

**PORTLAND COMMUNITY COLLEGE, SYLVANIA CAMPUS**

**12000 SW 49th Ave, Portland, Oregon**

**GE 101 – Fundamentals of Engineering, Fall 2006**

**Course Syllabus, Page 1**

Instructor: Greg Gerstner, P.E. Office: ST 208d  
E-mail: ggerstne@pcc.edu Phone: 977-4878, Fax: 977-4859

Office Hours: Monday 4:30-5:30 PM  
Wednesday 4:30-5:30 PM  
Thursday 3:00-6:00 PM  
BY APPOINTMENT

Class Meets: MW Lectures **3:00 PM - 4:30 PM**: 44567 (Sylvania), 44571 (Cascades), 44568 (RC)  
T Lecture **2:00 PM – 5:00 PM**: 44569 (Sylvania)  
Th Lectures **6:00 PM – 9:00 PM**: 44562 (Sylvania), 44570 (Cascades), 44572 (RC)

Prerequisites: Placement in MTH 251, WR 115 (may be concurrent)

Text: Engineering Fundamentals: An Introduction to Engineering, Second Edition, 2005; Moaveni, Saeed.

Description: This course will consist of an introduction to various engineering disciplines and problem solving techniques.

Calculator: A scientific calculator with vector algebra and simultaneous equation solver is required (TI-89 recommended, but not required).

Homework: Homework will be assigned often and will be due one week after assigned. Individual homework problems will be accepted up to one week late, for 1/2 credit. Homework should be done using standard engineering-style solution format and should be neat and easy to follow. Homework not satisfying these requirements may be returned ungraded (for a grade of 0), at the instructor's discretion. Homework solutions should "stand alone;" that is, all the information given in the book must be repeated in the homework solution. This is usually accomplished with a "Given-Find-Solution" format. (This is NOT a requirement to copy the problem out of the book word-for-word; you may paraphrase and shorten it.)

One homework problem will be graded thoroughly (completion, accuracy, neatness, etc) and will count as 5 points, while other problems will be graded for completion and effort and will count as 1 point each. Graded homeworks will be returned to you one week after you turn them in.

Exams: There will be a midterm exam and a final exam.

Grading: Grading will be in accordance with College policy. Audit and Pass/No Pass grading must be arranged with the instructor by the end of the third week of class.

Homework	20%	A	100% - 90%
Lab Score	35%	B	89% - 80%
Midterm	20%	C	79% - 70%
Final	25%	D	69% - 60%
		F	59% and below

**Service Learning volunteer opportunities** (minimum service of 8 hours) will earn you up to 3.0% extra credit for your overall grade. This could potentially improve your grade by a letter grade. Community Energy Project <http://www.communityenergyproject.org/> will be the main organization that we will be working with this quarter. Alternative ideas can be proposed for this opportunity. Approval must be received by instructor for extra credit opportunity.

I am happy to discuss accommodations which may be required for individuals with disabilities. Please see me outside of class,

**PORTLAND COMMUNITY COLLEGE, SYLVANIA CAMPUS**  
**12000 SW 49th Ave, Portland, Oregon**  
**GE 101 – Fundamentals of Engineering, Fall 2006**  
**Course Syllabus, Page 2**

or contact the Office for Students with Disabilities at 977-4341.

Cheating: This course outline incorporates, by reference, PCC Student Rights and Responsibilities, including the Academic Integrity Policy. First time cheating will result in exam or assignment failure. Second time cheating may result in course failure and in the issuance of disciplinary sanctions from PCC.

Cheating during exams includes:

- \* Discussing questions with anyone other than the instructor or proctor
- \* Observing or attempting to observe someone else's exam
- \* Possessing crib notes or aids except as allowed by instructor
- \* Possessing exams from prior course offerings.

*Discovery of cheating is an extremely sad event for both the student and the instructor. It is the sincere hope of the instructor that this will never be an issue!*

**PORTLAND COMMUNITY COLLEGE, SYLVANIA CAMPUS**

**12000 SW 49th Ave, Portland, Oregon**

**GE 101 – Fundamentals of Engineering, Fall 2006**

**Course Syllabus, Page 3**

**Example Homework Solution**

Engineering calculation paper  
(front side only, please)

Your name

Problem number

Problem statement and sketch

Provide free body diagrams and  
other sketches as required to  
work the problem or for  
clarification.

Neat and easy-to-follow solution

Provide brief explanations of  
principles-so a person reading the  
calc will be able to follow what  
you're doing AND so that you  
can use your work as a future  
reference!

Underline, circle, or box the final  
result.

Always write governing  
equations, but individual  
algebraic steps do not need to be  
shown.