

1. A parameter is a characteristic of
 - a) Population
 - b) Sample
 - c) Both (a) and (b)
 - d) (a) or (b)
2. As the sample size increases, standard error
 - a) Increases
 - b) Decreases
 - c) Remains constant
 - d) Decreases proportionately.
3. A population comprises 5 members. The number of all possible samples of size 2 that can be drawn from it with replacement is
 - a) 100
 - b) 15
 - c) 125
 - d) 25
4. The criteria for an ideal estimator are
 - a) Unbiasedness, consistency, efficiency and sufficiency and minimum variance
 - b) Unbiasedness, expectation, sampling and estimation
 - c) Estimation, consistency, sufficiency and efficiency
 - d) Estimation, expectation, unbiasedness and sufficiency.
5. The most commonly used confidence interval is
 - a) 95 percent
 - b) 90 percent
 - c) 94 percent
 - d) 98 percent
6. A simple random sample of size 16 is drawn from a population with 50 members. What is the SE of sample mean if the population variance is known to be 25 given that the sampling is done with replacement?
 - a) 1.25
 - b) 6.25
 - c) 1.04
 - d) 1.56
7. A random sample of a group of people is taken and 120 were found to be in favor of liberalizing licensing regulations. If the proportion of people in the population found in favor of liberalization with 95% confidence lies between 0.683 and 0.817, then the number of people in the group is
 - a) 140
 - b) 150
 - c) 160
 - d) 175
8. A _____ estimate is a single number
 - a) point
 - b) interval
 - c) both
 - d) none
9. Finite population multiplier is
 - a) square root of $(N-1)/(N-n)$
 - b) square root of $(N-n)/(N-1)$
 - c) square of $(N-1)/(N-n)$
 - d) square of $(N-n)/(N-1)$
10. The number of subsets of a set containing n elements is
 - a) 2^n
 - b) 2^{-n}
 - c) N

- d) None of these
11. The null set is represented by
- $\{ \phi \}$
 - $\{0\}$
 - Φ
 - None of these
12. If $A = \{1, 2, 3, 5, 7\}$, and $B = \{x^2 : x \in A\}$
- $n(b) = n(A)$
 - $n(B) > n(A)$
 - $n(A) = n(A)$
 - $n(A) < n(B)$
13. "is smaller than" over the set of eggs in a box is
- Transitive (T)
 - Symmetric (S)
 - Reflexive (R)
 - Equivalence (E)
14. In a group of 20 children, 8 drink tea but not coffee and 13 like tea. The number of children drinking coffee but not tea is
- 6
 - 7
 - 1
 - None of these
15. Given $A = \{2, 3\}$, $B = \{4, 5\}$, $C = \{5, 6\}$ then $A \times (B \cap C)$ is
- $\{(2, 5), (3, 5)\}$
 - $\{(5, 2), (5, 3)\}$
 - $\{(2, 3), (5, 5)\}$
 - None of these
16. At a certain conference of 100 people there are 29 Indian women and 23 Indian men. Out of these Indian people 4 are doctors and 24 are either men or doctors. There are no foreign doctors. The number of women doctors attending the conference is
- 2
 - 4
 - 1
 - None of these

Approved

By DC SIR at 13 Dec 14 10:34