

## Euclidean Output -

```
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 --version
Python 3.12.8
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_1.json --k 3 --distance_metric euclidean
Test set accuracy for dataset_1.json - 100.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_2.json --k 3 --distance_metric euclidean
Test set accuracy for dataset_2.json - 72.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_3.json --k 3 --distance_metric euclidean
Test set accuracy for dataset_3.json - 42.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_1.json --k 6 --distance_metric euclidean
Test set accuracy for dataset_1.json - 100.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_2.json --k 6 --distance_metric euclidean
Test set accuracy for dataset_2.json - 72.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_3.json --k 6 --distance_metric euclidean
Test set accuracy for dataset_3.json - 48.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_1.json --k 9 --distance_metric euclidean
Test set accuracy for dataset_1.json - 100.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_2.json --k 9 --distance_metric euclidean
Test set accuracy for dataset_2.json - 74.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_3.json --k 9 --distance_metric euclidean
Test set accuracy for dataset_3.json - 44.0.
```

## Manhattan Output -

```
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> print("Manhattan")
Unable to initialize device PRN
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_1.json --k 3 --distance_metric manhattan
Test set accuracy for dataset_1.json - 100.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_2.json --k 3 --distance_metric manhattan
Test set accuracy for dataset_2.json - 72.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_3.json --k 3 --distance_metric manhattan
Test set accuracy for dataset_3.json - 38.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_1.json --k 6 --distance_metric manhattan
Test set accuracy for dataset_1.json - 100.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_2.json --k 6 --distance_metric manhattan
Test set accuracy for dataset_2.json - 72.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_3.json --k 6 --distance_metric manhattan
Test set accuracy for dataset_3.json - 36.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_1.json --k 9 --distance_metric manhattan
Test set accuracy for dataset_1.json - 100.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_2.json --k 9 --distance_metric manhattan
Test set accuracy for dataset_2.json - 74.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2> python3 main.py --dataset_path dataset_3.json --k 9 --distance_metric manhattan
Test set accuracy for dataset_3.json - 44.0.
PS C:\Users\Manali\Desktop\Element_Ai\Part_2>
```