



کُد سری سؤال: یک (۱)

حضرت علی(ع): ارزش هر کس به میزان دانایی و تخصص اوست.

زمان آزمون (دقیقه): تستی: ۹۰ تشریحی: --

تعداد سوالات: تستی: ۳۰ تشریحی: --

نام درس: زبان تخصصی

رشته تحصیلی / کُد درس: آمار / ۱۱۱۷۰۳۰

مجاز است.

استفاده از: --

**A: Choose the correct answer for each sentence:**

1. There is always some chance that the results based on the sample do not represent the .....  
a. population                      b. truth                      c. data                      d. correlation
2. Descriptive statistics is mainly concerned with .....  
a. statistical evaluation and making generalizations  
b. summary calculations and graphical displays  
c. logical deduction and thorough conclusions  
d. making inferences and decision making
3. Sample frequency distribution is.....  
a. the resulting summary for the inspection times  
b. grouping data into contiguous blocks  
c. manipulating data in meaningful fashion  
d. the falling of each interval into observation
4. The mean is inappropriate for..... data.  
a. Ordinal                      b. ratio                      c. interval                      d. scale
5. An .....is any collection of an experiment.  
a. Event                      b. experimental                      c. encounter                      d. idea
6. An entire group of different types of multiple mean comparisons is called.....  
a. ANOVA                      b. t – test                      c. sign test                      d. non parametric test
7. A process involving a series of trials with two complementary outcomes is called..... the process.  
a. Bernouli                      b. Poisson                      c. Banach                      d. Gaussian
8. The..... shows the direction and strength of the relationship between two variables.  
a. association                      b. calculation                      c. correlation                      d. observation



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استفاده از:

9. This statistical formal terms,  $H_0 = \mu_1 - \mu_2 = 0$ , is referred to as ...

- a. alternative hypothesis                      b. null hypothesis  
c. expected conclusion                      d. unexpected conclusion

10. If tests are used to analyze experiments in which the dependent variable is ranks, they are called

- a. parametric                      b. nonparametric                      c. nominal                      d. ordinal

11. All members of a specified group is called .....

- a. sample                      b. data                      c. frequency                      d. population

12. A.....shape is parallelogram.

- a. block                      b. rectangular                      c. bell shaped                      d. categories

13. In symmertric distribution .....equals with mode, median.

- a. decimal                      b. fractile                      c. mean                      d. variance

14. The most frequently obtained score in the data is called.....

- a. median                      b. mean                      c. mode                      d. variance

15. A median isn't appropriate for .....data.

- a. ratio                      b. interval                      c. ordinal                      d. nomial

16. Chebysv's theorem indicates that at least..... of all population lie within  $\mu \pm k\sigma$ 

- a.  $1 - \frac{1}{k^2}$                       b.  $\frac{1}{k^2}$                       c.  $\frac{1}{k}$                       d.  $1 - \frac{1}{k}$

17. The .....unaffected by the size of the few outliers.

- a. mean                      b. variance  
c. regression model                      d. median

18. Raw scores more than the mean have .....z score.

- a. positive                      b. negative                      c. average                      d. noramal

19. A perfectly balanced coin will have a probability of a head equal to .....

- a. %5                      b. 0/5                      c. 5                      d. 50



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مجاز است.

استفاده از:

20. If A,B are .....so are A' , B'.

- a. dependent      b. independent      c. consistence      d. seperate

21. An exponential distribution has .....parameter.

- a. no      b. none      c. one      d. two

22. On a scatter plot, each individual in the data is illustated as a .....

- a. plot      b. plan      c. point      d. pattern

23. Logic inferential statistics mainly deals with

- a. treatments      b. probabilities      c. assvmptions      d. populations

24. The .....function is defiend by  $sg(x) = \begin{cases} -1 & x < 0 \\ 0 & x = 0 \\ 1 & x > 0 \end{cases}$

- a. mark      b. rank      c. moment      d. sign

25. Rejection of the null hypo thesis when it is true is called .....

- a. type II error      b. type I error      c. power function      d. sign function

26. If standard deviation is  $2\sqrt{2}$  and the sample mean is 2 what is the coefficient of variation?

- a. 1      b.  $0.91$       c.  $0.7$       d.  $1.1$

27. When there is á lack of symmetry in a probability distribution what sort of in data is occurred?

- a. unsymmetric      b. skewed      c. not – symmetric      d. kurtosis

28. What is the  $K^{th}$  moment about the mean?

- a.  $E(X^k)$       b.  $E(X-\mu)^k$       c.  $\frac{1}{k}E(X-\mu)^k$       d.  $E(X-\bar{X})^k$

29. For this distribution the mean and variance are equal?

- a. Noraml      b. Bernoli      c. Poisson      d. Geometric

30. What is the probability of rejecting the null hypothesis when it is false?

- a. Power of test      b. Type I error      b. Type II error      d. Power of the sample