

BSc (Hons) Economics with Data Science

Programme Specification

Awarding Institution:

University of London (Interim Exit Awards made by Goldsmiths' College)

Teaching Institution: Goldsmiths, University of London

Final Award: BSc (Hons) Economics with Data Science

Programme Name: BSc Economics with Data Science

Total credit value for programme: 360 credits

Name of Interim Exit Award(s):

Certificate of Higher Education in Economics

Diploma of Higher Education in Economics

Duration of Programme: 3 years

UCAS Code(s): L1M2

HECoS Code(s): (100450) Economics (75%) (100366) Computer Science (25%)

QAA Benchmark Group: Economics

FHEQ Level of Award: Level 6 for final award

Programme accredited by: Not applicable

Date Programme Specification last updated/approved: June 2023

Home Department: IMS

Department(s) which will also be involved in teaching part of the programme:

Department of Computing

Programme Overview

The current economics programmes (BA/BSc in Economics, BSc Economics with Marketing) give students a formal and rigorous training in economic theory and application, but also make them aware of the social, historical and political context of economic analysis. It allows them to explore key areas of modern economy and society from an interdisciplinary point of view, thereby putting them at the forefront of what is happening in the world today and equipping them to apply their knowledge to real world issues.

The current BSc (Hons) in Economics with Data Science extends the logic of the Economic curriculum by exploring the connection between Economics and Computing. It distinguishes itself from existing programs through its focus on cutting-edge computational methods related to data analysis. Rapid developments in Artificial Intelligence and Machine Learning

have profoundly influenced academic research, businesses and public organizations. Consequently, the need for computational thinking and data-driven methods in economic analysis are becoming indispensable in an increasingly digital and connected world. The successful programmes and modules in Goldsmiths' Department of Computing are highly relevant in this context, equipping students with necessary computing skills. Some of the pressing economic questions of today – both theoretical and applied – require not just a solid exposure to theoretical foundations in economics, but also interdisciplinary tools, skills and an ability to work with complex, high-dimensional datasets. The increasing demand for economists with expertise in the interface between economics and computational methods for data analysis is the focus of this programme. This new degree intends to advance student knowledge in these disciplines in the following three ways: 1) To offer a rigorous foundation of economic thinking and the tools (both theory and empirical analysis) that are part of the trade. 2) To ground students into the context of application of these tools both historically and in the different political and social realities of today. 3) To expose students to computational thinking, develop advanced programming skills and ability to work with big datasets to be able to understand and tackle important socio-economic problems. To achieve these objectives students across the years will have core and optional modules in economic analysis (e.g. Introductory Economics, Intermediate Microeconomics, Intermediate Macroeconomics, International Economics, Public Economics, Behavioural Economics), in mathematical and statistical analysis (e.g. Mathematics for Economics and Business, Quantitative Economics, Applied Quantitative Economics, Econometrics, Advanced Econometrics, Data Visualisation, Data Mining), in the context of economic ideas and the broader political and social context of today (e.g. Introductory Economics, Economic History, Gender, Race and Economic Relations, Identity, Agency and Environment 1&2), and in computational methods, especially in relation to developing advanced skills and methods to organise, analyse and infer from various form of data (e.g., Introduction to programming, Computing Project, Programming with data, Machine Learning, Artificial Intelligence). We expect this degree will not only develop graduates well-equipped to analyse important economic issues using cutting edge methods but will also be able to instigate change and have successful professional careers. The approach taken by this programme, which transcends existing disciplinary boundaries, will be pioneering in reimagining and redefining the toolkit available for future economists. This degree intends to equip graduates with the skills necessary to understand and tackle challenges posed by a dynamic economy.

Programme entry requirements

ABB in A level grades.

BTEC: DDD

IB: 33 Points

International non-English native speakers will need to demonstrate an adequate level of English for academic purposes. This is defined as IELTS 6.0 (with a minimum of 6.0 in the written element and no individual element lower than 5.5).

