

Accounting
Course Number: 33:010:310
Course Title: Accounting for Engineers

COURSE DESCRIPTION

Welcome to Accounting for Engineers! The general objective of the course is to introduce students to basic financial and managerial accounting and help them identify why accounting is so relevant in today's business world – and specifically, how accounting can be useful for Engineering majors.

Accounting is the language of business. The class will start with financial accounting and provide students with an understanding of the basic concepts and standards underlying the accounting procedures used to measure business performance. Once students recognize how business performance is measured and recorded, we will discuss how that accounting information will be used in making business decisions. Students will also learn how to prepare and interpret basic financial statements – a valuable skill.

We then move on to managerial accounting and the methods by which accountants measure, analyze and report both financial and nonfinancial information to help managers make important decisions. We will study how companies make profits and how they can strive towards higher profits. The class is also designed to give students an understanding of the ways in which performance is measured and by what means targets can be achieved. We will see that accounting information aids in formulating business strategies, budgets, resource allocation decisions, cost-planning approaches and performance measurement policies.

Financial information is everywhere, and both financial and nonfinancial managers must know how to use this information to a company's best advantage. This course offers students the tools they need to understand the implications of decisions made across a range of industries and professions and to develop the ability to analyze, interpret, question and communicate the accounting information they may encounter in a business context.

Class time will be divided between PowerPoint presentations and in-class handouts, as well as discussion of some homework problems and other resources. Given the amount of material to be covered, it is important for students to at least attempt to read the chapter, prior to the class period when that chapter will be covered, to get a basic understanding of the new topics and terminology. Homework will be assigned on a regular basis which will enable you to apply and understand the concepts learned in class (see homework sections below).

COURSE MATERIALS

The Rutgers Bookstore (rutgers.bncollege.com) offers the following textbook choices:

Horngren's Financial and Managerial Accounting, 6th edition, Miller-Nobles, Mattison and Matsumura, Pearson Publishing (2018)

1. (ISBN 9780134642857) Loose leaf version of the book PLUS a MyAccountingLab access code **OR**
2. (ISBN 9780134450810) JUST the MyAccountingLab access code – this comes with an online version of the book (meaning you are not required to buy the physical book if you prefer not to)

Note: I've been told the Rutgers Bookstore will match the prices of any other source for these materials.

See the "Course Documents" tab in Canvas for complete instructions on how to register.

If purchasing the physical textbook from a source other than the Rutgers Bookstore, class members should be careful to ensure your book comes with MyLab access. Sometimes a textbook advertised as being new and supposedly packaged together with the software has been delivered to the purchaser without the required access or with a code that has expired.

Please check Canvas and your official Rutgers email account regularly for other important class materials and updates.

Online Homework Assignments (for Credit):

Homework will be assigned in MyLab for each chapter. You will be required to complete 15 (out of a possible 18) online homework assignments that will count towards your grade in this class. **It is your responsibility to check MyLab for the due dates of these assignments.** The problems correspond with those in the textbook except that they are algorithmic, **meaning you will have slightly different numbers than the problem in the actual book.** You will also have different numbers from other students in the class. You will have three attempts to complete each section of each problem before your final grade is recorded (for multiple choice questions, there will only be two attempts). Once the due date has passed, you will have access to the problems and their solutions for your reference, but you will not be able to submit any work. If you do not understand your homework assignments, please seek help!

Grace period – students can take advantage of a two-week grace period with MyAccountingLab – you have access to the text and are able to complete homework assignments. During the registration process, you should see an option to get temporary access without payment for 14 days – choose this option if you want to take advantage of the grace period. After two weeks, your account will lock – but you don't need to create a new account. Click the "Update" button when you log in, then enter your access code or use a credit card to pay.

*****For any technical support issues involving MyAccountingLab, contact their tech support which is available at their website via live chat.**

Suggested Homework Assignments (for Practice):

To further assist in your understanding of the class material, I have selected suggested homework problems for each chapter (the problems and solutions will be posted under the "Assignments" tab in Canvas each

week). These problems will not be collected, but you should complete them to ensure you have a good understanding of each chapter. Feel free to discuss these homework assignments with other students.

