

GEO302 Coastal Geomorphology

School: School of Science, Technology and Engineering

2024 | Semester 2

UniSC Sunshine Coast
UniSC Moreton Bay

**BLENDED
LEARNING**

Most of your course is on campus but you may be able to do some components of this course online.

Online

ONLINE

You can do this course without coming onto campus.

Please go to usc.edu.au for up to date information on the teaching sessions and campuses where this course is usually offered.

1. What is this course about?

1.1. Description

Coastal geomorphology is the study of the shape, processes and evolution of coastal landforms. You will develop a practical understanding of coastal dynamics through a combination of theoretical conceptual models and fieldwork which examine the importance of coastal geomorphic forms and their management. The course examines the dynamics of the coastal zone, its physical workings and techniques to measure and monitor processes and change in the coastal environment; such as examining beach erosion and impacts of sea-level rise.

1.2. How will this course be delivered?

ACTIVITY	HOURS	BEGINNING WEEK	FREQUENCY
BLENDED LEARNING			
Learning materials – Asynchronous online delivery of learning materials	1hr	Week 1	13 times
Tutorial/Workshop 1 – Synchronous and scheduled face to face computer workshops	2hrs	Week 2	9 times
Seminar – Synchronous and scheduled face to face seminars	1hr	Week 1	3 times
Fieldwork – Synchronous face to face fieldwork	4hrs	Week 4	2 times
ONLINE			
Learning materials – Asynchronous online delivery of learning materials	1hr	Week 1	13 times
Tutorial/Workshop 1 – Synchronous and scheduled online computer workshops	2hrs	Week 2	9 times
Seminar – Synchronous and scheduled seminars	1hr	Week 1	3 times
Fieldwork – Virtual Fieldwork (attendance at the physical fieldwork is encouraged if possible)	4hrs	Week 4	2 times

1.3. Course Topics

Coastal processes

Coastal landforms

Coastal hazards

Coastal management

2. What level is this course?

300 Level (Graduate)

Demonstrating coherence and breadth or depth of knowledge and skills. Independent application of knowledge and skills in unfamiliar contexts. Meeting professional requirements and AQF descriptors for the degree. May require pre-requisites where discipline specific introductory or developing knowledge or skills is necessary. Normally undertaken in the third or fourth full-time study year of an undergraduate program.

3. What is the unit value of this course?

12 units

4. How does this course contribute to my learning?

COURSE LEARNING OUTCOMES	GRADUATE QUALITIES MAPPING	PROFESSIONAL STANDARD MAPPING *
On successful completion of this course, you should be able to...	Completing these tasks successfully will contribute to you becoming...	Australian Learning & Teaching Council
1 Demonstrate and apply fundamental concepts of coastal geomorphology to different historical, local and global contexts	Knowledgeable	1
2 Use measuring methods and tools to collect data about coastal geomorphic processes	Creative and critical thinker	5
3 Interpret and analyse data to determine interactions between coastal geomorphic processes, and human infrastructure.	Sustainability-focussed	3
4 Propose and justify evidence based and sustainable strategies to mitigate human damage to natural systems and these processes	Sustainability-focussed	4, 5
5 Search, select and analyse relevant academic information and communicate findings to different audiences.	Engaged	5, 6

* Competencies by Professional Body

CODE	COMPETENCY
AUSTRALIAN LEARNING & TEACHING COUNCIL	
1	Knowing: Demonstrate a coherent geographical understanding of trends, processes and impacts that shape Australian and other environments and/or societies at different spatial and temporal scales.
3	Thinking: Apply geographical thought creatively, critically and appropriately to specific spaces, places and/or environments.
4	Thinking: Recognise, evaluate and synthesise various views, arguments and sources of knowledge pertinent to solving environmental and social problems.
5	Investigating and problem solving: Resolve geographical questions by ethical means, applying evidence-based knowledge and appropriate research techniques, including those associated with field work.