Programme learning outcomes

Each component module of this programme has its own detailed learning outcomes and related methods of assessment that complement the overall learning outcomes of the programme. Reaching these learning objectives will enable students to synthesise rigorous knowledge of economic theory with an understanding of the appropriate use of models and statistical techniques in the real world and its relation to Data Science. By the end of the programme, a typical student engaging fully with the programme modules and activities should expect to have acquired knowledge and understanding of economic theory and application, data analysis, and in several core topics in computing/data science.

Students who successfully complete 120 credits of the BSc Economics with Data Science and choose to discontinue their studies and who are awarded a Certificate of Higher Education in Economics will be able to:

Knowledge and understanding

Code	Learning outcome	Taught by the following module(s)
A1	Demonstrate competence in basic mathematical manipulation of economic formulas.	Mathematics for Economics and Business
A2	Have an understanding of basic economic terminology.	Introductory Economics
A3	Basic knowledge of a programming language and its features.	Introduction to Programming/ Computing Project 1

Cognitive and thinking skills

Code	Learning outcome	Taught by the following module(s)
B1	Have a basic understanding of core economic concepts.	Introductory Economics
B2	Can identify differences between economic and other discourses of the social sciences.	Identity, Agency and the Environment 2

Code	Learning outcome	Taught by the following module(s)
B3	Computational problem-solving skills.	Introduction to Programming/ Computing Project 1

Subject specific skills and professional behaviours and attitudes

Code	Learning outcome	Taught by the following module(s)
C1	Demonstrates understanding of different schools of economic thought	Introductory Economics
C2	Learn mathematical operations for the manipulation of algebraic expressions in economics	Mathematics for Economics and Business
C3	Demonstrates understanding in programming basic computing software.	Introduction to Programming
C4	Develop complete, but limited, computing projects.	Computing Project 1

Transferable skills

Code	Learning outcome	Taught by the following module(s)
D1	Demonstrate basic skills in evaluating evidence, bibliographic searching, systematic reading, and use of internet resources	Identity, Agency and Environment 1 & 2; All level 4 modules
D2	Demonstrate basic computing skills and familiarity with information technology	Identity, Agency and Environment 1 & 2; All level 4 modules
D3	Discuss and explain the importance and limits of the economics approach in solving social problems.	Introductory Economics; Identity, Agency and the Environment 1 and 2
D4	Utilise essay and report writing skills.	Introductory Economics
D5	Independently manage workloads and submit work to a deadline	All level 4 modules
D6	Demonstrate core numeracy, computer literacy and IT skills.	Mathematics for Economics and Business; Introduction to Programming; Computing Project 1

Students who successfully complete 240 credits of the BSc (Hons) Economics with Data Science and decide to discontinue their studies and who are awarded a Diploma of Higher Education in Economics, in addition to the learning outcomes outlined above, will be able to:

Knowledge and understanding

Code	Learning outcome	Taught by the following module(s)
A1	Demonstrate competence in performing statistical analysis of economic data	Quantitative Economics; Applied Quantitative Economics
A2	Demonstrate detailed knowledge of core microeconomic and macroeconomic concepts	Intermediate Microeconomics; Intermediate Macroeconomics
A3	Demonstrate competence in data manipulation using computing packages	Applied Quantitative Economics; Programming with Data

Cognitive and thinking skills

Code	Learning outcome	Taught by the following module(s)
B1	Articulate consistent interpretations of statistical analysis and data	Quantitative Economics; Applied Quantitative Economics
B2	Demonstrate an ability to analyse key principles and concepts of economic theory	Intermediate Microeconomics; Intermediate Macroeconomics
B3	Demonstrate an ability to use computer packages to analyse data from a variety of perspectives.	Applied Quantitative Economics; Programming with Data

Subject specific skills and professional behaviours and attitudes

Code	Learning outcome	Taught by the following module(s)
C1	Demonstrate a clear understanding of core technical competence in the fields of microeconomics, macroeconomics and statistics for economics	Intermediate Microeconomics; Intermediate Macroeconomics; Quantitative Economics; Applied Quantitative Economics
C2	Demonstrate an analytical understanding of the historical, social and political context of economic phenomena	Economic History

Transferable skills

Code	Learning outcome	Taught by the following module(s)
D1	Use computer programming effectively to perform data analysis	Applied Quantitative Economics
D2	Engage with complex texts and summarise their arguments effectively	Economic History

