

Quiz # 5  
Chapter 9  
**Suggested Answers**  
Econometrics 06216

Name: \_\_\_\_\_

- Choose the **MOST CORRECT** answer
  - You have 5 minutes to solve out this quiz
1. If you have an F-statistic of 0.456, and you are testing the global significance of your model, you can conclude that:
    - a. At least one of the coefficients is statistically different from zero.
    - b. **All coefficients are simultaneously equal to zero.**
    - c. At least one of the coefficients is equal to zero.
    - d. All of the above could be solved with an F-test.
    - e. None of the above.
  2. Assume you have a multiple regression model with 10 variables, if each t-test is conducted at 5%, you can affirm that:
    - a. The level combined of significance is 5%.
    - b. **The true significance level could be anything between 5% and 50%.**
    - c. The level combined of significance is 50%.
    - d. None of the above.
  3. You are testing the global significance of the model:  $Y_i = \beta_0 + \beta_1 X_i + \varepsilon_i$ , you can affirm that:
    - a.  $H_0: \beta_0 = \beta_1 = 0$
    - b. **F-statistics of the global significance is the square of the t-statistics for the slope.**
    - c. F-statistics of the global significance is the squared root of the t-statistics for the slope.
    - d.  $H_0: \beta_0 = 0$
  4. In which of the next constraints is applicable the F-test?
    - a.  **$\beta_1 \varphi = \alpha_2$ , where  $\varphi$  is a scalar.**
    - b.  $\eta_1 = \gamma_1^2$
    - c.  $\beta_2 = 1/(1 - \beta_1)$
    - d. None of the above.
  5. Another way to test coefficients when they differ between two time periods is using:
    - a. Forecasting errors
    - b. **Dummy Variables**
    - c. Variable Bias test
    - d. None of the above

