

Ex 1. Build a Naïve Bayes Classifier using this data

rec	Age	Income	Student	Credit_rating	Buys_computer
r1	<=30	High	No	Fair	No
r2	<=30	High	No	Excellent	No
r3	31...40	High	No	Fair	Yes
r4	>40	Medium	No	Fair	Yes
r5	>40	Low	Yes	Fair	Yes
r6	>40	Low	Yes	Excellent	No
r7	31...40	Low	Yes	Excellent	Yes
r8	<=30	Medium	No	Fair	No
r9	<=30	Low	Yes	Fair	Yes
r10	>40	Medium	Yes	Fair	Yes
r11	<=30	Medium	Yes	Excellent	Yes
r12	31...40	Medium	No	Excellent	Yes
r13	31...40	High	Yes	Fair	Yes
r14	>40	Medium	No	Excellent	No

Predict whether the following user will buy a computer?

X= ( age <=30, income = medium, student = yes, credit\_rating = fair)

2. Part 2

The following gives a Term frequency of some of the documents for the given keywords and the last column gives the category of the document.

Document	TDP	Nifty	Sidhu	BJP	Sensex	Sixer	Congress	Century	Category
D1	4	0	3	5	1	0	6	0	Politics
D2	0	5	0	2	6	0	1	0	Business
D3	0	0	6	1	0	4	1	2	Sports
D4	4	1	0	1	1	0	6	0	Politics
D5	0	0	0	0	0	5	0	6	Sports
D6	0	4	0	2	6	0	0	1	Business
D7	5	0	0	3	0	0	5	0	Politics

Predict which Category the following document will fall into

Testdoc	0	3	0	2	6	0	2	1	?
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