



Aerospace Manufacturing MSc

www.cranfield.ac.uk/aerospacemanufacturing



Within a rapidly-evolving aerospace industry, the need to adapt and innovate aerospace manufacturing production processes is becoming increasingly apparent. This, in combination with a need to meet faster time-to-market demands for increasingly complex, interconnected and feature-rich aerospace products, means there is a requirement for graduates who are well-equipped to manage the related manufacturing processes.

Aerospace manufacturing is responsible for the design, development and production of aircraft, spacecraft and their components. This industry is constantly innovating and pushing the boundaries of technology, which makes it an exciting and rewarding field in which to work. Specialist skills of aerospace production systems are vital to drive productivity improvements.

On the Aerospace Manufacturing MSc, you will gain the sought-after capabilities to manage major improvement programmes in the aerospace manufacturing industry or instigate intervention that delivers improvements to the performance of the businesses.

Who is it for?

We welcome students from a range of backgrounds, including undergraduate degrees in science, technology, engineering and mathematics. We also welcome students who have spent time in industry and are looking to further their education.

Your career

This qualification takes you on to a wide range of aerospace manufacturing roles such as management, operations, logistics and technology-related functions within global aerospace manufacturing organisations. Many graduates find employment with one of their project sponsors.

Students from this course have gone into roles including:

- Aeronautical Engineer,
- Aerospace Manufacturing Engineer,
- Composite Manufacturing Engineer,
- Mechanical and automation Engineer,
- Mechanical Engineer,
- Production Leader,
- Zero Emission Prototype Manufacturing.

Overview

Start date

Full-time: October or March. Part-time: throughout the year

Duration

Full-time MSc - one year, Part-time MSc - up to three years, Full-time PgCert - one year, Part-time PgCert - two years, Full-time PgDip - one year, Part-time PgDip - two years

Qualification

MSc, PgDip, PgCert

Study type

Full-time / Part-time

Structure

Taught modules 40%, group project 20%, individual project 40%

Campus

Cranfield campus

Entry requirements

We welcome applications from talented individuals of all backgrounds and each application is considered on its individual merit. Usually applicants must hold:

A UK lower second-class (2:2) undergraduate degree with honours, as a minimum, or equivalent international qualification.

Ideally, applicants will have studied in a relevant discipline.

Find information about equivalent qualifications in your country on our International entry requirements page.

Applicants who do not fulfil the standard entry requirements can apply for the Pre-master's course, successful completion of which will qualify them for entry to this course for a second year of study.

ATAS clearance

This course requires Academic Technology Approval Scheme (ATAS) clearance.

ATAS is run by the UK Government's Foreign, Commonwealth and Development Office (FCDO) and applies to international students, except exempt nationalities, who need a visa to study in the UK. Further information can be found in our application guide.

Fees

Please see www.cranfield.ac.uk/fees for detailed information about fee status, full-time and part-time fees as well as deposit requirements and bursary and scholarship information.

Course details

The course comprises eight modules (five compulsory and three electives), a group project and an individual project.

The modules include lectures, workshops, case studies, tutorials and company visits. Students need to complete a mix of modules that are fundamental to aerospace manufacturing systems and modules that are technology related.

Modules

Keeping our courses up-to-date and current requires constant innovation and change. The modules we offer reflect the needs of business and industry and the research interests of our staff. As a result, they may change or be withdrawn due to research developments, legislation changes or for a variety of other reasons. Changes may also be designed to improve the student learning experience or to respond to feedback from students, external examiners, accreditation bodies and industrial advisory panels.

To give you a taster, we have listed below the compulsory and elective (where applicable) modules which are currently affiliated with this course. All modules are indicative only, and may be subject to change for your year of entry

Compulsory modules

All the modules in the following list need to be taken as part of this course.

Operations Management

Manufacturing Systems Engineering

Sustainable Aerospace Manufacturing Business

Supply Chain Management

Aircraft Assembly

Elective modules

Select three from the list below

Additive and Subtractive Manufacturing Technologies

Composites Manufacturing for High Performance Structures

Failure of Engineered Assets

Manufacturing Strategy

Metal Additive Manufacturing Processes

Operations Analysis

Welding Processes and Equipment

"What I have enjoyed about Cranfield University so far is definitely the people! People at Cranfield, whether it's the academic staff, non-academic staff or students, they make Cranfield better. I really like the structure of the course and the lecturers."

Uththara Nanayakkara Aparakkage

current student, Aerospace Manufacturing MSc

Accreditation

The Aerospace Manufacturing MSc is accredited by the Institution of Mechanical Engineers (IMechE), the Royal Aeronautical Society (RAeS) and Institution of Engineering & Technology (IET) on behalf of the Engineering Council as meeting the requirements for further learning for registration as a Chartered Engineer (CEng).

Candidates must hold a CEng accredited BEng/BSc (Hons) undergraduate first degree to show that they have satisfied the educational base for CEng registration.

Please note accreditation applies to the MSc award, PgDip and PgCert (if offered) do not meet in full the further learning requirements for registration as a Chartered Engineer.



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IET The Institution of
Engineering and Technology

For more information contact our Admissions Team:
T: +44 (0)1234 758082

Visit campus for yourself and meet current students and our academics at our next Open Day:
www.cranfield.ac.uk/openday

January 2025

Every effort is made to ensure that the information provided here is correct at the time it is published. Please check our website for the latest information.