Code	Learning outcome	Taught by the following module(s)
D3	Apply skills necessary for employment, such as taking personal responsibility and decision-making	All level 5 modules
D4	Actively contribute to theoretical discussion, and develop strengths in relation to speaking confidently in public	All level 5 modules

Students who successfully complete 360 credits and who are awarded the BSc (Hons) Economics with Data Science, in addition to the learning outcomes stated above with reference to 120 and 240 credits, will be able to:

Knowledge and understanding

Code	Learning outcome	Taught by the following module(s)
A1	Demonstrate a systematic understanding of economic theory.	International Economics; Public Economics; Optional Modules in Economics including: Gender, Race and Public Policy; Individual and Institutional Economic Behaviour; Manias, Bubbles, Crises and Market Failure
A2	Demonstrate specialised knowledge in at least two subfields of economic theory.	International Economics; Public Economics, Econometrics, Economic Crises
A3	Be able to articulate clear arguments on the strengths, limits and context of economic analysis for understanding the economy and society.	Public Economics; International Economics; Optional Modules in Economics including: Gender, Race and Public Policy; Individual and Institutional Economic Behaviour; Manias, Bubbles, Crises and Market Failure
A4	Implement a number of basic machine learning models and apply them on data	Machine Learning
A5	Demonstrate a systematic understanding of data handling techniques.	Econometrics; Further Econometrics; Machine Learning; Options in Computing
A6	Demonstrate refined knowledge of data analysis.	Econometrics; Further Econometrics; Machine Learning; Options in Computing

Cognitive and thinking skills

Code	Learning outcome	Taught by the following module(s)
B1	Explain real-world phenomena using economic theory	Public Economics; International Economics; Optional Modules in economics including: Gender, Race and Public Policy; Individual and Institutional Economic Behaviour; Manias, Bubbles, Crises and Market Failure
B2	Be able to employ complex arguments from different schools of economic thought	Public Economics; International Economics; Optional modules in economics including: Gender, Race and Public Policy; Individual and Institutional Economic Behaviour; Manias, Bubbles, Crises and Market Failure
B3	Explain fundamental machine learning concepts.	Machine Learning
B4	Be able to identify, employ and explain the right approach to use in relation to data analysis for a real-world problem.	Econometrics; Advanced Econometrics; Machine Learning; Other optional modules in Computing

Subject specific skills and professional behaviours and attitudes

Code	Learning outcome	Taught by the following module(s)
C1	Demonstrate a refined understanding of the following fields of specialised economic knowledge	Public Economics; International Economics
C2	Demonstrate an understanding the strengths and limits of rationality in economic theory	Optional Economics modules including: Gender, Race and Public Policy; Individual and Institutional Economic Behaviour; Manias, Bubbles, Crises and Market Failure
C3	Demonstrate a detailed understanding of the variety of ways to analyse data and the limitations of each technique	Econometrics; Advanced Econometrics; Machine Learning; and other options in Economics and Computing

Transferable skills

Code	Learning outcome	Taught by the following module(s)
D1	Work independently and evaluate evidence for complex theoretical and applied problems	Public Economics; International Economics; Economics and Computing Optional Modules
D2	Use deductive reasoning to analyse individual and institutional behaviour	Individual and Institutional Economic Behaviour; Manias, Bubbles, Crises and Market Failure
D3	Link economic with non-economic approaches to analyse and solve social problems	Public Economics; International Economics; Gender, Race and Economic Relations
D4	Demonstrate excellent ability in the use of data presentation skills and report writing utilising data	Econometrics; Advanced Econometrics; Computing Module Options

Marking criteria

Mark	Description	Generic Grading Descriptors	Specific Grading/Marking Criteria
0%	Non-submission or academic misconduct	A categorical mark representing either the failure to submit an assessment or a mark assigned in case of academic misconduct.	0% is a non-submission or the mark that will usually be given to an assessment subject to academic misconduct.
1-9%	Very Bad Fail	A submission that does not attempt to address the specified learning outcomes.	Not a Valid Attempt (1-9%). This is typically awarded to an answer that does not attempt to address the topic or question.
10-39%	Fail	Represents a significant overall failure to achieve the appropriate learning outcomes.	Work given a fail mark is likely to: <ul style="list-style-type: none"> a. Fail to address the topic or answer the question; b. Lack a structure or framework;

