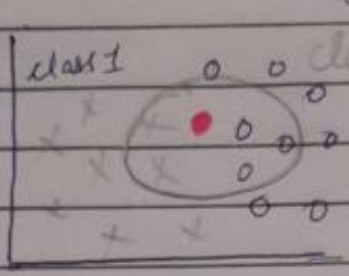
Page No.
Date :

K-Nearest Neighbours:-

→ It is used for both classification and regression
→ Supervised learning Algorithms



Let's say you have class 1 (xxx) and class 2 (ooo) and you get a new pt • to classify. To do that:-

(i) We calculate distance from • to all other points then we consider the nearest K points. K denotes how many points are you going to consider near the point. Then we take a majority points vote. as class 2 has more points, • belongs to class 2

All the work happens at query time, training time is of order 1. Query time O(N), O(Nq) for no. of queries

Non parametric algorithm

Used as Baseline for newer algorithms

Most brute force approach in machine learning