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IMAT3451 Final Year Project Module Handbook

**Level 6, 30 ETCs – Full Time**

**De Montfort University, Leicester**

**Module Leader: Dr Efpraxia Zamani**

Gateway House 5.72, [efpraxia.zamani@dmu.ac.uk](mailto:efpraxia.zamani@dmu.ac.uk), phone extension 7518

**Deputy Module Leader: Prof Eerke Boiten**

Gateway House 5.31, [eerke.boiten@dmu.ac.uk](mailto:eerke.boiten@dmu.ac.uk), phone extension 8511

Version of 21/08/2018

This handbook is correct at the time of writing and may be subject to change. Throughout your studies, to ensure you have the most up to date information, you should always consult the online version of this handbook held on Blackboard.

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# Welcome to the module

This module is quite likely to be the pinnacle of your undergraduate studies. One quarter of the time in your final year is allocated to it, in which you can work on a topic chosen in discussion between you and a supervisor. You have the opportunity to shape it and plan it to be the product of your studies that you will be most proud of. In job interviews, it can be a topic of discussion that makes you stand out in terms of enterprise and originality. With all this potential does come responsibility: *you* are in charge of your own progress on this. You have a project supervisor, supporting lectures, and general support from the module team, but they cannot make you do the work: it’s you who will need to plan it and develop it and complete it. We are looking forward to yet another year in which our students take on imaginative topics, produce exciting reports and surprising software that stir our curiosity. Let’s help you make it happen!

## Contact details of all module teaching staff

* **Project co-ordinator**: Dr Efpraxia Zamani. Gateway House 5.72, email: [efpraxia.zamani@dmu.ac.uk](mailto:efpraxia.zamani@dmu.ac.uk), phone extension 7518
* **Deputy Project co-ordinator**: Prof Eerke Boiten, Gateway House 5.31, email: [eerke.boiten@dmu.ac.uk](mailto:eerke.boiten@dmu.ac.uk), phone extension 8511
* **Project supervisors**: most academic staff in the School of Computer Science and Informatics, as well as a range of part-time and hourly paid staff members. Note that once you have a supervisor, you should be contacting them (rather than module leaders) in the first instance for any issues with your project.
* **Faculty academic practice officer:** Dr Moira Carroll-Mayer, Gateway House 5.52, email: [mcm@dmu.ac.uk](mailto:mcm@dmu.ac.uk), phone extension 1551

# Module template

This is how the module is described in the university’s teaching quality system, and most importantly it indicates what the module should achieve (“learning outcomes”). The main descriptions are given below.

Prerequisites: The project normally requires students to have undertaken successfully the requirements at level 5 and level 4 of their degree programme prior to commencing the project. The prior learning for each project, however, is dependent on the nature of that project. It is expected that students will choose their project topics, based on their individual course's requirements and with reference to their own prior learning.

The project provides students with the opportunity to carry out a significant piece of work involving critical analysis and reflection to provide an effective solution to a given technical and/or research-based problem. It enables students to apply and integrate previous material covered on the student's course as well as to extend the work covered on the course through research and self-learning. Students will be expected to demonstrate appropriate and proactive project management, and written/verbal presentation skills throughout the period of the project. As well as analysing, designing, delivering and appraising a product of suitable quality, they will be expected to undertake, research, analyse, design, evaluate and report on some aspects of a subject explicitly allied to the project.

Some courses may have mandatory requirements that restrict the nature of project work in order to satisfy, for example, course validation conditions and/or the requirements of professional bodies such as the British Computer Society (BCS).

## Learning outcomes

* Effectively plan a project.
* Carry out work in accordance with the plan and in a rigorous and sound manner.
* Provide a comprehensive set of research-oriented and/or technically oriented deliverables that are at least to a sufficient Level 6 standard and includes the potential global impact of the work.
* Present the project deliverables in a coherent and logical way.
* Undertake research into one or more identified areas in an appropriate and thorough manner.

## Timeline

This includes deadline days both for the students and supervisors, as well as the timing of lectures supporting particular aspects of project work and deliverables.

Note that there are sessions listed here that are drop ins at CLaSS (noted as drop in).

|  |  |
| --- | --- |
| August 2018 | Project ideas list available on Blackboard |
| Week 1 | Introduction to IMAT3451 |
| Week 3 | Project Management |
| Week 4 | Lecture on Literature Review (locating sources) |
| **Week 4: 26/10/2018** | **Submission of Early Documents** |
| Week 5 | Drop in session at CLaSS |
| Week 9 | Structure/Content of Deliverables |
| **Week 11: 14/12/2018** | **Submission of mid-year progress document** |
| Week 25 | Drop in session at CLaSS |
| **Week 27: 05/04/2019** | **Final deliverable submission deadline** |
| **Weeks 31-33** | **Vivas** |

## Assessments

The module mark is made up of *ONE* component:

* a mark worth 100% of the module that jointly covers
  + the Final Deliverable;
  + the Viva.

where each of those elements contribute towards your final mark.

