

Course Outline

Department of Computing Science
Faculty of Science

**COMP 4910 – 3
Computing Science Project
Winter, 2015**

Instructor:

Office:
Office Hours:

Phone/Voice Mail:

E-Mail:

Course / Calendar Description:

Students in this “capstone” project course must complete a practical design and implementation of a supervised project in an area of specialisation in Computing Science. Students will develop a ‘live’ project either working with an external client or a research project with an individual faculty supervisor.

Course Objectives / Learning outcomes:

Upon successful completion of the course, the student will demonstrate the ability to:

1. Design and implement a supervised “live” project.
2. Integrate the computing science knowledge gained at TRU in one project.
3. Work effectively in co-operation with external clients or researchers.

Prerequisites:

COMP 3520: Software Engineering
COMP 4530 Advanced Software Engineering is a co-requisite.
Fourth year standing.

Textbook: None

References:

<http://agilemanifesto.org/>
<http://www.agilealliance.org/>
<http://www.mountaingoatsoftware.com/>

<http://www.ccpace.com/resources/documents/agileprojectmanagement.pdf>
http://en.wikipedia.org/wiki/Agile_software_development
<https://www.gravitydev.com/>

Sommerville Ian, *Software Engineering*, 9th Edition, Addison Wesley; ISBN-10: 0137035152.

Lecture Topics:

N/A

Lab Topics:

N/A

ACM / IEEE Knowledge Area Coverage

Knowledge Areas that contain topics and learning outcomes covered in the course

| Knowledge Area | Total Hours of Coverage |
|---------------------------|-------------------------|
| Software Engineering (SE) | 29 |
| Project Experience | 150 |

Body of Knowledge coverage

| KA | Knowledge Unit | Topics Covered | T1 hours | T2 hours | Elective hours |
|----|--------------------------------------|--|----------|----------|----------------|
| SE | Software Processes | Usage of T1 | 2 | 0 | 0 |
| SE | Software Project Management | Usage of T2 | 0 | 2 | 0 |
| SE | Tools and Environments | Usage of T2 | 0 | 2 | 0 |
| SE | Requirements Engineering | Usage of T1; T2 | 3 | 3 | 0 |
| SE | Software Design | Usage of T1; T2 | 3 | 5 | 0 |
| SE | Software Construction | Usage of T1 | 2 | 0 | 0 |
| SE | Software Verification and Validation | Usage of T2 | 0 | 4 | 0 |
| SE | Software Evolution | Usage of T2 | 0 | 2 | 0 |
| SE | Software Reliability | Usage of T2 | 0, 1 | 1 | 0 |
| | Project Experience | Development of a semester long project | 150 | 0 | 0 |