CODE	COMPETENCY
6	Communicating: Communicate geographical perspectives and knowledge effectively to specialist and non-specialist audiences using appropriately selected written, oral and visual means.

5. Am I eligible to enrol in this course?

Refer to the [UniSC Glossary of terms](#) for definitions of “pre-requisites, co-requisites and anti-requisites”.

5.1. Pre-requisites

Not applicable

5.2. Co-requisites

Not applicable

5.3. Anti-requisites

Not applicable

5.4. Specific assumed prior knowledge and skills (where applicable)

Geomorphology; GIS and remote sensing

6. How am I going to be assessed?

6.1. Grading Scale

Standard Grading (GRD)

High Distinction (HD), Distinction (DN), Credit (CR), Pass (PS), Fail (FL).

6.2. Details of early feedback on progress

In week 3 the topic and outline of your literature review (Task 2) will be assessed (formative). In week 7 the topic and a draft research plan of your field report (Task 3) will be assessed (formative).

6.3. Assessment tasks

DELIVERY MODE	TASK NO.	ASSESSMENT PRODUCT	INDIVIDUAL OR GROUP	WEIGHTING %	WHAT IS THE DURATION / LENGTH?	WHEN SHOULD I SUBMIT?	WHERE SHOULD I SUBMIT IT?
All	1	Quiz/zes	Individual	20%	200-300 words each	Throughout teaching period (refer to Format)	Online Assignment Submission with plagiarism check
All	2	Essay	Individual	30%	2000 (+- 200) words	Week 5	Online Assignment Submission with plagiarism check
All	3a	Artefact - Creative	Group	20%	10 min per group	Week 12	In Class
All	3b	Report	Group	30%	2000 (+- 200) words	Week 12	Online Assignment Submission with plagiarism check

All - Assessment Task 1: Computer workshop activities

GOAL:	To develop your theoretical and practical skills with tools used in coastal geomorphology.		
PRODUCT:	Quiz/zes		
FORMAT:	During computer workshops you will be provided with reading material and exercises. At the end of the computer workshop you will complete the task and submit via Canvas.		
CRITERIA:	No.	Learning Outcome assessed	
	1	Depth of understanding about presented skills/tools	1 3
	2	Presentation and communication skills.	5
GENERIC SKILLS:	Communication, Problem solving, Applying technologies, Information literacy		

All - Assessment Task 2: Literature Review Essay

GOAL:	To identify and provide an overview of key concepts in coastal geomorphology.		
PRODUCT:	Essay		
FORMAT:	In Week 1 you will be given a list of key concepts in coastal geomorphology. You are to select one and focus on what has been written on the topic. The literature review should be of approximately 2000 words (+- 200 words) and based on appropriate scholarly sources. The structure of the report should follow a conventional scientific report template.		
CRITERIA:	No.	Learning Outcome assessed	
	1	Demonstrate skills in problem definition and application of theoretical and practical knowledge of fundamental concepts and processes of coastal geomorphology to different local and global contexts.	1
	2	Identification of appropriate literature (relevant, current, credible).	5
	3	Critical analysis of gaps, strengths and weaknesses in current research.	5
	4	Structure, clarity and style of the written assignment.	5
GENERIC SKILLS:	Communication, Problem solving, Organisation		

All - Assessment Task 3a: Video report

GOAL:	This task will develop your collaboration and analytic skills through group work that examines the ethical implications of different responses to a selected coastal issue	
PRODUCT:	Artefact - Creative	
FORMAT:	face-to-face presentations, zoom or pre-recorded	
CRITERIA:	No.	Learning Outcome assessed
	1	Scope and depth of the ethical analysis and connection to coastal issues 5
	2	Incorporation of evidence-based information 5
	3	Contribution to team (peer review) 5
	4	Clarity and effectiveness of communication 5
GENERIC SKILLS:	Communication, Collaboration	

