COQUITLAM COLLEGE
Established 1982

COURSE OUTLINE

Last Revised: Fall 2020

COURSE INFORMATION

Course Title: Mathematics for Everyday Life **Course Number:** MATH 197 **Credits:** 3

Total Weeks: 14 (Fall, Spring) **Total Hours:** 39 **Course Level:** ☒ First Year ☐ Second Year
12 (Summer) ☐ New ☐ Revised Course
☐ Replacement Course

Department: Math / Statistics **Department Head:** G. Belchev **Former Course Code(s) and Number(s) (if applicable):** N/A

Pre-requisites (If there are no prerequisites, type NONE): PREC 11 (minimum grade of C-) or Foundations of Math 11 (minimum grade of C)

Co-requisite Statement (List if applicable or type NONE): NONE

Precluded Courses: N/A

COURSE DESCRIPTION

This course explores topics in mathematics that are being used in our everyday life to improve our quantitative reasoning and decision-making, as well as to develop an appreciation for the power and beauty of mathematics. A wide range of topics such as the probability of winning the lottery, the likelihood of getting a false positive for a disease, compound interest and exponential growth and statistical reasoning are investigated in this course.

LEARNING OUTCOMES

Upon successful completion of the course, students will be able to:

- Reflect on the role that mathematics has played in their lives, both past and present.

- Explore the potential role of mathematics in their future.

- Use flexible, effective, and personalized strategies to analyze and solve increasingly complex problems in situational contexts.

- Become financially literate, which supports and underpins sound financial decision making.

- Develop the perseverance and confidence to apply mathematical thinking in everyday life.

- View and navigate their world with a mathematical perspective.

- Develop a capacity for abstract thinking, which includes the critical thinking skills necessary for understanding global issues in society.

COURSE OUTLINE

INSTRUCTION AND GRADING

Instructional (Contact) Hours:

Type	Duration
Lecture	39
Seminars/Tutorials	
Laboratory	
Field Experience	
Other (s*pecify):*	
Total	39

Grading System: Letter Grades ☒ Percentage ☐ Pass/Fail ☐ Satisfactory/Unsatisfactory ☐ Other ☐

Specify passing grade: 50%

Evaluation Activities and Weighting (total must equal 100%)

Assignments: %	Lab Work: %	Participation: %	Project: %
Specify number of, variety, and nature of assignments:		*Specify nature of participation:*	*Specify nature of project:*
Quizzes/Test: 25, 25 %	Midterm Exam: 25%	Final Exam: 25%	Other: % *Specify:*

TEXT(S) AND RESOURCE MATERIALS
Provide a full reference for each text and/or resource material and include whether required/not required.

Bennett, J. O., & Briggs, W. L. (2019). *Using and understanding mathematics: a quantitative reasoning approach, 7th Edition*. Boston: Pearson.

COURSE TOPICS
List topics and sequence covered.

Week	Topic	Chapter
Week 1	Language and Notation of Mathematics	1
Week 2	Critical Thinking	1
Week 3	Problem Solving	2
Week 4	Percentage, Ratio, and Number Sense	3
Week 5	Linear and Exponential Growth	8
Week 6	Financial Mathematics	4

Week 7	Review **MIDTERM EXAM**	
Week 8	Counting and Probability I	7
Week 9	Counting and Probability II	7
Week 10	Statistical Reasoning I	5
Week 11	Statistical Reasoning II	6
Week 12	Mathematics in Art and Music	11
Week 13	Mathematics and Politics	12
Week 14	Review **FINAL EXAM**	

NOTES

1. Students are required to follow all College policies. Policies are available on the website at: Coquitlam College Policies
2. To find out how this course transfers, visit the BC Transfer Guide at: bctransferguide.ca