

MasterMath

Theoretical and Experimental Probability

Name _____
Date _____

1. The colored wheel is spun 50 times, and the results are shown in the table below. Answer these questions:



blue	red	green
15	18	17

- What was the Experimental Probability of landing on red?
- What is the Theoretical Probability of landing on red?
- What was the Experimental Probability of not landing on red?
- What is the Theoretical Probability of not landing on red?
- What was the Experimental Probability of landing on green or red?

2. If you roll a die like the one pictured, what would be the Theoretical Probability of each of these events:



- Rolling either a 5 or a 6
- Rolling a number less than 3
- Rolling a number larger than 2
- Rolling an odd number

3. There are 84 colored chips in a bag, each either red, white or blue. The Theoretical Probability of picking a blue chip is 25%. How many blue chips are in the bag?

4. **Lowest Temperature on May 1st, 1951 - 2000**

Temp.	Frequency
20° - 30°	7
30° - 40°	7
40° - 50°	14
50° - 60°	16
60° - 70°	6

- Based upon the statistics shown in this table:
- What is the Probability that the low temperature on May 1st will be higher than 40°?
- Is this a Theoretical or an Experimental Probability?
- What is the Probability that the low temperature will be between 50° and 70°?

5. From a deck of 52 playing cards, what is the probability that if you draw one card, it will be a 2, 3, 4 or 5?



- Is this an Experimental or a Theoretical Probability?