



**Swansea University
Prifysgol Abertawe**

**FACULTY OF SCIENCE AND
ENGINEERING**

**UNDERGRADUATE STUDENT
HANDBOOK**

**MSc AEROSPACE
ENGINEERING (JANUARY)
(FHEQ LEVEL 7)**

**SUBJECT SPECIFIC
PART TWO OF TWO
MODULE AND COURSE STRUCTURE
2024-25**

Welcome to the Faculty of Science and Engineering!

Whether you are a new or a returning student, we could not be happier to be on this journey with you.

At Swansea University and in the Faculty of Science and Engineering, we believe in working in partnership with students. We work hard to break down barriers and value the contribution of everyone.

Our goal is an inclusive community where everyone is respected, and everyone's contributions are valued. Always feel free to talk to academic, technical and administrative staff, administrators - I'm sure you will find many friendly helping hands ready to assist you. And make the most of living and working alongside your fellow students.

During your time with us, please learn, create, collaborate, and most of all – enjoy yourself!

Professor David Smith
Pro-Vice-Chancellor and Executive Dean
Faculty of Science and Engineering



Faculty of Science and Engineering	
Pro-Vice-Chancellor and Executive Dean	Professor David Smith
Head of Operations	Mrs Ruth Bunting
Associate Dean – Education	Dr Laura Roberts
School of Aerospace, Civil, Electrical and Mechanical Engineering	
Head of School	Professor Antonio Gil
School Education Lead	Professor Cris Arnold
Head of Aerospace Engineering	Professor Ben Evans
Aerospace Engineering Programme Director (Postgraduate Taught)	Dr Yuying Xia – yuying.xia@swansea.ac.uk
Year Coordinator	Dr Yuying Xia – yuying.xia@swansea.ac.uk

DISCLAIMER

The Faculty of Science and Engineering has made all reasonable efforts to ensure that the information contained within this publication is accurate and up-to-date when published but can accept no responsibility for any errors or omissions.

The Faculty of Science and Engineering reserves the right to revise, alter or discontinue degree programmes or modules and to amend regulations and procedures at any time, but every effort will be made to notify interested parties.

It should be noted that not every module listed in this handbook may be available every year, and changes may be made to the details of the modules. You are advised to contact the Faculty of Science and Engineering directly if you require further information.

The 24-25 academic year begins on 23 September 2024

Full term dates can be found [here](#)

DATES OF 24-25 TERMS

23 September 2024 – 13 December 2024

06 January 2025 – 11 April 2025

06 May 2025 – 06 June 2025

SEMESTER 1

23 September 2024 – 27 January 2025

SEMESTER 2

27 January 2025 – 06 June 2025

SUMMER

09 June 2025 – 19 September 2025

IMPORTANT INFORMATION ON ACADEMIC INTEGRITY

Swansea University and the Faculty of Science of Engineering takes any form of **academic misconduct** very seriously. In order to maintain academic integrity and ensure that the quality of an Award from Swansea University is not diminished, it is important to ensure that all students are judged on their ability. No student should have an unfair advantage over another as a result of academic misconduct - whether this is in the form of **Plagiarism**, **Collusion** or **Commissioning**.

It is important that you are aware of the **guidelines** governing Academic Misconduct within the University/Faculty of Science and Engineering and the possible implications. The Faculty of Science and Engineering will not take intent into consideration and in relation to an allegation of academic misconduct - there can be no defence that the offence was committed unintentionally or accidentally.

Please ensure that you read the University webpages covering the topic – procedural guidance [here](#) and further information [here](#). You should also read the Faculty Part One handbook fully, in particular the pages that concern Academic Misconduct/Academic Integrity.

STUDENT SUPPORT

The **Student Experience and Information Team** are here to support you through your studies and to provide non-judgemental advice and guidance. If you have any questions relating to your academic or personal life you can contact the Team and chat through your support options.

The Team is available for in-person support meetings and can also be contacted via email (studentsupport-scienceengineering@swansea.ac.uk) or phone (**+44 (0) 1792 295514**). You can access their full contact details [here](#).

To visit the Team you can attend either of the following Receptions:

- Reception in the Foyer of Engineering Central, [Bay Campus](#)
- Reception on the first-floor landing of the Wallace Building, [Singleton Park Campus](#)

Standard Reception opening hours are Monday to Friday from 9am to 5pm however, this may vary outside of term time.

The current [FSE Student webpages](#) also contain useful information and links to additional resources:



READING LISTS

Reading lists for each module are available on the course Canvas page and are also accessible via <http://ifindreading.swan.ac.uk/>.

We do not expect you to purchase textbooks, unless it is a specified key text for the course.

THE DIFFERENCE BETWEEN COMPULSORY AND CORE MODULES

Compulsory modules must be **pursued** by a student.

Core modules must not only be **pursued**, but also **passed** before a student can proceed to the next level of study or qualify for an award. Failures in core modules must be redeemed.

Further information can be found under “Modular Terminology” on the following link - <https://myuni.swansea.ac.uk/academic-life/academic-regulations/taught-guidance/essential-info-taught-students/your-programme-explained/>

MSc (FHEQ Level 7) 2024/25
Aerospace Engineering MSc - January start
MSc Engineering (Aerospace)

Compulsory Modules

Semester 1 Modules	Semester 2 Modules
EG-M329 Advanced Propulsion 10 Credits Dr Z Ren CORE	EG-M190 Socio-Technical Engineering 10 Credits Dr SA Rolland/Prof JC Arnold CORE
EG-M69 Advanced Airframe Structures 10 Credits Prof H Haddad Khodaparast CORE	EG-M47 Business Leadership for Engineers 10 Credits Dr JE Norambuena-Contreras CORE
EG-M81 Flight Dynamics and Control 10 Credits Dr H Madinei CORE	EG-M90 Advanced Aerodynamics 10 Credits Prof BJ Evans/Prof K Morgan CORE
EGSM00 Structural Integrity of Aerospace Metals 10 Credits Prof C Pleydell-Pearce CORE	
EG-M62J Group Project (Aerospace January) 30 Credits Dr TN Croft CORE	
Dissertation	
EG-D02 MSc Dissertation - Aerospace Engineering 60 Credits Dr Y Xia CORE	
Total 180 Credits	

Optional Modules

Choose exactly 10 credits

Students who have taken EG-323 previously must choose EG-M23. Students without past FEA background knowledge are advised to take EGIM09. Students with other experience of FEA should discuss this module choice with the MSc coordinator.

EG-M23	Finite Element Computational Analysis	Prof R Sevilla	TB1	10 (CORE)
EG-M83	Simulation Based Product Design	Dr AJ Williams/Dr B Morgan	TB2	10 (CORE)
EGEM07	Fluid-Structure Interaction	Prof WG Dettmer	TB2	10 (CORE)
EGIM09	Finite Element Method	Dr W Harrison	TB1	10 (CORE)

And

Choose exactly 10 credits

If EGA301 Composite Materials was studied in year 3, EG-M73 cannot be selected.

EG-M330	Next Generation Sustainable Aircraft Technologies	Prof BJ Evans	TB2	10 (CORE)
EG-M73	Composite Materials	Dr FA Korkees	TB2	10 (CORE)