Note that:

* **students that fail to attend the viva examination will be given an overall project mark of zero percent;**
* **if during the viva examination a student cannot demonstrate an understanding of the work that has been submitted in their name they will fail the viva examination and will be awarded a mark of zero for the components they cannot explain.**

The content of each of the deliverables and the form of the viva depend on the type of project, see §5. All of these will be marked by the supervisor, and then second marked by a second marker (who also attends the Viva), and then moderated by a team led by the Programme Leader. Because of the nature of this work, marking cannot be anonymous.

## Reassessment

Resit is by deferred component. Resit normally involves either undergoing the entire project activity/assessment cycle with reference to a new project (if the project scores below 30%) or, if considered feasible by the assessment board, to the amendment/enhancement of the same project within an appropriate timeframe (if the project scores between 30% and 39%). The resit method adopted for a particular student will typically be decided considering any recommendations from the student's project supervisor.

As a general rule, projects scoring below 30% will have to undergo a resit with attendance during the next academic session, and projects scoring between 30% and 39% will have to undergo a resit with or without attendance depending on the comments and feedback from the supervisor, the 2nd market and the project co-ordinator.

**Please note that in the first case whereby the student is required to undergo the entire project activity/assessment cycle with reference to a new project, this is a resit with attendance, which unfortunately incurs fees that (the exact amount can be confirmed by the course administrator).**

# Types of Projects

There are three types of projects: Development Projects, Research Projects, and Hybrid Projects. **Students on a BCS accredited course need to select a Development Project or a Hybrid Project, and to ensure that it contains the correct elements of a development process as indicated in the BCS checklist.**

BCS accredited courses are: Computer Science, Software Engineering, Computer Games Programming, Intelligent Systems (BSc & MComp), Computer Security, Forensics.

**For all project types, you need to remember that most people involved in your project’s assessment (other than your supervisor) will only have your Deliverables available to base their marks on, so having a full set of supporting documentation is crucial.**

## Development projects

A development project aims to produce software. It will still involve research: to further understand the application area, and to make a justified choice between alternative technologies and approaches (frameworks, libraries, programming languages, APIs, development models, design patterns, …) to solve your problem.

For development projects in particular, please note that you are strongly advised to make sure that you either possess the skills required for developing your software product or that acquiring them during this year is feasible.

## Research projects

In a research project, the final report is the main product. It should be targeted at an audience and explore a research topic in some depth. A good research project produces original thoughts that add to the existing literature and/or sheds new light on a research topic by providing and analysing additional data, for example gathered through well designed questionnaires.

For research projects in particular, it is strongly advised that students have attended or will attend IMAT3103 Research Methods, as it is geared towards supporting students undertaking research projects (as part of IMAT3451) and equips them with the necessary skills and competences that are typically required for such an endeavour.

## Hybrid projects

A hybrid project sits in between those two types. It needs more research than a development project, probably because the problem domain you are working in and the requirements of the software you are building are less well understood. It also contains more development than a pure research project: you are expected to build a “proof of concept” piece of software to illustrate or further explore the research area, and so your work cannot remain fully theoretical. The requirements on deliverables reflect the intermediate position of such a project.

# Early documents for all types of projects

By the end of week 4 you will need to submit the following documents irrespective of the project type and these should be prepared as soon as possible (completed by you and signed off by your supervisor). You also need to submit them online through the relevant link by the end of week 4.

## Project contract

Your first deliverable at the beginning of the autumn term will be the Project Contract (also known as ‘Terms of Reference’).

Students on a BCS accredited course should consult the BCS checklist before completing their project contract, as it includes eight conditions that the project contract should fulfil, such as

* The contract contains an elucidation of the problem, the objectives of the project, and a risk analysis
* The contract states that the final report will contain a clear description of the stages of the life cycle undertaken
* The contract states that the final report will contain a description of how verification and validation were applied

Most of these requirements also make sense for other students’ project contracts.

This forms a ‘contract’ between you, your supervisor and your proposer (if different from the supervisor). It states what you intend to do: what is the background to and scope of your project, and what are its aims and objectives. It provides a ‘yardstick’ against which your achievements at the end of the project can be assessed.

