Imperial College London

Programme Information		
Programme Title	Programme Code	HECoS Code
Biological Sciences with Management (3 Years)	C1N2	For Registry Use Only

Award	Longth of Study	Mode of Study Entry Point(s)	Total Credits			
Award	Length of Study	Mode of Study		ECTS	CATS	
BSc	3 Years	Full-time	October	180	360	
Dip HE	2 Years	Full-time	N/A	120	240	
Cert HE	1 Year	Full-time	N/A	60	120	
The Cert. HE / Dip. HE are exit awards and are not available for entry. All students must apply to and join the BSc						

Ownership				
Awarding Institution	Imperial College London	Faculty	Natural Sciences	
Teaching Institution	Imperial College London	Department	Life Sciences	
Associateship	Associateship of the Royal College of Science (ARCS)	Main Location(s) of Study	South Kensington	
External Reference				
Relevant QAA Benchmark Statement(s) and/or other external reference points		Biosciences		
FHEQ Level		Level 6		
EHEA Level		1 st cycle		
External Accreditor(s) (if ap	oplicable) Not applicable			
External Accreditor 1:	АМВА			
Accreditation received:	1987	Accreditation renewal:	2023	
External Accreditor 2: EQUIS			·	
Accreditation received:	2006	Accreditation renewal:	2025	
External Accreditor 3: AACSB International				

Accreditation received:	2012	Accreditation renewal:	2023	
Accreditation received.	2012	Acciculation renewal.	2023	

Collaborative Provision Not applicable					
Collaborative partner	Collaboration type	Agreement effective date	Agreement expiry date		
N/A	N/A	N/A	N/A		
Specification Details					
Programme Lead		Prof Huw Williams			
Student cohorts covered by	specification	2022-23 entry			
Date of introduction of programme		October 2019			
Date of specification revision		October 2022			

Programme Overview

The BSc Biological Sciences with Management is a three-year degree. In the first two years students will tackle core subjects to ensure that they receive a solid grounding in the fundamentals.

Studying the Biological Sciences BSci programme you will be actively engaged in a curriculum that will be enriched from year 1 onwards by the Department of Life Sciences' research environment. The curriculum addresses the broad fundamental knowledge required to understanding the living organisms from their basic biochemistry, genetics and information flow in cells to detailed knowledge of the relationships, evolution, and key features of certain groups of organisms. You will gain understanding of the processes by which the diversity of life on earth has arisen, interacts with its environment.

All students on Biological Sciences programmes follow the same core modules in the first year of study, where the programme will range from biological chemistry to ecology and biodiversity. This will be complemented by a Life Science Skills programme that will provide training in quantitative skills, programming, statistics and scientific writing and presentation. You will develop a synoptic understanding of Biological Sciences before starting to specialise in year 2 by taking elective modules. By selecting modules from different areas a broad biological sciences training is possible or you can make selections leading to specialisation in a range of areas including Ecology, Environmental Science, Biodiversity, Microbiology, Immunology, Molecular Biology, Stem Cells, Neuroscience, Developmental Biology and Bioinformatics.

Through laboratory, computational and field work you will learn the skills you need to design, carry out and analyse the data from biological experiments.

You will learn from the full range of academic staff in the department, including world leaders, as well as postgraduate students, your peers and visiting scientists to the department. You will develop into effective, independent Life Scientists; life-long learners with high self-efficacy; and rational and evidence-based decision makers.

The third year will be spent in the Imperial College Business School. This year aims to prepare students for a career in business management, management services or management consultancy in the private or public sectors in the UK, Europe or worldwide.

A high proportion of Graduates in Biological Sciences go onto further study including PhD study or enter a range of employments including, research and development in pharma, biotech, ecological consultancy, science policy, research and technical consultancy, business and finance.

Learning Outcomes

Please refer to the Teaching Toolkit for advice on the role and purpose of Intended Learning Outcomes (ILO): www.imperial.ac.uk/staff/educational-development/teaching-toolkit/intended-learning-outcomes

On completion of this programme, graduates will be able to:

On achieving the Cert HE:

- 1. Interpret and apply core terminology and key concepts used in life sciences;
- 2. Integrate fundamental biological and/or biochemical principles to explore biological complexity;
- 3. Integrate concepts from a range of disciplines, including physics, chemistry and maths, to solve problems in life sciences;
- 4. Demonstrate effective verbal, written communication and presentation skills;

On achieving the Dip HE, the ILOs (1-4) above and

- 5. Explore ethical and social issues in life sciences, and consider the potential impact of novel technologies;
- 6. Formulate hypotheses, design experiments, and apply lab and/or field skills to collect and critically evaluate relevant data;
- 7. Conduct statistical analyses using programming skills, adhering to publication standards;
- 8. Collaborate successfully in diverse, multicultural and international teams;

