

University of Plymouth

Faculty of Science and Engineering
School of Biological and Marine Sciences

Programme Specification

BSc (Honours) Ocean Science and Marine Conservation (5174)
BSc (Hons) Ocean Science and Marine Conservation (Integrated)
(5417)

September 2018

1. Final award title:

BSc (Honours) Ocean Science and Marine Conservation on completion of 120 credits at Level 4, 120 credits at Level 5 and 120 credits at Level 6.

Level 4 Intermediate award title:

Certificate of Higher Education on completion of 120 credits at Level 4.

Level 5 Intermediate award title:

Diploma of Higher Education on completion of 120 credits at Level 4 and 120 credits at Level 5.

UCAS code: F732

JACS code: F700

2. Awarding Institution: University of Plymouth

Teaching institution: University of Plymouth

3. Accrediting bodies:

None

4. Distinctive Features of the Programme and the Student Experience

Programme Overview:

The BSc (Honours) Ocean Science and Marine Conservation Programme is one of a suite of three BSc programmes and one MSci in the Marine Science Undergraduate Scheme. This Scheme delivers three programmes with distinct specialisms (Ocean Exploration and Surveying, Oceanography and Coastal Processes, and Ocean Science and Marine Conservation), and an MSci Ocean Science Programme which offers options across all three specialisms and an additional year at Masters Level.

The Marine Science Undergraduate Scheme consists of:

- BSc (Honours) Ocean Exploration and Surveying
- BSc (Honours) Oceanography and Coastal Processes
- BSc (Honours) Ocean Science and Marine Conservation
- MSci (Honours) Ocean Science

Distinctive Features:

Marine conservation is an emerging discipline in marine science with an increasing need for skilled graduates in various management related careers in many

different agencies and organisations. This specialist degree will explore the root causes of marine degradation and identify tools and techniques which can be used to better protect and conserve our coasts and seas. This will include marine and coastal ecology, marine conservation law and policy and marine protected area (MPA) management techniques.

Undergraduate degrees in the Marine Science Scheme share a number of features distinctive from the offers of alternative institutions and in addition the BSc (Honours) Ocean Science and Marine Conservation degree is distinctive within the Scheme.

Specific Distinctive Features:

- Throughout the degree there is a strong emphasis on developing specialist skills related to marine conservation research and data collection. These skills include ecological survey methods and quantitative data analysis that enable scientists to measure the health and status of marine ecosystems and resources and to monitor conservation actions. Furthermore there is a focus on developing qualitative skills related to stakeholder data collection such as structured interviews and questionnaires which enable managers to understand how and why people use the marine environment. Field trips include visits to protected sites to discuss the challenges of conservation in practice while in the lab advanced software will be used to visualise and measure the complexity of the marine environment and our activities in it.
- Marine Conservation specialist teaching staff are involved in internationally leading research via the Centre for Marine and Coastal Policy Research (MarCoPol) and the Marine Biology and Ecology Research Centre (MBERC). Staff expertise includes managing protected populations and marine protected areas (MPAs), marine and coastal governance, marine ecosystem services and economics, society and the sea. These diverse areas of expertise provide opportunity for students to pursue their specialist interests and to become active members of a thriving international marine conservation policy science community.
- Outstanding research and teaching infrastructure is available to support the practical aspects of the degree programme. This infrastructure includes a fleet of research vessels for group teaching and year-round project work, state-of-the-art ocean science equipment and there is an extensive collection of water quality monitoring equipment which students can use during field work and for their dissertation research. The Marine Station which provides a unique waterfront teaching and research space specifically designed to support the Marine Science programmes.

- Ocean Science and Marine Conservation students are offered choice from a diverse set of option modules enriched with specialist expertise in marine conservation including management and policy structures, biodiversity and ecology, stakeholder and public engagement designed to equip graduates with the suitable knowledge and expertise for the diverse and competitive marine conservation employment market.

Distinctive Features common across the Marine Science Undergraduate Scheme

- Students have the opportunity to gain a HSE diving qualification and RYA power boat certificates alongside their degree work and an optional dedicated scientific diving module to enhance employability and provide training and qualification for diving-based research projects.
- The programme includes an overseas field course that is specifically aimed at integrating the ocean science knowledge and understanding across the different sub-disciplines to address real-world issues.
- The local river and estuarine system, together with Plymouth Sound and the local coastline, provide a unique natural resource ideally suited to the study of marine science. Use of this resource is built into the Marine Science Undergraduate Scheme at all levels.
- The University's Marine Institute brings together all of the work being done in the university that relates to the marine environment, providing linkage with outside bodies and promoting it to the widest possible audience. Plymouth is also home to a number of marine science organisations including the Plymouth Marine Laboratory, Marine Biological Association of the United Kingdom and the National Marine Aquarium, making it an important hub for marine science.
- Marine Science modules are delivered and shared across a range of programmes within the University allowing students the opportunity to interact with a broad range of disciplines that have a connection with the ocean. These programmes include the Marine Biology Programmes, Environmental Science, and Ocean Science minor programmes in Geology and Geography.
- The Marine Science Undergraduate Scheme has been designed to allow flexibility and transfer between programmes up until the end of Level 5. The BSc programmes also provide a smooth transition to the MSci programme, and students can upgrade from a BSc to an MSci as late as the end of Semester 1 of Level 6 if they have met the grade requirements.
- The overarching aim of the Marine Science Undergraduate Scheme is to produce highly-skilled and employable graduates in the coastal/ocean/marine

area. In addition to acquiring the subject-specific knowledge and skills, we also place emphasis on personal skill development, including team working, team management, leadership, and self-leadership skills. We also think it is very important that our graduates become responsible employees who will help look after our ocean and marine environments in a sustainably way, can incorporate appropriately the ethical dimension, and are aware of the importance of health & safety and risk assessment procedures. These 'softer skills' will mainly be developed through the numerous practical activities that are part of the programmes and the professional development processes will be guided through our Personal Tutor system.

