



School of Access  
Community Learning Partnerships

## **Mathematics 034** **Fundamental Mathematics 7** Course Outline

---

This course outline is available online at

<http://faculty.camosun.ca/martinbuck/files/2011/07/MATH034.pdf>

Ω Please note: This outline will not be kept indefinitely. It is recommended students keep this outline for their records.

---

### **Calendar Description**

See the Mathematics Course Descriptions and Prerequisites at

<http://camosun.ca/learn/calendar/2011/web/math.html>

### **Course Materials:**

- a) Textbook: *Developmental Mathematics*, 6<sup>th</sup> or 7<sup>th</sup> edition, Marvin Bittinger & Judith Beecher. An Access Code for the online classroom is available for purchase online at the publisher's website -- <http://mathxl.com>.  
NOTE: The Access Code also provides access to a plethora of textbook publisher resources including animations, videos, podcasts and digital pages of the textbook.
- b) Computer System Requirements: See <http://mathxl.com/support/system.htm>.
- c) Scientific calculator: If you're headed for higher levels of math, the Sharp EL 531W model is the only calculator allowed for advanced math courses at Camosun. See [http://sharp-world.com/contents/calculator/support/guidebook/pdf/Operation\\_Guide\\_EL-531W\\_ser.pdf](http://sharp-world.com/contents/calculator/support/guidebook/pdf/Operation_Guide_EL-531W_ser.pdf) for the operation guide.

NOTE: Contact your instructor by email when you have completed the signup procedures for MathXL. He will provide you with a course id code for entry to our online classroom.

### **Important Dates**

See <http://camosun.ca/learn/calendar/current/important-dates.html>

### **Instructor Information**

Instructor -- Martin Buck

- a) Office hours: 24 hours a day and seven days a week via the online classroom. Expect a response within one school day or less. Skype and phone appointments with the instructor are also available by prior arrangement.
- b) Location: The online classroom is available to registered students at <http://mathxl.com>.
- c) Instructor's website: <http://faculty.camosun.ca/martinbuck>  
Facebook group: [Camosun Math Online](#)
- d) E-mail: [martin@lwebs.ca](mailto:martin@lwebs.ca)  
Skype: [mbuck\\_skype](#)

## Course Information

This mastery learning or competency based course is designed to be completed in one term or less. Depending on your beginning level of math skills, motivation, learning rate, and how much time you can actually devote to learning math; you may be able to complete more than one level per term. If you devote at least 15 – 20 hours per week to the course following the steps below you should have no problem completing in one term or less.

- (a) Log into <http://mathxl.com>. Be sure your browser is properly configured by clicking on the [Browser Check](#) button. You will also want to click on the [How to Enter Answers](#) tours and tip sheets for information about entering math notation. With that done, click on the **Homework and Tests** button. At the beginning of each unit are links to animations, podcasts, videos and digital pages of your text. Your first assignment for marks is the unit pre-test. The pre-test is NOT a formal test. It's a tool to help us figure out the gaps in your math learning. Take as much time as you need. As long as you do NOT submit the pre-test, you can close it down and then return to it later. Beside each question you will see a number of resources to help you master each question. Be sure to use these and any other resources, like your text, to help you master each question. Once you have submitted the pre-test, the online system will mark it and allow you to review your results. You can also click on the **Results** button at any time to review the assignments you had trouble with and figure out where you went wrong.
- (b) With the unit pre-test reviewed, return to the **Homework and Tests** area. Move on to the Section Homework and complete the assigned homework exercises. To demonstrate mastery, aim for a score of 80% or better on each homework assignment. Note: You will be assigned exercises that the pre-test identified as areas you need to work on. Be sure to keep up with the schedule identified on the course homepage and in the **Calendar** area. Work through all the online homework assignments. If you need more practice, click on the **Study Plan** button. While there are hundreds of exercises there, the ones to focus on are those with the pencil icon beside them. The icon indicates you need more work in this area. You can also see a list of assigned exercises by clicking on the **Show What I Need to Study** button. For each question, make use of the resources available to help you master each question.
- (c) With all the section homework assignments mastered at an 80% or better level, return to the **Homework and Tests** area to complete the Unit Review assignment. If you scored less than 80% on the homework assignments, you will need to contact your instructor for permission to write. Like the pre-test, there is no need to complete this in one sitting. However, this review should be completed without accessing any other resources. If you score of 80% or better, you may move right along to the Unit Test. Otherwise, return to the Study Plan area to complete the assigned exercises for this unit.
- (d) Complete the unit by writing the Unit Test. If you scored less than 80% on the Unit Review, you will need to contact your instructor for permission to write. The unit final tests will also be written online. However, they must be completed in one sitting. You will NOT be allowed to exit out and return later. While they are designed to be completed in less than an hour, you will have two hours. NOTE: You will need a stable, wired (not wireless) Internet access to complete the Unit Exams. If you find you are being denied access to complete a unit exam, you will have to make arrangements to write in one of our math labs or other supervised (invigilated) location with stable Internet access. As long as you score 75% or better, you will be able to proceed to the next unit. If you score less than 75% you will be allowed to rewrite each Unit Test *once* (for a total of two times) to achieve mastery. Note: All test scores count towards your final grade for the course.

