

Probability Basics

Name: _____

Date: _____ Score: _____

UNIT TOPICS

- * Probability = favorable outcomes / total outcomes
- * Theoretical vs. experimental probability
- * Simple and compound events

PRACTICE PROBLEMS - Show all work

1. A bag has 3 red, 2 blue, 5 green marbles. $P(\text{red}) = \underline{\hspace{2cm}}$
2. A bag has 3 red, 2 blue, 5 green marbles. $P(\text{blue}) = \underline{\hspace{2cm}}$
3. A fair coin is flipped. $P(\text{heads}) = \underline{\hspace{2cm}}$
4. A die is rolled. $P(\text{rolling a 4}) = \underline{\hspace{2cm}}$
5. A die is rolled. $P(\text{rolling an even number}) = \underline{\hspace{2cm}}$
6. A spinner has 4 equal sections: red, blue, green, yellow. $P(\text{red or blue}) = \underline{\hspace{2cm}}$
7. You flip a coin 20 times and get 12 heads. Experimental $P(\text{heads}) = \underline{\hspace{2cm}}$
8. Is 12/20 close to the theoretical probability? Explain.
9. True or False: The probability of an impossible event = 1. $\underline{\hspace{2cm}}$
10. List the sample space for rolling one die: $\underline{\hspace{2cm}}$

Answers (accept equivalent responses and correct reasoning):

1. [Grade based on correct application of concept taught this week]
2. [Grade based on correct application of concept taught this week]
3. [Grade based on correct application of concept taught this week]
4. [Grade based on correct application of concept taught this week]
5. [Grade based on correct application of concept taught this week]
6. [Grade based on correct application of concept taught this week]
7. [Grade based on correct application of concept taught this week]
8. [Grade based on correct application of concept taught this week]
9. [Grade based on correct application of concept taught this week]
10. [Grade based on correct application of concept taught this week]