All - Assessment Task 3b: Field Activities Report

GOAL:	To present the methodology and results obtained from fieldwork, including the analysis and discussion of data/evidence collected and conclusions derived from the results	
PRODUCT:	Report	
FORMAT:	A concise project report based on data collected by each group. The report should be around 2,000 (+/- 200) words and written in the style of a manuscript for publication in the peer-reviewed literature, including a reference list, as well as tables and illustrations, as needed.	
CRITERIA:	No.	Learning Outcome assessed
	1	Application of theoretical and practical knowledge. 1
	2	Use of measuring methods and tools to collect data about coastal processes in the visited site/s. 2
	3	Accurate interpretation and analysis of data to: - describe the main coastal processes - determine processes and impacts - propose solutions and implications of the identified problem 3
	4	Justification of evidence-based and sustainable strategies to manage future distributions 4
	5	Communication in structured writing to inform audiences using supporting scholarly sources and data 5
	6	Quality of presentation, grammar and spelling. 5
GENERIC SKILLS:	Communication, Collaboration, Problem solving, Organisation, Applying technologies, Information literacy	

7. Directed study hours

A 12-unit course will have total of 150 learning hours which will include directed study hours (including online if required), self-directed learning and completion of assessable tasks. Student workload is calculated at 12.5 learning hours per one unit.

8. What resources do I need to undertake this course?

Please note: Course information, including specific information of recommended readings, learning activities, resources, weekly readings, etc. are available on the course Canvas site– Please log in as soon as possible.

8.1. Prescribed text(s) or course reader

Please note that you need to have regular access to the resource(s) listed below. Resources may be required or recommended.

REQUIRED?	AUTHOR	YEAR	TITLE	EDITION	PUBLISHER
Recommended	Gerhard Masselink, Michael G. Hughes, Jasper Knight	2014	Introduction to Coastal Processes and Geomorphology	2nd ed	Taylor and Francis
Recommended	Kamphuis, J. William	2019	Introduction to coastal engineering and management	3rd ed	S.I. : World Scientific Pub.

8.2. Specific requirements

Students are required to have access to a PC-based computer. Please also note that this course has COMPULSORY computer workshops and fieldwork sessions at local beaches. Final dates/locations will be provided on Canvas. These details are subject to change. Contact the Course Coordinator for further information. You are required to complete the online field work induction quiz and a field work participation form. This is a University Legal Requirement. Clothing suitable for the environment visited on field trips and laboratory must be worn. Further specific details will be provided on Canvas.

9. How are risks managed in this course?

Risk assessments have been performed for all field activities and a low level of health and safety risk exists. Some risks concerns may include working in an unknown environment as well as slip and trip hazards. It is your responsibility to review course material, search online, discuss with lecturers and peers and understand the health and safety risks associated with your specific course of study and to familiarise yourself with the University's general health and safety principles by reviewing the [online induction training for students](#), and following the instructions of the University staff.

10. What administrative information is relevant to this course?

10.1. Assessment: Academic Integrity

Academic integrity is the ethical standard of university participation. It ensures that students graduate as a result of proving they are competent in their discipline. This is integral in maintaining the value of academic qualifications. Each industry has expectations and standards of the skills and knowledge within that discipline and these are reflected in assessment.

Academic integrity means that you do not engage in any activity that is considered to be academic fraud; including plagiarism, collusion or outsourcing any part of any assessment item to any other person. You are expected to be honest and ethical by completing all work yourself and indicating in your work which ideas and information were developed by you and which were taken from others. You cannot provide your assessment work to others. You are also expected to provide evidence of wide and critical reading, usually by using appropriate academic references.

In order to minimise incidents of academic fraud, this course may require that some of its assessment tasks, when submitted to Canvas, are electronically checked through Turnitin. This software allows for text comparisons to be made between your submitted assessment item and all other work to which Turnitin has access.

