



2020/21

Postgraduate Diploma in Science in Financial Analytics

Level 9, 60 ECTS

Programme Handbook

Foreword

Welcome to DBS where we will help you realise your ambition. We have an international reputation for delivering a high-quality student experience and our intention is to do everything we can do to support you during your time with us.

Dublin Business School (DBS) is Ireland's largest independently owned, third level institution. Our campus is in Dublin's city centre and comprises four buildings where nationalities from over 95 countries participate in a bustling and thriving student life.

We offer programmes across a range of disciplines from business to data science, cybersecurity to artificial intelligence, marketing to psychology, accounting and finance through law, film and creative media. We are committed to enabling strong academic outcomes through employer-led programmes and continuing to deliver an out-standing student experience.

This year coming contains many significant challenges for higher education providers due to the COVID-19 pandemic. At DBS we will meet this challenge head-on and draw on our experience of delivering high-quality teaching and learning through hybrid and multi-modal learning. Our utmost priority is the protection of your health and safety and DBS actively commits to government guidelines and protocols in order to ensure this. We will also do everything we can to maximise the opportunities for you to be on campus as much as possible and this will mean that some of your learning will be on campus and some will be online. You will find the specific details in your online timetable as well as in your Module and Assessment Guides.

The information contained in this handbook is crucial to your learning. It provides important information on your programme, your assessments and the key individuals you will meet. For these reasons we want you to constantly read and refer to this handbook and use it as a key information source during your time with us.

We are dedicated to ensuring that you have a rewarding and fulfilling experience while studying at DBS and intend that, through your programme of study, you begin to realise your ambitions and your career goals.

Good luck on your journey!

Kerry

Dr Kerry McCall Magan

Head of Academic Programmes

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Section 1 Programme Information

Welcome Message from Course Director

Welcome Hello and a very warm welcome to Dublin Business School. My name is Richard O'Callaghan, and I am the Course Director for your financial analytics programme.

You have made the right choice on deciding to study at Dublin Business School. We are Ireland's largest independent third-level institution, offering a range of undergraduate, postgraduate, and professional programmes in Business, Arts and Law. Your choice to study financial analytics will enhance your personal, academic, and professional development.

DBS has built on a reputation of "Excellence through Learning" and we pride ourselves on our ability to design and deliver programmes which are academically rigorous and innovative whilst ensuring they meet the demands of an ever-changing global business community. All faculty members are experienced tutors who are specialists in their chosen field. As well as being highly qualified academically, they also bring a wealth of industry experience to the classroom. Our tutors are actively engaged in consultancy and research and this feeds directly into your learning experience.

I look after the undergraduate programmes which include the BA (Hons) in Accounting and Finance, and the postgraduate programmes, the MSc in Financial Analytics and the MSc in Financial Technology. I work closely with your Programme Coordinator Marta Silva and your lecturers. Some examples of areas that I can assist with include:

- Academic planning and choices
- Assignments and Examinations
- Decisions around stream choices.

Your student portal is also a one stop shop for accessing your email, timetables and more. I would like to note the DBS email assigned to you. It is important that you correspond with DBS staff using this email only. We will send a number of important communications to this email during your studies. This information and more, is available in your Student Handbook, which can be accessed via students.dbs.ie/academic/operations

It is appreciated that new students each have particular needs. This handbook is designed to provide you with much of the information you will require in the first few weeks of your programme of study. It will aid your study immensely if you familiarise yourself with the contents of this handbook and keep it somewhere safe. It is to be used in conjunction with the Module and Assessment Guides that you will also receive via Moodle. We hope you enjoy your time with us here in DBS and look forward to helping you during your learning journey. I am here to help you with the academic side of your programme from now until you graduate, and beyond.

Please do not hesitate to contact me on richard.ocallaghan@dbs.ie if you have any questions. Best wishes to you all for a great year!

