

Southern Polytechnic State University
Course Syllabus
CM 3110
Residential & Light Construction Methods
(2-2-3)
Fall 2009

Prerequisite: None

Classroom: J264

Class Periods:

Tuesday & Thursday
Lecture - 001: @ 5:00pm – 5:50pm
Lecture - 051: @ 6:00pm –6:50pm

Required Text: **Building Construction Principles, Materials, and Systems**, Madan Mehta, Walter Scarborough and Diane Arm Priest, Pearson Prentice Hall.

Other References: **International One and Two Family Dwelling Code**, International Code Council, 2006 edition (a copy is in reserve at the Library)

Grading Policy

Homework - group	35%
Quiz 1	15%
Quiz 2	15%
Quiz 3	15%
Quiz 4	15%
Class Participation & Quizzes	5%
Total	100%

The minimum cutoff for an A is 90%; for a B is 80%; for a C is 70%; and for a D is 60%. Anything below 60% is considered an F. There will be no curve on this course only straight average.** The minimum cutoff for an A is 90%; for a B is 80%; for a C is 70%; and for a D is 60%. Anything below 60% is considered an F.

**The only grade adjustment possible will be the following: If a student is on the border of a grade (59, 69, 79, 89), the class attendance record will be used to award a 1% increase to the final grade. To earn this 1% increase, students must be present at least 75% of the meeting during the semester.

Instructor: Pavan Meadati
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Office Hours: Tuesday 2:30am to 4:00pm
Thursday 2:30pm to 4:00pm
(Other times available by appointment)

Catalog Description

A study of materials, techniques, and methods used in residential construction. Foundations, wood frame and masonry structural systems, interior and exterior finishes, residential electrical, plumbing, and mechanical systems are included. Also included are residential building code requirements.

Learning Outcomes

The students will have the ability to

- 1) Differentiate material usage for different components in residential construction.
- 2) Understand specifications related to the materials used in residential construction.

- 3) Sequence the construction activities involved in residential development.
- 4) Anticipate and implement building code requirements during construction.

Class Policy

1. Students are expected to attend to lectures as well as laboratory sessions. It is expected that students will arrive to class on time and if expected to be absent from class, prior notification to the instructor is required (e-mails are accepted for this purpose). Each student is expected to behave in a professional way and participating in an alert, prepared, and relevant manner.
2. **It is expected that students will complete the readings before the class date** so that any questions that arise may be discussed fully.
3. Students will be required to work in teams for the preparations of several assignments. These will be presented in class and all team members are required to participate in the presentation of the homework.
4. Plagiarism or any form of cheating violates the academic principles and will not be tolerated.
5. Assignments will be turned in at the **beginning** of class on the date due. It is each student's responsibility to deliver late assignments to the department mailbox of the instructor.
6. Assignments that are submitted after the **beginning** of class will receive a penalty of 10%. Assignments submitted the day after the class on which they are due will receive a penalty of 25%, 2 days after 50%, 3 days after 100% off.
7. Homework should have a professional appearance, being neat, logically formatted, and legible (by computer printout). **See Specific Homework Requirements**. Adherence to this requirement is mandatory and will be strictly enforced.
8. Quizzes will be taken using the WebCT Vista system. Detailed instruction will be given at the appropriate time. Quizzes are closed book and closed notes. The Honor System applies.
9. Students will take all quizzes in the computer lab using the Web CT Vista system.
10. Make-up quizzes **WILL NOT BE GIVEN** under any circumstance.
11. Any request for grade revision must be made in writing (typed and formally written like a business letter) and delivered to the course instructor or to department personnel in person (**no email, no fax**) before the two (2) day deadline. After the two (2) day deadline, students waive their rights for appeals. The request for grade revision must include the name of the student, the assignment or test in question, description of the item in question, and the reasons for requesting the revision. Students must present their argument clearly and substantiate with evidence. The course instructor will evaluate the request and take appropriate action.
12. The course instructor reserves the right to make exceptions as he deems appropriate. (if I make an exception with one students this does not mean that I will do the same for others)
13. If you are given the opportunity to make up quiz, it must be no later than the class period after the one in which the quiz took place (no extensions).
14. Deadlines are to be met. No late work should be presented. If you turn in late work penalties apply (one day after 25% off, 2 days after 50%, 3 days after 100% off). Plan ahead, beware of "Murphy". (I am not responsible for malfunctioning computers, printers, software, or lost work)

Course Management:

WebCT Vista will be used for managing this course. All communications (email) will be done using this system. All course material will be available in the system as well as all grades for all work related to this course. Electronic communication by any other means will not be accepted. Allow **24 hrs** for a reply to your e-mail message (in some cases I will respond before, but this is not guaranteed). **E-mails that are received after 1:00pm on Fridays will be answered on the following Monday.**

Cell Phone and Personal Device Policy: The use of cell phones/PDAs/pagers during class will not be tolerated. Turn them OFF before entering class and they are to remain off until the class is completed. The classroom environment will be treated the same way as if this was a corporate meeting in a large conference room in which your boss was delivering a presentation. He/she would not tolerate their use and a "wise" young employee would probably shy away from their use in order to prevent their discharge from the firm as a result of their rudeness.