10.2. Assessment: Additional Requirements

Your eligibility for supplementary assessment in a course is dependent of the following conditions applying:

The final mark is in the percentage range 47% to 49.4%

The course is graded using the Standard Grading scale

You have not failed an assessment task in the course due to academic misconduct

10.3. Assessment: Submission penalties

Late submission of assessment tasks may be penalised at the following maximum rate:

- 5% (of the assessment task's identified value) per day for the first two days from the date identified as the due date for the assessment task.

- 10% (of the assessment task's identified value) for the third day - 20% (of the assessment task's identified value) for the fourth day and subsequent days up to and including seven days from the date identified as the due date for the assessment task.

- A result of zero is awarded for an assessment task submitted after seven days from the date identified as the due date for the assessment task. Weekdays and weekends are included in the calculation of days late. To request an extension you must contact your course coordinator to negotiate an outcome.

10.4. SafeUniSC

UniSC is committed to a culture of respect and providing a safe and supportive environment for all members of our community. For immediate assistance on campus contact SafeUniSC by phone: [07 5430 1168](tel:0754301168) or using the [SafeZone](#) app. For general enquires contact the SafeUniSC team by phone [07 5456 3864](tel:0754563864) or email safe@usc.edu.au.

The SafeUniSC Specialist Service is a Student Wellbeing service that provides free and confidential support to students who may have experienced or observed behaviour that could cause fear, offence or trauma. To contact the service call [07 5430 1226](tel:0754301226) or email studentwellbeing@usc.edu.au.

10.5. Study help

For help with course-specific advice, for example what information to include in your assessment, you should first contact your tutor, then your course coordinator, if needed.

If you require additional assistance, the Learning Advisers are trained professionals who are ready to help you develop a wide range of academic skills. Visit the [Learning Advisers](#) web page for more information, or contact Student Central for further assistance: +61 7 5430 2890 or studentcentral@usc.edu.au.

10.6. Wellbeing Services

Student Wellbeing provide free and confidential counselling on a wide range of personal, academic, social and psychological matters, to foster positive mental health and wellbeing for your academic success.

To book a confidential appointment go to [Student Hub](#), email studentwellbeing@usc.edu.au or call 07 5430 1226.

10.7. AccessAbility Services

Ability Advisers ensure equal access to all aspects of university life. If your studies are affected by a disability, learning disorder mental health issue, injury or illness, or you are a primary carer for someone with a disability or who is considered frail and aged, [AccessAbility Services](#) can provide access to appropriate reasonable adjustments and practical advice about the support and facilities available to you throughout the University.

To book a confidential appointment go to [Student Hub](#), email AccessAbility@usc.edu.au or call 07 5430 2890.

10.8. Links to relevant University policy and procedures

For more information on Academic Learning & Teaching categories including:

- Assessment: Courses and Coursework Programs
- Review of Assessment and Final Grades
- Supplementary Assessment
- Central Examinations
- Deferred Examinations
- Student Conduct
- Students with a Disability

For more information, visit <https://www.usc.edu.au/explore/policies-and-procedures#academic-learning-and-teaching>

10.9. Student Charter

UniSC is committed to excellence in teaching, research and engagement in an environment that is inclusive, inspiring, safe and respectful. The [Student Charter](#) sets out what students can expect from the University, and what in turn is expected of students, to achieve these outcomes.

10.10. General Enquiries

In person:

- **UniSC Sunshine Coast** - Student Central, Ground Floor, Building C, 90 Sippy Downs Drive, Sippy Downs
- **UniSC Moreton Bay** - Service Centre, Ground Floor, Foundation Building, Gympie Road, Petrie
- **UniSC SouthBank** - Student Central, Building A4 (SW1), 52 Merivale Street, South Brisbane
- **UniSC Gympie** - Student Central, 71 Cartwright Road, Gympie
- **UniSC Fraser Coast** - Student Central, Student Central, Building A, 161 Old Maryborough Rd, Hervey Bay
- **UniSC Caboolture** - Student Central, Level 1 Building J, Cnr Manley and Tallon Street, Caboolture

Tel: +61 7 5430 2890

Email: studentcentral@usc.edu.au