			<p>c. Fail repeatedly to relate statements to each other;</p> <p>d. Lack a line of argument;</p> <p>e. Fail to use evidence to support claims that are made.</p> <p>10-24% is a significant failure to achieve learning outcomes but is deemed a valid attempt. Marks in this band might be awarded to an answer that shows that the student has attended relevant lectures, even if there is little in the answer that is of direct relevance to the question.</p> <p>25-39% represents an overall failure to achieve the learning outcomes of the module. Marks in this band might be awarded to an answer that contains some indication that the student can recall having heard or read something relevant to the question.</p>
40-49%	Threshold III: Third	Represents the overall achievement of the appropriate learning outcomes to a threshold level (honours).	<p>Work awarded a third class mark is likely to:</p> <ul style="list-style-type: none"> a. Address the topic or question by reproducing material that is only partly relevant; b. Have an unclear or illogical structure or framework; c. Present relationships between statements that are often difficult to recognise; d. Have a poor quality line of argument; e. Make poor use of evidence to support most claims. <p>At a minimum, a third class piece of work must contain some relevant material. Typically, this means providing</p>

			<p>a clear indication that the appropriate lectures have been attended, and/or some recommended reading has been read; however, the reproduction of this material is either scant or inaccurate. A high third is likely to reproduce this material with fewer inaccuracies, but still lacks structure, argument, and evidential support.</p>
50-59%	Good Iiii: Lower Second	<p>Represents the overall achievement of the appropriate learning outcomes to a good level.</p>	<p>Work awarded a lower second class mark is likely to:</p> <ul style="list-style-type: none"> a. Present relevant material without using it to address the question or issue in a precise way; b. Have a structure, but one that is vague and/or illogical; c. Present relationships between statements that are sometimes difficult to recognise; d. Have a reasonable line of argument; e. Tend to make claims with some but not sufficient supporting evidence. <p>At minimum, a lower second class piece of work must show that the student has a fair knowledge of the basic material relating to the question or issue concerned. Higher marks within this category will be awarded according to how accurately the material is handled, the relevance of the material that is presented, and the clarity of the writing. Thus, a good lower second is likely to reproduce material that is relevant to the essay topic or question with reasonable accuracy, and to structure that material clearly. It is principally distinguished from an upper second by not going much beyond what was presented in</p>

			lectures or what is available in recommended reading.
60-69%	Very good Ili: Upper Second	Represents the overall achievement of the appropriate learning outcomes to a very good level.	<p>Work awarded an upper second mark is likely to:</p> <ol style="list-style-type: none"> a. Address the topic or answer question; b. Have a logical structure; c. Have relationships between statements that are generally easy to follow; d. Have a good quality line of argument; e. Support claims by reference to relevant literature. <p>At minimum, an upper second class piece of work must answer the question or address the issue concerned, be clearly written, and show signs that the student has read beyond the basic source material. For lecture-based assessments, this usually means going beyond what was presented in the lectures themselves; for work that is not lecture-based, this means going beyond basic recommended reading. A top upper second will in addition be likely to have a clearer structure, a stronger line of argument, and draw on a broader range of material.</p>
70-79%	Excellent I: First	Represents the overall achievement of the appropriate learning outcomes to an excellent level.	<p>Work assigned a first class mark is likely to:</p> <ol style="list-style-type: none"> a. Address the topic in an explicit manner; b. Have a logical, clear and well-delineated structure; c. Have relationships between statements that are very easy to recognise;

			<p>d. Have an excellent or original line of argument that is easily followed;</p> <p>e. Give wide-ranging and appropriate evidential support for claims.</p> <p>At minimum, a first class piece of work needs to answer the question or address the issue concerned, be well-constructed, and show evidence of independent reading and thinking. The particularly important qualities are those concerned with structure, argument and evidence. Thus, a good First has to be very well written, develop an argument that is original, and draw on a wide range of material.</p>
80-90%	Outstanding I: First	Represents the overall achievement of the appropriate learning outcomes to an outstanding level.	Work assigned an Outstanding First will meet all of the suggested achievements of an Excellent First at an outstanding level.
90-100%	Exceptional I: First	Represents the overall achievement of the appropriate learning outcomes to an exceptionally accomplished level.	Work assigned an Exceptional First will meet all of the suggested achievements of an Excellent First at an exceptionally accomplished level.