Course Website:

Course announcements, PowerPoint slides, handout/homework solutions and other information will be posted on the course website at <https://canvas.rutgers.edu> - use your Rutgers NETID and password to log in. **Make sure your email address in Canvas is one you use regularly and check often.**

LEARNING GOALS AND OBJECTIVES

This course will address the following relevant learning goals of the Rutgers Business School:

1. Analytical and critical thinking skills will be improved by applying knowledge acquired to the solution of exercises, problems, and mini case studies.
2. Oral communication skills will be enhanced by in-class discussion of class material.
3. Computer skills will be enhanced through use of online homework assignments, spreadsheets, and various communications through Canvas.
4. Business skills will be enhanced through acquired knowledge of costing, pricing, recording, performance evaluation and decision-making techniques. Students will gain the ability to read and interpret financial statements and use this information to make decisions.

After completing this course, a student will be able to understand

1. The basics of recording accounting transactions.
2. Revenue and cost recognition under the accrual basis of accounting.
3. Asset and liability measurement and valuation.
4. Basic financial statements.
5. The difference between management accounting and financial accounting.
6. How a business might set its long-term strategy.
7. The cost concepts and their use in everyday decisions.
8. How to use breakeven analysis as a decision-making tool.
9. Why overheads need to be included when costing products.
10. The limitations of traditional costing methods.
11. How to calculate a simple activity-based cost.
12. The process of preparing a budget.
13. The purpose of simple variance analysis.
14. How various methods of costing can impact pricing.
15. Which costs are relevant to short-term decision-making.
16. The performance of a business using financial measures.
17. How ethical and environmental issues should be taken into account.

ACADEMIC INTEGRITY

I do NOT tolerate cheating. Students are responsible for understanding the RU Academic Integrity Policy (<http://academicintegrity.rutgers.edu/>)

I will strongly enforce this Policy and pursue all violations. On all examinations and assignments, students must sign the RU Honor Pledge, which states, “On my honor, I have neither received nor given any unauthorized assistance on this examination or assignment.” I will screen all written assignments through SafeAssign or Turnitin, plagiarism detection services that compare the work against a large database of past work. Don’t let cheating destroy your hard-earned opportunity to learn. See business.rutgers.edu/ai for more details.

ATTENDANCE AND PREPARATION POLICY

Expect me to attend all class sessions. I expect the same of you. If I am to be absent, I will send you notice via email and Canvas as far in advance as possible. If you have personal problems or an extended absence, you will need to contact the Dean of Students office so that they can verify your situation – you can find more information at <http://deanofstudents.rutgers.edu/>.

PLEASE BE PROACTIVE – personal issues arise during the course and I will do my best to try and accommodate you if I believe your situation is valid. If you have an issue, see the Dean of Students as soon as possible – don’t wait until after you have done poorly on an exam or received your final grade. The best thing you can do to help yourself is to seek assistance early on.

There are no make-ups for the midterm exams. If you fail to take one of the midterms and you have a valid excuse that can be documented in writing, then the score on your other midterm and final exam will be weighted more heavily to produce your score (so one midterm would count as 37.5% and the final would be 47.5%). Please note that a **valid** excuse for missing an exam is generally some type of emergency that could not have been foreseen by the student.

It is always your decision whether or not to attend class; however, arriving late and/or leaving early is disruptive to other students. Please make every effort to arrive to class **on time**.

Inclement Weather:

In the case of inclement weather consult the University’s ‘Campus Operating Status’ at <http://campusstatus.rutgers.edu>.

CLASSROOM CONDUCT

I expect you to have respect for me as your instructor, as well as your fellow students. In general, you should leave your cell phone in your bag and pay attention throughout the class. Using your computer to take notes and follow slides is fine. However, using your computer to look at non-class related websites, check email, etc. is distracting to other students and will not be allowed during class.

EXAM DATES AND POLICIES

See the class schedule at the end of the syllabus for exam dates and the material to be covered. All examinations are “closed-book” and mandatory. The two midterms will be given during the regularly scheduled class periods, with no make-ups. If you fail to take one of the midterm exams and you have a valid excuse that can be documented in writing, then the score on your other midterm and final exam will be weighted more heavily to produce your score (so one midterm would count as 37.5% and the final would be 47.5%). Please note that a **valid** excuse for missing an exam is generally some type of emergency that could not have been foreseen by the student. If you do not have a valid excuse, you will receive a grade of zero on the exam.

