

CS1382 Discrete Computational Structures
Spring 2019 Quiz V

Full points will be awarded for showing all your working.

1. Use the binomial theorem to expand $(2c - 3d)^4$
2. A club with 20 women and 17 men needs to form a committee of size six. How many committees are possible if the committee must have three women and three men?
3. What is the probability that a fair coin lands Heads 4 times out of 6 flips?
4. Given a deck of 52 cards, we draw 6. What is the probability of getting 2 Aces, 2 Kings and 2 Jacks?
5. What is the probability that when two dice are rolled, the sum of the numbers on the two dice is 7?