Mode of study

The teaching and learning methods to which students are exposed have been designed in recognition of: (a) the different knowledge routes to learning; (b) the learning requirements of different types of information and skills; and (c) the need for students to engage in a complementary range of learning activities, leading to the synthesis of academic knowledge and professional skills/competencies.

To achieve the learning outcomes, students experience a range of teaching/learning methods, including formal lectures, analysing case studies, seminars, tutorials, summative coursework (essays and reports), and independent research projects. Formal lectures are

integral to the acquisition of subject specific skills and understanding, but these also provide the opportunity for discussion, group work and debate. This learning strategy is designed to challenge students' preconceptions, facilitate independent thought, and enable students to develop a critical perspective. In some instances, seminars and workshops provide a further opportunity to develop an independent and critical perspective.

Students receive feedback on written work (essays and practical reports) relating to the logic of arguments, their coherence, references, coverage of background literature, etc., highlighting the major strengths and weaknesses sufficient to allow students to know how to improve their work. During meetings with their module lecturers and personal tutor, students have a further opportunity to receive feedback and academic guidance. The written and oral feedback serve a number of functions: (a) to identify areas in need of further development, serving a diagnostic function; (b) the discussion accompanying oral feedback provides an opportunity to develop knowledge and appreciation of theoretical and applied material, and to encourage students to think critically and independently; and (c) feedback provides students with tangible criteria against which progress can be monitored. Group meetings between tutors assure the reliability and validity of these forms of assessments. In addition, all summative work is moderated. Detailed criteria for marking bands are provided for students in the Programme Handbook.

Programme structure

In each year of the programme, students will have to take compulsory modules that cover a number of subfields of economics: microeconomics, macroeconomics, Quantitative Economics, Economic History, Econometrics (basic and advanced); as well as modules that cover various aspects of computing/data science: Introduction to Programming, Machine Learning and Programming with Data. Students will develop applied hands-on skills through modules like Computing Project. Alongside these, they will take modules on our social environment and employment skills: Identity, Agency and Environment, The Goldsmiths Project or My Career Strategy. The compulsory economics component for the BA in Economics with Data Science comprises of 120 credits in the first year, 90 credits in the second year and 30 credits in the third year. The programme is also designed to provide several optional modules (45 credits) from economics in year 3, which offer a range of advanced topics for students to choose from, such as International Economics; Public Economics; Behavioural Economics; Individual and Institutional Economic Behaviour; Gender, Race and Economic Relations and Manias, Bubbles, Crises and Market Failures. Similarly, students get to choose 30 credits worth of optional modules in Data Science such as Artificial Intelligence, Neural Networks, Data Visualisation and Data Mining.

The programme progresses by building competence in economic theory and statistical analysis, and provides the necessary context through economic history. Furthermore, the programme gives a thorough grounding in computational methods primarily as it relates to

data analysis and statistical inference with modules in econometrics, advanced econometrics, machine learning, data mining and artificial intelligence. The structure progresses from an introduction of concepts in year 1 to advanced specialised study both in economics and data science in year 3, where natural complementarities develop.

In year 1, for example, students learn introductory topics in economics and programming from IMS and Computing, respectively. In year 2, students learn core theoretical modules in economics (microeconomics, macroeconomics), intermediate-level modules in statistical methods like quantitative economics and applied quantitative economics (focusing on themes concerning descriptive statistics, inference, hypothesis testing and regression analysis) taught by economists and simultaneously learn valuable intermediate level programming skills specifically to work with data from the Computing department. Similarly, in year 3, students progress to learn advanced statistical methods such as econometrics, time-series analysis through modules taught by economists in the IMS, and advanced computational topics such as Machine Learning, Artificial Intelligence, Neural Networks and Data Visualisation taught by the Department of Computing. These carefully designed complementarities run through various stages of learning. This gives the programme a structure that allows students to revisit core aspects of the economy and engage with its problems from different disciplinary perspectives creating a unique educational journey for the students across the three years of their undergraduate degree.

