360-759 Fundamentals of Catchment Management

Credit Points:	12.50
Level:	9 (Graduate/Postgraduate)
Time Commitment:	Contact Hours: 120 hours total time commitment, 40 hours contact including fieldwork Total Time Commitment: Not available
Prerequisites:	None
Corequisites:	None
Recommended Background Knowledge:	None
Non Allowed Subjects:	None
Core Participation Requirements:	For the purposes of considering request for Reasonable Adjustments under the Disability Standards for Education (Cwth 2005), and Student Support and Engagement Policy, academic requirements for this subject are articulated in the Subject Overview, Learning Outcomes, Assessment and Generic Skills sections of this entry.It is University policy to take all reasonable steps to minimise the impact of disability upon academic study, and reasonable adjustments will be made to enhance a student's participation in the University's programs. Students who feel their disability may impact on meeting the requirements of this subject are encouraged to discuss this matter with a Faculty Student Adviser and Student Equity and Disability Support: http://services.unimelb.edu.au/disability">http://services.unimelb.edu.au/disability
Subject Overview:	This subject is concerned with providing students with a common starting point across the range of physical, biological, chemical, social and institutional processes that bear on catchment behaviour. The subject structure uses past, current and foreseeable issues facing catchment managers to introduce the concepts of catchments as physical, biological, chemical, social and institutional systems. Subject content covers the principles of: geomorphology, hydrology, hydraulics, ecology and water quality in sufficient detail to understand the main processes that control the condition of: catchments, waterways, floodplains and wetlands. Content also explores the institutional and social context of catchment management to understand the constraints on management intervention and the notion of ecosystem services as a driver of management intervention. Approaches to management intervention consider the multiple goals of catchment management and the concept of "management levers". The structured remote learning component deals with the objectives of natural resources management and institutional and legislative frameworks and introduces the range of relevant catchment processes. A four day intensive face to face session focuses on the knowledge needed to understand catchments as interacting systems and illustrates limitations on management intervention options through consideration of past, current and future catchment issues. As part of this subject, students undertake a component of the overall course project, examining a catchment management issue from their workplace to identify the physical, biological, chemical, social and institutional processes that guide or constrain management intervention.
Assessment:	One hour written test on the institutional and legislative frameworks (10 percent) Tutorial exercises and short tests during the intensive phase (10 percent) Group "management levers" exercise. Equivalent to 1,000 words each plus participation (20 percent) Individual project report(s) equivalent to a 4,000-word assignment (50 percent) 500 word (equivalent) ongoing

Page 1 of 2 02/02/2017 11:48 A.M.

	critique of the subject's relevance to the key natural resources management principles (10 percent)
Prescribed Texts:	None
Breadth Options:	This subject is not available as a breadth subject.
Fees Information:	Subject EFTSL, Level, Discipline & Census Date, http://enrolment.unimelb.edu.au/fees
Generic Skills:	On the successful completion of this subject students will:
	recognise institutional, social and economic opportunities and constraints including river health policy and practice and the roles and responsibilities of catchment management agencies;
	understand the technical content of the disciplines involved in catchment management and its relationship to the broader objective of river health and total catchment management;
	understand catchments as interacting systems; and
	use the concept of "management levers" to simplify management intervention options.

Page 2 of 2 02/02/2017 11:48 A.M.