**Probability**

***COINS***

1. When 2 coins are tossed together,what is the probability of getting   
    **{HH, TT, TH, HT}**
2. At Least 1 head
3. At Least 2 heads
4. At Most 1 head
5. At Most 2 heads
6. Exactly 1 head
7. Exactly 2 heads
8. When 3 coins are tossed together. What is the probability of getting

**{HHH, TTH, THT, HTT, TTT, HHT, HTH, THH}**

1. At Least 1 Head
2. At Least 2 Heads
3. At Least 3 Heads
4. At Most 1 Head
5. At Most 2 Heads
6. At Most 3 Heads
7. Exactly 1 Head
8. Exactly 2 Heads
9. Exactly 3 Heads
10. None is Head
11. When 5 unbiased coins are tossed, what is the probability that they get
12. Exactly 3 heads
13. At Least 3 heads
14. At Most 3 heads

***DICE***

1. When a dice is rolled. What is the probability of getting (1,2,3,4,5,6)

a) a prime number

b) even number

c) number less than four

d) multiple of 3

e) ≥ 2

1. Two dice are thrown simultaneously. Find the probability of:

(a) getting a sum of 8

(b) getting sum ≤ 3

(c) getting sum ≤ 10

(d) getting a total of at least 10

(e) getting sum of at most 4

(f) getting sum divisible by 5

(g) getting a multiple of 3 as the sum

(h) getting a doublet

(i) getting 6 as a product

(j) getting an even number as the sum

(k) getting a prime number as the sum

(l) getting a multiple of 2 on one die and a multiple of 3 on the other die

(m)getting difference of the numbers as

***CARDS***

1. From a pack of 52 cards, if one card is selected at a time, what is the probability that it is
2. Face card
3. Face card of red color
4. Face card of heart
5. Queen
6. King of diamond
7. Honor card
8. Number 10
9. Number 6 of spade
10. Honor card of black color
11. King of red color
12. Number 2 of black color
13. Ace of spade

1. What is the probability of getting a number as

a) Five of Spades or five of Clubs?

b) Queen of the club or a king of heart?

1. What is the probability of drawing a card from a deck which is either a king or a Diamond card?
2. From a pack of 52 cards, two cards are drawn together at random. What is the probability of both the cards being kings?
3. Two cards are drawn together from a pack of 52 cards. The probability that one is a spade and one is a heart, is.
4. Two cards are drawn at random from a pack of 52 cards. What is the probability that either both are Red or both are queens?

***BALLS***

1. A bag contains 4 black, 5 yellow and 6 green balls. Three balls are drawn at random from the bag. What is the probability that
2. all of them are yellow?
3. 3 balls of different color balls?
4. 3 balls are not the same color?
5. at least 1 is a black ball?
6. None of the balls drawn is green?
7. There are 10 prizes and 25 blanks in a lottery. If John has taken a lottery, what is the probability for him to get a prize?
8. There are two bags A and B. Bag A contains 2 white and 3 black balls. Bag B contains 3 white and 4 black balls. A bag is chosen at random. What is the probability that the ball drawn is white?
9. A speaks the truth 3 out of 4 times, and B 5 out of 6 times : what is the probability that they will contradict each other in stating the same fact?