

### Basic Course Information

Semester:	<b>Spring 2024</b>	Instructor Name:	<b>Alison Jill Brock</b>
Course Title & #:	<b>BUS 105, Business Office Math</b>	Email:	<a href="mailto:alison.brock@imperial.edu">alison.brock@imperial.edu</a>
CRN #:	<b>20486, 21057</b>	Webpage (optional):	<b>See Canvas</b>
Classroom:	<b>20486: 3109 21057: Online</b>	Office #:	<b>3113B</b>
Class Dates:	<b>February 12 to June 7</b>	Office Hours:	<b>Wednesdays 12:45-2:45 p.m. Thursdays 9:30-11:30 a.m.</b>
Class Days:	<b>20486: Mondays 21057: Asynchronous</b>	Office Phone #:	<b>Use email</b>
Class Times:	20486: 1:00 to 4:10 p.m. 21057: Asynchronous	Emergency Contact:	<b>Tisha Nelson</b>
Units:	3	Class Format:	20486: In person 21057: Online, asynchronous

### Course Description

This course provides practice with a wide range of mathematical procedures used in various business applications. Students use a combination of estimation, ten-key calculators, and computers. Topics include a review of basic math skills, banking, invoices, markup and markdown, discounts, interest, promissory notes, and credit.

### Course Prerequisite(s) and/or Corequisite(s)

None

### Student Learning Outcomes

Upon course completion, the successful student will have acquired new skills, knowledge, and or attitudes as demonstrated by being able to (1) set up and solve business-related problems using equations to solve for an unknown quantity, (2) calculate the parts of an invoice, including discounts and a series of discounts, and (3) calculate markups and markdowns. (ILO2, ILO4)

### Course Objectives

Upon satisfactory completion of the course, students will be able to: (1) add, subtract, multiply, and divide whole numbers, (2) add, subtract, multiply and divide fractions and convert fractions to decimals, (3) add, subtract, multiply, and divide decimals and convert decimals to fractions, (4) prepare a bank reconciliation and understand the difference between blank, restrictive, and full endorsements, (5) set up and solve business-related problems using equations to solve for an unknown quantity, (6) solve percentage problems involving portion, rate, and base and find the percent increase or decrease, (7) calculate the parts of an invoice, including single discounts and a series of discounts, (8) calculate markups and markdowns and calculate prices when markups and markdowns are known, (9) calculate simple interest for loans, (10) calculate finance charges and new balance of business lines of credit, (11) use estimation to evaluate the reasonableness of an answer, and (12) use a ten-key calculator, (13) use a computer spreadsheet to perform business calculations.

### Textbooks & Other Resources or Links

Required: Brechner, Robert. Contemporary Mathematics for Business and Consumers, Cengage, 9th edition,



etextbook only. (ISBN: 978-035702-644-1) You can purchase this textbook at the Cengage.com website or anywhere else, new, used, or rented, hardcopy or electronic.

You do not need access to Cengage Unlimited. However, if you have another class using Cengage products (such as my Practical Accounting or Managerial Accounting classes), Cengage Unlimited will give you access to all Cengage online products for one semester for one price.

You are also welcome to use the 8<sup>th</sup> or 7<sup>th</sup> edition of this textbook if you can find it for a lower price. There are cheap ones out there. If you use one of these editions, the numbers on certain exercises will be different than the 9<sup>th</sup> edition, but that's generally not a problem in this class. The content is mostly the same.

### Course Requirements and Instructional Methods

This course will review basic math concepts and apply those concepts to common business math problems with an emphasis on critical thinking. Along the way you will learn how to use a 10-key calculator (only in in-person classes) and a computer spreadsheet.

**Exams:** Most of each exam will include new material covered since the last exam. A portion will be comprehensive. Exams must be completed by the due date without make-ups. (I suggest you put the dates on your calendar now.)

**Homework:** It is imperative that you keep up with assignments because the material will build throughout the semester. I will collect all assignments, and **no late work is accepted**. To earn points on the homework, **you must show all your work**. Also, **your homework must be submitted as a single pdf file, not separate files for each page**. If you earn less than full credit, I will post a comment on the assignment page.

