

## Third Lab Assignment (Due by 3pm on Nov. 4)

### Lab assignments

**Assignment 1** In Matlab simulate the experiment of drawing 6 white and 10 red balls from a box **without replacement**. The probabilities of drawing white ball first and red ball first are  $P(w_1) = \frac{6}{16}$  and  $P(r_1) = \frac{10}{16}$ , respectively.

Experimentally show that  $P(w_1) = P(w_{10})$  or  $P(r_1) = P(r_{10})$ .

In order to do this do 100,000 experiments where you keep drawing balls from the box until there are no balls in the box left.

Submit your Matlab code, where you finally print probabilities for  $P(w_{10})$  and  $P(r_{10})$ .