1. In hypothesis testing, type II error is represented by  $\beta$  and the power of the test is  $1-\beta$  then  $\beta$  is:

# Ans - A

2. In hypothesis testing, the hypothesis which is tentatively assumed to be true is called the

# Ans - B

3. When the null hypothesis has been true, but the sample information has resulted in the rejection of the null, a \_\_\_\_\_ has been made

# Ans - D

4. For finding the p-value when the population standard deviation is unknown, if it is reasonable to assume that the population is normal, we use

# Ans - B

5. A Type II error is the error of

# Ans - C

6. A hypothesis test in which rejection of the null hypothesis occurs for values of the point estimator in either tail of the sampling distribution is called

# Ans - D

7. In hypothesis testing, the level of significance is

# Ans - B

8. In hypothesis testing, b is

# Ans - A

9. when testing the following hypotheses at an  $\alpha$  level of significance H0: p = 0.7 H1: p > 0.7 The null hypothesis will be rejected if the test statistic Z is

#### Ans - A

10. Which of the following does not need to be known in order to compute the P-value?

#### Ans - C

11. The maximum probability of a Type I error that the decision maker will tolerate is called the

# Ans - A

12. For t distribution, increasing the sample size, the effect will be on

# Ans - A

# 13. What is Anova in SPSS?

Ans - Anova in Spss, is used for examining the differences in the mean values of the dependent variable associated with the effect of the controlled independent variables, after taking into account the influence of the uncontrolled independent variables. Anova in Spss must have a dependent variable which should be metric (measured using an interval or ratio scale). Anova in Spss must also have one or more independent variables, which should be categorical in nature. In Anova in Spss, categorical independent variables are called factors. A particular combination of factor levels, or categories, is called a treatment.

# 14. What are the assumptions of Anova?

Ans - There are three primary assumptions in ANOVA:

- 1. The responses for each factor level have a normal population distribution.
- 2. These distributions have the same variance.
- 3. The data are independent

# 15. What is the difference between one-way Anova and two-way Anova?

Ans - The only difference between one-way and two-way ANOVA is the number of independent variables. A one-way ANOVA has one independent variable, while a two-way ANOVA has two.