**Discussion:** It is important that we maintain regular, effective communication in this online environment. Most weeks you will find an assignment in Canvas to participate in a discussion with your classmates. I will jump in, as needed, to answer questions.

If necessary, I may contact you directly using email, so remember to check your IVC email account regularly. If you have a personal question that you don't want to post in the discussion forum, the best way to contact me is through email. You can send me an email message using the Inbox in Canvas.

**Out of Class Assignments:** The Department of Education policy states that one (1) credit hour is the amount of student work that reasonably approximates not less than one hour of class time and two (2) hours of out-of-class time per week over the span of a semester. WASC has adopted a similar requirement.

### Course Grading Based on Course Objectives

Grade	Points
A	900-1000
B	800-899
C	700-799
D	600-699
F	0-599

Grades are posted regularly on **Canvas**. You may earn up to 1,000 points, as follows:



Points possible	Assignment/Assessment	Details
80	Discussion	5 points each X 16 assignments
220	Homework	20 points each X 11 assignments
700	Exams	175 points each X 4 exams

Late work is generally not accepted. Homework solutions are posted after the due date, so I will not award points for late homework submissions. Also, the purpose of weekly discussions is for students to connect and get answers to questions. Most students do not read discussion posts from prior weeks, so I do not award points for late discussion posts.

### Academic Honesty (Artificial Intelligence -AI)

IVC values critical thinking and communication skills and considers academic integrity essential to learning. Using AI tools as a replacement for your own thinking, writing, or quantitative reasoning goes against both our mission and academic honesty policy and will be considered academic dishonesty, or plagiarism unless you have been instructed to do so by your instructor. In case of any uncertainty regarding the ethical use of AI tools, students are encouraged to reach out to their instructors for clarification.

### Course Policies

Refer to the college catalog for attendance and academic honesty policies.

### IVC Student Resources

IVC wants you to be successful in all aspects of your education. For help, resources, services, and an explanation of policies, visit <http://www.imperial.edu/studentresources> or click the heart icon in Canvas.

### Anticipated Class Schedule/Calendar

Week	Topic	In-Class Exercises	Assignment
NO CALCULATOR			
1	Pretest, <b>Whole Numbers</b> (Ch. 1)	Chapter 1 exercises	Read Ch 1, take assessment test
2	Monday Holiday		
3	<b>Fractions</b> (Ch. 2)	Chapter 2 exercises	Read Ch 2, take assessment test
4	<b>Decimals</b> (Ch. 3)	Chapter 3 exercises	Read Ch 3, take assessment test
USING A (10-KEY) CALCULATOR			
5	<b>Exam 1</b> <b>Banking</b> (Ch. 4)	Chapter 4 exercises	Read Ch. 4, take assessment test
6	<b>Equations</b> (Ch. 5)	Chapter 5 exercises	Read Ch 5, take assessment test
7	<b>Percents</b> (Ch. 6)	Chapter 6 exercises	Read Ch 6, take assessment test, odd-numbered exercises only
	SPRING BREAK		

8	Review <b>Exam 2</b>		
<b>USING A COMPUTER SPREADSHEET</b>			
9	Introduction to Excel	Excel exercises	Complete Excel exercises
10	<b>Invoices &amp; Discounts</b> (Ch. 7)	Chapter 7 exercises	Read Ch 7, take assessment test, do #22 using Excel template and turn in on Canvas
11	<b>Markup/Markdown</b> (Ch. 8)	Chapter 8 exercises	Read Ch 8, take assessment test, skip #s 8 and 14
12	Review <b>Exam 3</b> <b>Turn in Excel project</b>		
13	<b>Payroll</b> (Ch. 9)	Chapter 9 exercises	Read Ch. 9, take assessment test
14	<b>Simple Interest</b> (Ch. 10)	Chapter 10 exercises	Read Ch 10, take assessment test, odd-numbered exercises only, skip 25, 27, 37
15	Monday Holiday		
16	Review <b>Exam 4</b>		Congratulations, you did it! :)

**\*\*\*Subject to change without prior notice\*\*\***