5. Relevant QAA Subject Benchmark Group(s)

Earth Sciences, Environmental Sciences and Environmental Studies

6. Programme Structure

The BSc (Honours) Ocean Science and Marine Conservation programme is modular and delivered in three levels. Each level is delivered across two semesters in one year and consists of 120 credits. All modules are 20 credit units, with the exception of the Ocean Science Research Project in Level 6, which is a 40 credit unit. Modules and credits at each level are summarised in Figure 1.

Level 4 is shared across all programmes in the Marine Science Undergraduate Scheme and all modules are core with the exception of the Plymouth Plus option. Plymouth Plus modules bring together students from different disciplines to apply problem-based learning, with a view to developing a more holistic understanding of their subject and how it sits within a wider context. These core modules deliver fundamental introductory material emphasising the multi-disciplinary nature of the ocean science discipline. Of these core modules 40 credits are dedicated to supporting the development of practical and analytical skills.

In Level 5 the Marine Science Undergraduate Scheme programmes share core and option modules in Semester 1. In Semester 2, students on the BSc Ocean Science and Marine Conservation programme have two core modules and can choose one option module from the other two BSc programmes (Ocean Exploration and Surveying, or Oceanography and Coastal Processes). Core 20 credit modules in both semesters have an emphasis on practical and analytical skills.

In Level 6 the Ocean Science Research Project is a core module and a Marine Science field course is compulsory with a choice from 3 field course option modules. BSc Ocean Science and Marine Conservation students also have two specialist core modules and one option module (in Semester 2). The Research Project must address a topic related to marine conservation.

BSc Ocean Science and Marine Conservation students may transfer to any of the BSc degrees within the Marine Science Undergraduate Scheme up until the end of Semester 1 in Level 5. Students may further transfer to the MSci Ocean Science on completion of Level 5 with an overall grade of >55% (exceptional cases will be considered on a case-by-case basis).

Students enrolled on one of the other Marine Science undergraduate programmes may transfer to the BSc Ocean Science and Marine Conservation up until the end of Semester 2 in Level 5 provided they have completed the corresponding core pathway module in Level 5.

Award and progression requirements are shown in Figure 1.

Professional Training

Professional Training is optional for this programme between levels 5 and 6 and students will be allowed to progress to the final stage of the programme without completing a placement year. Students may choose to arrange a suitable work placement in their third year of studies with an organisation in industry, commerce, or the public sector and will be awarded a Certificate of Industrial Training on completion of their programme.

Level 4	<p>CORE (ALL 20 CREDITS):</p> <ol style="list-style-type: none"> 1. OS101¹ Introduction to Ocean Science 2. OS102¹ Physical & Chemical Processes of the Ocean 3. OS103² Biology & Hydrography of the Ocean 4. OS104² Measuring the Marine Environment 5. OS105¹ Mapping the Marine Environment 	<p>Progression to Level 5 or award of Certificate of Higher Education: 120 credits at Level 4.</p>
	<p>OPTIONS (ALL 20 CREDITS):</p> <p>ONE FROM :</p> <ul style="list-style-type: none"> • OS106PP²: Our Ocean Planet • OS107PP²: Space Exploration • GEES1001PP²: Natural Disasters • GEES1002PP²: Climate Change and Energy **suspended for 2018/19 • GEES1003PP²: Sustainable Futures • GOV1000PP: One Planet? Society and Sustainability 	

Level 5	<p>CORE (ALL 20 CREDITS):</p> <ol style="list-style-type: none"> 1. OS201¹ Global Ocean Processes 2. OS202¹ Monitoring the Marine Environment 3. OS206² Researching the Marine Environment 4. OS205² Managing Human Impacts in the Marine Environment 	<p>Progression to Level 6 or award of Diploma of Higher Education: 120 credits at Level 5.</p>
	<p>OPTIONS (ALL 20 CREDITS):</p> <p>ONE FROM:</p> <ul style="list-style-type: none"> • OS207¹ Scientific Diving • OS208¹ Meteorology • OS209¹ Marine Remote Sensing <p>ONE FROM:</p> <ul style="list-style-type: none"> • OS203² Seafloor Mapping • OS204² Waves, Tides & Coastal Dynamics 	
Placement	<p>OPTION (0 CREDIT):</p> <ul style="list-style-type: none"> • BPIE338^{1,2} Ocean Science Placement 	<p>Placement Certificate</p>
Level 6	<p>CORE (ALL 20 CREDITS EXCEPT OS301 40 CREDITS):</p> <ol style="list-style-type: none"> 1. OS301^{1,2} Ocean Science Research Project 2. OS304¹ Marine Ecosystem Conservation (req. OS205) 3. OS307² Marine Conservation Policy & Planning (req.OS205) 	<p>Award requirements: BSc (Honours) Ocean Science and Marine Conservation: 360 credits, including 120 credits at Level 6 and 120 further credits at Level 5</p>
	<p>OPTIONS (ALL 20 CREDITS):</p> <p>ONE FROM (SEMESTER 1):</p> <ul style="list-style-type: none"> • OS312¹ Marine Science Field Course (UK) • OS313¹ Ocean Science and Marine Conservation Field Course (option 1) • OS314¹ Oceanography, Coastal Processes and Surveying Field Course (option 2) <p>ONE FROM (SEMESTER 2):</p> <ul style="list-style-type: none"> • OS305² Coastal Survey (req. OS203) • OS306² Coastal Geomorphology & Estuaries (req. OS204) • OS309² Marine Pollution & Environmental Change • MBIO341² Biological Oceanography 	