Richard

Acting Course Director for Accounting and Finance

1.1 Programme Administration

If you have any questions or concerns about any aspect of your course, or a problem relating to any aspect of your time here at DBS you should contact your Course Director or Programme Coordinator. If they cannot tackle the question or problem themselves, they can help you identify the person who can and they will refer you on to them. Below is short description of the people you will meet on your programme:

- **Course Director**
The Course Director has responsibility for ensuring academic quality and standards for learners (particularly in the areas of teaching, learning and assessment). They are the academic lead in the discipline area and are a key contact point for programme team liaison and co-operation. They work to ensure programmes contain high quality teaching and learning and are committed to enabling strong employer-aligned, academic outcomes.
- **Programme Coordinators**
Programme Coordinators provide administrative support on programmes and ensure all learners are provided with full details of their programme of study. They are the first point of contact for learners on a range of issues such as programme queries, deferrals, personal mitigating circumstances (PMCs) that may affect their learning.
- **Module Leader**
The Module Leader is the Lecturer responsible for the module. Their primary function is to lecture and assess learners on subjects or modules according to the programme document. Their duties and responsibilities relate to teaching, assessment and completion of the module. Module leaders work hard to ensure a high quality teaching and learning experience for all students.

1.2 Main Points of Contact for the programme

	Name	E-mail
Programme Coordinator	Aditya Shankar	aditya.shankar@dbs.ie
Course Director	Richard O'Callaghan	richard.ocallaghan@dbs.ie

1.3 Programme Team

In DBS, email addresses for lecturing staff are as follows: firstname.lastname@dbs.ie

This is an indicative list and is subject to change.

Module Name	Lecturer(s)
Principles of Financial Decision Making	Richard O'Callaghan Brian Coffey
Data Analytics & Machine Learning for Finance	Dr Shahram Azizi Sazi Terri Hoare Dr Amir Esmaily
Predictive Financial Modelling	Lynn Monaghan Monika Smatralova Hubert Misztel
Applied Financial Analytics	Monika Smatralova Hubert Misztel Paul Laird
Financial Intelligence & Data Visualisation	Clive Gargan Kunwar Madan Paul Laird
Information & Cybersecurity Management	Jerome Murray Darren Redmond Paul Laird
Financial Risk Management	Philip Hickey Richard O'Callaghan
Behavioural Economics and Finance	Dr John Hyland John Looby
Innovation in Financial Technology	Tim Bicknell Richard O'Callaghan Kean Gilbert

There are also other valuable points of contact and support in DBS such as [Student Services](#), the [Student Engagement and Success Unit](#), [Student Welfare and Support](#), [IT Helpdesk](#) and the award winning [DBS Library](#). Your [DBS Handbook](#) and the [DBS website](#) will contain more information on these and other great DBS services and supports.

This year coming contains many significant challenges for higher education providers due to the COVID pandemic. At DBS we will meet this challenge head-on and draw on our experience of

delivering high-quality teaching and learning through hybrid and multi-modal learning. Our utmost priority is the protection of your health and safety and DBS actively commits to government guidelines and protocols in order to ensure this. We will also do everything we can to maximise the opportunities for you to be on campus as much as possible and this will mean that some of your learning will be on campus and some will be online. You will find the specific details in your online timetable as well as in your Module and Assessment Guides.

Section 2 Programme Details

2.1 Aims of the Programme

Financial analytics arms decision makers with the tools to make sense of an increasingly complex world. By combining internal financial information and operational data with external information such as social media, demographics and big data, financial analytics may address critical business questions with unprecedented ease, speed, and accuracy.

The programme aims to produce graduates with the skills and attributes to meet the demand for modern decision makers. Learners initially develop advanced practical skills in essential areas such as predictive financial modelling while also acquiring theoretical knowledge in areas such as behavioural economics and finance. Through the programmes, graduates will understand the core principles of finance, be equipped to utilise data analytics, machine learning, and visualisation tools, apply the appropriate financial analytic models, and inform business decision making in an ethical context.

The programme aims to incorporate practical skills in each module for the professional development of learners to enhance their employability options. This will enable learners to integrate seamlessly into any commercial enterprise by demonstrating professional skills such as: creativity, resilience, self-management, problem-solving, teamwork and effective communication skills.

The overall aim of this programme is to produce graduates with strong proficiencies in the application of financial analytics in a contemporary and evolving data driven environment, whilst also enhancing the practical technical skills of the learners.

