ACADEMIC PARTNERSHIPS

**PROGRAMME QUALITY HANDBOOK
2023-24**

MSc Engineering for Marine Professionals

Contents

1. About this Handbook

This Programme Quality handbook contains important information including:
The approved programme specification
Module records

Note: The information in this handbook should be read in conjunction with the current edition of:

- our MLA College Student Handbook which contains student support- based information on issues such as finance and studying at HE available at: here
- Your University of Plymouth Student Handbook available here

2. Programme Specification

2.1. Programme Details

Awarding Institution:	University of Plymouth
Partner Institution and delivery site (s):	MLA College The Merchant, St Andrews Street, Plymouth PL1 2AX
Accrediting Body:	N/A
Language of Study:	English[1]
Mode of Study:	Part time distance e-learning
Final Award:	MSc Engineering for Marine Professionals
Intermediate Award:	None
Programme Title:	MSc Engineering for Marine Professionals
UCAS Code:	N/A Applications handled directly
JACS Code:	G200
Benchmarks:	QAA UK Quality Code for Higher Education. Part A: Setting and Maintaining Academic Standards. The Frameworks for Higher Education Qualifications of UK Degree-Awarding Bodies (FHEQ). October 2014; QAA Subject Benchmark Statement: Engineering. February 2015; UK-SPEC. UK Standard for Professional Engineering Competence (third edition), Engineering Council, 2014; The Accreditation of Higher Education Programmes (AHEP), The UK Standard for Professional Engineering Competence (third edition), Engineering Council, 2014; Southern England Consortium for Credit Accumulation and Transfer (SEEC), **Level 7** Descriptors ([SEEC 2021)](#) "Characteristics Statement: Master's Degree", The Quality Assurance Agency for Higher Education (QAA), September 2015
Date of Programme Approval:	8th February 2018

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[1] Unless otherwise approved through University of Plymouth Academic Development and Partnerships Committee

2.2. Brief Description of the Programme

The MSc Engineering for Marine Professionals programme consists of a stand-alone 60 credit research module, which provides the opportunity to complete a full 180 credits at Level 7 for predominantly employed professional students, who may be qualified to BEng level and have a significant level of professional experience. Alternatively, prospective students can apply using general credit from other PGDip or full MSc programmes at other institutions, or as professionals from industry.
UK-SPEC (2014) states that:

> Master's degrees in engineering other than the MEng [typically MSc degrees such as this programme] offer the chance to study in greater depth particular aspects or applications of a broader discipline in which the graduate holds a bachelor's degree with honours. Master's programmes also provide an opportunity to integrate the technical and non-technical aspects of engineering and to develop a commitment to professional and social responsibility and ethical codes

The IMarEST's Professional Review Committee has noted in many applicants for Chartered Engineer, a lack in some areas of the UK Standard for Professional Engineering Competence (UK-SPEC). This is especially apparent in A2 (engage in the creative and innovative development of engineering technology and continuous improvement systems) and B2 (conduct appropriate research and undertake design and development of engineering solutions). Offering prospective Chartered engineers the opportunity to complete a Master's dissertation will fill a knowledge and competence gap for those whose workplace experience does not allow them to meet fully the A2 and B2 competences.
This programme will enable a broad spectrum of mid-career to senior level professionals the opportunity to progress their careers in marine engineering. During the programme, students will have the opportunity to undertake advanced research methods training, project planning, data management and statistics; and carry out independent research as part of the MSc Project.

2.3. Details of Accreditation by a Professional Statutory Body (if appropriate)

None

2.4. Exceptions to Plymouth University Regulations

(Note: The University of Plymouth's Academic Regulations are available here)

The University's Academic Regulations are implemented in full, with the exceptions below:
Approved by the University of Plymouth on 15th June 2021.

1. **48 Hour Extension for Late Submission**: the student's Personal Tutor may approve a 48 hr extension for Distance Learning assessment submission without need for formal Extenuation Circumstances application.

2. **For modules delivered via distance learning - 28 (calendar) day Extenuating Circumstances Extension for Late Submission:** in exception to the University of Plymouth's Extenuating Circumstances Policy and Procedures, both self-certified and evidenced applications for Extenuating Circumstances (EC), considered valid by MLA College, will be offered 28 calendar days as an extension to the assessment deadline. Additionally, poor internet connection, where appropriately described as an employment driven issue causing the missing of an assessment deadline (e.g. whilst 'at sea'), may be considered as a valid extenuating circumstance.

