



**School of Access**  
**Community Learning Partnerships**  
**MATH 053 DS19**  
**Intermediate Mathematics 2**  
**Course Outline – Summer 2017**

**Instructor:** Pooja Gupta

**Class Hours:** Online

**E-mail:** [guptap@camosun.ca](mailto:guptap@camosun.ca)

**Office Hours:** By Arrangement

**Calendar Description**

This course covers the second part of ABE Intermediate Math, and provides the introductory algebra and problem-solving skills required for further study in advanced-level algebra, math for technology, and any course or program that requires Math 10. Topics include: real numbers, algebraic expressions, equations, inequalities, graphing, and polynomials.

**Prerequisite(s):** MATH 052, or assessment.

<http://camosun.ca/learn/calendar/current/web/math.html>

**Required Materials**

- (a) Reliable access to the internet
- (b) Registration with MyMathLab: <http://www.pearsonmylabandmastering.com/northamerica/mathxl/students/get-registered/index.html>
- (c) Course ID: **gupta60888**
- (d) Scientific calculator (Sharp EL531 is the recommended calculator, and is good through MATH 073)

**Course Content and Schedule**

The course is designed to be completed in one term. However, it can be completed sooner, depending on a number of factors including the students' beginning level of math skills, motivation, learning rate, and how much time they can actually study **(average 15-20 hours per week to complete in 4 months)**.

If you do not understand something seek help right away. In addition to online, resources include your family and friends, your instructor, and /or the Math Tutor Center.

Contact me via email to get permission to write the Final exam. The Final Exam must be written with an invigilator.

**Grade Calculation**<sup>1</sup>: 5 Unit Exams worth 75% and a Final Exam worth 25%

---

<sup>1</sup> As this is a mastery-based course, the goal for each test is 75% or better. If you scored less than 75% then you will need to rewrite the test before you continue. Note: Tests can only be rewritten once for a total of two times and all test scores are averaged to calculate a final mark

### Intended Learning Outcomes

(complete ABE Intermediate Mathematics learning outcomes at ABE Articulation Handbook website [http://www2.gov.bc.ca/assets/gov/education/post-secondary-education/adult-education/2016-17\\_abe\\_guide.pdf](http://www2.gov.bc.ca/assets/gov/education/post-secondary-education/adult-education/2016-17_abe_guide.pdf))

At the end of the course, students will be able to:

1. use mathematics at an ABE Intermediate level with competence
2. demonstrate knowledge and skills in using the language, principles, and operations of introductory algebra
3. apply a variety of strategies in solving math-related problems
4. apply knowledge and skills in introductory algebra to solve problems
5. use knowledge of introductory algebra as a basis for further study in Advanced-level algebra, math for technology, and other courses and programs

### Grading System

Percentage	Grade	Grade Point Equivalency
90–100%	A+	9
85–89%	A	8
80–84%	A–	7
77–79%	B+	6
73–76%	B	5
70–72%	B–	4
65–69%	C+	3
60–64%	C	2
50–59%	D	1
<50%	F	0
In Progress	IP	N/A

### Math Help Centres:

Ewing 342 (LANS) and CBA 109 (INT): These drop-in centres are available for you to work on math homework and to seek **free** help from the Instructional Assistant. See the hours posted on the math lab doors or go to <http://camosun.ca/services/help-centres/math.html>

Study Tips: It is recommended that approximately 3-6 hours per week be spent studying and completing homework for this course outside of class time. Find a study buddy to discuss math problems and **use the math labs**.

