Probability Quiz

1. The probability of an impossible event is:
   A. 0
   B. 0.5
   C. 1
   D. Undefined

2. The sum of the probabilities of all the elementary events of an experiment is:
   A. 0
   B. Less than 1
   C. 1
   D. More than 1

3. If two coins are tossed simultaneously, the probability of getting at least one head is:
   A. 1/4
   B. 1/2
   C. 3/4
   D. 1

4. In a single throw of a die, the probability of getting a prime number is:
   A. 1/2
   B. 1/3
   C. 1/6
   D. 2/3

5. An event having only one outcome of a random experiment is called a(n):
   A. Compound event
   B. Impossible event
   C. Simple event
   D. Sure event

6. Two events A and B are mutually exclusive if:
   A. $P(A) + P(B) = 1$
   B. $P(A) + P(B) > 1$
   C. $P(A \cap B) = 0$
   D. $P(A \cap B) > 0$

7. The probability of an event that is certain to happen is:
   A. 0
   B. 0.5
   C. 1
   D. Undefined

8. The odds in favor of an event A are 3:2. What is the probability of A?
   A. 3/5
   B. 2/3
   C. 2/5
   D. 5/3

9. If P(E) represents the probability of an event E, then $0 \leq P(E) \leq 1$. This is known as:
   A. Probability axiom
   B. Probability theorem
   C. Probability range
   D. Probability law

10. The probability of getting a number greater than 4 in a single roll of a six-sided die is:

A. 1/3
B. 1/2
C. 1/6
D. 2/3

11. If the probability of winning a game is 0.09, what is the probability of losing the game?
A. 0.91
B. 0.09
C. 0.81
D. 1.00

12. A bag contains 5 red balls and 7 green balls. What is the probability of drawing a green ball?
A. 5/12
B. 7/12
C. 7/5
D. 12/7

13. When two dice are rolled, what is the probability of getting a sum of 9?
A. 1/9
B. 1/6
C. 4/36
D. 1/12

14. A card is drawn at random from a standard deck of 52 cards. What is the probability that the card is a queen?
A. 1/13
B. 1/12
C. 4/52
D. 1/4

15. An event E is independent of itself if and only if P(E) is:
A. 0 or 1
B. Exactly 1/2
C. Less than 1/2
D. More than 1/2

16. A jar contains 3 red, 2 blue, and 5 green marbles. If a marble is drawn at random, what is the probability that it is not green?
A. 2/5
B. 1/2
C. 5/10
D. 3/5

17. If events A and B are independent, the probability of both events occurring is given by:
A. P(A) + P(B)
B. P(A) - P(B)
C. P(A) × P(B)
D. P(A) / P(B)

18. In a batch of 8 batteries, 3 are defective. If one battery is chosen at random, what is the probability it is not defective?
A. 5/8
B. 3/8
C. 3/5
D. 8/5

19. The probability

of selecting a red card or a king from a standard deck of cards is:

A. 26/52
B. 28/52
C. 2/52
D. 4/52

20. A bag contains 4 white, 5 red, and 6 black balls. A ball is drawn at random. What is the probability that it is either red or black?

A. 5/15
B. 9/15
C. 11/15
D. 6/15

Probability Quiz Answer Key

1. A
2. C
3. C
4. A
5. C
6. C
7. C
8. A
9. A
10. A
11. A
12. B
13. C
14. A
15. A
16. D
17. C
18. A
19. B
20. C

And that completes the quiz set for the "Probability" chapter. If you need further assistance or more quizzes, feel free to ask!