3. **For modules delivered via distance learning, Instant Referrals in the event of Failure or Non-Submission: with or without submission of a valid Extenuating Circumstances claim,** may be approved through MLA College's Interim Assessment and Award Board (IAAB) which then reports to the next scheduled University of Plymouth Subject Assessment Panel (SAP) and/or Award Assessment Board (AAB).
   More information is available in the student handbook which is available in your TLP and on the [MLA website.](#)

2.5.   Programme Aims

The programme aims to:
1. Prepare students for the next stage of their careers and improve their effectiveness within a management role
2. Enable those undertaking the programme to work towards fulfilling the competence requirements for Chartered Engineer status

2.6.   Programme Intended Learning Outcomes (ILO)

By the end of this programme the student will be able to:
1. Use a combination of general and specialist engineering knowledge in order to creatively and innovatively develop existing or emerging engineering solutions
2. Apply appropriate theoretical and practical methods to the analysis and solution of engineering problems
3. Evaluate critically current research and advanced scholarship in engineering
4. Communicate research findings effectively, in a manner suitable for a wide audience

2.7. Distinctive Features

The MSc Engineering for Marine Professionals is an innovative, part time distance e-learning Master's degree 'top-up' programme. The programme begins with a 'taught' e-learning Chapter within the module covering Advanced Techniques in Research Methods. This includes evaluation of literature, data analysis, statistical and modelling techniques; along with planning, writing and presenting a complex research project.

The e-learning course materials for Advanced Techniques in Research Methods are delivered through MLA's Total Learning Package, which can be downloaded to a variety of platforms, including tablets, smart phones and computers. Using cutting-edge technology, the Total Learning Package is fully functional whether the device is connected to the internet or not, which enables students to study successfully in any location ashore, or whilst deployed for extended periods offshore. The Total Learning Package adds considerable value to lecture material with formative testing, transcripts and learning support materials.

This programme is a flexible, fully tutor supported, distance e-learning programme, which has broad appeal and is a gateway to professional advancement and registration. Use of Plymouth University teaching and learning resources is available to all MLA College students.

2.8. Student Numbers

The scalability of the part-time distance e-learning model employed by the MLA facilitates considerable flexibility in terms of student numbers. A staff: student ratio in the order of 1:5 is considered appropriate considering the part-time nature of the students.
Minimum student numbers per stage = N/A, no minimum
Target student numbers per stage = 10
Maximum student numbers per stage = N/A. Tutor capacity can be scaled in a timely way to meet demand

2.9. Progression Route(s)

There are no automatic progression routes from this programme, however, successful graduates are able to apply for doctoral study with Plymouth University or another education provider or may complete further Master's level study with MLA or another provider in line with their professional requirements. It is also anticipated that graduates will seek CEng registration through the IMarEST.

2.10. Admissions Criteria

Qualification(s) Required for Entry to this Programme:	Details:
Level 2: - **Key Skills requirement / Higher Level Diploma:** **and/or** - **GCSEs required at Grade C or above:**	All applicants must have GCSE (or equivalent) Maths and English at Grade C or higher.
Level 3: at least one of the following: - **AS/A Levels** - **Advanced Level Diploma:** - **BTEC National Certificate/Diploma:** - **VDA: AGNVQ, AVCE, AVS:** - **Access to HE or Year 0 provision:** - **International Baccalaureate:** - **Irish / Scottish Highers / Advanced Highers:**	N/A
Work Experience:	In the case of admission to the MSc, MLA are keen to consider admission on the basis of work or life experience. Where an applicant presents with significant and entirely appropriate experience, this may be taken into account in lieu of certificated qualifications, regardless of age. Relevant maritime experience will be considered on individual merit. Specific reference to APCL and APEL is made below.
Other HE qualifications / non-standard awards or experiences:	120 level 7 credits in a related cognate area, or equivalent experience (see APEL).
Interview / Portfolio requirements:	Please see detail in the section below this table
Independent Safeguarding Agency (ISA) / Disclosure and Barring Service (DBS) clearance required:	No
English language requirements	If students have not obtained or do not have the appropriate entry qualifications in the English language, they may be required to produce evidence of English language ability. This will normally be the equivalent of:

	GCSE Grade C or above in English language.
	➢ IELTS 6.5 overall or above with a minimum of 5.5 in all four components (listening, reading, speaking and writing)
	For further information and alternatives to IELTS, see University of Plymouth's International Student Entry Requirements. [1] [SEP]

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', whereby up to 120 credits at Master's level can be APL.