Repeat the above process for the remaining units. There is no final exam for Math 034.

The Math 034 online course has been divided into two sections, Math 034A and Math 034B. Math 052 begins with a review of the Math 034B content. That means students who make good progress in Math 034A and are heading on to Intermediate Mathematics 052/053 may be eligible to bypass 034B and move on to Math 052. If you believe you are eligible, contact your instructor for more information.

## Assignments

The due dates for the pre-tests as well as the homework assignments and unit tests will be found on the course homepage at <http://mathxl.com>. Click on the Calendar button for specific assignment due date information. You are responsible for regularly checking the website and completing the assignments on time. Please note that the MathXL system keeps track of how much time you devote to each of the assignments. Late penalties of 10% per day may be applied for those who do not devote enough time to meet the assignment due dates.

## Tips for Success

The secret to success in math is practice, practice and practice. That means you will need to plan on spending 15 to 20 hours each week on your math. Do your homework every day. If you fall behind the schedule to complete this term, it will be very difficult to catch up. While the use of the multimedia materials of animations, podcasts and videos is optional, they can explain things in an easy to understand way. You will find links to these at the beginning of each unit under the Homework and Test button in the online classroom.

<b>Grade Calculation:</b>	Online Pre and Post-tests	20%
	Online Homework Assignments	20%
	Study Plan Exercises	10%
	* Unit Tests	50%

\* 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.

## Standard Grading System (GPA)

Percentage	Grade Description	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

## Academic Policies

For information on Camosun College's academic policies including grading and academic progress, see the webpage at

<http://camosun.ca/learn/becoming/policies.html>

## Assignments

See your online course for due dates.

Text	MATH 034A course content
	<b>Unit 1 – Whole Numbers</b>
	<b>Unit 1 Pre-test</b>
1.1	Standard notation; order
1.2	Addition and subtraction
1.3	Multiplication and division; rounding and estimating
1.4	Solving equations
1.5	Applications and problem solving
1.6	Exponential notation and order of operations
1.7	Factorizations
1.8	Divisibility
1.9	Least common multiples
	Summary and review
	Chapter test
	<b>Unit 1 Post-test</b>
	<b>Unit 1 Exam (no calculator)</b>
	<b>Unit 2 – Fraction Notation</b>
	<b>Unit 2 Pre-test</b>
2.1	Fraction notation and simplifying
2.2	Multiplication and division
2.3	Addition and subtraction; order
2.4	Mixed numerals
2.5	Applications and problem solving
2.6	Order of operations; estimation
	Summary and review
	Chapter test
	<b>Unit 2 Post-test</b>
	<b>Unit 2 Exam (no calculator)</b>
	<b>Unit 3 – Decimal Notation</b>
	<b>Unit 3 Pre-test</b>
3.1	Decimal notation, order, and rounding
3.2	Addition and subtraction
3.3	Multiplication
3.4	Division
3.5	Converting from fraction notation to decimal notation
3.6	Estimating
3.7	Applications and problem solving
	Summary and review
	Chapter test
	<b>Unit 3 Post-test</b>
	<b>Unit 3 Exam (no calculator)</b>
	<b>Unit 4 – Percent Notation</b>
	<b>Unit 4 Pre-test</b>
4.1	Ratio and proportion
4.2	Percent notation
4.3	Percent and fraction notation
4.4	Solving percent problems using percent equations
	Chapter test
	Summary and review
	Chapter test
	<b>Unit 4 Post-test</b>
	<b>Unit 4 Exam</b>

Text	MATH 034B course content
	<b><i>Unit 4 – Percent Notation</i></b>
	<b><i>Unit 4 Pre-test</i></b>
4.5	Solving percent problems using proportions
4.6	Applications of percent
4.7	Sales tax, commission, discount, and interest
4.8	Interest rates on credit cards and loans
	Summary and review
	Chapter test
	<b><i>Unit 4 Post-test</i></b>
	<b>Unit 4 Exam</b>
	<b><i>Unit 5 – Data, Graphs, and Statistics</i></b>
	<b><i>Unit 5 Pre-test</i></b>
5.1	Averages, medians, and modes
5.2	Tables and pictographs
5.3	Bar graphs and line graphs
5.4	Circle graphs
	Summary and review
	Chapter test
	<b><i>Unit 5 Post-test</i></b>
	<b>Unit 5 Exam</b>
	<b><i>Unit 6 – Measurement and Geometry</i></b>
	<b><i>Unit 6 Pre-test (Completed under supervised conditions)</i></b>
A*	Linear measures: American and metric units (*Appendixes)
B*	Weight and mass; medical applications
C*	Capacity; medical applications
D*	Time and temperature
6.2	Perimeter
6.3	Area
6.4	Circles
6.5	Volume and surface area
	Summary and review
	<b><i>Unit 6 Post-test</i></b>
	<b>Unit 6 Exam</b>