The Postgraduate Diploma programme's specific aims are to:

- Enable learners to develop in-depth knowledge and analytical skills in current and developing financial technologies.
- Provide learners with the ability to think critically and make informed, value creating, decisions based on complex and voluminous data.
- Develop learners' core competencies and technical skills in the fields of applied finance, quantitative modelling risk management techniques and financial statement analysis.
- Enhance the learner's ability to operate effectively in cross-cultural settings, understand the nature and complexities of globalisation with an ongoing commitment to the importance of business ethics in a global financial business environment.
- Foster learners' leadership characteristics which will enable graduates to lead teams and to achieve organisational goals.
- Create an innovative and entrepreneurial mind-set that will enable learners to solve real problems in an evolving, technologically driven work environment.
- Enable learners to identify, develop and apply detailed analytical, creative, problem solving skills.
- Provide learners with a comprehensive platform for career development, innovation and further study.

2.2 Programme Learning Outcomes

The Minimum Intended Programme Learning Outcomes (MIPLOs) of the programmes, have been informed by the QQI Level 9 Science Awards Standards. The Postgraduate Diploma is offered as a separate entrance and exit award.

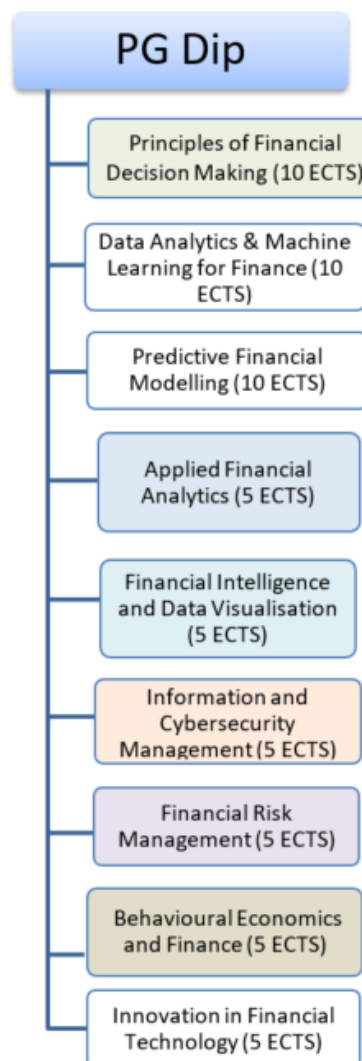
On successful completion of the Postgraduate Diploma in Science in Financial Analytics graduates will be able to:

MIPLO	Learning outcome
MIPLO1	Evaluate the practical application of the core (risk-reward) fundamentals of finance and identify value enhancing strategies and solutions.
MIPLO2	Synthesise financial statement analysis, investment appraisal and valuation techniques in complex financial decision-making scenarios.
MIPLO3	Apply the appropriate analytical tools to analyse and extract value from large structured and unstructured data sets to enhance financial decision-making.
MIPLO4	Demonstrate a proficiency in the use and application of a range of quantitative tools and techniques in predictive financial modelling.
MIPLO5	Appraise the evolving importance of human psychology on market valuations and financial decision making in the context of cognitive biases and the nature of incentives.
MIPLO6	Critically evaluate financial risks and utilise derivatives, and/or other strategies to manage systematic market risk factors.
MIPLO7	Formulate appropriate risk management frameworks for data governance, ethics, cybersecurity, privacy and other operational risks.
MIPLO8	Demonstrate proficiency in applying financial intelligence techniques in the context of the visualisation of complex data sets.
MIPLO9	Evaluate the evolution and application of innovative technologies – specifically automation – impacting the contemporary and future of work and the finance function.
MIPLO10	Display a range of personal and interpersonal skills, including the capacity for continuous learning, initiative taking, performing to deadlines, working in a team, communicating effectively.

Programme synopsis

This Postgraduate programme aims to incorporate practical skills in each module for the professional development of learners to enhance their employability options. This will enable the learner to integrate seamlessly into an organisation by addressing skills such as awareness to analytical abilities, leadership, self-management, teamwork and academic writing that are essential for a Level 9 graduate. It is a 1 year full-time, 12 - 18 months part-time programme of three 10 ECTS and six 5 ECTS taught modules.

2.3 Programme Structure



2.4 Teaching and Learning Strategy for a multi-modal environment

The teaching and learning (T&L) strategy refers to the teaching modes, approaches and activities that the lecturer will use to help you work toward achieving the learning outcomes for the module.