Accreditation of Prior Certificated Learning will be considered on verification of formal qualifications in line with the University's regulations.

Table 1: Graduates from a Master's degree accredited by the Engineering Council must achieve a systematic understanding of the learning outcomes described below. In order to be granted APEL of 120 credits at Level 7, candidates will have to demonstrate how they have met the learning outcomes below, and clearly identify any gaps in their knowledge and understanding.

(Note that the EAB codes refer to the Engineering Accreditation Board (EAB), Appendix B: Learning outcomes specified in AHEP for Masters degrees (other than the integrated Masters) accredited as further learning to CEng level. The codes are reproduced here as an enabler for a candidate compiling a portfolio for professional review).

	EAB Code	Related AHEP LOs	Met?	Evidence
Science and Mathematics				
	SM7M	A comprehensive understanding of the relevant scientific principles of the specialisation		
	SM8M	A critical awareness of current problems and/or new insights most of which is at, or informed by, the forefront of the specialisation		
	SM9M	Understanding of concepts relevant to the discipline, some from outside engineering, and the ability to evaluate them critically and to apply them effectively, including in engineering projects		
Engineering Analysis				
	EA6M	Ability both to apply appropriate engineering analysis methods for solving complex problems in engineering and to assess their limitations		
	EA5m	Ability to use fundamental knowledge to investigate new and emerging technologies		
	EA7M	Ability to collect and analyse research data and to use appropriate engineering analysis tools in tackling unfamiliar problems, such as those with uncertain or incomplete data or specifications, by the appropriate innovation, use or adaptation of engineering analytical methods		
Design				
	D9M	Knowledge, understanding and skills to work with information that may be incomplete or uncertain, quantify the effect of this on the design and, where appropriate, use theory or experimental research to mitigate deficiencies		
	D10M	Knowledge and comprehensive understanding of design processes and methodologies and the ability to apply and adapt them in unfamiliar situations		
	D11M	Ability to generate an innovative design for products, systems, components or processes to fulfil new needs		

	EAB Code	Related AHEP LOs	Met?	Evidence
Economic, legal, social, ethical and environmental context				
	EL8M	Awareness of the need for a high level of professional and ethical conduct in engineering		
	EL9M	Awareness that engineers need to take account of the commercial and social contexts in which they operate		
	EL10M	Knowledge and understanding of management and business practices, their limitations, and how these may be applied in the context of the particular specialisation		
	EL11M	Awareness that engineering activities should promote sustainable development and ability to apply quantitative techniques where appropriate		
	EL12M	Awareness of relevant regulatory requirements governing engineering activities in the context of the particular specialisation		
	EL13M	Awareness of and ability to make general evaluations of risk issues in the context of the particular specialisation, including health & safety, environmental and commercial risk		
Engineering Practice	P12M	Advanced level knowledge and understanding of a wide range of engineering materials and components		
	P9m	A thorough understanding of current practice and its limitations, and some appreciation of likely new developments		
	P10m	Ability to apply engineering techniques, taking account of a range of commercial and industrial constraints		
	P11m	Understanding of different roles within an engineering team and the ability to exercise initiative and personal responsibility, which may be as a team member or leader		
Additional General Skills				
	G1	Apply their skills in problem solving, communication, information retrieval, working with others, and the effective use of general IT facilities		
	G2	Plan self-learning and improve performance, as the foundation for lifelong learning/CPD		
	G3m	Monitor and adjust a personal programme of work on an on-going basis		
	G4	Exercise initiative and personal responsibility, which may be as a team member or leader		

Table 2: UK SPEC defines a framework for the competence and commitment required of engineers to perform work to the necessary standard (Engineering Council, 2014). Potential registrants for CEng and professional review assessors from the IMarEST use the following threshold generic competence and commitment standards for all registrants. UKSPEC states the formal education qualification required to demonstrate the necessary knowledge and understanding.

