

INTRA Programme

B.Sc Environmental Science and Health



THE OVERALL OBJECTIVE of this four-year, fulltime degree programme is to produce graduates with a multidisciplinary approach to environmental science and health coupled with an opportunity to specialise in biotechnological, chemical, physical or health aspects of the subject. The objective is to ensure that the student gains a holistic understanding of the human impact on the environment and the impact of the environment on humans.

Programme Outline

In the first two years each student covers the fundamentals of environmental biotechnology, environmental health, environmental chemistry and environmental physics, which are the four specialist areas covered by the degree. Typical modules include microbiology and genetics, atmospheric and aquatic chemistry, atmospheric physics, and anatomy and physiology for health professionals. In third-year students specialise in areas relevant to the environment, along with an international field trip. Relevant work experience is a central feature of education at DCU and an integral part of all undergraduate and some graduate degrees. This is called INTRA (INtegrated TRAIning). The second half of third-year comprises a six month INTRA (Integrated TRAIning) placement. In fourth-year students complete a major project in their chosen specialism.

Work Areas

The interdisciplinary nature of the programme will strengthen the marketability of students, who will have the ability to work in a variety of areas:

- Pollution Control and Inspection
- Environmental Monitoring and Analysis
- Waste Treatment and Management
- Environmental Consultancy
- Quality Control/Assurance
- Research and Development
- Health and Safety
- Health Promotion
- Medical Physics

Student Availability

Students are available for interview from early October. Please post vacancies on the *INTRA on line* web site at www.intra.dcu.ie, or send details to:

INTRA Unit, Student Affairs,
Dublin City University,
Glasnevin, Dublin 9, Ireland.
Phone: 00 353 1 700 5033 Fax: 00353 1 700 5505
Web: www.intra.dcu.ie

B.Sc ENVIRONMENTAL SCIENCE AND HEALTH

Year 1

BIOLOGY

CHEMISTRY

PHYSICS

MATHEMATICS

COMPUTING

Year 2

BIOTECHNOLOGY

Pollution and the Biosphere
Microbiology
Genetics

CHEMISTRY

Chemistry of energy production
Atmospheric and aquatic chemistry

PHYSICS

Atmospheric Physics
Meteorology

HEALTH

Anatomy and Physiology for Health Professionals
Sociology of Health
Epidemiology

PRACTICAL

Environmental Chemistry
Environmental Physics
Environmental Biotechnology

Year 3

LAW

Environmental Sciences and the Law
International Field Trip

BIOTECHNOLOGY

Environmental biotechnology and waste treatment

CHEMISTRY

Analysis of organic and inorganic species
Environmental monitoring and Control

PHYSICS

Environmental Geophysics

HEALTH

Health promotion

I N T E R A

CORE

CHOOSE FROM THE FOLLOWING OPTIONS

Year 4

CORE MODULES

Environmental Health and Safety
Environmental ethics
Environmental protection and sustainable development
Environmental and Occupational Health and Safety Law
Research project

BIOTECHNOLOGY

Environmental Biotechnology
Environmental Toxicology

CHEMISTRY

Chemistry of Organic Pollutants in the Environment
Environmental Analysis
Chemistry of organic pollutants and the environment

PHYSICS

Environmental spectroscopy and instrumentation
Medical and health physics