FIT5008
Digital communications project

Unit Guide

Semester 2, 2009

The information contained in this unit guide is correct at time of publication. The University has the right to change any of the elements contained in this document at any time.

Last updated : 20 Jul 2009
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FIT5008 Digital communications project - Semester 2, 2009

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Introduction

Welcome to FIT5008 Digital communications project for semester 2, 2009. This 12-point project is a compulsory unit in the Master of Digital Communications degree program, unless the 24-point minor thesis option is taken. This unit may be taken in a single semester or over two semesters (semester 1 and/or 2).

The purpose of the project unit is to provide students with an opportunity to demonstrate that they can carry out a reasonably large piece of individual research, investigation, development and/or reporting work under supervision, and have it assessed. The project unit should be undertaken **after the completion (or close to completion) of other units in the course.**

Unit synopsis

The Digital Communications project requires a student to carry out a significant individual task in the Digital Communications field under academic supervision. The project can be conducted in a variety of topic areas, which may include: the design, development, prototype construction and testing of a significant protocol or device item in software or hardware; an in-depth investigation and report of a relevant topic in information technology; an in-depth investigation and report of an employment-based topic with innovative and/or creative solutions. The project topic and summary must be approved by the project coordinator prior to its commencement.

Learning outcomes

At the completion of the unit students will be able to understand:

1. a field of consolidated knowledge in digital communications;
2. the technology and development in the project topic area;
3. the concept of a significant individual task that involves research and innovation in digital communications.

On completion of the unit students will have knowledge of:

1. standards and protocols for the topic area;
2. trends and developments in the topic area.

On completion of the unit students will have the skills to:

1. analyse some specific protocols and technologies in the topic area and their operations;
2. evaluate the advantages and disadvantages of particular technologies in specific topic area.

Upon completion of this unit, students will have an appreciation of

1. the importance of carrying out a reasonably large piece of individual research, investigation and development and reporting under supervision;
2. the importance of report writing and its related skills.

Upon completion of this unit, students will have the ability to:

1. carry out an investigation into the selection and deployment of particular digital communications technologies;
Upon completion of this unit students will have gained experience in:

1. communicating information on one or more advanced topics in digital communications area in written and/or oral form;
2. working individually on one or more advanced topics in digital communications technology.

Contact hours

Regular meetings with supervisor(s) over the course of the unit enrolment

Workload

24 hours per week (for one semester enrolment) or 12 hours per week (for two semester enrolment) of research, laboratory work, private study and supervision meetings.

Unit relationships

Prerequisites

At least four units from the list of specified electives for the Master of Digital Communications.

Prohibitions

Other graduate project subjects.

Relationships

FIT5008 is a core unit in the Master of Digital Communications degree. It can only be replaced with a 24-point minor thesis which may consist of FIT5014 which is a 24-point unit taken over a single semester. It is also possible to take the 24-point Minor Thesis over more than one semester by enrolling in units that collectively comprise 24 points, ie FIT5016 (6 points); FIT5017 (12 points); and FIT5018 (18 points).

You may not study this unit and other graduate project subjects in your degree.
Teaching and learning method

Supervised individual research and experimentation as required by the project.

Students will work closely with their project supervisors during the entire period of the project. Students are expected to consult with and seek advice from their respective supervisors on a regular basis. In consultation with their supervisors, students are expected to produce a project proposal and project plan outlining the agreed project milestones and deliverable, and to steer the project to its completion.

Individual and group supervision and/or lecture to cover all objectives.

Timetable information

For information on timetabling for on-campus classes please refer to MUTTS, http://mutts.monash.edu.au/MUTTS/

Tutorial allocation

On-campus students should register for tutorials/laboratories using the Allocate+ system: http://allocate.cc.monash.edu.au/

Unit Schedule

<table>
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<tr>
<th>Week</th>
<th>Topic</th>
<th>Key dates</th>
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<tr>
<td>2</td>
<td>Project Proposal</td>
<td>12 noon, 31-07-2009</td>
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<tr>
<td>3</td>
<td>Supervisor's approval</td>
<td>4 PM, 07-08-2009</td>
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<td>4</td>
<td>Project Start</td>
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<td>10</td>
<td>Report Writing</td>
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<td></td>
<td>Mid semester break</td>
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<tr>
<td>13</td>
<td>Project Report</td>
<td>12 noon, 30-10-2009</td>
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Unit Resources

Prescribed text(s) and readings

As recommended by the supervisor.