Note that applicants without exemplifying qualifications may demonstrate the required knowledge and understanding in other ways, including through workplace learning (Engineering Council, 2014)

	CEng/CMarEng competence:	Met?	Evidence
A	**Use a combination of general and specialist engineering knowledge and understanding to optimise the application of existing and emerging technology.**		
A1	Maintain and extend a sound theoretical approach in enabling the introduction and exploitation of new and advancing technology.		
A2	Engage in the creative and innovative development of engineering technology and continuous improvement systems.		
B	**Apply appropriate theoretical and practical methods to the analysis and solution of engineering problems.**		
B1	Identify potential projects and opportunities.		
B2	Conduct appropriate research and undertake design and development of engineering solutions.		
B3	Manage implementation of design solutions and evaluate their effectiveness.		
C	**Provide technical and commercial leadership**		
C1	Plan for effective project implementation		
C2	Plan budgets organise direct and control tasks people and resources.		
C3	Lead teams and develop staff to meet changing technical and managerial needs		
C4	Bring about continuous improvement through quality management.		
D	**Demonstrate effective interpersonal skills**		
D1	Communicate in English with others at all levels		
D2	Present and discuss proposals		
D3	Demonstrate personal and social skills		
D4			
E	Demonstrate a personal commitment to professional standards recognising obligations to society the profession and the environment		
E1	Comply with relevant codes of conduct		
E2	Manage and apply safe systems of work.		
E3	Undertake engineering activities in a way that contributes to sustainable development		
E4	Carry out and record CPD necessary to maintain and enhance competence in own area of practice		
E5	Exercise responsibilities in an ethical manner		

2.11.   Programme Structure

The following table(s) provides the current structure for this programme:

FHEQ level: 7 For: MSc Engineering for Marine Professionals Full Time				
F/T Route Year	**When in Year? (i.e. Autumn, Spring etc.)**	**Core or Option Module**	**Credits**	**Module**
No Full Time Route				

FHEQ level: 7 For: MSc Engineering for Marine Professionals Part Time				
P/T Route Year	**When in Year? (i.e. Autumn, Spring etc)**	**Core or Option Module**	**Credits**	**Module**
12 months	All year	Core module	60 credits	MLA717B Engineering for Marine Professionals

2.12. Explanation and Mapping of Learning Outcomes, Teaching & Learning and Assessment

Note that the Level 7 Programme Outcomes (QAA, 2014), which a student should be able to demonstrate for the award of the qualification appear below. The majority of these outcomes are assessed during the APEL/APCL award of 120 credits at Level 7 for entry to the programme (Section PS10.1) and map across directly to the engineering competence frameworks shown in Table 1 and Table 2. Outcome 4 below ('to evaluate critically current research and advanced scholarship in the discipline') is likely to be absent or 'rusty' in the majority of candidates at the commencement of this MSc top-up programme. The students' needs will be met through the provision of a 'taught' e-learning lecture series covering Advanced Techniques in Research Methods.

Master's degrees are awarded to students who have demonstrated:

1. A systematic understanding of knowledge, and a critical awareness of current problems and/or new insights, much of which is at, or informed by, the forefront of their academic discipline, field of study or area of professional practice
2. A comprehensive understanding of techniques applicable to their own research or advanced scholarship
3. Originality in the application of knowledge, together with a practical understanding of how established techniques of research and enquiry are used to create and interpret knowledge in the discipline
4. Conceptual understanding that enables the student:
    a. to evaluate critically current research and advanced scholarship in the discipline
    b. to evaluate methodologies and develop critiques of them and, where appropriate, to propose new hypotheses.

Typically, holders of the qualification will be able to:

5. Deal with complex issues both systematically and creatively, make sound judgements in the absence of complete data, and communicate their conclusions clearly to specialist and non-specialist audiences
6. Demonstrate self-direction and originality in tackling and solving problems, and act autonomously in planning and implementing tasks at a professional or equivalent level
7. Continue to advance their knowledge and understanding, and to develop new skills to a high level.

And holders will have:

8. The qualities and transferable skills necessary for employment requiring:
    a. the exercise of initiative and personal responsibility
    b. decision-making in complex and unpredictable situations
    c. the independent learning ability required for continuing professional development.

