Stats Video Lectures – Probability Trees

Week 2, Video 6

1. Probability Trees
   1. 100 emails in the inbox, 60 are spam, 40 are not. Of the 60 Spam emails, 35 contain the word Free, Of the 40 nonspam emails, 3 contain the word Free. If an email contains the word Free, what is the prob that it is spam?
      1. Bayes: P(Sp | Fr) = P(Spa and Fr)/P(Fr) = (35/100)/(38/100) = 35/38 = 0.92 = 92%
2. Prob trees in the case of P(A|B) = P(B|A)