Name: _____

Probability

1. If you roll a die, what are the chances of rolling a two? answer: _____

2. If you roll a die, what is the probability that you will roll
    an even number?   answer: _____

3. A bag contains 3 red marbles, 3 blue marbles, and
    1 green marble. If a marble is drawn from the bag
    at random, what is the probability that the marble
    will be blue?   answer: _____

4. A bag contains 6 number tiles. The numbers in the
    bag are 3, 7, 8, 9, 13, and 15. If you randomly draw
    one tile from the bag, what is the probability of
    picking an odd number?   answer: _____

5. Mr. Jones has a hot air balloon. Because the basket
    is so small, he can take one child for a ride with him.
    Mary, Carla, John, Lynda, Peter, and Janessa all
    want to go. They each write their name on a piece of
    paper and place them in a hat. Mr. Jones randomly
    selects one child to go with him.

    What is the probability that he will select a boy?   answer: _____

    What is the probability that he will select a girl?   answer: _____

6. John and Jackie are rolling a die. John wins if he rolls a number higher than 4. Jackie
    wins if the number rolled is 4 or less.   Is this game fair? Explain.

    _____

    _____

    _____

ANSWER KEY

Probability

1. If you roll a die, what are the chances of rolling a two? answer: **1 out of 6**

2. If you roll a die, what is the probability that you will roll an even number?

   answer: **1 our of 2**

3. A bag contains 3 red marbles, 3 blue marbles, and 1 green marble. If a marble is drawn from the bag at random, what is the probability that the marble will be blue?

   answer: **3 out of 7**

4. A bag contains 6 number tiles. The numbers in the bag are 3, 7, 8, 9, 13, and 15. If you randomly draw one tile from the bag, what is the probability of picking an odd number?

   answer: **5 out of 6**

5. Mr. Jones has a hot air balloon. Because the basket is so small, he can take one child for a ride with him. Mary, Carla, John, Lynda, Peter, and Janessa all want to go. They each write their name on a piece of paper and place them in a hat. Mr. Jones randomly selects one child to go with him.

   What is the probability that he will select a boy? answer: **1 out of 3**

   What is the probability that he will select a girl? answer: **2 out of 3**

6. John and Jackie are rolling a die. John wins if he rolls a number higher than 4. Jackie wins if the number rolled is 4 or less.   Is this game fair? Explain.

   This is not fair because John has to roll a 5 or 6, which means he only has a 1 out of 3 chance of winning. Jackie has to roll a 4, 3, 2, or 1, which means she has a 2 out of 3 chance of winning.