



School of Access  
Community Learning Partnerships  
**MATH 037 S16**  
*Math for Professional Cook Program*  
**Course Outline – Winter 2016**



<b>Instructor:</b> Morgan Sargent	<b>E-mail:</b> <a href="mailto:sargentm@camosun.ca">sargentm@camosun.ca</a>	<b>Phone #:</b> 250.384.3211 Ext.2233
<b>Class Hours:</b> Tu/Th 9:00-11:50	<b>Office Hours:</b> By Arrangement	

### **Calendar Description**

This course provides a brief trades-oriented review of the basic computational and problem-solving skills required for further study in the Professional Cook Foundation program. Topics include: whole numbers, fractions, decimals, proportion, percent.

**Prerequisite(s):** MATH 034, or assessment. <http://camosun.ca/learn/calendar/current/web/math.html>

### **Intended Learning Outcomes**

(complete ABE Fundamental Mathematics learning outcomes at ABE Articulation Handbook website <http://www.aved.gov.bc.ca/abe/handbook.pdf>)

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

1. demonstrate knowledge and skills in using the principles and operations of arithmetic and measurement
2. apply a variety of strategies in solving math-related problems
3. apply knowledge and skills in arithmetic and measurement to solve problems related to the Professional Cook Foundations Program
4. use knowledge of arithmetic, measurement, and applied problems as a basis for further study in the Professional Cook Foundations Program

### **Required Materials**

- (a) textbook: *Line B, Solve Mathematical Problems, Trades Common Core*
- (b) course outline: including *Applied Math Problems for the Professional Cook Program*
- (c) scientific calculator
- (d) optional supplementary materials from MATH 032/033/034



## Course Content and Schedule

### Self-paced Instructions

The course completion time will vary for each student, depending on a number of factors, including your current level of math skills, motivation, learning rate, and how much time you have to work on this course. Students generally need to spend 5–15 hours of study time per week, either at the college or at home, to complete a math course within 4 months.

The table below lists the six competencies or chapters in the Line B text that are required for the Professional Cook Foundations Program. Follow these steps to complete each competency:

1. skip the Pre-Test
2. study the explanations and examples
3. answer and check **all** questions in the order listed in the table below
4. complete all of the Professional Cook Applied Problems for that competency
5. ask the instructor for help whenever you need it

To prepare for the Final Test, write the Practice Test and review your results with the instructor.

### Basis of Student Assessment (Weighting)

The course grade is either COM (complete) or NC (not complete), and is based on the student's score on the Final Test, which covers all of the required units (**passing score 75%**).

#### Note:

Students with a record of poor attendance OR poor progress may be restricted from re-registering in Academic and Career Foundations Department courses.

### Grading System

COM	IP	NC
Complete	In Progress	Not Complete



## MATH 037 Essential Skills

(based on learning outcomes, coursework and classroom interaction)

**Numeracy:** numerical calculation and measurement (whole numbers, fractions, decimals, metric and imperial measurements, ratio and proportion, percent)

- Convert between fractions, decimals, and percents
- Add, subtract, multiply and divide rational numbers
- Solve application problems involving addition, subtraction, multiplication, and division of rational numbers
- Use order of operations
- Use the common metric and imperial units for temperature, length, volume and mass
- Convert between and within metric and imperial units using tables and/or calculators
- Read, write, interpret, compare and identify proportions and use them to solve problems involving percent, part and whole, edible portion/as purchased (EP/AP) proportions and other ratios

### Reading

- Scan for key information
- Read and correctly follow written directions
- Read a full text to understand, learn or evaluate
- Integrate and synthesize information from multiple sources
- Refer to appropriate written (hardcopy or online) resources when experiencing difficulty

### Document Use

- Interpret information in graphs or charts
- Use information from recipes and menus
- Interpret invoices, price lists, menu pricing calculations
- Use a table of contents or index to find specific information

### Writing

- Organize, record and document
- Write notes in point form

**Oral Communication**

- Follow oral instructions and explanations
- Seek or obtain information from peers and instructor

**Working with Others**

- work independently alongside others
- appropriate and respectful communication with peers and others
- receive and apply relevant feedback

**Thinking Skills**

- Apply prior learning to facilitate effective study and to integrate information from a text with background knowledge from outside the text
- Identify learning strengths
- Identify and set short and long term goals
- Maintain a personalized learning plan within an individualized educational setting
- Identify key facts and issues related to a problem
- Check that answers and solutions to problems are reasonable
- Build strategies for successfully writing math tests
- Prioritize tasks
- Use tools (calendars, agendas, checklists) to help organize tasks and for time management
- Identify, compare, contrast & critically evaluate multiple pieces of information while reading/listening/viewing

**Digital Technology**

- Use a scientific calculator
- May use online tools to communicate and to learn and practice mathematical skills

**Continuous Learning**

- Deepen understanding of skill strengths and areas in need of improvement
- Recognize preferred learning style (learning by seeing, hearing or doing)
- Try new ways of doing things
- Apply newly learned skills and knowledge



### Course Content

MATH 037 course content	Line B page #	question #		
<b>Competency B-1 – Whole Numbers</b>				
	5	1-4		
	3	1-5		
	7	1-5		
B-1 Professional Cook Applied Problems		1-10		
<b>Competency B-2 – Fractions</b>				
	15	1-4		
	17	1-4		
	20	1-4		
	21	1-5		
	11	1-20		
	23	1-15		
B-2 Professional Cook Applied Problems		1-10		
<b>Competency B-3 – Decimals</b>				
	32	1-2		
	33	1-2		
	37	1-5		
	29	1-10		
	38	1-15		
B-3 Professional Cook Applied Problems		1-10		
<b>Competency B-4 – Metric and Imperial Measurements</b>				
			46	1-2
			49	1-6
			43	1-2
			50	1-2
B-4 Professional Cook Applied Problems		1-10		
<b>Competency B-5 – Ratio and Proportion</b>				
			59	1-12
			55	1-10
			62	1-10
B-5 Professional Cook Applied Problems		1-10		
<b>Competency B-6 – Percent</b>				
			69	1-4
			73	1-4
			67	1-5
			74	1-5
B-6 Professional Cook Applied Problems		1-10		
MATH 037 Practice Test				
MATH 037 Final Test				



## Recommended Materials or Services to Assist Students to Succeed Throughout the Course

### LEARNING SUPPORT AND SERVICES FOR STUDENTS

There are a variety of services available for students to assist them throughout their learning. This information is available in the College Calendar, Registrar's Office or the College web site at:

<http://www.camosun.ca>

### STUDENT CONDUCT POLICY

There is a Student Conduct Policy. It is the student's responsibility to become familiar with the content of this policy. The policy is available in each School Administration Office, Registration, and on the College web site in the Policy Section, or the College web site at:

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

### STUDENT GRADING POLICY

A new student grading policy is in effect for students in the School of Access. This information is available in the College Calendar, Registrar's Office or the College web site at:

<http://camosun.ca/about/policies/education-academic/e-1-programming-and-instruction/e-1.5.pdf>

### ACADEMIC PROGRESS POLICY

There is an Academic Progress Policy designed to enhance a learner's likelihood of success. Students should become familiar with the content of this policy. The policy is available in each School Administration Office, Registration, and on the College web site in the Policy Section or the College web site at:

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