Examples of T&L modes include:

Mode	Description
In-class	Where the lecturer and all the students are in the class
Live Online	Where the lecturer and all of the students are online at the same time
Hybrid	Where some of the students are online and some are in the class and the lecturer is either in-class or online
Pre-Recorded	Where the lecturer pre-records a session
On Demand	Where the lecturer has prepared teaching content or activities and made it available to you online for you to engage with at your own convenience

Examples of T&L approaches include:

Approach	Description
Lecture	Where the lecturer presents or talks about concepts, ideas, topics or theories
Tutorial	Where the lecturer and students engage in a discussion
Workshop	Where the lecturer and students engage in activities either collectively or in groups
Lab Demonstrations	Where the lecturer or students demonstrate processes usually on a computer

Examples of T&L Activities include

Activity	Description
Case Study	Students review real-world examples of what they are learning about
Guest Speaker	A practitioner talks about real-world examples of what students are learning about
Group work	Students are divided into groups to work on a particular activity
Peer Review	Students review and comment on other students' work
Peer discussion	Students engage in a discussion about a topic which the lecturer observes and can contribute to
Quizzes	Students work through a series of short questions
Practical Exercises	Students carry out an individual task during the class
Peer Presentations	Students present either individually or as a group to their fellow students
Controlled Debate	Students are divided into groups and argue the merits of a specific stance on a topic usually determined by the lecturer
Reading	Students engage in a reading activity and either write or report back on what they have read
Watching Videos	Students analyse videos and have peer discussions on what they have seen
Peer Pairing	Students are split into pairs. Individually they carry out a task and then swap their work for the other student to review.
Role Play	Students act out a scenario from the real world for the whole group

Typically, a timetabled class will take place in one mode or another, for example through online, in-class, recorded or hybrid mode. Although the on-demand mode can be used on its own or with any of the other modes.

Usually, the lecturer will adopt the same approach for the length of each timetabled class, so your class will be a lecture or a tutorial or a workshop or a demonstration. However, the lecturer may mix approaches during a class. So, for example, the timetabled class may start with a lecture before moving into workshop and then finishing with a tutorial approach.

Lecturers can also draw on any of the activities above, and others not mentioned above, during a class whether it is online, hybrid or in-class. However, some activities and approaches are better suited to some modes.

You will find the specific details of which mode applies to which module in your online timetable as well as in your Module and Assessment Guides.

Should you have any queries, please do not hesitate to contact your Programme Coordinator or Module Leader.

Section 3 Assessment

3.1 Introduction to Assessment

The purpose of assessment is to ensure that you achieve the learning outcomes of each module. Learning outcomes are statements that specify what you will know or be able to do as a result of a learning activity. Assessment types will include practical, continual assessment, reports, group activities and exams.

It is important that you familiarise yourself with the format and number of assessments, assessment weighting, and due dates. These are published in the Module Guide which is available on [Moodle](#). An Assessment Brief is also published for each individual piece of continuous assessment. This will give details on the format, weighting and due date, as well as set out what task you are required to complete in the assignment. It also gives the marking scheme for each assignment, and you should use this to guide your completion of the assignment.

All assessments are marked and graded by your lecturer and are reviewed by an internal moderator and an external examiner. This is to ensure fairness, consistency of marking and the correct standard across all assessment. Results are always provisional until they are approved by the External Examiner and are processed through the programme Exam Board. The purpose of an Exam Board is to formally ratify results and determine award classification (for more information please refer to the [Quality Assurance Handbook](#)).

The assessment schedule is below and Moodle syncs with the Student Dashboard to provide a calendar of deadlines. The schedule lists the due dates for all your assessments due over the academic year. The schedule ensures that the workload is balanced across the academic year. Any extension requests need to be considered in light of this schedule, as changes might risk clashing deadlines, so it is very important to be aware of the potential impact of changes to assessment dates. The exam timetable is published on the [exam page](#) in the DBS current student area and is usually available about four weeks in advance of the exam period.

Your goal is to achieve the highest mark possible in your assessment. In order to do this, it is expected that learners:

- Complete ALL assessment components.
- Submit all assessment on time as indicated on the assessment specification.
- Complete all parts of each assessment.
- NEVER copy/plagiarise or submit content that is not yours by ensuring that you apply the correct referencing standard. DBS uses the Harvard Referencing style. A guide to this can be found [here](#).
- Always ask your lecturer if you are not sure about any requirements, not your fellow students.
- Always complete the required number of questions in an exam.