FHEQ level: 7					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related <u>Core</u> Modules**
Knowledge / Understanding: Students should demonstrate: A coherent and detailed knowledge of the topic area, most of which is at, or informed by, the forefront of defined aspects of the relevant engineering discipline. Ability to generate an innovative design for products, systems, components or processes	Primary: Mainly student-led research and project work. Supplementary research-methods lectures provided by technology-enhanced distance learning Secondary/Supplementary: Tutorials by telephone, video conferencing; webinars and provision of information through MLA's supporting technology to aid student learning. On and offline seminars, workshops, students' local field work, work-based learning, case studies, project work, simulation, practical work and demonstration, virtual discussion groups and mentoring from an engineer (as part of the tutoring team) from a cognate discipline area.	1,2	1,2,3	Assessment methods include: Critical literature review, research proposal and a dissertation.	MLA717B

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An explanation for embedding Knowledge and Understanding through Teaching & Learning and Assessment at this level of the programme:
The learning and assessment strategy is designed to embrace the nature of this distance e-learning programme and make best use of appropriate technology to inculcate the relevant aspects of knowledge and understanding at Level 7. MLA College uses a balanced approach of constructivist and behaviourist teaching and learning; whereby students are 'lectured' in an off-line web based IT architecture, exposed to practical applications and activities, and complete formative assessment, before undertaking a period of reflection and summative assessment. For example in knowledge and understanding, teaching, learning and assessment; students are introduced to a range of appropriate data sources, software and technologies that include industry standard techniques, so that students are able to revisit the information, in context, attempt formative assessment (repeatedly if necessary), reflect and then complete a knowledge and understanding focussed assignment, as part of their portfolio of work.

Cognitive and Intellectual Skills: Students should be able to: Display a critical awareness of current problems and/or new insights most of which is at, or informed by, the forefront of the specialisation Evaluate critically current research and advanced scholarship in relevant areas relating to the chosen topic area Demonstrate originality in the application of knowledge, together with a practical understanding of how established techniques of research and enquiry are used to interpret knowledge in marine engineering	Primary: As above: the taught 'Research Methods' element of this programme is delivered by fully tutor supported distance learning. Support for cognitive and intellectual skills learning is particularly appropriate in this distance learning environment as students are mature adult learners, most of whom are employed within industry, and who are very able to recognise their own circumstances and status, understand cognitive and intellectual skills learning outcome targets, self-motivate, take responsibility for their own learning and use distance learning resources to maximum effect. Secondary/Supplementary: As above	1,2	1,2,3	As above.	MLA717B

An explanation for embedding Cognitive and Intellectual Skills through Teaching & Learning and Assessment at this level of the programme:					
Teaching, learning and assessment of cognitive and intellectual skills lends itself well to supported distance e-learning as testing comprehension, logical analysis and problem solving skills may be readily achieved in across a variety of formative, numerical and written summative assessments. Students are empowered and take control of their learning content and pace, attending virtual lectures, videos, demonstrations and simulations, supported by accompanying transcripts and notes. Once the learner has undertaken the Research Methods chapter and produced their detailed research proposal with help from their academic tutor, the tutor remains on hand to support the student's academic development and standards. Additionally, a mentor will be provided to each student (typically an engineer (as part of the tutoring team) from a cognate discipline area) to support them through the self-directed research process.					
Key Transferable Skills: Students should be able to: Collect and analyse research data and to use appropriate engineering analysis tools in tackling unfamiliar problems, such as those with uncertain or incomplete data or specifications, by the appropriate innovation, use or adapt engineering analytical methods Communicate information, arguments and analysis effectively at both a scientific and professional level, for specialist and non-specialist audiences, using structured and coherent arguments	Primary: Mainly student-led research and project work. Tutorials by telephone and/or video conferencing. Formative feedback and comment from personal tutor Secondary/Supplementary: Examination of case studies, project work, practical work and demonstration, virtual discussion groups and mentoring.	1,2,3	1,2,3,4	As above	MLA717B
An explanation for embedding Key Transferable Skills through Teaching & Learning and Assessment at this level of the programme:					
Producing the literature review and selection and development of research question, and the detailed research proposal provides a more structured approach for the student at the beginning of the programme, ensuring that they do not lose their way – an issue which can be encountered, particularly with mature learners, at the start of a largely self-directed programme of study. Regular mentoring (typically from an engineer (as part of the tutoring team) from a cognate discipline area) will be provided, together with feedback from the student's personal academic tutor. The tutoring team will provide formative feedback where appropriate in order to facilitate the development of KT skills in the learner					

