

# EFFECTIVE: MAY 2003 CURRICULUM GUIDELINES

Α.	Division:	Instructional	Ei	fective Date:		May 2003		
В.	Department / Program Area:	Commerce & Business Admin. Business Management	Re	evision	X	New Course		
	1108	2 do neos managoment		Revision, Section(s) evised:		F,J,M,N,P,		
				ate of Previous Revision ate of Current Revision		February 2002 April 2003		
C:	BUSN 4	<b>D</b> : BUSINESS	STAT	ISTICS		<b>E</b> 3		
С.	Subject & Course No. Descript					nester Credits		
F:	Calendar Descri		ion to a	totiotica Ctudente will	loom to	o colvo muchlomo voi		
	This course will provide students with an introduction to statistics. Students will learn to solve problems using computer spreadsheets. Topics include measures of central tendency and dispersion, probability, sampling, normal and binomial distributions, confidence intervals and hypothesis testing and regression analysis. Students will not receive credit for BUSN 429 and BUSN 430.							
G:		ontact Hours to Type of Instruction	H:	Course Prerequisites	:			
	/ Learning Settings			CISY 110 and (BUSN 330 or MATH 12 or				
	Primary Methods of Instructional Delivery and/or Learning Settings: Lecture and Seminar Number of Contact Hours: (per week / semester for each descriptor)			SURVEY MATH 12 or MATH 115), and ENGLISH 12 with a grade of "C" or better, or				
				approved equivalent	•			
			I:	Course Corequisites:				
				Nil				
	Lecture:	3 Hours	J:	Course for which thi	s Cours	se is a Prerequisite		
	Seminar: 1 Hour Total: 4 Hours			BUSN 431 and MARK 483				
	Number of Weeks per Semester: 15 Weeks X 4 Hours Per Week = 60 Hours			K: Maximum Class Size:				
				35				
L:	PLEASE INDI							
	Non-Credit							
	College Credit Non-Transfer							
	X College C	redit Transfer	Re	Requested: X Granted:				
	SEE BC TRANSFER GUIDE FOR TRANSFER DETAILS (www.bccat.bc.ca)							

### M: Course Objectives / Learning Outcomes

At the end of the course, the successful student should be able to:

- 1. collect statistical data using appropriate sampling techniques;
- 2. organize statistical data and calculate measures of central tendency and variation;
- 3. calculate the probability of events when they are mutually exclusive, independent and dependent;
- 4. use binomial and normal distribution to make probability estimates;
- 5. set up confidence intervals for population means and proportions;
- 6. use sample information to test statements or claims about parameters;
- 7. use computer spreadsheets to solve statistical problems;
- 8. use simple regression to determine significance of relationship between two variables.

#### **N:** Course Content:

- 1. Descriptive Statistics: frequency distributions, graphical displays, measures of central tendency, measures of dispersion.
- 2. Probability: experiments, counting rules, assigning probabilities, events, complement, exclusion, intersection, union, addition law, conditional probability.
- 3. Discrete Probability Distributions: expected value and variance, binomial distribution.
- 4. Continuous Probability Distributions: uniform and normal probability distributions.
- 5. Sampling Distributions: random sampling, sampling distribution of sample mean and sample proportion.
- 6. Interval Estimation: means and proportions, small and large samples, determining sample size.
- 7. Hypothesis Testing: formulating and testing a research hypothesis, 1 and 2 tailed tests about sample mean and proportion, Type 1 and 2 error.
- 8. Statistical Inference with Two Populations (independent samples): interval estimation and hypothesis tests for difference between two means and between two proportions.
- 9. Computer Analysis with Excel Spreadsheets: creation of spreadsheets, histograms, frequency tables, scatter charts, interval estimates, and use of probability distribution functions.
- 10. Simple Linear Regression: least squares, model and assumption, R-Squared, prediction.

## **O:** Methods of Instruction

Lectures and seminars.

## P: Textbooks and Materials to be Purchased by Students

Anderson, D.R., Sweeney et al. Statistics for Business and Economics, Latest Ed. South-Western (Thomson).

Business Calculator: one of:

- Texas Instruments BAII+
- Texas Instruments BA35
- Hewlett Packard 10B
- Sharp EL-733a

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Q:	Means of Assessment						
	Final Exam	30%					
	Term Examinations (2-3)	40% - 50%					
	Computer Lab Test	5% - 10%					
	Assignments (6-12)	15% - 25%					
	Participation	<u>0% - 5%</u>					
		100%					
R:	Prior Learning Assessment and Recognition: specify whether course is open for PLAR						
	No.						
Course Designer(s): George Stroppa			Education Council / Curriculum Committee Representative				
Dean / Director: Jim Sator			Registrar: Trish Angus				

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