Full-time mode

Academic year of study 1

BSc Economics with Data Science

Module Name	Module Code	Credits	Level	Module Type	Term
Introductory Economics	IM51010B	30	4	Compulsory	1-2
Introduction to Programming	IS51008B	15	4	Compulsory	1-2
Mathematics for Economics and Business	IM51012C	30	4	Compulsory	1-2
Identity, Agency and Environment 1	CC51001A	15	4	Compulsory	1
Identity, Agency and Environment 2	CC51002A	15	4	Compulsory	2
Computing project 1	IS51036A	15	4	Compulsory	2

Academic year of study 2

BSc Economics with Data Science

Module Name	Module Code	Credits	Level	Module Type	Term
Intermediate Microeconomics	IM52006C	15	5	Compulsory	1
Intermediate Macroeconomics	IM52007A	15	5	Compulsory	2
Quantitative Economics	IM52008B	15	5	Compulsory	1
Applied Quantitative Economics	IM52009B	15	5	Compulsory	2
Programming with Data	<u>IS52064A</u>	15	5	Compulsory	2
Economic History	IM52011B	15	5	Compulsory	2
EITHER Developing an Employability Strategy	IM52022B	15	5	Optional	1
OR The Goldsmiths Project	CC52001A	15	5	Optional	2
Options (within/across depts)	Various	15	5	Optional	1-2

Academic year of study 3

BSc Economics with Data Science

Module Name	Module Code	Credits	Level	Module Type	Term
Econometrics	IM53016C	15	6	Compulsory	1
Advanced Econometrics	IM53017C	15	6	Compulsory	2
Machine Learning	IS53051A	15	6	Compulsory	2
Optional (Computing)*	Various	30	6	Optional	1-2
Data Visualisation	IS53048D	15	6		
Data Mining	IS53023C	15	6		
Neural Networks	IS53002B	15	6		
Artificial Intelligence	IS53024B	15	6		
Optional (Economics)*	Various	45		Optional	1-2
International Economics	IM53011B	15	6		
Public Economics	IM53012B	15	6		
Behavioural Economics	IM53033A	15	6		
Communication and Presentation Skills	IM53013C	15	6		
Manias, Bubbles, Crises and Market Failure	IM53014A	15	6		

Module Name	Module Code	Credits	Level	Module Type	Term
Individual and Institutional Economic Behaviour	IM53015A	15	6		
Gender, Race and Economic Relations	IM53041A	15	6		

*Indicative, non-exhaustive list of modules on offer.

Academic support

Support for learning and wellbeing is provided in a number of ways by departments and College support services who work collaboratively to ensure students get the right help to reach their best potential both academically and personally.

All students are allocated a Personal Tutor (one in each department for joint programmes) who has overall responsibility for their individual progress and welfare. Personal Tutors meet with their student at least twice a year either face-to-face, as part of a group and/or electronically. The first meeting normally takes place within the first few weeks of the autumn term. Personal Tutors are also available to students throughout the year of study. These meetings aim to discuss progress on modules, discussion of the academic discipline and reports from previous years if available (for continuing students). This provides an opportunity for progress, attendance and assessment marks to be reviewed and an informed discussion to take place about how to strengthen individual learning and success.

All students are also allocated a Senior Tutor to enable them to speak to an experienced academic member of staff about any issues which are negatively impacting their academic study, and which are beyond the normal scope of issues handled by Programme Convenors and Personal Tutors.

Students are provided with information about learning resources, the [Library](#) and information available on [Learn.gold \(VLE\)](#) so that they have access to department/ programme handbooks, programme information and support related information and guidance.

Taught sessions and lectures provide overviews of themes, which students are encouraged to complement with intensive reading for presentation and discussion with peers at seminars. Assessments build on lectures and seminars, and so students are expected to attend all taught sessions to build knowledge and their own understanding of their chosen discipline.

All assessed work is accompanied by some form of feedback to ensure that students' work is on the right track. It may come in a variety of forms ranging from written comments on a

marked essay to oral and written feedback on developing projects and practice as they attend workshops.

