

# FIT3107 Advanced programming for database applications

# Unit Guide

Semester 2, 2011

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: 22 Aug 2011

# Table of Contents

FIT3107 Advanced programming for database applications - Semester 2, 2011.	1
Mode of Delivery.	
Contact Hours	
Workload	
Unit Relationships	1
Prohibitions.	
Prerequisites	
Chief Examiner	
Campus Lecturer.	
<u>Clavton</u>	1
Tutors.	
Clayton	
Academic Overview	3
Learning Objectives	
Graduate Attributes	
Assessment Summary	
Teaching Approach	
Feedback	
Our feedback to You	4
Your feedback to Us	4
Previous Student Evaluations of this unit.	4
Required Resources	
Unit Schedule	5
Assessment Requirements	
Assessment Policy	
Assessment Tasks	
Participation	6
Examinations	7
Examination 1	7
Assignment submission	7
Extensions and penalties	7
Returning assignments	7
Other Information.	
Policies	
Student services	8

# FIT3107 Advanced programming for database applications - Semester 2, 2011

This unit is designed for students who wish to extend their programming abilities in developing relatively large database applications. An integrated system of significant size will be developed using the current industry standard software. Topics covered include the principal aspects of database development and applications, advanced queries, customising forms and professional reporting, business graphics, importing and exporting data, internet applications, debugging and error-handling security and system documentation.

# Mode of Delivery

Clayton (Day)

# **Contact Hours**

2 hrs lectures/wk, 2 hrs laboratory/wk

# Workload

Workload commitments per week are:

- two-hour lecture and
- two-hour laboratory
- a minimum of 8 hours of personal study including programming practice and practical work.

# **Unit Relationships**

### **Prohibitions**

BUS3010

### Prerequisites

One of FIT1004, FIT2010, BUS3112, CSE2316, CSE3316, CPE2005, CSE2132, GCO2815 or IMS1907

### **Chief Examiner**

Associate Professor David Taniar

## **Campus Lecturer**

### Clayton

**David Taniar** 

Contact hours: Wednesday 1pm - 2pm

FIT3107 Advanced programming for database applications - Semester 2, 2011

# Tutors

# Clayton

Kefeng Xuan

# **Academic Overview**

# **Learning Objectives**

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

- create a database system for practical application utilising forms, reports and graphics;
- understand the principal aspects of setting up a complete database software system;
- apply professional form design processes and techniques to tailored database applications;
- produce a database system of professional quality.

### **Graduate Attributes**

Monash prepares its graduates to be:

- 1. responsible and effective global citizens who:
- a. engage in an internationalised world
- b. exhibit cross-cultural competence
- c. demonstrate ethical values

critical and creative scholars who:

- a. produce innovative solutions to problems
- b. apply research skills to a range of challenges
- c. communicate perceptively and effectively

### **Assessment Summary**

Examination (3 hours): 60%; In-semester assessment: 40%

Assessment Task	Value	Due Date
Assignment - Oracle Form Builder	30%	Week 11, Thursday 13 October 2011, 3pm
Practical Assessment	10%	Week 9, Wednesday 21 September 2011, 2pm
Examination 1	60%	To be advised

## **Teaching Approach**

#### Lecture and tutorials or problem classes

This teaching and learning approach provides facilitated learning, practical exploration and peer learning. **Feedback** 

Academic Overview

### Our feedback to You

Types of feedback you can expect to receive in this unit are:

- Informal feedback on progress in labs/tutes
- Graded assignments with comments
- Test results and feedback
- Solutions to tutes, labs and assignments

### Your feedback to Us

Monash is committed to excellence in education and regularly seeks feedback from students, employers and staff. One of the key formal ways students have to provide feedback is through SETU, Student Evaluation of Teacher and Unit. The University's student evaluation policy requires that every unit is evaluated each year. Students are strongly encouraged to complete the surveys. The feedback is anonymous and provides the Faculty with evidence of aspects that students are satisfied and areas for improvement.

For more information on Monash's educational strategy, and on student evaluations, see: <a href="http://www.monash.edu.au/about/monash-directions/directions.html">http://www.monash.edu.au/about/monash-directions/directions.html</a> <a href="http://www.policy.monash.edu/policy-bank/academic/education/quality/student-evaluation-policy.html">http://www.monash.edu.au/about/monash-directions/directions.html</a>

### **Previous Student Evaluations of this unit**

If you wish to view how previous students rated this unit, please go to <u>https://emuapps.monash.edu.au/unitevaluations/index.jsp</u>

# **Required Resources**

You will need access to:

- Oracle Developer Suite (Form Builder)
- Oracle SQLPlus\*

Both softwares are available in the labs. Also, both softwares can be downloaded freely through Oracle OTN. Further details about download and installation can be obtained from Moodle.

# **Unit Schedule**

Week	Activities	Assessment
0		No formal assessment or activities are undertaken in week 0
1	Topic 1 - SQL	
2	Topic 2 - Data Block Forms	
3	Topic 2 - Data Block Forms (continued)	
4	Topic 2 - Data Block Forms (continued)	
5	Topic 3 - Basic PL/SQL Programming	
6	Topic 3 - Advanced PL/SQL Programming	
7	Topic 4 - Custom Forms (Basic)	
8	Topic 4 - Custom Forms (Multiple Forms)	
9	Topic 4 - Custom Forms (Tab Forms)	Practical Assessment in Week 9, Wednesday 21 September 2011, 2pm
10	Topic 4 - Custom Forms (Stacked Forms)	
11	Topic 5 - Integrated Applications	Assignment due Week 11, Thursday 13 October 2011, 3pm
12	Topic 5 - Integrated Applications (continued)	
	SWOT VAC	No formal assessment is undertaken SWOT VAC
	Examination period	LINK to Assessment Policy: http://policy.monash.edu.au/policy-bank/ academic/education/assessment/ assessment-in-coursework-policy.html

\*Unit Schedule details will be maintained and communicated to you via your MUSO (Blackboard or Moodle) learning system.