- Practice writing out answers for end -of term exams by doing [previous papers](#), in particular hand writing answers to ensure that your writing is legible.
- Always write/type your ID number on any assessment or exam script.
- If you require support for exams/assessment, ensure that you have completed the appropriate paperwork and submitted it to the [Learner Supports Service](#) well in advance of any assessment or exam dates

3.2 Assessment Brief

Postgraduate Diploma Assessment Schedule

Semester One

Module	ECTS	Assessment	Weighting	Due Date
Principles of Financial Decision Making	10	Individual Research & Analysis	30%	Wk 2
		Group Research & Analysis	30%	Wk 6
		Exam	40%	Wk 15
Data Analytics & Machine Learning for Finance	10	Individual Research & Application	50%	Wk 3
		Individual Research & Application	50%	Wk 8
Predictive Financial Modelling	10	Individual Application	50%	Wk 4
		Individual Application	50%	Wk 9

Semester Two

Module	ECTS	Assessment	Weighting	Due Date
Applied Financial Analytics	5	Individual Application	50%	Wk 2
		Individual Application	50%	Wk 8
Financial Intelligence & Data Visualisation	5	Individual Application	50%	Wk 3
		Individual Application	50%	Wk 8
Information & Cybersecurity Management	5	Individual Research & Analysis	50%	Wk 5
		Exam	50%	Wk 15
Financial Risk Management	5	Individual Scenario Report	50%	Wk 7
		Exam	50%	Wk 15
Behavioural Economics and Finance	5	Group Case Study	50%	Wk 6
		Exam	50%	Wk 15
Innovation in Financial Technology	5	Group Case Study & Presentation	100%	Wk 5

All assessment in this programme conforms to the DBS assessment regulations informed by *QQI Assessment and Standards, Revised 2013*. Special regulations are defined on the course schedule. Where a learner is found to require additional learning supports, the Learner Support Coordinator Jane Buggle will identify appropriate support or an alternative assessment instrument. This will be agreed with the Registrar's Office and will be in accordance with the DBS Assessment Regulations. Please refer to DBS Quality Assurance Handbook (QAH) for further details.

Overview of Assessment Submission

Semester 1													
Module	Wk 1	Wk 2	Wk 3	Wk 4	Wk 5	Wk 6	Wk 7	Wk 8	Wk 9	Wk 10	Wk 11	Wk 12	Exam
Principles of Financial Decision Making													
Data Analytics & Machine Learning for Finance													
Predictive Financial Modelling													
Semester 2													
Module	Wk 1	Wk 2	Wk 3	Wk 4	Wk 5	Wk 6	Wk 7	Wk 8	Wk 9	Wk 10	Wk 11	Wk 12	Exam
Applied Financial Analytics													
Financial Intelligence and Data Visualisation													
Information & Cybersecurity Management													
Financial Risk Management													
Behavioural Economics and Finance													
Innovation in Financial Technology													

3.3 Reassessment

Reassessment must assess the same learning outcomes as the prescribed assessment, and therefore all reassessments will conform in structure and subject matter to the original assessment, with the scope of group assessments being reduced as appropriate for individual assessment.

3.4 General Submission Requirements

1. All relevant provisions of the Assessment Regulations ([QAH Part B Section 5](#)) must be complied with, in addition to the requirements set out in the Assessment Brief:
 - Students are required to refer to the assessment regulations in their [Student Handbooks](#) and in [Part B Section 5 of the Quality Assurance Handbook](#).
2. Assignments should be submitted through the appropriate link on the module Moodle page (unless explicitly excepted by the lecturer). Assignments not submitted through Moodle may not be graded.
3. Online assignments must be submitted **no later than the stated deadline:**
 - Late submissions (up to 14 days) will receive the Late Submission penalty (see [QAH Section B Part 5.4](#));
 - After 14 days, late submissions will be awarded **0%**.
4. Extensions to assignment submission deadlines will be not be granted, other than in exceptional circumstances:
 - To apply for an extension please go to <https://students.dbs.ie/registrar-office/dbs-faq> and download the *Assignment Extension Request Form*, to complete and return, with supporting documentation, to your Programme Coordinator;
 - Ongoing exceptional circumstances can be considered for deferrals. To apply for a deferral, submit the completed *Personal Mitigating Circumstances Form*, with supporting documentation, to your Programme Coordinator
5. Students are required to retain a copy of each assignment submitted.
6. Dublin Business School penalises students who engage in Academic Impropriety (i.e. plagiarism, collusion, copying, essay mills, etc.):
 - Refer to the [QAH Part B Section 3.3](#) for further information on Academic Impropriety and the potential penalties;
 - Refer to the [Library](#) for information on correct referencing, and support classes.

