

HOMEWORK #3

[1] Section 2.1: Exercises 1, 2, 3, 5.

[2] Section 2.7: Exercises 4, 5, 9, 19.

[3] Suppose that you toss n fair coins. Let Y denote the number of heads that appear. Determine and plot F_Y .

(Hint: start with easy cases $n=1, 2, 3$.)

[4] Three balls are to be randomly selected without replacement from an urn containing 7 balls numbered 1 through 7. Let X denote the largest number selected. Find and plot F_X .

(Hint: $P(X=x) = \frac{\binom{x-1}{2}}{\binom{7}{3}}$, for $x = ?$)