**Training Report Day-11**

**19 June 2024**

**Numpy worksheet:**

Import NumPy as np

import numpy as np

Create an array of 10 zeros

arr=np.zeros(10)

print(arr)

#### Create an array of 10 ones

ar1=np.ones(10)

print(ar1)

#### Create an array of 10 fives

ar2=np.full(10,5)

**Pandas:**

Pandas is a powerful and widely-used open-source library in Python for data manipulation and analysis.

import numpy as np

import pandas as pd

l1=[1,2,3,4,5]

labels=['a','b','c','d','e']

d={"A":10,"B":20,"C":30,"D":40,"E":50}

s1=pd.Series(l1)  #printing indexes with values

print(s1)

s2=pd.Series(labels)

print(s2)

s3=pd.Series(data=l1, index=labels)

print(s3)

arr=np.random.randint(0,100, size=(5,6))

print(arr)

pd.DataFrame(arr)

df=pd.DataFrame(arr, index=["A","B","C","D","E"], columns=["a","b","c","d","e","f"])

print(df)