Figure 1: BSc (Hons) Ocean Science and Marine Conservation Programme Structure. Note that prerequisite modules are indicated only where the

prerequisites are option modules. All option modules assume completion of prior core modules. ¹Semester 1. ²Semester 2.

7. Programme Aims

The overarching aim of the Marine Science Undergraduate Scheme is to produce highly-skilled and employable graduates with knowledge and expertise of complex marine environments, the pressures placed upon them, their importance for society and the need to manage them sustainably.

Specifically, the BSc (Honours) Ocean Science and Marine Conservation programme is intended to:

1. Develop fundamental knowledge and an integrated understanding of ocean science, with specific emphasis on marine conservation, informed by current research, and with emphasis on management, policy and biodiversity conservation with a wide range of applied and contemporary issues.
2. Enable students to apply their knowledge and skills to independently design, plan and execute marine conservation related research projects.
3. Develop a range of intellectual skills, including: scientific enquiry and argument, critical thinking and problem-solving.
4. Develop a range of transferable and broad skills focused on gaining employment or further education and research in the marine conservation management sector. Skills will include: working independently and in groups, communication, a hands-on approach to problem-solving, and the use of specialist research techniques, equipment and information technology.
5. Develop skills for the collection, handling, analysis and interpretation of complex ocean science and ecological data sets, including, but not limited to, those obtained on the coast, from boats and from other challenging marine and coastal environments. Skills will also be developed specific to collecting ecological and stakeholder data related to management issues, with specific emphasis on marine conservation management and human stakeholder data.

8. Programme Intended Learning Outcomes

Knowledge/ Understanding

On successful completion of the programme students will be able to:

- demonstrate coherent and detailed knowledge of the underlying concepts and principles associated with the ocean science discipline, with specific emphasis on marine conservation, informed by current research, with evidence of enquiry beyond the taught programme.
- apply knowledge to demonstrate systematic understanding of ocean science theories, paradigms, concepts and principles, with specific emphasis on marine conservation
- demonstrate an appreciation of uncertainty, ambiguity and the limits of knowledge.

- apply the methods and techniques that they have learned to review, consolidate, extend and apply their knowledge and understanding.

Intellectual Skills (generic)

On successful completion of the programme students will be able to:

- incorporate appropriately the ethical dimensions of issues and investigations and the need for professional codes of conduct, including a consideration of health and safety issues and recognition of the need to carry out risk assessment prior to conducting practical work
- demonstrate ability to critically analyse, synthesise and summarise information from a range of sources, including current research and multidisciplinary and interdisciplinary perspectives
- critically evaluate arguments, assumptions, abstract concepts, data and current research to make judgements, sustain arguments and to address problems in complex contexts

Transferable and employment-related skills

On successful completion of the programme students will be able to:

- communicate information, ideas, problems and solutions to specialist and non-specialist audiences in written, graphical and verbal forms
- collect, prepare, process and interpret data and solve numerical problems using appropriate techniques with guidance
- demonstrate initiative and personal responsibility by planning an independent project with limited reliance on guidance
- contribute to team work recognising and respecting the views of others
- demonstrate ability to analyse personal strengths and weaknesses and to identify and work towards targets for personal, career and academic development
- demonstrate ability to be adaptable and flexible, making decisions in complex and unpredictable contexts

Subject specific/practical skills

On successful completion of the programme students will be able to:

- use spatial technologies in addressing ocean science and marine conservation problems
- demonstrate an ability to apply safely and accurately a range of established techniques of measurement and analysis within ocean science and marine conservation.
- demonstrate an ability to critically evaluate and interpret ocean science and marine conservation data

9. Admissions Criteria, including APCL, APEL and DAS arrangements

All applicants must have GCSE (or equivalent) Maths and English at Grade C or above.

All applications are considered on individual merit in relation to the aims and outcomes of the programme.

Equality of opportunity

The University aims to ensure that all applicants receive fair treatment. In line with its Strategic Plan, the University has strategies to promote equality of opportunity, widen participation and encourage access. In particular we welcome applications from:

- younger students from disadvantaged backgrounds
- mature students
- people with disability

Disability

We welcome and support students with disabilities, and we endeavour to meet specific needs. The Disability Assist Service (DAS), based on the Plymouth Campus, supports disabled students across the University. We work closely with DAS which is responsible, in liaison with other departments of the University, for providing a support service to meet the needs of students with disabilities. Specific services which are available include – advice for prospective students regarding facilities and support at the University, dyslexia assessment, support for claiming the Disabled Student Allowance, arrangement of examination provisioning in conjunction with the Examinations Office and individual schools, the supply and co-ordination of enablers, study skills and computer skills training, work placement and employment assessment.