3.5 Awarding Body and NFQ Level

This programme has been validated and approved by the Irish state agency, QQI (Quality and Qualifications Ireland), responsible for validating all third level programmes in Ireland. The programme is positioned at Level 9 on the National Framework of Qualifications (NFQ), a framework for the development, recognition and award of qualifications in Ireland.

3.6 Useful links and tips

Door codes for Bow Lane and Balfe Street are available at Reception desks.

Once registered, a learner should use the calendar in their student email account for personalised timetables.

Timetables can be sync'd with mobile devices, see <https://www.dbs.ie/about-dbs/news-and-events/2018/05/17/dublin-business-school-moodle-app> for more information.

- . www.dbs.ie
- . <https://elearning.dbs.ie/> (Moodle)
- . www.mydbs.ie (student email)
- . tts.dbs.ie for generic timetables
- . <https://library.dbs.ie/>
- . Lorls.dbs.ie (to access your reading list online)
- . esource.dbs.ie (repository of student and faculty research)
- . servicedesk.dbs.ie (to log support queries or issues)
- . Moodle App available for download (Play Store and iTunes): <https://elearning.dbs.ie/>

If you have any problems with your timetable or require technical support, please log a ticket at servicedesk.dbs.ie.

Section 4 Academic Calendar

The academic calendars can be found on the DBS website:

<https://students.dbs.ie/academicoperations/academic-calendars>

It shows the term dates, as well as reading weeks, the Christmas break and the exam session, including the repeat exams.

Section 5 Quality Assurance Handbook

All programmes delivered by DBS are delivered within a robust and established quality assurance infrastructure encapsulated by a *Quality Assurance Handbook*. This is available on the DBS website: <https://students.dbs.ie/registrar-office/gah>.

5.1 Key Assessment Regulations

Quality Assurance Handbook

Quality Assurance Handbook – Key Assessment & Regulations Reminders

LIMITED ASSESSMENT OPPORTUNITIES
Students generally only have FOUR (4) opportunities to complete a module successfully and do not defer the sitting. It still counts as an attempt.
Dissertation modules usually allow TWO (2) opportunities.
Students who Exhaust their opportunities will be Withdrawn from their programme.

PMCs
Personal or medical circumstances which impact a students' ability to complete an assignment or sit an exam. PMCs must be submitted to your Programme Coordinator within 7 days of the deadline or exam sitting. PMCs are not automatically approved. PMCs require supporting evidence where available.

NO REPEAT FOR HONOURS
QQJ programmes are subject to the regulation that a student cannot receive an Honours award (First Class Honours, etc) if they have passed a module at Award Stage on a repeat attempt.
If you repeat an Award Stage module, your award will be capped at a Pass.

LATE SUBMISSION PENALTY
Unless an Assignment Extension has been approved, a penalty will be applied to reduce a grade if an assignment is submitted after the deadline. Submissions will not be graded if these are received more than 2 weeks after the original deadline.

ACADEMIC INTEGRITY
Academic Impropriety (eg cheating, plagiarism, collusion, ghost-writing) are serious offences, and appropriate penalties will be applied if identified.
Students found to have committed A.I. may be subject to a Fail grade (see No Repeat for Honours) or Withdrawn from the college.
The Library has classes and support guides on Academic Referencing, Urkund, etc.

APPEALS
Appeal, Verification of Results, and View Script Requests can only be submitted within 7 working days of the release of final results. Students are advised to refer to the Appeals Policy closely before submitting an Appeal, to understand what is considered Grounds for an Appeal. Appeals based on disagreement with the academic judgement of the examiner are not considered grounds for an appeal. Appeals submitted without evidence, or as an incomplete request, will not be investigated and cannot be refunded.

PMIC FORM

LEARNER SUPPORTS

ASSESSMENT EXTENSION REQUEST FORM

APPEALS, VERIFICATION, VIEW SCRIPTS POLICIES & FORMS

Section 6 Conclusion

We hope you have found the programme handbook helpful. If you have any queries, please contact your Course Director or Programme Coordinator. Their contact details can be found in Section 1 of this handbook.

Enjoy your time at DBS!