.SPLIT THIS STRING**

[] s= “Hi there Sam !”

[]

**ANS:**

[] s=”Hi there Sam!”

[]

s.split ()

**output:**

[‘Hi ‘,’there’,’Sam!’]

**2.USE.FORMAT () TWO PRINT THE FOLLOWING STATE .**

[]Planent = “Earth”

Diameter =12742

[]

**ANS:**

## **The diameter of Earth is 12742 kilometers.**

planet = "Earth"

diameter = 12742

print("The diameter of {} is{}kilometers.".format(planet,diameter))

The diameter of Earth is 12742 kilometers.

**3.IN THIS NEST DICTUONARY GRAB THE WORD “hello”**

[] d={‘k1’:[1,2,3,{‘tricky’:[‘oh’,’man’,’inception’,{‘target’:[1,2,3,’hello’]}]}]}

[]

**ANS:**

In [11]:

d={'k1':[1,2,3,{'tricky':['oh','man','inception',{'target':[1,2,3,'hello']}]}]}

In [14]:

d['k1'][3]['tricky'][3]['target'][3]

Out[14]:

'hello'

**4.1 CREATE AN ARRAY OF 10 ZEROS?**

**4.2 CREATE AN ARRAY OF 10 FIVES?**

import numpy as np

array=np.zeros(10)

print("An array of 10 zeros:")

print(array)

array=np.ones(10)\*5

print("An array of 10 fives:")

print(array)

**Sample Output:**

An array of 10 zeros:

[ 0. 0. 0. 0. 0. 0. 0. 0. 0. 0.]

An array of 10 fives:

[ 5. 5. 5. 5. 5. 5. 5. 5. 5. 5.]

**5.CREATE AN ARRAY OF ALL THE EVEN INTEGERS FROM 20 TO 35**

import numpy as np

array=np.arange(20,36,2)

print("Array of all the even integers from 20 to 35")

print(array)

**Sample output:**

Array of all the even integers from 20 to 35

[20 22 24 26 28 30 32 34 ]

**6. CREATE A 3\*3 MATRIX WITH VALUES RAGING FROM 0 TO 8**

In [7]:

np.arange(9).reshape(3,3)

Out[7]:

array([[0, 1, 2],

[3, 4, 5],

[6, 7, 8]])

**7.CONCATENATE a AND b**

**a=np.array([1,2,3]),b=np.array([4,5,6])**

>>>a **=** np**.**array**([[1,** **2, 3]**

>>> b **=** np**.**array**([4, 5, 6]])**

>>> np**.**concatenate**((**a**,** b**),** axis**=0)**

*array([[1, 2, 3],*

*[ 4, 5, 6]])*

>>> np**.**concatenate**((**a**,** b**.**T**),** axis**=1)**

*array([[1, 2, 5],*

*[3, 4, 6]])*

>>> np**.**concatenate**((**a**,** b**),** axis**=None)**

*array([1, 2, 3, 4, 5, 6])*