

STATISTICS WORKSHEET

1. Bernoulli random variables take (only) the values 1 and 0.
Answer: true
2. Which of the following theorem states that the distribution of averages of iid variables, properly normalized, becomes that of a standard normal as the sample size increases?
Answer: Central Limit Theorem
3. Which of the following is incorrect with respect to use of Poisson distribution?
Answer: Modeling bounded count data
4. Point out the correct statement.
Answer: all the above
5. _____ random variables are used to model rates.
Answer: Poisson
6. Usually replacing the standard error by its estimated value does change the CLT.
Answer: False
7. Which of the following testing is concerned with making decisions using data?
Answer: Hypothesis
8. Normalized data are centered at _____ and have units equal to standard deviations of the original data.
Answer: 0
9. Which of the following statement is incorrect with respect to outliers?
Answers: Outliers cannot conform to the regression relationship
10. Normal Distribution?
Answer: probability bell curve
Where the mean is zero and SD is 1
11. How do you handle missing data? What imputation techniques do you recommend?
Answer: can be done in many ways for missing data techniques are cold deck imputation, regression imputation, substitution
12. What is A/B testing?
Answer:
13. Is mean imputation of missing data acceptable practice?
Answer: ignores feature correlation
14. What is linear regression in statistics?
Answer: used to predict the value of a variable based on the value of another variable
15. What are the various branches of statistics?
Answer: descriptive statistics
Data collection
Inferential statistics