Working alongside staff from DAS, the programme team assesses for students' individual disabilities. As a result, routine and measurable adjustments are made to teaching and learning provision along with alternative modes of assessment

Qualifications for entry

AS/A-Level and Vocational A-Level

We welcome a mix of AS/A-Level and Vocational A-Level qualifications as well as specialisation in either. Table 1 sets out normal minimum qualifications required for entry to First Degree/Diploma in Higher Education programmes.

The standard entry requirements will be:

- 104-112 points
- a minimum of two A-Level subjects

- the equivalent in the Vocational A-Level
- the equivalent as a mix of both qualifications

We encourage applicants to study more subjects at AS Level or the equivalent. See Table 1 below for full details of entry requirements.

Accreditation of Prior Certificated Learning (APCL) and Assessment of Prior Experiential Learning (APEL)

The University's regulations for Accreditation of Prior Certificated Learning (APCL) and Assessment of Prior Experiential Learning (APEL) are set out in the 'University Academic Regulations'. We may also consider admission on the basis of work or life experience.

English language requirements

If students have not obtained or do not expect to obtain the required entry qualifications in the English language, they are required to produce evidence of English language ability. This will normally be the equivalent of:

- GCSE Grade C or above in English Language
- Overall IELTS score of 6.0 or above and minimum component score of 5.5 in four components (listening, reading, speaking and writing)

A list of accepted qualifications can be found in the link: <http://www1.plymouth.ac.uk/internationalplymouth/Pages/entry.aspx>.

Overseas qualifications

The University Registry provides advice on, and maintains oversight of, the acceptability of any qualifications from overseas offered for entry.

Table 1: Entry Requirements

QUALIFICATIONS ACCEPTED	Level required
A-Level/AS Level/ Vocational A-Level	104-112 points, a typical offer for 112 points from minimum 2 A Levels to include Grade C in relevant Science, Geography, Environmental, Geology, Psychology, Design Technology, Applied Science and 104 points is from a min of 2 A levels in include a Grade C in a relevant science, Biology, Chemistry, Maths, Physics. Excluding General Studies.
GCSE or equivalent	GCSE in English and Mathematics (at grade C) or equivalent are required.
General Studies A-Level	Not accepted.
AVCE Double Award: 12 unit	Minimum 280 points depending on subjects taken (must include some science). Additional units/A-Level subject may be required.
BTEC National Certificate/Diploma	BTEC National Diploma/QCF Extended Diploma DMM - DDM in a relevant science subject.
Access to Higher Education	Pass Access (Science), (including GCSE English and Maths grade C or above or equivalent) with at least 33 credits at Merit and/or Distinction in science.
National Vocational Qualification (including Advanced Modern Apprenticeships)	An appropriate NVQ at Level 3/AMA in relevant subject (Science, Technology and Environment) will be considered with other information that demonstrates your ability to successfully complete the course.
Scottish Qualifications Authority	260-280 points with a minimum of 80 points from a science subject (see prospectus for details).
Irish Leaving Certificate	Within the range BBBBC-BBCCC depending on subjects taken (must include some science).
International Baccalaureate	Offers will be made based on total points acquisition within the range of 26 - 28 points overall to include 5 points in Higher Level Science.
European Baccalaureate	Within the range of 70%-75% points depending on subjects taken (must include some science).
Other Qualifications	Please enquire.

Partnership Arrangements**PUIC Stage 1 Equivalent Integrated programmes**

On successful completion of their Stage 0 programme PUIC students progress to Stage 1 of their designated programme and are taught and assessed by PU staff.

Additionally, the students will undertake a module (ILS 1005) of skills and support designed to facilitate their transition to the HE learning culture in the UK.

Progression to Stage 1 Integrated programmes is dependent upon achieving 50% in all modules of the PIUC Stage 0 programme.

Progression to PU Stage 2 is dependent upon successful completion of the PU Stage 1 and at least 60% in ILS 1005 (The PUIC DMD for ILS 1005 is appended).

10. Progression criteria for Final and Intermediate Awards

Final award title:

BSc (Honours) Ocean Science and Marine Conservation on completion of 120 credits at Level 4, 120 credits at Level 5 and 120 credits at Level 6.

Level 4 Intermediate award title:

Certificate of Higher Education on completion of 120 credits at Level 4.

Level 5 Intermediate award title:

Diploma of Higher Education on completion of 120 credits at Level 4 and 120 credits at Level 5.

11. Exceptions to Regulations

There are no exceptions to the University Academic Regulations.

