Math 375: Probability Theory
Spring 2018
Homework 1

- Exercises from the text: 2.3, 2.5(a), 2.6, 2.7, 2.8, 2.11, 2.17, 2.20, 2.21, 2.29, 2.33, 2.35, 2.41, 2.43, 2.44, 2.53, 2.58, 2.64, 2.65

- Candy Problem

  (a) Suppose 8 identical pieces of candy are to be divided among 3 children. How many distinguishable distributions of the candy are there?

  (b) For Halloween, someone is giving out bags with 8 pieces of candy each. There are three types of candy used to fill the bags. How many distinguishable ways are there to fill the bags? What if each bag contains at least one of each type of candy?