

Review Test Submission: Module 03 Week 6 gretl Assignment

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Course	2023GFA_ANA_500_02 Foundations of Data Analytics
Test	Module 03 Week 6 gretl Assignment
Started	10/6/23 2:28 AM
Submitted	10/6/23 2:49 AM
Due Date	10/8/23 11:59 PM
Status	Completed
Attempt Score	75 out of 100 points
Time Elapsed	20 minutes
Instructions	<p>The online portion of this gretl assignment has a variety of types of questions; multiple choice, fill in the blank, true/false, etc. Please select the choice that best answers the question or enter a value rounded to two decimal places unless otherwise instructed. If you have any questions just ask!</p> <p>If you didn't already download it, here is a copy of the Word document associated with this week's assignment.</p> <p>mphModule 3 Week 2, gretl 6 ANA 500.docx</p>

Question 1

10 out of 10 points

Which independent variables are NOT statistically significant in Model 2? Select all that apply.

Question 2

10 out of 10 points

Most of the independent variables are significant at the 10% level, i.e. . True or False?

Question 3

10 out of 10 points

Having a confidence level of 0.1 means that when sampling there is more likely that the mean will fall within the confidence interval than if the confidence level were 0.01. (Hint, if you are unsure consider the solution to Example 8.4 in your OpenStax Introductory Statistics textbook.) True or False?

Question 4

0 out of 10 points

The standard error of regression, which is different than the standard error of the mean, represents the average distance that observed values are from the regression line of the model. The standard error of regression in Model 2 is preferred to the standard error of regression in Model 1 because it reflects more precision and/or less distance on average between the computed regression line that represents the model and the actual, observed values of the data. True or False?

Question 5

5 out of 5 points

First, eliminate the independent variable "nox" from the model and enter the resulting R-squared value. With "nox" removed R-squared equals _____.

Question 6

5 out of 5 points

Next, replace "nox" in the model and remove the independent variable "lstat". With "lstat" removed R-squared equals _____.

Question 7

5 out of 5 points

Considering our original multivariable model, Model 2, let's remove several independent variables and see if that makes a bigger difference. This time remove "nox," "lstat," "black," and "crim". With those independent variables removed the R-squared value equals _____.

Question 8

5 out of 5 points

With the independent variable "RM" removed the R-squared value of the model (in this case Model 6) is _____.

Question 9

5 out of 5 points

The new model built when RM was removed has changed the significance of the other independent variables, e.g. lstat, which now has a P-value of (select the best answer below):

Question 10

5 out of 5 points

Now, if we also remove the independent variable "lstat" the R-squared value of the model is _____.

Question 11

0 out of 5 points

Just as the R-squared value indicated more or less precision in our regression model, the standard error of regression or S.E. of regression values indicated consistently, respective more or less distance between the regression line of the model to actual, observed data values. True or False?

Question 12

5 out of 5 points

If we include the independent variables "RM," "AGE," "TAX," and "PTRATIO" in our model we will still have an R-squared value (slightly) greater than 0.80. True or False?

Question 13

0 out of 10 points

Consider the slope coefficients of the model when "RM," "AGE," "TAX," and "PTRATIO" are included. Not including the intercept, which slope has the greatest effect on the slope of the regression line representing our model? Enter your computed value for that slope coefficient.

Question 14

10 out of 10 points

The value of the intercept, i.e. -41.56, means that the regression line has a steep, negative slope. True or False?