Appropriate conduct is expected from you during the exam. All cell phones and other electronics must be put away during a test. You should bring a pencil, eraser and simple calculator (nonprogrammable). I will check the calculators at the beginning of the exam period – if yours is not appropriate, I will provide a simple calculator for you to use. You also need to bring a valid Rutgers photo ID so that I can verify your identity. You will have assigned seats during any tests – I will bring a seating chart to the beginning of each exam period, and this chart will tell you where your seat is. Finally, bathroom breaks are allowed during an exam only in emergency situations – in this case, you will be required to leave your phone and Rutgers ID with me when you exit the classroom. You will be required to sign out to use the bathroom and sign back in upon your return. Violation of any of these exam procedures can result in a grade of “F” on your exam, at my discretion. Certain violations (such as having a cell phone out during a test or copying from another student) may be written up under the University’s Academic Integrity Policy. Your exam will not be accepted unless you sign the Honor Pledge.

If you have a disability that influences testing procedures, please provide me an official letter from the Office of Disability Services at the start of the semester (see the Support Services section of the syllabus).

Grading:

Your final grade is determined as follows:

25%	Exam 1
25%	Exam 2
35%	Final Exam (cumulative)
15%	Online Homework Assignments

GRADING POLICY

In general, midterm grades will be posted in Canvas and returned for review by our next class meeting. Final grades will be posted in REGIS.

Warning grades will be posted in REGIS. Anyone that receives a grade below 65 on the first midterm will receive a warning.

Your final grade is not subject to negotiation. If you feel I have made an error, submit your written argument to me within one week of receiving your final grade. I am happy to correct any grades that resulted from an error on my part. However, I cannot and will not adjust grades based on potential consequences for the student such as lost scholarships, lost tuition reimbursement, lost job opportunities, or dismissals. Do not ask me to do so. It is dishonest to attempt to influence faculty in an effort to obtain a grade that you did not earn, and it will not work.

In addition, there is no extra credit in the class – your grade will be determined as outlined in the section on grading above.

Email Policy:

Every student is responsible for maintaining the current e-mail address in the Rutgers Online Directory. You can maintain your personal information at <https://personalinfo.rutgers.edu/pi>.

Students who do not have a Rutgers NETID can create one using the link <https://netid.rutgers.edu/index.htm>.

COURSE SCHEDULE

IMPORTANT: there is a lot of material here and we will not cover every section of every chapter – I will advise on this as we go through the course.

Class #	Topic/Suggested Homework
1	Chapter 1: Accounting and the Business Environment
2	Chapter 2: Recording Business Transactions
3	Chapter 2: Recording Business Transactions
4	Chapter 3: The Adjusting Process
5	Chapter 3: The Adjusting Process
6	Chapter 4: Completing the Accounting Cycle
7	Chapter 5: Merchandising Operations
8	Chapter 6: Merchandise Inventory

	Chapter 6: Merchandise Inventory
9	Chapter 14: The Statement of Cash Flows
10	Chapter 14: The Statement of Cash Flows
	Chapter 15: Financial Statement Analysis
11	Catch up/Review for Midterm 1
12	Midterm Exam 1: Chapters 1-6, 14 and 15
13	Chapter 16: Introduction to Managerial Accounting
14	Chapter 17: Job Order Costing
	Chapter 17: Job Order Costing
15	Chapter 19: Cost Management Systems: Activity-Based, Just-in-Time, and Quality Management Systems (note change in chapter order)
16	Chapter 19: Cost Management Systems: Activity-Based, Just-in-Time, and Quality Management Systems (note change in chapter order)
17	Chapter 18: Process Costing
18	Chapter 20: Cost-Volume-Profit Analysis
	Chapter 20: Cost-Volume-Profit Analysis
19	Catch up/Review for Midterm 2
20	Midterm Exam 2: Chapters 16-20
21	Chapter 21: Variable Costing
22	Chapter 21: Variable Costing
23	Chapter 22: Master Budgets
24	Chapter 22: Master Budgets
	NO CLASS:
	(note schedule change)
25	Chapter 23: Flexible Budgets and Standard Cost Systems
26	Chapter 23: Flexible Budgets and Standard Cost Systems

