

School of Distance Education, University of Kerala
M.Com. (II- SEMESTER)
Assignment Topics & Case Analysis (2017 Admission)

Course Code: CO2 23
Title: QUANTITATIVE TECHNIQUES
Assignment Code: CO2-23/SDE-C/2017-18
Assignment Coverage: All Modules
Maximum Marks: 15

Attempt any three topics each in 4-5 pages

1. Discuss Theory of Estimation.
2. Explain Binomial, Poisson and Normal distributions
3. Explain method of least square in regression.
4. Describe F test and t test.
5. Explain the procedure for testing hypothesis.

Course Code: CO2 23
Title: QUANTITATIVE TECHNIQUES
Case analysis Code: CO2-23/SDE-C/2017-18
Coverage: All Modules
Maximum Marks: 10

Attempt all the case each in 4-5 pages

1. The quantity of a raw material purchased by a company at the specified prices during the 12 months of 2016 is given:

Month	Jan	Feb	March	April	May	June	July	Aug	Sep	Oct	Nov	Dec
Price	96	110	100	90	86	92	112	112	108	116	86	92
(Per Kg)												
Quantity	250	200	250	280	300	300	220	220	200	210	300	250
(Per Kg)												

- a) Find the regression equations based on above data.
 - b) Estimate the approximate quantity likely to be purchased if the price shoots up to Rs. 124 per kg.
 - c) Obtain the coefficient of correlation between the price prevailing and quantity demanded.
2. Le Tech International ltd is a leading manufacturer of cylinder liners. The products are mainly rejected due to defects arising in machining section and casting section. The defects in casting section are generally cracks, hard, porosity etc. The defects in machining section are generally, undersize of outer diameter and over size of inner diameter, collar, width over size etc. Hence it is necessary to reduce the rework due to defects in casting and machining section and to improve the quality of product. To improve its sales in market, Le Tech is focusing its business strategy towards achieving the good quality products and operational efficiency by improving productivity and reducing internal costs.
 - 1) State the right quality control technique to improve the quality of the products.
 - 2) How the company can improve overall efficiency of the system in the section concerned.
 - 2) State the possible ways of maximizing output per section with less defects.