A. Course Description

Credits: 4

Prerequisites: ICS 370 Software Design Models
OR
ICS 372 Object-Oriented Design and Implementation and completion of at least 24 hours of upper-division work in the major.

Lab Hours/ Weeks: Corequisites: None

Lecture Hours/ Week:

MnTC Goals: None

This course focuses on the theory and practice of effectively and efficiently building software systems that satisfy the requirements placed upon them by customers. This course gives an overview of the software lifecycle and introduces various process models used to develop software.

B. Course Effective Dates: 08/17/2014 - Present

C. Outline of Major Content Areas:

See Course Description for major content areas.

D. Learning Outcomes (General)

1. Effectively and efficiently build software systems.
2. Design and document a complete system and implement it
3. Write user manuals
4. Present work orally
5. Understand Computer Ethics issues
6. Elucidate requirements, and use those build a system that fulfills those requirements.
7. Manage the software lifecycle.
8. Select an appropriate process model for a project.
9. Verify and validate a system.
10. Manage a software project, including estimating effort, time, and resources needed.
11. Work cooperatively in a group
12. Create a project plan and execute it
13. Elicit and document system requirements

E. Learning Outcomes (MN Transfer Curriculum)

This contains no goal areas.

G. Special Information

Note: Students are responsible to both be aware of and abide by prerequisites for ICS courses for which they enroll, and will be administratively dropped from a course if they have not met prerequisites.