# **Assessment Requirements**

### **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 50% then a mark of no greater than 49-N will be recorded for the unit

### Assessment Tasks

#### **Participation**

#### Assessment task 1

Title:

Assignment - Oracle Form Builder

#### **Description:**

This is a group assignment. Students will develop a complete form application using Oracle Developer Suite.

#### Weighting:

30%

#### Criteria for assessment:

- 1. Completeness of each sub-system.
- 2. Correctness of each sub-system.
- 3. Quality of testing results.
- 4. Technical requirements of the system met, as specified in the assignment specification.

All group members will receive the same marks.

If there are issues/concerns about individual contributions within a group, a peer evaluation form will be used.

#### Due date:

Week 11, Thursday 13 October 2011, 3pm

#### Assessment task 2

#### Title:

Practical Assessment

#### **Description:**

This is a class test that will include questions on SQL, PL/SQL, Data Block Forms and Custom Forms.

#### Weighting:

10%

#### Criteria for assessment:

Correct answers to questions (demonstrates understanding of the learning material). **Due date:** 

Week 9, Wednesday 21 September 2011, 2pm

# Examinations

• Examination 1

Weighting: 60% Length: 3 hours Type (open/closed book): Closed book Electronic devices allowed in the exam: None

# Assignment submission

It is a University requirement

(http://www.policy.monash.edu/policy-bank/academic/education/conduct/plagiarism-procedures.html) for students to submit an assignment coversheet for each assessment item. Faculty Assignment coversheets can be found at <a href="http://www.infotech.monash.edu.au/resources/student/forms/">http://www.infotech.monash.edu.au/resources/student/forms/</a>. Please check with your Lecturer on the submission method for your assignment coversheet (e.g. attach a file to the online assignment submission, hand-in a hard copy, or use an online quiz).

# **Extensions and penalties**

Submission must be made by the due date otherwise penalties will be enforced.

You must negotiate any extensions formally with your campus unit leader via the in-semester special consideration process: http://www.infotech.monash.edu.au/resources/student/equity/special-consideration.html.

# Returning assignments

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

# **Other Information**

# Policies

Monash has educational policies, procedures and guidelines, which are designed to ensure that staff and students are aware of the University's academic standards, and to provide advice on how they might uphold them. You can find Monash's Education Policies at: http://policy.monash.edu.au/policy-bank/academic/education/index.html

Key educational policies include:

- Plagiarism (http://www.policy.monash.edu/policy-bank/academic/education/conduct/plagiarism-policy.html)
- Assessment (<u>http://www.policy.monash.edu/policy-bank/academic/education/assessment/assessment-in-coursework-policy-bank/academic/education/assessment/assessment-in-coursework-policy-bank/academic/education/assessment/assessment-in-coursework-policy-bank/academic/education/assessment/assessment-in-coursework-policy-bank/academic/education/assessment/assessment-in-coursework-policy-bank/academic/education/assessment/assessment-in-coursework-policy-bank/academic/education/assessment-in-coursework-policy-bank/academic/education/assessment/assessment-in-coursework-policy-bank/academic/education/assessment/assessment-in-coursework-policy-bank/academic/education/assessment-in-coursework</u>
- Special Consideration
  (<u>http://www.policy.monash.edu/policy-bank/academic/education/assessment/special-consideration-policy.h</u>
  Grading Scale
- (<u>http://www.policy.monash.edu/policy-bank/academic/education/assessment/grading-scale-policy.html</u>) • Discipline: Student Policy
- (http://www.policy.monash.edu/policy-bank/academic/education/conduct/student-discipline-policy.html)
- Academic Calendar and Semesters (<u>http://www.monash.edu.au/students/key-dates/</u>);
- Orientation and Transition (<u>http://www.infotech.monash.edu.au/resources/student/orientation/</u>); and
- Academic and Administrative Complaints and Grievances Policy
  (<u>http://www.policy.monash.edu/policy-bank/academic/education/management/complaints-grievance-policy</u>
- Codes of Practice for Teaching and Learning (http://www.policy.monash.edu.au/policy-bank/academic/education/conduct/suppdocs/code-of-practice-tea

# **Student services**

The University provides many different kinds of support services for you. Contact your tutor if you need advice and see the range of services available at <u>www.monash.edu.au/students</u> The Monash University Library provides a range of services and resources that enable you to save time and be more effective in your learning and research. Go to <u>http://www.lib.monash.edu.au</u> or the library tab in my.monash portal for more information. Students who have a disability or medical condition are welcome to contact the Disability Liaison Unit to discuss academic support services. Disability Liaison Officers (DLOs) visit all Victorian campuses on a regular basis

- Website: http://adm.monash.edu/sss/equity-diversity/disability-liaison/index.html;
- Telephone: 03 9905 5704 to book an appointment with a DLO;
- Email: dlu@monash.edu
- Drop In: Equity and Diversity Centre, Level 1 Gallery Building (Building 55), Monash University, Clayton Campus.