Split this string

S = "Hi there krishna!"

S = "Hi there krishna!"

Output should be: The diameter of Earth is 12742 kilometers.

2. Use .format() to print the following string.

Planet = "Earth"

Diameter = 12742

Planet = "Earth"

Diameter = 12742

Print('The diameter of {} is {} kilometers.' .format(planet,diameter));

The diameter of Earth is 12742 kilometers.

3. In this nest dictionary grab the word "hello"

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

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

Print(d['k1'][3]["tricky"][3]['target'][3])

Hello

Numpy

Import numpy as np

Import numpy as np

Array=np.ones(10)*5

Print("An array of 10 fives:")

Print(array)

An array of 10 fives:

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

Import numpy as np

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

Print("Array of all the even integers from 30 to 70")

Print(array)

Array of all the even integers from 30 to 70

[20 22 24 26 28 30 32 34]

5. Create an array of all the even integers from 20 to 35

A = np.array((1,2,3))

B = np.array((4,5,6))

Np.stack((a,b),axis=1)

Array([[1, 4],

 [2, 5],

 [3, 6]])

6. Create a 3x3 matrix with values ranging from 0 to 8

Import numpy as np

X = np.arange(0, 9).reshape(3,3)

Print(x)

[[0 1 2]

 [3 4 5]

 [6 7 8]]

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.stack((a,b),axis=1)

Array([[1, 4],

 [2, 5],

 [3, 6]])

Pandas

8. Create a dataframe with 3 rows and 2 columns

Import pandas as pd

Name Register no

0 kesavan 41

1 kavya 39

2 kesavarthini 42

```
Import pandas as pd
Data = [['kesavan', 41], ['kavya', 39], ['kesavarthini', 42]]
Df = pd.DataFrame(data, columns=['Name', 'Register no'])
Df
```

9. Generate the series of dates from 1st Jan, 2023 to 10th Feb, 2023

```
Import datetime
# The size of each step in days
Day_delta = datetime.timedelta(days=1)
Start_date = datetime.date.today()
End_date = start_date + 41*day_delta
For I in range((end_date – start_date).days):
    Print(start_date + i*day_delta)
```

2022-09-15

2022-09-16

2022-09-17

2022-09-18

2022-09-19

2022-09-20

2022-09-21

2022-09-22

2022-09-23

2022-09-24

2022-09-25

2022-09-26

2022-09-27

2022-09-28

2022-09-29

2022-09-30

2022-10-01

2022-10-02

2022-10-03

2022-10-04

2022-10-05

2022-10-06

2022-10-07

2022-10-08

2022-10-09

2022-10-10

2022-10-11

2022-10-12

2022-10-13

2022-10-14

2022-10-15

2022-10-16

2022-10-17

2022-10-18

2022-10-19

2022-10-20

2022-10-21

2022-10-22

2022-10-23

2022-10-24

2022-10-25

Lists = [[1, 'aaa', 22], [2, 'bbb', 25], [3, 'ccc', 24]]

10. Create 2D list to DataFrame

Lists = [[1, 'aaa', 22], [2, 'bbb', 25], [3, 'ccc', 24]]

Import pandas as pd

Lists = [[1, 'aaa', 22], [2, 'bbb', 25], [3, 'ccc', 24]]

```
Ls = pd.DataFrame(data, columns=['Tag', 'Number'])

Df
```