27	Chapter 25: Short-Term Business Decisions
28	Chapter 26: Capital Investment Decisions
	Cumulative Final Exam (some more weight will be given to Chapters 21-26)

SUPPORT SERVICES

If you need accommodation for a *disability*, obtain a Letter of Accommodation from the Office of Disability Services. The Office of Disability Services at Rutgers, The State University of New Jersey, provides student-centered and student-inclusive programming in compliance with the Americans with Disabilities Act of 1990, the Americans with Disabilities Act Amendments of 2008, Section 504 of the Rehabilitation Act of 1973, Section 508 of the Rehabilitation Act of 1998, and the New Jersey Law Against Discrimination. More information can be found at ods.rutgers.edu.

[Rutgers University-New Brunswick ODS phone (848)445-6800 or email dsoffice@echo.rutgers.edu]

[Rutgers University-Newark ODS phone (973)353-5375 or email ods@newark.rutgers.edu]

If you are *pregnant*, the Office of Title IX and ADA Compliance is available to assist with any concerns or potential accommodations related to pregnancy.

[Rutgers University-New Brunswick Title IX Coordinator phone (848)932-8200 or email jackie.moran@rutgers.edu]

[Rutgers University-Newark Office of Title IX and ADA Compliance phone (973)353-1906 or email TitleIX@newark.rutgers.edu]

If you seek *religious accommodations*, the Office of the Dean of Students is available to verify absences for religious observance, as needed.

[Rutgers University-New Brunswick Dean of Students phone (848)932-2300 or email deanofstudents@echo.rutgers.edu]

[Rutgers University-Newark Dean of Students phone (973)353-5063 or email DeanofStudents@newark.rutgers.edu]

If you have experienced any form of *gender or sex-based discrimination or harassment*, including sexual assault, sexual harassment, relationship violence, or stalking, the Office for Violence Prevention and Victim Assistance provides help and support. More information can be found at <http://vpva.rutgers.edu/>.

[Rutgers University-New Brunswick incident report link: <http://studentconduct.rutgers.edu/concern/>. You may contact the Office for Violence Prevention and Victim Assistance at (848)932-1181]

[Rutgers University-Newark incident report link: https://cm.maxient.com/reportingform.php?RutgersUniv&layout_id=7 . You may also contact the Office of Title IX and ADA Compliance at (973)353-1906 or email at TitleIX@newark.rutgers.edu. If you wish to speak with a staff member who is confidential and does **not** have a reporting responsibility, you may contact the Office for Violence Prevention and Victim Assistance at (973)353-1918 or email run.vpva@rutgers.edu]

If students who have experienced a temporary condition or injury that is adversely affecting their ability to fully participate, you should submit a request via <https://temporaryconditions.rutgers.edu> .

If you are a military **veteran** or are on active military duty, you can obtain support through the Office of Veteran and Military Programs and Services. <http://veterans.rutgers.edu/>

If you are in need of **mental health** services, please use our readily available services.

[Rutgers University-Newark Counseling Center: <http://counseling.newark.rutgers.edu/>]

[Rutgers Counseling and Psychological Services–New Brunswick: <http://rhscaps.rutgers.edu/>]

If you are in need of **physical health** services, please use our readily available services.

[Rutgers Health Services – Newark: <http://health.newark.rutgers.edu/>]

[Rutgers Health Services – New Brunswick: <http://health.rutgers.edu/>]

If you are in need of **legal** services, please use our readily available services: <http://rusls.rutgers.edu/>

Students experiencing difficulty in courses due to **English as a second language (ESL)** should contact the Program in American Language Studies for supports.

[Rutgers–Newark: PALS@newark.rutgers.edu]

[Rutgers–New Brunswick: eslpals@english.rutgers.edu]

If you are in need of additional **academic assistance**, please use our readily available services.

[Rutgers University-Newark Learning Center: <http://www.ncas.rutgers.edu/rlc>]

[Rutgers University-Newark Writing Center: <http://www.ncas.rutgers.edu/writingcenter>]

[Rutgers University-New Brunswick Learning Center: <https://rlc.rutgers.edu/>]

[Optional items that many faculty include:

- Students must sign, date, and return a statement declaring that they understand the RU Academic Integrity Policy.

- Students must sign, date, and return a statement declaring that they understand this syllabus.]