Use of cell phone/PDA/Pager/blackberry etc. during class will result in the dismissal of the student from that particular class and the receipt of a “zero” for that class’s particular assignment, exercise, exam, quiz, etc. The second use of the device during class will result in the withdrawal of the student from the class by the instructor. Withdrawal of the student by the instructor after the official “drop date” will result in the grade of a “WF” for the student.

Laptop Computers: The use of laptop computers during the classroom period will be allowed as long as the student is using the laptop to take the notes. No facebook, web surfing, IM, or E-mailing is allowed. If you use your laptop for any purpose than taking notes, you will have to leave the class and it is your responsibility to acquire missed information.

CM 3110 Course Outline

Week	Class	Date	Topics	Comments
1	1	Aug 25	Administrative Matters, Introduction	Handouts: Syllabus
	2	Aug 27	Materials: Wood (CH 11, 12)	HW#1 Materials assigned
2	3	Sep 1	Materials: Wood (CH 11, 12)	
	4	Sep 3	Materials: Concrete (Ch 18)	HW#2 Concrete Mix Design assigned
3	5	Sep 8	Video – Quality Concrete Materials: Concrete (Mix Design)	HW#1 Materials due
	6	Sep 10	Materials: Concrete (Mix Design)	
4	7	Sep 15	Materials: Masonry (CH 22 and 23)	HW#2 Concrete Mix Design due
	8	Sep 17	Materials: Masonry (CH 22 and 23)	
5	9	Sep 22	Techniques: Building Codes (CH 2) & Rough Sitework	
	10	Sep 24	Quiz 1 (Introduction, CH 11, 12, 18, 22, and 23)	HW#3 Sitework and Foundations, HW#4 Framing and Rough-ins, HW#6 Roofing, Windows, and Walls and Partitions
6	11	Sep 29	Materials: Masonry - Lab (CMU)	
	12	Oct 1	Techniques: Foundations (CH 21) (21.1, 21.2, 21.3, 21.5, 21.6, 21.7, 21.9, and 21.10)	
7	13	Oct 6	Techniques: Foundations (CH 21) (21.1, 21.2, 21.3, 21.5, 21.6, 21.7, 21.9, and 21.10)	
	14	Oct 8	Guest Speaker - I	
8	15	Oct 13	Techniques: Framing (Ch 13)	
	16	Oct 15	HW#3 Presentations	HW#3 Sitework and Foundations due
9	19	Oct 20	Quiz 2 (CH 2 & Sitework, CH 21 and 13)	
	20	Oct 22	Guest Speaker – II; Revit Modeling	HW#5 Modeling assigned
10	21	Oct 27	Modeling - Self Practice	HW#5 Modeling due
	22	Oct 29	Techniques: Roofing (CH 32)	
11	23	Nov 3	Techniques: Exterior Finishes (Ch 14, 27) (27.1, 27.2, 27.3, 27.4)	
	24	Nov 5	Techniques: Interior Finishes (Ch 14)	
12	25	Nov 10	Techniques: Walls and Partitions	
	26	Nov 12	HW#4 Presentations	HW#4 Framing and Exterior Finishes due
13	27	Nov 17	Techniques: Flooring (CH 34) & Ceilings (CH 35)	
	28	Nov 19	Techniques: Doors & Windows (CH 29)	
14	29	Nov 24	Quiz 3 (CH 32, 14 and 27)	
	30	Nov 26	Thanksgiving (NO CLASS)	
	31	Dec 1	Plumbing & Mechanical: Rough-in and Final	HW#6 Roofing, Windows, and Walls and Partitions due
15	32	Dec 3	HW#6 Presentations (Include Revit Model in Presentation)	
	33	Dec 8	Video - Estimating building materials;	
16	34	Dec 10	Quiz 4 (Walls and Partitions, CH 34, CH 35, CH 29 and Plumbing and Mechanical)	
17	35	Dec 15	NO CLASS	

Note: The outline is intended to represent the general format of class. The instructor may make changes to better suit the needs of the class.