

Lab 7

Problem 1. Note: Show how you arrived at your solutions -- show all work.
Consider the following dataset:

A1	A2	A3	Class
Medium	Mild	East	No
Low	Mild	East	Yes
High	Mild	East	Yes
Low	Mild	West	Yes
Low	Cool	East	No
Medium	Hot	West	No
High	Hot	East	Yes
Low	Cool	West	No
Medium	Hot	East	No
High	Cool	East	Yes
Medium	Mild	East	No
Low	Cool	West	Yes
Medium	Hot	West	Yes
Low	Hot	East	Yes

- (1) Compute the *Info* of the whole dataset D .
- (2) Compute the *information gain* of A_3 .

Problem 2. Your task of this problem is to run a J48 Decision Tree model using the same dataset as Naïve Bayes Lab Problem 2. Capture the classifier output and paste it onto your submission. Make sure your screenshot has accuracy and confusion matrix included. Compare the performance (correctly classified instances %) of the Naïve Bayes which you obtained from earlier lab with that of J48 which you obtained from this problem and state which one you would use and explain why.