

**Central Washington University / Department of Industrial and Engineering Technology
IET 161, Architectural CAD (Computer Aided Design), using AutoCAD and Revit Architecture / Winter 2012**

Catalog Description: IET 161. Introduction to architectural design and Building Information Modeling (BIM) using AutoCAD and Revit Architecture. The student will learn the basics of 2D and 3D Computer Aided Design (CAD) in an architectural and construction related format. An outcome of this class will be the production and presentation of architectural models and construction drawings. Approximately two hours of lecture, four hours laboratory with 6 hours of out of class student lab work per week.

Instructor: Chris Scarlett, Electrical Design Engineer, Adjunct Professor, freelance modeler, draftsman and small business owner. Email: cscarlett@fairpoint.net , chris@e-d-and-i.com , (scarlech@cwu.edu not used as often)

Office: Hogue 300H Wednesdays 10am until early afternoon, appointment or by phone: 509-899-2732

Textbook: [Introducing Autodesk Revit Architecture 2012](#) by Patrick Davis, et al, Wiley Publishing, Inc.

Supplies: 4GB or more flash or thumb drive

Class Website: <http://e-d-and-i.com/Classes/2012-1-IET-161/>

Learner Outcomes: (Course Objectives)

| Outcome | Assessment Strategy |
|---|--|
| 1. To gain a working knowledge in the production of architectural computer models and design documents using standard presentation formats, dimensioning and annotation techniques. | Design assignments, In Class Evaluations (ICEs), design portions of examinations and the Final Project. |
| 2. Demonstrate the ability to understand basic concepts and terminology as explained in the textbook, videos and in lecture. | Periodic assessments involving the written portions of examinations using short answers, multiple choice, matching and true/false questions. |
| 3. Demonstrate the ability to produce basic design documents under a time constraint. | Periodic assessments involving the creation and modification of design documents during In Class Evaluations (ICEs) and examinations. |

Assessments:

| Item | Percentage of total grade |
|---|---------------------------|
| Examinations (2) for 50% and the Final Project for 50%, (3 items total) | 50% |
| Design Assignments, ICEs, every week | 50% |

You will receive a letter grade as a final assessment in this class based on the following scale:

A = 92 or higher, A- = 89 – 91, B+ = 86 – 88, B = 83 – 85, B- = 80 – 82, C+ = 77 – 79, etc...

Design assignments: Student progress is evaluated weekly by the handing in of printed drawings or by In Class Evaluations ICEs usually on Tuesdays with a time constraint then submitted to the instructor. Assignments will be evaluated for completeness and timeliness and awarded a maximum point value in multiples of 10 points. Design assignments will be returned for corrections the next class meeting and can be re-submitted for re-grading by the upcoming Friday. Re-graded design assignments will receive a maximum of 80%. Missed assignments may be submitted by the upcoming Friday for a maximum of 70%. Missed assignments more than a week late will not be graded. Missed ICEs will receive a grade of 0.

Examinations: there will be 2 exams and the Final Project. Exams will be in 2 portions with a written portion consisting of short answers, multiple choice, matching and true/false questions and a design portion consisting of a small project. Both elements of the exam will be completed in class under a time constraint. Points will be split evenly between the 2 portions. The Final Project consists of a building model, drawings and a presentation.

General statement about missed class: In all fairness to the class as a whole; if you miss class for whatever reason it is your responsibility to make up the work. Class material covered once will not be repeated. If you miss an ICE or an examination without prior arrangements you will not get credit for the missed work. Exceptions will only be made under extraordinary circumstances (medical or family emergencies etc...) and only with proper documentation.

Cheating: Your work has to be unique and original to this class. If caught cheating you will fail the class.

ADA Statement: Students who have special needs or disabilities that may affect their ability to access information and or material presented in this course are encouraged to contact the ADA Compliance Officer, Director, ADA Affairs and Students Assistance on campus at 963-2171 for additional disability related educational accommodations.