12. Transitional Arrangements

None

13.1 Mapping: Learning Outcomes, Modules and Skills

Programme Intended Learning Outcomes

Certificate Level

Learning Outcome	Aim	Benchmark	Modules
Knowledge/ Understanding 1. demonstrate a broad knowledge of the underlying concepts and principles associated with the ocean science discipline	1	A	OS102 OS103
Intellectual Skills (generic) 1. integrate lines of evidence from a prescribed range of sources to support findings and simple hypotheses analyse, synthesise and summarise information 2. apply basic approach to academic literature and other sources of information using predefined techniques or criteria	3	B, E, G	OS101 OS104 OS105
Transferable and employment-related skills 1. communicate information in written, graphical and verbal forms 2. read and respond to written material 3. collect and record data with guidance 4. prepare and process data using prescribed techniques 5. use the internet for communication and information retrieval 6. solve numerical problems using appropriate basic techniques 7. develop the skills necessary for self-managed and lifelong learning (eg, independent study, time management, organisational skills) 8. identify and work towards targets for personal, career and academic development 9. analyse personal strengths and weaknesses 10. Introduce the moral and ethical dimensions of issues and investigations and the need for professional codes of conduct	4	H, Q, R, S, T, U, V, Y, Z, Z2	OS101 OS102 OS103 OS104 OS105
Subject specific/practical skills 1. describe and record materials in the field and laboratory 2. interpret practical results 3. use appropriate laboratory and field equipment safely	5	I, J, K, L, O, P	OS101 OS104 OS105

<ul style="list-style-type: none"> 4. use spatial technologies in addressing problems 5. present results of investigations in a range of prescribed formats 6. relate investigations to prior work and to reference appropriately 			
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Programme Intended Learning Outcomes

Intermediate Level

Learning Outcome	Aim	Benchmark	Modules
Knowledge/ Understanding <ul style="list-style-type: none"> 1. demonstrate detailed knowledge of the taught underlying concepts and principles associated with the ocean science discipline, and some evidence of enquiry beyond that 2. Demonstrate detailed knowledge of the underlying concepts and principles associated with marine conservation 3. apply knowledge to demonstrate understanding of subject-specific theories, paradigms, concepts and principles 	1	A, C	OS201 OS205
Intellectual Skills (generic) <ul style="list-style-type: none"> 1. integrate lines of evidence from a range of sources to support findings and hypotheses 2. analyse, synthesise and summarise information from a range of multidisciplinary and interdisciplinary perspectives including current marine conservation research 3. define problems and evaluate possible solutions in relatively predictable contexts 4. incorporate appropriately the moral and ethical dimensions of issues and investigations and the need for professional codes of conduct 	2, 3	B, D, E, F, G, H	OS201 OS202 OS205 OS206
Transferable and employment-related skills <ul style="list-style-type: none"> 1. communicate information, ideas and problems to a variety of audiences in written, graphical and verbal forms 2. collect and record data with limited guidance 3. prepare, process and interpret data using appropriate techniques with guidance 4. solve numerical problems using appropriate techniques 5. develop the skills necessary for self-managed and lifelong learning (e.g. independent study, time management, organisational skills) 	4	Q, S, T, U, Y, Z, Z2	OS201 OS202 OS205 OS206

6. identify and work towards targets for personal, career and academic development 7. analyse personal strengths and weaknesses			
Subject specific/practical skills 1. describe and record materials in the field and laboratory 2. logically interpret practical results 3. use appropriate laboratory and field equipment safely 4. professionally present results of investigations in an appropriate format 5. demonstrate initiative and personal responsibility by planning an independent project with limited reliance on guidance 6. relate investigations to prior work and to reference appropriately	5	I, J, K, M, O, P,Y,Q	OS201 OS202 OS205 OS206

Programme Intended Learning Outcomes

Honours Level

Learning Outcome	Aim	Bench mark	Modules
Knowledge/ Understanding 1. demonstrate coherent and detailed knowledge of the underlying concepts and principles associated with the ocean science discipline, with specific emphasis on marine conservation, informed by current research, with evidence of enquiry beyond the taught programme 2. demonstrate a detailed knowledge of marine conservation ecology and various threats and methods of protection for vulnerable populations, species and ecosystems. 3. demonstrate knowledge and understanding of potential solutions to marine conservation problems with focus on the roles of management, policy and conservation practice 4. apply knowledge to demonstrate systematic understanding of subject-specific theories, paradigms, concepts and principles, with specific emphasis on marine conservation 5. demonstrate an appreciation of uncertainty, ambiguity and the limits of knowledge 6. apply the methods and techniques that they have learned to review, consolidate, extend and apply their knowledge and understanding	1	A,C,E, V,Y,Z	OS301, OS304 OS307

<p>Intellectual Skills (generic)</p> <ol style="list-style-type: none"> 1. integrate lines of evidence from a range of sources, including current research, to devise and sustain arguments 2. demonstrate ability to critically analyse, synthesise and summarise information from a range of multidisciplinary and interdisciplinary perspectives 3. Demonstrate the ability to summarise and synthesise scientific evidence of human impacts on the functioning of marine ecosystems and the results of the application of marine conservation management within a policy framework paradigm 4. critically evaluate arguments, assumptions, abstract concepts, data and current research to make judgements and to address problems in complex contexts 	2, 3	B, D, E, F, G, J	OS301, OS304 OS307
<p>Transferable and employment-related skills</p> <ol style="list-style-type: none"> 1. communicate information, ideas, problems and solutions to specialist and non-specialist audiences in written, graphical and verbal forms 2. prepare, process and interpret data using appropriate techniques with guidance 3. conduct and present an independent project with limited guidance 4. contribute to team work 5. recognise and respect the views of others 6. demonstrate ability to identify and work towards targets for personal, career and academic development 7. demonstrate ability to be adaptable and flexible, making decisions in complex and unpredictable contexts 8. analyse personal strengths and weaknesses 9. Incorporate appropriately the moral and ethical dimensions of issues and investigations and the need for professional codes of conduct 	4	H, M, Q, T, W, X, Y, Z, Z1, Z2	OS301 OS307 OS312, OS313, OS314
<p>Subject specific/practical skills</p> <ol style="list-style-type: none"> 7. demonstrate an ability to apply safely and accurately a range of established techniques of measurement and analysis within the ocean science discipline 8. demonstrate an ability to critically evaluate and interpret data 	5	I, J, K, M, S, T, U, N	OS301, OS312, OS313, OS314