Employment Related Skills: Students should be able to: Demonstrate an independent learning ability required for continuing professional development. Plan and implement tasks at a professional level Reflect critically on own learning development and style with application to professional career development	Primary: The student-directed nature of a research project facilitates the further development of these skills Secondary/Supplementary: Work-based learning and employment-related case studies, discussion groups and mentoring are used to support employment related skill learning.	1,2	1,2,3,4	As above	MLA717B
An explanation for embedding Employment Related Skills through Teaching & Learning and Assessment at this level of the programme: As a maritime industry focussed programme, the MSc Engineering for Marine Professionals programme offers students a wide range of high quality employment related skills, aimed at middle manager level. The majority of prospective students are expected to be drawn from oil & gas, and other marine related industries, working as junior to mid-level operational, engineering or administrative staff and wishing to enhance their knowledge and understanding as a means to progress their careers.					
Practical Skills: Students should be able to: Manage their own working priorities, to plan, organise and manage time. Plan and manage a research project making decisions in complex and unfamiliar context	Primary: Computer modelling and simulation, use of primary and secondary data Secondary/Supplementary: Mentoring by industry-based engineering specialist together with personal academic tutor	1,2	1,3,4	As above	MLA717B
An explanation for embedding Practical Skills through Teaching & Learning and Assessment at this level of the programme: It is important for students wishing to operate effectively at a senior level within industry to be able to manage a discrete research project effectively, self-direct such a project, and deliver results to a given deadline. This module, and the assessment strategy (incorporating an initial critical literature review and then a detailed research proposal) facilitates the development of these important practical skills within a student's portfolio of capabilities					

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2.13. Work Based/Related Learning

FHEQ level:7					
WBL/WRL Activity:	**Logistics**	**Prog Aim**	**Prog Intended LO**	**Range of Assessments**	**Related Core Module(s)**
Application of theory, knowledge and understanding to current problems and issues in the industry	Delivered through tutor's formative feedback, and the student-led dissertation	1,2	1,3	As above	MLA717B
An explanation of this map:					
This programme is specifically intended for those already working within industry. A focus remains, however, in ensuring that all teaching and learning activity demonstrates clear relevance to industry practice and requirements. This will be assured through the regular benchmarking of teaching and learning activities against clear industry requirements, a practice facilitated through the MLA's links with the IMarEST and their participation in groups such as the Marine Industry Alliance Skills Group.					

3. Module Records

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD. *Proposed changes must be submitted via Faculty/AP Quality Procedures for approval and issue of new module code*.

MODULE CODE: MLA717B	**MODULE TITLE: Engineering for Marine Professionals**	
CREDITS: 60	**FHEQ LEVEL: 7**	**HECOS CODE(S) [max 3]:** 100194 Marine Technology
PRE-REQUISITES: None	**CO-REQUISITES: None**	**COMPENSATABLE: N** *(if No identify programmes in notes box below)*

SHORT MODULE DESCRIPTOR:
Students have the opportunity to research a topic or problem of interest in marine engineering. Starting with a taught chapter on Advanced Research Methods, the module covers project planning and literature review, building the student's capability to undertake an in-depth investigation employing numerical, analytical and/or modelling of data. Collaboration with the student's employer is encouraged.

ELEMENTS OF ASSESSMENT			
C1 (Coursework	**90%**	**P1 (**Practical**)**	10%

SUBJECT ASSESSMENT PANEL to which module should be linked: MLA

Professional body minimum pass mark requirement: N/A

MODULE AIMS:
To undertake a programme of advanced scholarship in order to prepare students for Chartered Engineer registration (where appropriate). Plan, execute and report on a programme of research appropriate to the aspirations of the student and their current or chosen field of work within the maritime sphere.

ASSESSED LEARNING OUTCOMES:.

