MSc Sustainable Food Processing

(Two years, Part-Time)

Online



Introduction

The MSc Sustainable Food Processing will provide students with excellent knowledge of the principles underlying the sustainable processing of foods and enable graduates to apply the technical knowledge acquired to the production of high quality, safe and nutritious foods, while maximising sustainability and minimising the environmental impact of food production and processing.

Delivered by leading international experts from the UCD School of Agriculture and Food Science and the UCD Institute of Food and Health, graduates will be skilled in proposing and developing solutions to sustainability problems as they relate to post-farm-gate food processing from the point of production to the point of sale and communicating these to stakeholders professionally. In a time where we need to find new ways of processing food at unprecedented volumes whilst minimising their environmental impact, graduates of this MSc will acquire a critical awareness of principles relating to scientific integrity and ethical issues in Sustainable Food Processing using a range of approaches.

Course Highlight

UCD Institute of Food and Health

The UCD Institute of Food and Health brings together UCD academic staff with active research programmes in the area of Food and Health into one centre of excellence. The Institute is a multidisciplinary, campus-wide initiative, comprising 60+ Principal Investigators all working together to deliver pioneering research in the area of food and health.

Programme Content and Structure

90 credits taught masters

Online Format

The MSc Sustainable Food Processing is delivered and assessed entirely online. The minimum registration is two years, however students have four years in which to complete the programme thereby affording flexibility. The online format of the programme enables students enrolled to combine studying while in employment.

Proposed modules: (Indicative list, may vary year by year):

- One Health
- Food chain integrity
- Nutrients for a balanced and healthy diet
- Plant foods
- Balancing environmental limits in food systems against dietary requirements
- · Advanced food safety toxicology
- Life cycle assessment
- Food microbiology
- Precision food safety in the genomics area
- · Fundamentals of food chemistry
- Milk and dairy products

Modules include a mixture of autonomous student learning, course work, and lectures. The course is assessed by a combination of assignments, in-trimester continuous assessment exercises, and end of trimester examinations.

Why study at UCD?



Graduate Education

12,000 graduate students; 17% graduate research students; structured PhDs



Graduate Employability

Ranked no. 1 in Ireland in QS Graduate Employability ranking



Global Careers

Dedicated careers support; 2 year stayback visa to work in Ireland



Global Community

8,500 international students and 300,000 alumni network across 165 countries



Global Profile

UCD is ranked in the top 1% of higher education institutions worldwide



Welcoming Campus

Modern parkland campus with 24 hr security. Wide range of facilities, clubs, societies and supports



Career Opportunities

This course is aimed at individuals working full-time in the food industry charged with improving the sustainability of food systems or those working in the food industry seeking to upskill and differentiate themselves for a career in this area. Recent graduates of food or health related disciplines seeking new careers in this rapidly expanding sector are also encouraged to apply.

Graduates of this MSc will be positioned for leadership roles in this critically important sector for the Irish and Global economy.

Opportunities for employment include:
Sustainability Manager, Environmental Officer, Food Processing Manager, Food Production Manager, Food Safety , New Product Development, Food Regulation Manager as well as emerging opportunities around Sustainable Food Systems.

Applicant Profile

- Applicants must hold a minimum of a Second-Class Honors degree in a cognate subject (Science, Engineering or related discipline), or international equivalent.
- Applicants with other awards who hold substantial relevant work experience will be considered.
- Applicants who do not hold the requisite Science qualification (but who hold a Level 8 Honors degree or equivalent) have been admitted previously and are advised to submit an application for assessment by the Programme Director to determine eligibility.
- Applicants whose first language is not English must also demonstrate English language proficiency of IELTS 6.5 (no band less than 6.0 in each element), or equivalent.

How will I learn?

The MSc Sustainable Food Processing is delivered through the UCD online learning platform (Brightspace) and will consist of pre-prepared lecture material delivered online, videos and demonstrations by lecturers, interactive learning, discussion boards and virtual classroom environments.

For each 5 ECTS credit module earned students are expected to undertake about 125 hours of work, to include on-line activity and performing their own study. Students will be required to complete quizzes periodically so that progress can be monitored. Formative assessments will be used to help you develop and critically assess your own understanding of the material presented. All modules will have a high continuous assessment component. Students have access to a UCD Module Coordinator at all times.

Fees and Scholarships

Tuition fee information is available on www.ucd.ie/fees.

UCD offers a number of graduate scholarships for full-time, self-funding international students, holding an offer of a place on a UCD masters programme. Please see www.ucd.ie/global/scholarships for further information.

Related Masters

- · MSc Food Safety (Online)
- MSc Food, Nutrition and Health(Online)
- · MSc Animal Science (Online)
- Professional Diploma Food Safety and Regulatory Science (Online)

Staff Profile



Assoc Prof Nigel Brunton Programme Director

Assoc Prof Nigel Brunton holds an MSc and PhD from the School of Agriculture and Food at University College Dublin.

He has over 30 years of expertise in food chemistry, sample extraction and chromatography analysis.

Ranked among the top 1% of the most cited researchers in the world*, Dr Brunton specialises in the area of phytochemicals and the recovery of valuable compounds from food waste

* Highly Cited Researchers report 2020