13.2 Mapping: Modules, credits and assessment weightings

LEVEL 4: 120 CREDITS

Module	Subject	Sem	Credit	% Ex	% CW	% Prac
OS101	Introduction to Ocean Science	1	20		100	
OS102	Physical & Chemical Processes of the Ocean	1	20	50	50	
OS103	Biology & Hydrography of the Ocean	2	20	50	50	
OS104	Measuring the Marine Environment	1	20		100	
OS105	Mapping the Marine Environment	2	20		80	20
OS106PP	Our Ocean Planet	1	20		100	
OS107PP	Space Exploration	1	20		100	

LEVEL 5: 120 CREDITS

Module	Subject	Sem	Credit	% Ex	% CW	% Prac
OS201	Global Ocean Processes	1	20	50	50	
OS202	Monitoring the Marine Environment	1	20		100	
OS206	Researching the Marine Environment	2	20		90	10
OS205	Managing Human Impacts in the Marine Environment	2	20		100	
OS207	Scientific Diving	1	20		100	
OS208	Meteorology	1	20		100	
OS209	Marine Remote Sensing	1	20		100	
OS203	Seafloor Mapping	2	20		100	
OS204	Waves, Tides & Coastal Dynamics	2	20		100	

LEVEL 6: 120 CREDITS

Module	Subject	Sem	Credit	% Ex	% CW	% Prac
OS301	Ocean Science Research Project	AY	40		90	10
OS304	Marine Ecosystem Conservation	1	20	30	70	
OS307	Marine Conservation Policy & Planning	2	20		100	
OS305	Coastal Survey	2	20	40	60	
OS306	Coastal Geomorphology & Estuaries	2	20	40	60	

OS309	Marine Pollution & Environmental Change	2	20	40	60	
OS312	Marine Science Field Course (UK)	1	20		50	50
OS313	Ocean Science and Marine Conservation Field Course (option 1)	1	20		50	50
OS314	Oceanography, Coastal processes and Surveying Field Course (option 2)	1	20		50	50
MBIO341	Biological Oceanography	2	20	70		30

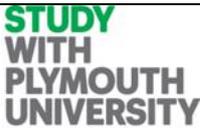
APPENDIX 1

Subject Benchmark Threshold Performance Statements

Intellectual skills (knowledge and understanding)	A	Knowledge based on the directly taught programme.
	B	Basic ability to integrate lines of evidence from a range of sources to support findings and hypotheses.
	C	Basic understanding of subject-specific theories, paradigms, concepts and principles.
	D	Basic ability to consider issues from a range of multidisciplinary and interdisciplinary perspectives.
	E	Basic ability to analyse, synthesise and summarise information.
	F	Basic ability to define problems and evaluate possible solutions in relatively predictable contexts.
	G	Basic approach to academic literature and other sources of information.
	H	Ability to describe the moral and ethical dimensions of issues and investigations and the need for professional codes of conduct.
Practical skills	I	Basic ability to describe and record materials in the field and laboratory.
	J	Basic ability to interpret practical results.
	K	Basic ability to use appropriate laboratory and field equipment safely.
	L	Basic ability to use spatial technologies in addressing problems.
	M	Ability to plan, conduct and present an independent project with reliance on guidance.
	N	Ability to apply a range of methods to solve problems.
	O	Basic ability to present results of investigations in a number of formats.
	P	Basic ability to relate investigations to prior work and to reference appropriately.
Communication skills	Q	Ability to communicate to a variety of audiences in written, graphical and verbal forms.
	R	Ability to read and respond to written material.
Numeracy and C & IT skills	S	Ability to collect and record data with guidance.
	T	Ability to prepare, process and interpret data using appropriate techniques with guidance.
	U	Basic ability to solve numerical problems using appropriate basic techniques.
	V	Ability to use the internet for communication and information retrieval.
Interpersonal/ teamwork	W	Some aptitude for and ability to contribute to team work.
	X	Ability to recognise and respect the views of others.
Self management	Y	Basic ability to develop the skills necessary for self-managed and lifelong learning (eg independent study, time management, organisational skills).

and professional development	Z	Basic ability to identify and work towards targets for personal, career and academic development.
	Z1	Ability to be adaptable and flexible.
	Z2	Basic ability to analyse personal strengths and weaknesses.