At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes (ALOs)	Programme Intended Learning Outcomes (PILOs) contributed to
At the end of the module the learner will be expected to: 1. Act autonomously to plan and manage advanced research and scholarship in the discipline	ALO1: PILOs 1 to 4

2. Use a combination of general and specialist engineering knowledge in order to creatively and innovatively develop existing or emerging engineering solutions	ALO 2: PILO 1
3. Apply appropriate theoretical and practical methods to the design and development of engineering solutions	ALO 3: PILO 2
4. Evaluate critically current research and advanced scholarship in engineering	ALO 4: PILO 3
5. Communicate research findings effectively, in a manner suitable for a wide audience	ALO 5: PILO 4

DATE OF APPROVAL: May 2022	**FACULTY/OFFICE:** Academic Partnerships
DATE OF IMPLEMENTATION: May 2022	**SCHOOL/PARTNER:** MLA
DATE(S) OF APPROVED CHANGE: XX/XX/XXXX	**SEMESTER:** Autumn
Mode of Delivery: distance learning	

Notes:

PLYMOUTH UNIVERSITY MODULE RECORD

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

Items in this section must be considered annually and amended as appropriate, in conjunction with the Module Review Process. Some parts of this page may be used in the KIS return and published on the extranet as a guide for prospective students. Further details for current students should be provided in module guidance notes.

ACADEMIC YEAR: 2023-24　　　　　**NATIONAL COST CENTRE: 111**
MODULE LEADER: Dr Paul Folan　　　**OTHER MODULE STAFF:**

Summary of Module Content

Identification of a research topic. Planning and management of a research programme, meetings schedule. Critical review of literature. Collection of data and/ or development of theory. Analysis and conclusions. Communication of research rationale, methodology and conclusions

SUMMARY OF TEACHING AND LEARNING *[Use HESA KIS definitions]*		
Scheduled Activities	**Hours**	**Comments/Additional Information**
Lectures	10	
Tutorials	10	Indicative figures for distance learning
Seminars	5	
Guided independent study	575	
Total	**600**	**(NB: 1 credit = 10 hours of learning; 10 credits = 100 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework	Literature review and selection and development of research question. Detailed research proposal	25%
	Final dissertation	75%
Practical	Presentation	100%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework	Literature review and selection and development of research question. Detailed research proposal	25%
	Final dissertation	75%
Practical	Presentation	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Ann Timms	**Approved by**: Glenn Harris
Date: 30th October 2023	Date:

Staffing and Resources

Programme Level Strategy for Staffing and Resourcing
While staff appointments remain the remit of the partner, the University must assure itself of the quality and quantity of staff and resources for Plymouth University awards. In order to assist in underpinning this assurance, an explanation of strategy for staffing and resourcing follows:
The distance learning nature of the Marine MSc Suite facilitates considerable flexibility in terms of staffing resources. Intake size will be limited by tutor capacity. Having consulted with other academic organisations experienced in the delivery of Master's level projects by distance learning, a staff: student ratio in the order of 1:5 would be appropriate considering the part-time nature of the students and the other academic duties of the MLA staff involved. This represents an adjusted staff: student ratio in comparison with full time MSc supervision at Plymouth University, and is based on part-time study, considering the support requirements of such students and the nature of an academic's duties within the MLA environment. MLA will ensure that an appropriate staff: student ratio is maintained for effective part-time MSc project study.
All students on the MSc Marine Engineering for Professional programme will be allocated a minimum of two project supervisors:

1. The Mentor: A qualified engineer (minimum MSc qualification with CEng) with knowledge of the student's intended area of study. Such supervisors will be employed on MLA College's standard Associate Tutor contract and remunerated appropriately. This supervisor will act as the student's mentor, and provide the subject-specific advice to the student as required

2. The Academic Tutor: An experienced academic from MLA College. This supervisor will provide academic oversight, will coordinate marking and feedback, and will coach the student through their 'taught' Research Methods chapter. If the student's mentor (1, above) requires support in terms of guidance around academic processes and standards, then the academic tutor can support the mentor as required.

The supervisory team will maintain regular contact, and will hold meetings with the student as required, usually using video conferencing facilities.

PLYMOUTH UNIVERSITY MODULE RECORD

Module Level Staffing and Resourcing Requirements - aligned with current staff

Module Code, Title and Credits:	Equivalent contact hours Contact Hours	Essential Staff Qualifications and Experience	Resources / Facilities	Desirable Additional Skills Sets	Current Staff Name
MLA717B	25	First Supervisor (Associate Lecturer): An MSc or higher in an appropriate engineering discipline, or other equivalent a HE qualification, and/or significant and relevant professional experience. CEng registration. Second Supervisor: An MSc or higher in an appropriate discipline, or other equivalent a HE qualification. Holder or working towards an appropriate HE teaching and learning qualification	Plymouth University e-library resources	Distance and open learning. Research skills	Prof John Chudley Dr Jaimie Cross Dr Carlos Martins Dr Paul Folan