On achieving the BSc, all the ILOs (1-8) above and

- Demonstrate excellent verbal, written communication and presentation skills across a range of academic and disciplinary activities, including research, assessment, dissemination and communication with diverse audiences;
- 10. Solve complex real-world problems within their degree specialisation, using a range of appropriate laboratory, computational or field skills;
- 11. Create independent, enquiry-based, extended and novel work that demonstrates critical analysis and evaluation.
- 12. Demonstrate a foundation of knowledge in core business disciplines
- 13. Demonstrate the capability to apply this knowledge
- 14. Continue to develop their personal skill set

The Imperial Graduate Attributes are a set of core competencies which we expect students to achieve through completion of any Imperial College degree programme. The Graduate Attributes are available at: www.imperial.ac.uk/students/academic-support/graduate-attributes

Entry Requirements

	<u>A level</u>
Academic Requirement	AAA overall, to include: A in Biology A in Chemistry, Mathematics or Physics A in another subject
	General Studies and Critical Thinking are not accepted.
	International Baccalaureate (IB)

	Minimum 38 overall 6 in Biology at higher level 6 in Chemistry, Physics or Mathematics at higher level
Non-academic Requirements	None
English Language Requirement	Higher requirement Please check for other <u>Accepted English Qualifications</u>
Admissions Test/Interview	There is no admissions test associated with entry to this programme and applicants will not normally be interviewed.

The programme's competency standards documents can be found at: TBA

Learning & Teaching Approach

Learning and Teaching Delivery Methods

Lectures and large group-teaching incorporating a range of active leaning approaches, laboratory practicals working as individuals, in pairs or small groups, field work, computational work, seminars, tutorials and problem classes, interactive online learning material, online concepts and skills videos and interactive group work, student presentations as individuals and small groups, team-based learning, dissertation and individual research projects.

Overall Workload

Your overall workload consists of face-to-face sessions and independent learning. While your actual contact hours may vary according to the optional modules you choose to study, the following gives an indication of how much time you will need to allocate to different activities at each level of the programme. At Imperial, each <u>ECTS credit</u> taken equates to an expected total study time of 25 hours. Therefore, the expected total study time is 1500 hours per year.

Typically in the first two years you will spend in the order of 30% of your time on lectures, laboratory work and small group teaching and seminars and similar (around 400 hours) and in the order of 70% of your time on independent study.

Assessment Strategy

Assessment Methods

Formative assessment.

Performance in problem classes, quizzes in lectures, digital resources for self-assessment including online quizzes and problems, by discussions in tutorials as well as written and or verbal feedback on a range of non-examined tasks, including the types of summatively assessed tasks listed below.

Summative Assessment

Written Examinations Laboratory write-ups Essays Reports Dissertations Presentations Individual research project report Viva voce examination Peer assessment Poster presentations

Assessment Mode	Year 1	Year 2	Year 3
Examination	60	48	60
Coursework	40	52	40

Academic Feedback Policy

Coursework submission is managed by our education office and in most cases coursework is submitted electronically via BlackBoard and feedback is provided electronically or by a feedback form attached to items of coursework. Feedback is also provided via Blackboard on formative quizzes. You will receive feedback normally within 10 working days, but this might be longer for some very substantial pieces of work, such as a dissertation. Personal tutors hold timetabled tutorials to give feedback on examination performance and can be approached by their tutees at any point in the year for further guidance. The education office manages the timely return of coursework feedback and the Director of Undergraduate Studies routinely monitors the quality and quantity of feedback provided. In some instances, generic class feedback is returned to all students via email or a Blackboard announcement once coursework is marked.

Re-sit Policy

The College's Policy on Re-sits is available at: <u>www.imperial.ac.uk/student-records-and-data/for-current-</u> students/undergraduate-and-taught-postgraduate/exams-assessments-and-regulations/

Mitigating Circumstances Policy

The College's Policy on Mitigating Circumstances is available at: <u>www.imperial.ac.uk/student-records-and-data/for-current-students/undergraduate-and-taught-postgraduate/exams-assessments-and-regulations/</u>

Additional Programme Costs

This section should outline any additional costs relevant to this programme which are not included in students' tuition fees.

Description	Mandatory/Optional	Approximate cost
Field Trips	Optional	£1500

Programme S	Programme Structure						
Year 1 – FHEQ Level 4 Students study all core modules.							
Code	Module Title	Core/ Elective	Group*	Term	Credits		
LIFE40005	Biological Chemistry and Microbiology	Core		1-3	15		
LIFE40008	Evolution and Diversity	Core		1-3	15		
LIFE40006	Cell Biology and Genetics	Core		2-3	15		
LIFE40007	Ecology and Evolution	Core		2-3	15		
Credit Total				60			

Year 2 - FHEQ Level 5 Students study all core modules. Students select three electives for study, one from each of Groups A, B and C.

