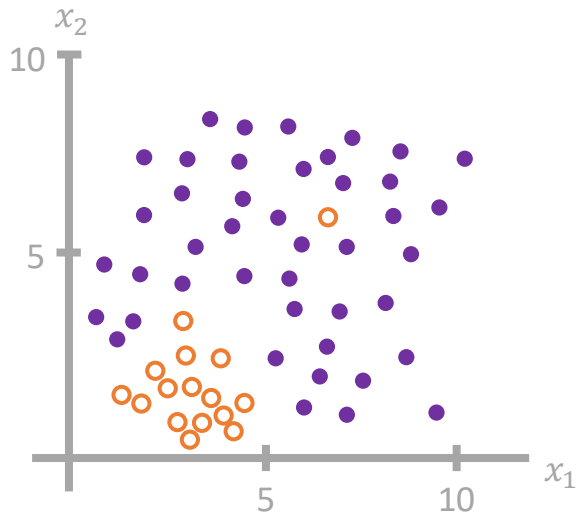Warm-up challenge as you walk in

Consider the following dataset with input features $x \in \mathbb{R}^2$.
Draw a reasonable decision tree.

Decision Tree:

Draw decision boundaries for decision trees and nearest neighbor on this training dataset.

Decision tree

X_2

X_1

Nearest neighbor

X_2

X_1