Students may be referred to specialist student services by department staff or they may access support services independently. Information about support services is provided on the [Goldsmiths website](#) and for new students through new starter information and induction/Welcome Week. Any support recommendations that are made are agreed with the student and communicated to the department so that adjustments to learning and teaching are able to be implemented at a department level and students can be reassured that arrangements are in place. Opportunities are provided for students to review their support arrangements should their circumstances change. The [Disability](#) and [Wellbeing](#) Services maintain caseloads of students and provide on-going support.

The [Careers Service](#) provides central support for skills enhancement, running [The Gold Award](#) scheme and other co-curricular activities that are accredited via the Higher Education Achievement Report ([HEAR](#)).

The [Centre for Academic Language and Literacies](#) works with academic departments offering bespoke academic literacy sessions. It also provides a programme of academic skills workshops and one-to-one provision for students throughout the year.

Placement opportunities

Students will have a second-year option module called my career strategy which will allow them to focus on their professional profiles, be career ready and prepare them for placements.

More broadly the department runs a variety of employment related activities that include: a mentoring scheme, job related talks, networking activities with graduates and professionals, information on job openings, training in CV writing and developing your professional profile. All these activities together with the activities run by the careers service give a range of opportunities for students to explore and prepare for their professional careers.

Employability and potential career opportunities

Goldsmiths Graduate Attributes

The unique character of Goldsmiths, which combines rigorous academic ability, critical skills in theory and policy, together with training in advanced interdisciplinary, cutting-edge tools

have formulated the key attributes that we believe are characteristic of the Goldsmith's Economics with Data Science Graduate.

The graduate, as a result of fully participating in life at Goldsmiths and also gaining competence in core economic theory and analysis, will:

1. Have developed knowledge and understanding appropriate to the level of their programme;
2. Have knowledge of computational and statistical methods involved in working with datasets;
3. Have developed advanced skills in literacy, data analysis, communication and presentation;
4. Be able to take responsibility for their academic, career and personal development whilst at Goldsmiths and beyond;
5. Be critical and self-reflective thinkers;
6. Be imaginative and creative and willing to take risks, and where necessary to engage in constructive, informed and critical challenges to economic orthodoxy;
7. Be flexible, adaptable, able to manage change and work effectively in a variety of contexts individually and collaboratively;
8. Be enterprising and resourceful with the knowledge and skills to secure appropriate employment, effectively manage their career and maintain lifetime job satisfaction;
9. Have developed personally in ways which will enrich their lives and encourage them take an active and responsible role in public life equipped with an awareness of broader world issues and a sense of their own role as a world citizen. In particular, we will encourage all of our students to respect and value diversity.

This degree equips you with highly sought-after skills that will help you stand out in the marketplace and launch your career. Through our modules you will learn economic theory and application, and practice your skills in writing, presenting and data analysis.

Skills

This programme was created to give you a diverse set of skills that will help you to successfully overcome the challenges of a constantly evolving economy and society. We

help you develop not only the technical skills necessary in becoming a successful economist today, but also the ability to understand economic change and adapt as the world changes.

Technical Skills

As an economist you will gain competence in the following fields: Macroeconomic and Microeconomic Analysis, Statistics and Economics, Quantitative Methods from a theoretical and practical perspective, Presentation skills and report writing. Also, from your data science modules you will develop coding skills, working knowledge of relevant computational methods and tools to organise, analyse datasets and communicate insights concerning real-world applications to different stakeholders.

Broader Skills

The structure of this programme of studies also equips you with the following skills:

- An ability to explain economic ideas to non-economists in government and the business world.
- A knowledge of the limits of economic models for analysing real world data.
- An understanding of the economy that can meet new challenges and unforeseen crises.
- A personal philosophy of how the economy works.
- An understanding of computational methods and how they can aid in data analysis.

You'll also gain skills in teamwork, time management, organisation, critical-thinking, reflection and independent research. All of these skills are greatly sought after by graduate employers.

Programme-specific requirements

Not applicable

Tuition fee costs

Information on tuition fee costs is available at: <https://www.gold.ac.uk/students/fee-support/>

Specific programme costs

Not applicable