APPENDIX 2

 		DMD ILS1005	
Module Interactive Learning Skills and Communication Code ILS1005			FHEQ 4
Version	Current Version	2.14	October 2014
	Prior Version/s	1.14	September 2014
		1.13	October 2013
		1.12	July 2012
<p>This Definitive Module Document (DMD) is designed for all prospective, enrolled students, academic staff and potential employers. It provides a concise summary of the main features of the module and the Specific Learning Outcomes (LOs) that a typical student might reasonably expect to achieve and demonstrate if he/she takes full advantage of the learning opportunities.</p> <p>Detailed information regarding the content and assessment criteria of this module should be considered alongside the appropriate Programme Specifications (PSS) and Module Guide (see MG ILS1005).</p>			
Module Name	Interactive Learning Skills and Communication (ILSC)		
Module Code	ILS1005		
Module Duration (per semester)	Thirteen (13) weeks		
Contact Hours (per semester)	52		
Directed Study Hours (per semester)	-		
Self-directed Study Hours (per semester)	98		
Notional Hours (per module)	150		
Teaching Rotation	01,03		
Teaching Body	PUIC		
Articulating Institution	Plymouth University		
Articulating Faculty	Faculty of Science and Environment; Faculty of Arts and Humanities; Plymouth Business School		
University Campus	Drakes Circus		
Pathways (on which this module is offered)	All Integrated Pathways		
Credit Points	Zero		
Pathway Stage	PUIC Stage 2 (Plymouth University Stage 1)		
Stage FHEQ Level	4		
Language of Delivery	English		
Language of Assessment	English		
E-Learning	IT software packages (Word, PowerPoint, Excel), internet access; College Portal; University Student Portal.		
Moderation	See CPR QS9		
Standard Progression Criteria	Summary: minimum overall pass mark of 65% (Grade C*) across all assessment events and a minimum of 65% in assessments B, D and E. See CPR QS9.		
Failure to Progress	[Summary: a student may not fail a module assessment on more than one (1) occasion, failure of the module assessment once requires that a student re-sit the failed assessment thereafter re-take the entire module at full cost; failure of a student to complete a module on the re-take of that module will result in referral to the College Learning and Teaching Board for a student management decision. The University will not be incumbent to progress students who fail].		
Aims	<p>This module has been designed to be delivered in conjunction with the Integrated FHEQ Level 4 (equivalent) first year degree and associated programmes in order to benchmark and satisfy the transfer criteria with regard to student communication and learning skills competency. This module is part of a wider pedagogic approach taken by NAVITAS UK to ensure the preparedness of its students and graduates with a focus on the relevant transferable and portable skills of effective and professional communication to support further study at a variety of levels, whether it involves higher education or further post-degree vocational programmes and/or professional awards, as well as providing a basis to foster career and life-building skills.</p> <p>Utilising a number of practical activities to allow candidates to achieve these essential skills, students will be introduced to techniques and strategies to manage speech anxiety; enhance grammar and vocabulary; think critically under pressure; research, package and deliver logical</p>		

and persuasive communication both orally and in a variety of written formats (inclusive of dissertation); summarise; become an effective listener; understand cultural and gender differences; and work effectively in a team.

This module ensures that graduates have attained the prescribed level of inter-disciplinary communication competence described as Level B2 'Proficient User' by the Council of Europe, see *Common European Framework of Reference for languages: Learning, teaching assessment 2001*, Council of Europe, CUP, Cambridge, p. 24, Table 1. *Common Reference Levels: global scale*. This module is ACL accredited and benchmarked: ACL is a leading provider of English language provision to students seeking entry to Australian HEIs and a variety of levels. ACL now forms part of Navitas English and carries dual accreditation by the Australian National ELT Accreditation Scheme (NEAS) and the NSW Government's Vocational Education and Training Accreditation Board (VETAB). Navitas English is also a Registered Training Organisation (RTO) under the Australian Quality Training Framework (AQTF).

Successful completion of this module indicates that students have obtained a good understanding of and ability to apply the requisite knowledge and skills to enable them for successful onward study at undergraduate degree level.

Topics

- ⇒ Preparation for college and university programmes
- ⇒ Personal development planning (PDP)
- ⇒ Presentation skills
- ⇒ Listening skills
- ⇒ Skills for self-directed study
- ⇒ Appropriateness
- ⇒ Library induction
- ⇒ Writing at university
- ⇒ Analysing questions/titles
- ⇒ Planning written work projects
- ⇒ Teamwork
- ⇒ Composition and style
- ⇒ Summarising techniques
- ⇒ Revision techniques
- ⇒ Examination overview and techniques
- ⇒ Critical analysis and use of evidence

Specific Learning Outcomes

A	Knowledge and Understanding
	<i>Upon completion of this module students will be able to demonstrate their knowledge and understanding of the following:</i>
1	The structure of the UNIVERSITY degree programmes and classification.
2	UNIVERSITY undergraduate degree scheme structures and awards.
3	UNIVERSITY laboratory, library and e-learning facilities; College resources and personal resources to support study.
4	Time management and its application to notional hours of study and assessment events.
5	Public speaking techniques and managing communication apprehension.
6	Non-verbal communication techniques.
7	Listening skills and knowledge dissemination and retention techniques.
8	The importance of ensuring a clear basic understanding of the history of scholarship with regard to certain subject areas and/or the use of appropriate nomenclature to aid communication.
9	What language styles to employ in a variety of situations to ensure appropriateness and clarity of communication.
10	A comprehensive set of clear writing techniques (plain English, factual and persuasive writing) that can be applied to a variety of written formats.
11	How to create appropriate and effective document layouts.
12	The importance and basic precepts of style when composing written work in a variety of forms.
13	How to embed the concept of continuous improvement and objectivity in relation to an individual's academic performance.
14	Professional communication and presentation.
15	How to enhance personal creativity and lateral thought processes.
16	Examination techniques and skills.
17	Design and communicate effective messages to a variety of audiences.
18	How to work effectively as a team member.

