

- 1.) A bag contains 10 red marbles, and 5 blue marbles. A marble is drawn at random, replaced and then a second marble is drawn. Find the probability of choosing a red marble and then a blue marble.

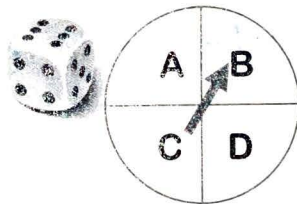
$$P(\text{red and blue}) = \frac{10}{15} \cdot \frac{5}{15} = \frac{50}{225}$$

- 2.) A bag contains 10 red marbles, and 5 blue marbles. A marble is drawn at random, replaced and then a second marble is drawn. Find the probability of choosing two red marbles.

$$P(\text{red and red}) = \frac{10}{15} \cdot \frac{10}{15} = \frac{100}{225}$$

- 3.) A die is rolled and a spinner is spun. Find the probability of rolling a 5 and spinning and landing on the letter A.

$$P(5 \text{ and } A) = \frac{1}{6} \cdot \frac{1}{4} = \frac{1}{24}$$



### Review It!

- 4.) If one letter is chosen randomly from the word **APPLE**, what is the probability that the letter chosen is the letter P?

$$P(P) = \frac{2}{5}$$

- 5.) The set of all possible outcomes of an experiment is called a(n) \_\_\_\_.

- A event
- B outcome
- C sample space
- D experiment

**TURN OVER →**

#6-9 The PTA is having raising money by selling Grand Avenue t-shirts. The t-shirts come in 3 sizes small, medium and large. The t-shirts are available in 2 colors: grey and green.

6.) Make a tree diagram to show all of the possible outcomes.



7.) List the sample space.

$\{SGra, SGre, MGra, MGre, LGra, LGre\}$

8.) How many outcomes are possible? 6

9.) Vinny's pizza offers the choice of 3 types of crust and 6 different toppings. How many 1 crust and 1 topping pizzas are possible?

3 · 6 = 18 combinations