Text books are available from the Monash University Book Shops. Availability from other suppliers cannot be assured. The Bookshop orders texts in specifically for this unit. You are advised to purchase your text book early.

Recommended text(s) and readings

As recommended by the supervisor.

Required software and/or hardware

Depends on the topic area, access to general software related with linux/MS Windows is necessary.

Equipment and consumables required or provided

A project room equipped with PCs running Linux/MS Windows. Out of hours access if required should be arranged with the supervisor.

Students studying off-campus are required to have the minimum system configuration specified by the Faculty as a condition of accepting admission, and regular Internet access. On-campus students, and those studying at supported study locations may use the facilities available in the computing labs. Information about computer use for students is available from the ITS Student Resource Guide in the Monash University Handbook. You will need to allocate up to 5 hours per week for use of a computer, including time for newsgroups/discussion groups.

Study resources

Study resources we will provide for your study are:

the standard resources made available to post graduate students and those available/procured specifically by your supervisor.
Assessment

Overview

The project will be assessed mainly by the project supervisor and the result approved by the course coordinator.

Faculty assessment policy

To pass a unit which includes an examination as part of the assessment a student must obtain:

- 40% or more in the unit's examination, and
- 40% or more in the unit's total non-examination assessment, and
- an overall unit mark of 50% or more.

If a student does not achieve 40% or more in the unit examination or the unit non-examination total assessment, and the total mark for the unit is greater than 44% then a mark of no greater than 44-N will be recorded for the unit.

The project will be assessed mainly by the project supervisor and the result approved by the course coordinator.

Depending on the project topic, the assessed material resulting from the project will consist of:

1. the project proposal and plan;
2. the working prototype software and/or hardware, plus appropriate supporting and operational documentation;
3. an extensive report of the results of the investigation;
4. where appropriate, an oral presentation and demonstration to the examiner(s).
5. The assessed material must commensurate with at least 300 hours of graduate-level project work. As an indication, the 12 point project leading solely to a written report would typically result in a report of at least 12,000 words.

Project guidelines and assessment details are available at:


Assignment tasks

Assignment coversheets

Assignment coversheets are available via "Student Forms" on the Faculty website:
http://www.infotech.monash.edu.au/resources/student/forms/
You MUST submit a completed coversheet with all assignments, ensuring that the plagiarism declaration section is signed.

Assignment submission and return procedures, and assessment criteria will be specified with each assignment.

• Assignment task 1
  
  Title:
  FIT5008: Digital Communications Project Report
  
  Description:
FIT5008 Digital communications project - Semester 2, 2009

Refer to project guidelines at:


Weighting:
100%

Due date:
12 noon, 30-10-2009

Due dates and extensions

Please make every effort to submit work by the due dates. It is your responsibility to structure your study program around assignment deadlines, family, work and other commitments. Factors such as normal work pressures, vacations, etc. are not regarded as appropriate reasons for granting extensions. Students are advised to NOT assume that granting of an extension is a matter of course.

Students requesting an extension for any assessment during semester (eg. Assignments, tests or presentations) are required to submit a Special Consideration application form (in-semester exam/assessment task), along with original copies of supporting documentation, directly to their lecturer within two working days before the assessment submission deadline. Lecturers will provide specific outcomes directly to students via email within 2 working days. The lecturer reserves the right to refuse late applications.

A copy of the email or other written communication of an extension must be attached to the assignment submission.

Refer to the Faculty Special consideration webpage or further details and to access application forms:

Late assignment

Requests for extensions must be made to the unit Chief Examiner at your campus at least two days before the due date. You will be asked to forward original medical certificates in case of illness, and may be asked to provide other forms of documentation where necessary.

A copy of the email or other written communication of an extension must be attached to the report submission.

Reports received after the due date will be subject to a penalty of 5% per day. Reports received later than one week (seven days) after the due date will not normally be accepted.

Return dates

Students can expect assignments to be returned within two weeks of the submission date or after receipt, whichever is later.
Appendix

Please visit the following URL: http://www.infotech.monash.edu.au/units/appendix.html for further information about:

- Continuous improvement
- Unit evaluations
- Communication, participation and feedback
- Library access
- Monash University Studies Online (MUSO)
- Plagiarism, cheating and collusion
- Register of counselling about plagiarism
- Non-discriminatory language
- Students with disability
- End of semester special consideration / deferred exams