COS 341, September 24, 1997
Handout Number 4

Homework Set 2

Reading Assignments Read Chapter 4.

Written Assignments Do Exercises 11, 19, 21, 22, 29, 31 and 35 in Section 3.6.

Special Problem 1 (to be counted as 1 exercise) Deal five cards from a random deck. What is the probability of getting a straight? What is the probability of getting a flush? What is the probability of getting a "two-pairs"?

Special Problem 2 (to be counted as 2 exercises) There are 3 red balls (identical), 6 blue balls, and 7 green balls. There are two boxes B_1 and B_2.

(a) How many ways are there to put the balls into the boxes, so that each box has 8 balls?

(b) If there are three boxes B_1, B_2 and B_3, how many ways are there to put the balls, so that there is no empty box.

(c) Repeat (b) for the case when there are four boxes B_1, B_2, B_3, and B_4.