ENGR 2110 - Creative Decisions & Design  
Spring 2013

Instructor: Dr. C. Coates, Mr. C. Williams  
Office hours: MW 1400-1500, Tu 1330-1530, F 1000-1100  
Lecture: MW, 1300 –1350, Annex 122  
Studio: Th 1430-1715, Annex 122  
AASU site:  http://www.engineering.armstrong.edu  
Georgia Tech site:  http://singhose.marc.gatech.edu/courses/me2110/  

Text: Introductory Mechanical Design Tools by William Singhose, Jeff Donnell  
http://www.lulu.com/content/3365814  


Course Objectives: To learn—fundamental procedures for solving engineering design problems—the essential details of analyzing, synthesizing, and implementing design solutions—with flexibility, adaptability, and creativity—the techniques which allow an engineer to tackle new, unsolved, open-ended problems—by doing through team and individual projects and assignments.

Course Requirements (100%)  
1) Studios 10%  
2) In-Lecture Quizzes 5%  
3) Homework 10%  
4) Mini project 20%  
5) Major project 55%  
   Planning Report and Presentation (5%)  
   Evaluation Report and Presentation (5%)  
   Competition score (15%)  
   Presentation to Judges on Competition Day (5%)  
   Final Oral Presentation (10%)  
   Final Report (15%)  
6) Give at least one oral presentation P/F  
7) Machining and mechatronics P/F  

Reality Check (1)  
This course is about—understanding alternatives—problem solving—organization—writing—presenting—getting a taste of the real world

Professionalism—  
-Projects  
-Reports  
-Attendance.  

Reality Check (2)  
Do’s
- follow instructions
- be in class on time
- be in studio on time
- pay attention
- use the tools that are presented
- read the book
- give professional presentations
- act professionally
- follow procedures (safety)
- clean-up in studio

Don’t’s
- miss class
- turn in hand written reports
- give hand written presentations
- close your minds to the alternatives
- sleep in class—wear a hat in class
- bring food into studio
- leave a mess in studio.
Attendance
You must attend all lectures, missing lectures will result in a final grade penalty as follows:
2-3 missed lectures = 1 letter grade reduction
4-5 missed lectures = 2 letter grade reduction
6-7 missed lectures = 3 letter grade reduction
8-9 missed lectures = 4 letter grade reduction

You must attend all studios—attendance will be taken—missing a studio results in a 0 for that studio grade.

Quiz policy
Periodically there will be a quiz at the end of the lecture, these will cover anything from the reading to the lecture to the studio assignments.

Homework Policy
You are expected to complete all homework assignments individually. No collaboration is permitted on homework assignments. Failure to comply with this policy will result in a zero for that particular assignment. Studio assignments are group assignments.

Honor Code
Please read http://www.armstrong.edu/Departments/student_affairs/student_affairs_honor_code for Armstrong policies and procedures regarding honor code expectations and violations.

Additional Tutoring
The COST tutoring center provides free tutoring for most lower level mathematics and science courses. (http://advise.armstrong.edu/tutorialservices.html)

OFFICE HOURS
Office hours are listed at the top of this document. You are encouraged to stop by for assistance if you feel you are having academic problems or you wish to discuss an assignment/project in more detail or you may just want to discuss engineering matters. Please stop by ONLY during office hours, if you cannot make the designated office hours, send me an email and we will make an appointment for a convenient time. It is also more efficient if you let me know ahead of time that you are coming and what is it you wish to discuss as well.

DISABILITIES OR SPECIAL NEEDS
If you have a physical, psychological, and/or learning disability that might affect your performance in this class, please contact the Disability Services Office (MCC 208, 912 344-2744) as soon as possible. The Disability Services Office will determine appropriate accommodations based on testing and medical documentation. Please notify me that you might need accommodations within two weeks of the start of the semester or two weeks of being diagnosed. Please see me privately after class or in my office. You may then choose, by notifying the instructor before the start of each exam or assignment, whether you will need any accommodation. Notification after the start of an exam or last minute notification on an assignment will not be accepted.

IMPORTANT DATES
Tests/Quizzes: See schedule
First day of classes: Monday, Jan 7
Last day to withdraw without automatic academic penalty of WF: Friday, Feb 27
Last day of classes: Monday, April 29
No class: Monday, Jan 21, MLK Day
No class: Mar 11-15 Spring Break
Final Exam: May 1 @12:00noon