

Statistics

Global Program on Economics and Finance (Fall 2022)

Course Title	Statistics		
Credit	3	Credit Hours	48 credit hours
Course Objectives	After the course, students should learn some basics concepts and methods in statistics to analyze simple problems in business.		
Course Description	This course is an introduction to the basic concepts and procedures behind probability and statistics. Some of the topics covered are descriptive statistics, experimental design, regression, probability, discrete random variables including the binomial distribution, the normal distribution, confidence intervals, hypothesis tests for a single parameter, inference on two samples and the chi-square distribution to test goodness-of-fit and independence.		
Course Requirements: Prerequisites: Knowledge in calculus is preferred.			
Teaching Methods: Face-to-face lectures			
Course Schedule			
Credit Hours	Lecture	Readings	
4	Data and Statistics and Descriptive Statistics	Chapter 1,2	
4	Descriptive Statistics: Numerical Measures	Chapter 3	
4	Introduction to Probability	Chapter 4	
4	Discrete Probability Distributions	Chapter 5	
4	Continuous Probability Distributions	Chapter 6	
4	Midterm Review and Examination		
4	Sampling and Sampling Distributions	Chapter 7	
4	Interval Estimation	Chapter 8	
4	Hypothesis Testing	Chapter 9	
4	Inference About Means and Proportions with Two Populations	Chapter 10	
4	Inferences About Population Variances	Chapter 11	
4	Review and Final Examination		
The design of class discussion or exercise, practice, experience and so on: Homework is assigned after each class.			

Grading & Evaluation:

No more than 30% A and A- grade and no more than 1/3 overall absence. The total score includes the following three parts:

Grading Policy

Quizzes and Homework	30%
Midterm Examination	30%
Final Examination	40%

Grading Scale is as follows

Number grade	Letter grade	GPA
90-100	A	4.0
85-89	A-	3.7
80-84	B+	3.3
75-79	B	3.0
70-74	B-	2.7
67-69	C+	2.3
65-66	C	2.0
62-64	C-	1.7
60-61	D	1.0
≤59	F (Failure)	0

Teaching Materials & References:

- Statistics For Business & Economics by David Ray Anderson, Jeffrey D. Camm, James J. Cochran, Dennis J. Sweeney, Thomas Arthur Williams
- Business Statistics—A First Course, David Levine, Kathryn Szabat, and David Stephan, 7th edition (global edition)