

QP Code: D143688	Total Pages: 1	Name:
		Register No:
FOURTH SEMESTER (CUFYUGP) DEGREE EXAMINATION, APRIL 2026		
ECONOMICS/DEVELOPMENT ECONOMICS/ECONOMETRICS AND DATA MANAGEMENT/ECONOMICS WITH FOREIGN TRADE /ECONOMICS WITH ISLAMIC FINANCE		
ECO4CJ205 Analytical Tools for Economics - II		
2024 Admission Onwards		
Maximum Time: 2 Hours		Maximum Marks: 70
Section A		
All Questions can be answered. Each Questions carries 3 marks (Ceiling: 24 marks)		
1	Distinction between null Hypothesis and alternative hypothesis.	
2	Evaluate the importance of sampling distribution in statistical inference.	
3	What is a simple hypothesis in statistics?	
4	Explain sample point and sample space.	
5	What is interval estimation in statistics?	
6	Define exponential distribution. Write down any two applications in statistical analysis.	
7	Critically examine the limitations of point estimation.	
8	Distinction between Sample Statistic and Population Parameter.	
9	What is a large sample in statistics?	
10	What is the standard error in statistics?	
Section B		
All Questions can be answered. Each Questions carries 6 marks (Ceiling: 36 marks)		
11	What are the important properties of the t-distribution?	
12	What is the Sign Test in statistics and when is it used?	
13	A population has mean $\mu = 50$ and standard deviation $\sigma = 10$. If a sample of size $n = 36$ is taken, find the probability that the sample mean is greater than 53.	
14	What is the distribution of the sample mean in statistics?	
15	Distinguish between simple and composite hypotheses in statistics.	
16	Examine Bayes theorem and state its applications in statistical analysis.	
17	Distinguish between small sample and large sample in statistics. Explain with reference to their size, distribution, and reliability.	
18	Explain the Chi-Square Test of Goodness of Fit and its main applications.	
Section C		
Answer any one. Each question carries 10 marks (1x10= 10 marks).		
19	Evaluate the importance and application of discrete probability distribution in real life scenario. Examine the key characteristics of any two discrete distributions.	
20	Explain the Ordinary Least Squares (OLS) method and discuss its main assumptions and importance in economic analysis.	