Code	Module Title	Core/ Elective	Group	Term	Credits
LIFE50016	Applied Molecular Biology	Core		1	7.5
LIFE50011	Genetics	Core		1	7.5
LIFE50025	Bioinformatics, Statistics and Programming (BS)	Core		1-2	5
LIFE50003	Tutored Dissertation	Core		3	7.5
LIFE50005	Cell and Developmental Biology	Elective	А	2	10
LIFE50017	Molecular Microbiology	Elective	А	2	10
LIFE50009	Essentials of Ecology: Theory and Practice	Elective	А	2	10
LIFE50006	Cellular and Molecular Neuroscience	Elective	В	2	10
LIFE50012	Immunology	Elective	В	2	10
LIFE50002	Behavioural Ecology	Elective	В	2	10
LIFE50024	Vertebrate Form and Evolution	Elective	С	3	7.5
LIFE50008	Ecology Field Skills	Elective	С	3	7.5
LIFE50014	Molecular and Cell Biology Skills	Elective	С	3	7.5
LIFE50018	Computational 'Omics	Elective	С	3	7.5
	I-Explore	Compulsory		1-2	5/7.5
	·		Cred	it Total	60/62. 5

Year 3 FHEQ Level 6 Students study all compulsory modules.					
Code	Module Title	Core/ Elective/ Compulsory	Group	Term	Credits
BUSI97178	Plagiarism Awareness	Compulsory	N/A	1	0
BUSI60023	Accounting	Compulsory	N/A	1	5
BUSI60033	Business Economics	Compulsory	N/A	1	5
BUSI60025	Global Strategy	Compulsory	N/A	1	5
BUSI60026	Organisational Behaviour and Human Resource Management	Compulsory	N/A	1	5
BUSI60028	Marketing	Compulsory	N/A	2	5
BUSI60034	Innovation Management	Compulsory	N/A	2	5
BUSI60035	Finance and Financial Management	Compulsory	N/A	2	5
BUSI60027	Sustainable Business	Compulsory	N/A	2	5
BUSI60031	Entrepreneurship	Compulsory	N/A	2	5
BUSI60032	Research Methods and Practice	Compulsory	N/A	1-3	15
Credit Total				60	

* 'Group' refers to module grouping (e.g. a group of electives from which one/two module(s) must be chosen).

Progression and Classification

Progression

In order to progress to the next level of study, you must have passed all modules (equivalent to 60 ECTS) in the current level of study at first attempt, at resit or by a compensated pass.

The overall weighted average for each year must be 40%, including where a module(s) has been compensated, in order for you to progress to the next year of the programme.

Classification

The marks from modules in each year contribute towards the final degree classification.

In order to be considered for an award, you must have achieved the minimum number of credits at the required levels prescribed for that award and met any programme specific requirements as set out in the Programme Specification.

Your classification will be determined through:

- i) Aggregate Module marks for all modules
- ii) Year Weightings

For this award, Year One is weighted at 7.50%, Year Two at 35.00% and Year Three at 57.50%.

The College sets the class of undergraduate degree that may be awarded as follows:

amme Specific Regulations			
	iv)	Third	40% or above for the average weighted module results
	iii)	Lower Second	50% or above for the average weighted module results
	ii)	Upper Second	60% or above for the average weighted module results
	i)	First	70% or above for the average weighted module results

Programme Specific Regulations

N/A

Supporting Information

The Programme Handbook is available at: **TBA**

The Module Handbook is available at: **TBA**

The College's entry requirements for postgraduate programmes can be found at: www.imperial.ac.uk/study/pg/apply/requirements

The College's Quality & Enhancement Framework is available at: www.imperial.ac.uk/registry/proceduresandregulations/qualityassurance

The College's Academic and Examination Regulations can be found at: www.imperial.ac.uk/about/governance/academic-governance/regulations

Imperial College is an independent corporation whose legal status derives from a Royal Charter granted under Letters Patent in 1907. In 2007 a Supplemental Charter and Statutes was granted by HM Queen Elizabeth II. This Supplemental Charter, which came into force on the date of the College's Centenary, 8th July 2007, established the College as a University with the name and style of "The Imperial College of Science, Technology and Medicine".

www.imperial.ac.uk/admin-services/secretariat/college-governance/charters/

Imperial College London is regulated by the Office for Students (OfS) www.officeforstudents.org.uk/advice-and-guidance/the-register/

This document provides a definitive record of the main features of the programme and the learning outcomes that a typical student may reasonably be expected to achieve and demonstrate if s/he takes full advantage of the learning opportunities provided. This programme specification is primarily intended as a reference point for prospective and current students, academic and support staff involved in delivering the programme and enabling student development and achievement, for its assessment by internal and external examiners, and in subsequent monitoring and review.

difications				
Description	Approved	Date	Paper Reference	
N/A	N/A	N/A	N/A	