## Problems from Assignment 21

1. A poker-dealing machine is supposed to deal cards at random, as if from an infinite deck.

In a test, you counted 1600 cards, and observed the following:
Spades 404
Hearts 420
Diamonds 400
Clubs $\quad 376$
Could it be that the suits are equally likely? Construct a hypothesis test to address this question and put bounds on the $p$-value of the test.

