

# CAMOSUN COLLEGE School of Arts & Science Department of Mathematics & Statistics

MATH-109-005 Finite Mathematics Winter 2020

# **COURSE OUTLINE**

The course description is online @ http://camosun.ca/learn/calendar/current/web/math.html

Please note: This outline will <u>not</u> be kept indefinitely. It is recommended students keep this outline for their records, especially to assist in transfer credit to post-secondary institutions.

#### 1. Instructor Information

(a) Instructor	Leah Howard		
(b) Office hours	M 11:30-1:20 Tu 11:30-12:20 W 12:00-12:50 Th 11:30-12:20 F 11:30-1:20		
(c) Location	CBA 151		
(d) Phone	250-370-4490	Alternative:	
(e) E-mail	HowardL@camosun.ca		
(f) Website	www.leahhoward.com		

## Free Math Help is also available in the Math Lab in TEC 142.

#### 2. Intended Learning Outcomes

Upon completion of this course a student will be able to:

- 1. Solve counting problems using sets and/or the multiplication principle, and recognize and solve problems involving permutations and combinations.
- Apply the basic properties and concepts of probability to solve problems from fields such as medicine and quality control. Determine the probability distributions for random variables and calculate expected values. Where appropriate, evaluate probabilities using the binomial distribution. Explore systems evolving from one state to another using Markov chains.
- Solve linear systems of equations using techniques, including Gauss-Jordan elimination and inverse matrices.
- 4. Solve linear programming problems using a graphical approach.
- 5. Derive simple annuity formulas and use them to solve amortization problems.
- 6. Translate statements into symbolic form and vice versa. Construct truth tables for propositions, including implications. Use truth tables to verify equivalencies.

#### 3. Required Materials

- TEXTBOOK: Finite Mathematics (Custom Edition). Available in the bookstore.
- 2) CALCULATOR: Sharp EL-531 or TI-BA II Plus. These are the only calculators permitted on tests and exams. The Sharp EL-531 is recommended.

# 4. Basis of Student Assessment (Weighting)

5% Quizzes

45% Tests (3 tests at 15% each)

50% Final Exam

Quizzes: There will be a short quiz at the start of class each Tuesday, starting in

Week 2. There are no make-up quizzes. The two lowest quiz grades will be dropped. Each week's quiz will be a question based on the previous

Tuesday's lecture notes.

Tests: If a student misses a test for any reason then the weighting of that

test will shift to the final exam. There are no make-up tests.

Final Exam: A comprehensive, 3-hour final exam will take place during the final exam

period. You must write the final exam at the scheduled time and place as

per Camosun College's policy on final examinations.

#### **TENTATIVE DATES**

Test One Thurs Jan 30
Test Two Thurs Mar 5
Test Three Thurs Apr 2

# 5. Grading System

X Standard Grading System (GPA)

Competency Based Grading System

Percentage	Grade	Description	Grade Point Equivalency
90-100	A+		9
85-89	Α		8
80-84	A-		7
77-79	B+		6
73-76	В		5
70-72	B-		4
65-69	C+		3
60-64	С		2
50-59	D		1
0-49	F	Minimum level has not been achieved.	0

#### **TEMPORARY GRADES**

Temporary grades are assigned for specific circumstances and will convert to a final grade according to the grading scheme being used in the course. See Grading Policy at <a href="http://camosun.ca/about/policies/index.html">http://camosun.ca/about/policies/index.html</a> for information on conversion to final grades, and for additional information on student record and transcript notations.

Temporary Grade	Description
I	Incomplete: A temporary grade assigned when the requirements of a course have not yet been completed due to hardship or extenuating circumstances, such as illness or death in the family.
IP	In progress: A temporary grade assigned for courses that are designed to have an anticipated enrollment that extends beyond one term. No more than two IP grades will be assigned for the same course.
CW	Compulsory Withdrawal: A temporary grade assigned by a Dean when an instructor, after documenting the prescriptive strategies applied and consulting with peers, deems a student is unsafe to self or others and must be removed from the course.

## 6. College Supports, Services and Policies



#### Immediate, Urgent, or Emergency Support

If you or someone you know requires immediate, urgent, or emergency support (e.g. illness, injury, thoughts of suicide, sexual assault, etc.), **SEEK HELP**. Resource contacts @ <a href="http://camosun.ca/about/mental-health/emergency.html">http://camosun.ca/about/mental-health/emergency.html</a> or <a href="http://camosun.ca/services/sexual-violence/get-support.html#urgent">http://camosun.ca/services/sexual-violence/get-support.html#urgent</a>

#### **College Services**

Camosun offers a variety of health and academic support services, including counselling, dental, disability resource centre, help centre, learning skills, sexual violence support & education, library, and writing centre. For more information on each of these services, visit the **STUDENT SERVICES** link on the College website at <a href="http://camosun.ca/">http://camosun.ca/</a>

# **College Policies**

Camosun strives to provide clear, transparent, and easily accessible policies that exemplify the college's commitment to life-changing learning. It is the student's responsibility to become familiar with the content of College policies. Policies are available on the College website at <a href="http://camosun.ca/about/policies/">http://camosun.ca/about/policies/</a>. Education and academic policies include, but are not limited to, Academic Progress, Admission, Course Withdrawals, Standards for Awarding Credentials, Involuntary Health and Safety Leave of Absence, Prior Learning Assessment, Medical/Compassionate Withdrawal, Sexual Violence and Misconduct, Student Ancillary Fees, Student Appeals, Student Conduct, and Student Penalties and Fines.