**MATH 053 DS19**  
*Intermediate Mathematics 2*  
**Course Outline – Summer 2017**

<b>MATH 053 course content</b>		
<b><i>Unit R: Arithmetic Review</i></b>		<b>(Suggested) Due Date</b>
<b>Pre-test</b>		
R.1	Place value	
R.2	Comparing numbers	
R.3	Rounding numbers	
R.4	Adding and subtracting whole numbers and decimals	
R.5	Multiplying whole numbers and decimals	
R.6	Dividing whole numbers and decimals	
R.7	Order of operations	
R.8	Operations with fractions	
R.9	Equivalent fractions	
R.10	Adding and subtracting fractions	
R.11	Multiplying fractions	
R.12	Dividing fractions	
R.13	Converting fractions and decimals	
R.14	Estimation	
<b>Post-Test (timed 3hrs.)</b>		
<b>Unit R Final Test (timed 3hrs.)</b>		<b>May 6, 2017</b>
<b><i>Unit 1: Real Numbers and Algebraic Expressions</i></b>		
<b>Pre-test</b>		
7.1	Introduction to algebra	
7.2	The real numbers	
7.3	Addition of real numbers	
7.4	Subtraction of real numbers	
7.5	Multiplication of real numbers	
7.6	Division of real numbers	
7.7	Properties of real numbers	
7.8	Simplifying expressions; order of operations	
<b>Post-Test (timed 3hrs.)</b>		
<b>Unit 1 Final Test (timed 3hrs.)</b>		<b>May 26, 2017</b>

**MATH 053 DS19**  
*Intermediate Mathematics 2*  
**Course Outline – Summer 2017**

<b>Unit 2: Solving Equations and Inequalities</b>		<b>(Suggested) Due Date</b>
<b>Pre-test</b>		
8.1	Solving equations: the addition principle	
8.2	Solving equations: the multiplication principle	
8.3	Using the principles together	
8.4	Formulas	
8.5	Applications of percent	
8.6	Applications and problem solving	
8.7	Solving inequalities	
8.8	Applications and problem solving with inequalities	
<b>Post-Test (timed 3hrs.)</b>		
<b>Unit 2 Final Test (timed 3hrs.)</b>		<b>June 26, 2017</b>
<b>Unit 3: Graphs of Linear Equations</b>		
<b>Pre-test</b>		
9.1	Graphs and applications of linear equations	
9.2	More with graphing and intercepts	
9.3	Slope and applications	
9.4	Equations of lines	
9.5	Graphing using the slope and y-intercept	
<b>Post-Test (timed 3hrs.)</b>		
<b>Unit 3 Final Test (timed 3hrs.)</b>		<b>July 16, 2017</b>
<b>Unit 4: Polynomials: Operations &amp; Factoring</b>		
<b>Pre-test</b>		
10.1	Integers as exponents	
10.2	Exponents and scientific notation	
10.3	Introduction to polynomials	
10.4	Addition and subtraction of polynomials	
10.5	Multiplication of polynomials	
10.6	Special products	
10.7	Operations with polynomials in several variables	
10.8a	Division of polynomials by a monomial	
11.1ab	Introduction to common factoring	
11.2	Factoring trinomials of the type $x^2 + bx + c$	
11.5cd	Factoring differences of squares	
<b>Post-Test (timed 3hrs.)</b>		
<b>Unit 4 Final Test (timed 3hrs.)</b>		<b>August 06, 2017</b>
<b>MATH 053 Final Exam Pre-Test</b>		<b>August 08, 2017</b>
<b>MATH 053 Final Exam Post-Test</b>		<b>August 12, 2017</b>
<b>MATH 053 FINAL EXAM</b>		<b>August 14, 2017 (date may change)</b>

### **Learning Support and Services for Students**

#### **ACADEMIC UPGRADING HELP CENTRE (CBA 109 or Ewing 342)**

<http://camosun.ca/services/help-centres/math.html>

Help with coursework, reference & learning materials library, computers & printer, quiet testing & study areas

There are many other Camosun services available to help you succeed in and out of the classroom, including education planning, learning and personal support, campus life, work and housing, and getting around. This information is available at Registration or the College web site <http://camosun.ca/services/>

### **College Policies**

#### **STUDENT CONDUCT POLICY**

The purpose of this policy is to provide clear expectations of appropriate academic and non-academic student conduct, and to establish processes for resolution of conduct issues or the imposition of sanctions for inappropriate conduct.

<http://camosun.ca/about/policies/education-academic/e-2-student-services-and-support/e-2.5.pdf>

#### **STUDENT GRADING POLICY**

The purpose of this policy is to ensure that grading and promotion are consistent and fair. <http://camosun.ca/learn/calendar/current/procedures.html>

#### **ACADEMIC PROGRESS POLICY**

The purpose of this policy is to enhance a learner's likelihood of success, and to encourage the learner to use College resources effectively.

<http://camosun.ca/about/policies/education-academic/e-1-programming-and-instruction/e-1.1.pdf>