19	How to work effectively as an individual.				
20	How to apply basic research and referencing techniques to formulate reasoned academic opinion in a variety of forms so as to avoid plagiarism and collusion.				
B	Intellectual / Cognitive Skills				
1	Ability to employ appropriate nomenclature and terminologies across subject contexts.				
2	Ability to analyse various modes of information when delivered in different formats.				
3	Make full use of library and e-learning search (catalogue and bibliographic) resources.				
4	Ability to effectively retain and communicate knowledge and understanding of topics covered in the module in a comprehensive manner under timed conditions without re-course to learning aids.				
C	Practical Skills				
1	Develop organisational skills for deadline submission.				
2	Proficiently use techniques and technology in the collation, interpretation and presentation of data in oral and written formats.				
3	Develop oral presentation skills.				
4	Develop written skills for a variety of formats and requirements.				
D	Transferable Skills				
1	Select, read, digest, summarise and synthesise information material in a variety of forms, both qualitative and quantitative (text, numerical data and diagrammatic) and in an appropriate manner to identify and determine key facts/themes, relevancy and assessment of problems and identification and implementation of solutions.				
2	Use and clearly communicate discursive, numerical, statistical and diagrammatic ideas, concepts, results and conclusions using appropriate technical and non-technical language and language style, structure and form.				
3	Apply basic research and referencing techniques to all aspects of study, information collation, information presentation and formulation of academic opinion.				
4	Embedding the importance of self-study and reliance. This involves cultivating and developing a responsibility within each student to take cognizance for their own learning, initiative, effective time-management and self-discipline within the academic and professional environments.				
Generic Learning Outcomes					
Key skills demonstrated:			Key skills demonstrated by the ability to:		
Personal organisation and time-management skills to achieve research goals and maintain solid performance levels;			Meet converging assessment deadlines – based on punctuality and organisation with reference to class, group and individual sessions within a dynamic and flexible learning environment with variable contact hours and forms of delivery.		
Understanding of the importance of attaining in-depth knowledge of terminology as used in a given topic area, as a basis to further study;			Communicate clearly using appropriate nomenclature to enhance meaning in all oral and written assessments with no recourse to collusion or plagiarism.		
Understanding, knowledge and application of appropriate and effective methods of communication to meet formal assessment measures;			Present clearly, coherently and logically in a variety of oral and written formats using a variety of appropriate qualitative and quantitative tools and evidence bases.		
Understanding and knowledge as to the development of the industry and/or scholarship in relation to a given topic under study;			Demonstrate an understanding of the current themes of a given topic, the academic and practical foundation on which they are based – demonstrated by a lack of plagiarism and need for collusion in both individual and group work.		
Understanding of the rules applying to plagiarism and collusion;			Collate, summarise, reason and argue effectively on a given topic without reference to another's work or ideas/concepts.		
Ability to work as an individual, in a small team and in a larger group to effect data collation, discussion and presentation of evidence;			Meet and succeed in each of the varied assessments presented.		
Assessment					
Type	Duration	Method	Topic	Schedule	Weighting
Assessment E	10 weeks	efficacy of individual PDP	Attendance and participation in PDP	NA	10%
Assessment A	Nine (9) weeks	research project (1,500 – 2000 words)	Computing/engineering /biological or biomedical/environment studies	Set session 2.2 Submission session 11.1	30%
Assessment B	1 session (1 hour)	Listening assessment	Listen to a lecture (computing/engineering /biological or biomedical/environment	Session 10.2	10%

			t studies) and answer set questions.		
Assessment C Individual presentation	1 session	Presentation	Project presentation and defence	Session 11.2	20%
Assessment D Final Examination	Two (2) hour (closed-book) examination	Examination	Final summative examination covering academic reading and writing skills; history of scholarship and academic debate and critical analysis	Week 13	30%
Total Weighting					100%

Standard Progression Criteria

For the purposes of PUIC this module carries a standard minimum progression requirement: [grade C* / pass mark 65%].

For Plymouth University this is a Pass/Fail zero credited module that the student must pass to progress into University Stage 2.

Grade	Classification	Mark
A*	High Distinction	80% – 100%
B*	Distinction	70% - 79%
C*	Pass	65% - 69%
F	Fail	Less than 65%

Bibliographic Resources

Essential Reading

Essential Reading

Module Guide – see MG ILS1005

Recommended Reading

Cottrell, S., *The Study Skills Handbook*, 3rd ed., Macmillan, 2008.

Fry, R., *How to Study*, 6th ed., Delmar Learning, 2005.

Race, P., *How to Get a Good Degree – Making the most of your time at university*, 2nd ed., Open University Press, 2007.

Further Sources

Baker, E., Barrett, M., and Roberts, L., *Working communication*. Milton, 2002.

Berko, R. M., Wolvin, A. D., and Wolvin, D. R., *Communicating: A social and career focus*, Boston, 8th ed., 2001.

Blundel, R., *Effective organisational communication: Perspectives, principles and practices*, Essex, 2nd ed., 2004.

Daly, J. A., and Engleberg, I. N., *Presentations in everyday life: Strategies for effective speaking*, Boston, 2001.

O'Rourke, J. S. (2004). *Management communication: A case-analysis approach*, New Jersey, 2nd ed., 2004.

Whalen, D. J., *I see what you mean*, Chicago, 1995.

Journals (general reading)

Asian Journal of Communication

Communication Education

Journal of Communication

Relevant computing/engineering/biological or biomedical/environment journals – supplied as focus by Instructor

List