

BSc in Export Agriculture
Fourth Year First Semester Examination – July/ August 2018

Econometrics (EAG 402-2)

Section I – Essay Questions

Instructions:

Answer **all** questions in the given booklet.

No. of questions : Two (02)

No. of pages : Two (02)

Time : One (01) hour

Total marks allocated : 60%

01.

- (I) What is meant by Data? (08 marks)
- (II) Distinguish between the followings;
- a) Panel Data and Pooled Data (08 marks)
 - b) Primary Data and Secondary Data (08 marks)
 - c) Cross Sectional Data and Time Series Data (08 marks)
- (III) Briefly explain the following types of data
- a) Continuous (05 marks)
 - b) Discrete (05 marks)
 - c) Nominal (05 marks)
 - d) Ordinal (05 marks)
 - e) Ratio (05 marks)
 - f) Interval (05 marks)
- (IV) List three graphical and/or tabular techniques to present for each of the following data types
- a) Nominal data (09 marks)
 - b) Interval data (09 marks)
- (V) provide two practical examples for each of the following data types
- a) Primary (04 marks)
 - b) Secondary (04 marks)
 - c) Panel data (04 marks)
 - d) Time series data (04 marks)

- e) Pooled data (04 marks)

02.

(I) Distinguish between;

- a) Correlation and Regression
- b) Regressand and Regressor
- c) OLS estimator and Maximum Likelihood Estimator
- d) R^2 and Adjusted R^2

(II)

(III) What are the assumptions in OLS regression?

(IV) Write short notes on the followings; (Hint: You should briefly explain how to correct each issue)

- a) Autocorrelation
- b) Multicollinearity
- c) Heteroscedasticity

(V) Suppose someone has presented the following regression results for your consideration

$$\hat{Y}_t = 2.6911 - 0.4795X_t$$

Where,

Y = Coffee consumption in Sri Lanka (cups per person per day)

X = Retail price of coffee (rupees per kilogram)

t = Time period

- a) Is this a time series regression or cross-sectional regression?
- b) Sketch the regression line
- c) What is the interpretation of the intercept in this example? Does it make economic sense?
- d) How would you interpret the slope coefficient?

[End of Section II]