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| Perceptron Algorithm Task - 2 |
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| Aim: To Check the Perceptron Algorithm in My Data-Set is Linearly Separable or not I have made dataset of 4 inputs to check whether a person will get a Job in Google as a App Developer  1) Has an Outstanding Profile in his/her Career  2) Launched an App on Play Store with more than 500k Downloads  3) A Hackathon Winner  4) If we He/She has cracked Google interview    Perceptron.py :    Testing.py    Output:  **Threshold=2 ,learning rate=0.01**  --------------------  Epoch number :0  weights ---> [0. 0. 0. 0. 0.]  expected output --->1  perceptron output is ---> 1  ---------------------------  expected output --->0  perceptron output is ---> 1  ---------------------------  expected output --->1  perceptron output is ---> 1  final weights --> [0.01 0. 0.01 0.02 0.02]  **Threshold=3,learning\_rate=0.01**  --------------------  Epoch number :0  weights ---> [0. 0. 0. 0. 0.]  --------------------  Epoch number :1  weights ---> [0.01 0. 0.01 0.02 0.02]  --------------------  Epoch number :2  weights ---> [-0.01 0. 0.01 0.01 0.02]  expected output --->1  perceptron output is ---> 1  ---------------------------  expected output --->0  perceptron output is ---> 0  ---------------------------  expected output --->1  perceptron output is ---> 1  final weights --> [-0.01 0. 0.01 0.01 0.02]  **Threshold=4,learning\_rate= 0.01**  --------------------  Epoch number :0  weights ---> [0. 0. 0. 0. 0.]  --------------------  Epoch number :1  weights ---> [0.01 0. 0.01 0.02 0.02]  --------------------  Epoch number :2  weights ---> [-0.01 0. 0.01 0.01 0.02]  --------------------  Epoch number :3  weights ---> [-0.01 0. 0.01 0.01 0.02]  expected output --->1  perceptron output is ---> 1  ---------------------------  expected output --->0  perceptron output is ---> 0  ---------------------------  expected output --->1  perceptron output is ---> 1  final weights --> [-0.01 0. 0.01 0.01 0.02] |
| Conclusion : Learning rate should be 0.01 and Minimum Epoch should be 2 in my data-set  And my data is linearly Seperable. |
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