It is not easy to complete a suitable Project Contract; you will need to discuss it with your supervisor and may have to prepare several versions before it is finalised. More information about the content of the Project Contract can be found in the Appendix and on the module Blackboard shell.

The Project Contract must be signed and dated by you, your supervisor and proposer (if different from the supervisor). Keep the signed copy carefully. If a change in circumstances means that modifications have to be made to your Project Contract during the year, these should be agreed with your supervisor and proposer (where different from the supervisor) and carefully documented.

For students on a BCS accredited course, the supervisor can only sign off the project contract if they can sign off the BCS checklist answering “Yes” to all questions, so please double check the BCS checklist before submitting your project contract.

## Project plan

This is usually in the form of a Gantt chart. To complete the plan you will need to:

* Identify the tasks you intend to undertake and their order, remembering that some tasks can be undertaken in parallel;
* Allocate time for each task to be carried out.

You are likely to find it difficult to allocate time to each task, as you may not know what a realistic amount of time is. But you could work backwards from the deadline for project report hand-in: all tasks will need to be completed by then. You may find it helpful to do a critical path analysis. Allow some contingency for falling behind (you might get sick, or have some unavoidable delays). Your supervisor will advise whether your initial plan looks realistic.

As you progress through your project you will need to update your plan for each meeting with your Supervisor. Use it to indicate what progress you have made by showing which tasks are complete and which are ongoing. Take it to every supervision meeting.

MS Project is available in all labs of Gateway House.

Remember that you start ‘writing up’ on day one, you accumulate documents throughout the project period and the final stage should ideally be a matter of tidying up and writing your introduction, conclusions, evaluation etc.

## Ethical review

It is a University requirement that every project undergoes an Ethical Review. This is to ensure the protection of the interests of any humans affected by research studies and to carefully consider any legal risks associated with the project. A client, end user, or research participant can be affected by:

* Collection of data directly from people (e.g. via interviews, surveys, questionnaires, observation);
* Collection of data about individuals whose identity can be detected from the data.

In addition, research may be at risk of involving illegal activities, activities at the margins of the law (e.g. software piracy, illegal downloads of music) or activities that have a risk of injury.

The University policy states that research (including student projects) involving human subjects should ensure:

* All participants volunteer, normally without inducement and give their written consent to participation;
* Written consent is given in the light of full awareness of the objectives of the teaching/research, the procedures to be followed and the anticipated outcomes particularly in the respect of publication of findings;
* All participants be given a written description of their involvement in the project, the demands to be made, their rights and how their rights and interests will be protected, particularly in respect of publication of findings;
* All participants are made aware of their freedom to withdraw consent and discontinue participation at any time;
* Appropriate documentation must be designed to meet these objectives and to keep appropriate records, for example information regarding the project should be given in writing and the participant should sign to acknowledge receipt of the material.

You should discuss with your supervisor whether your project will give rise to any ethical issues, and if so how they will be addressed.

A simplified form has been approved for the Ethical Review process on the Final Year Project; you will find this on the module Blackboard shell under ‘Module Information/Module Forms. This form is to be completed and signed off by week 4. If necessary, it can be reviewed later; it may be that you decide later to involve some human subjects (for example, to carry out some user testing); or if you are undertaking a ‘research’ project you might not have completed your research design, and thus cannot identify what ethical issues may be involved, by week 4.

The possible outcomes of the Ethical Review are:

1. No ethical issues

2. Minor ethical issues which have been addressed and concerns resolved

3. Major ethical issues which have been addressed and concerns resolved

4. Ethical issues that have not been resolved/addressed

It is likely that for the majority of projects the outcome will be 1 or 2: in these cases, the Ethical Review form is completed accordingly, and signed off by the student and supervisor.

If the outcome is 3 or 4, the completed form must be forwarded to the Faculty Research Ethics committee.

You must keep a copy of the completed and signed Ethical Review form. If changes are made in the spring term then the new form must be handed in as an appendix to your final report.

Further information about the University’s Human Research Ethics policy can be found at: <http://www.dmu.ac.uk/research/ethics-and-governance/pg-and-research/human-research-ethics/technology/human-research-ethics.aspx>

Take care if you plan to use publicly available websites to support questionnaires, these may request data from respondents that is additional to the questions you have submitted and possibly in violation of your ethical review.

## Global checklist

As a student of DMU you will be aware of the high value placed on gaining an international experience through all the courses that we offer. As part of the process of enhancing your learning experience through global engagement, the international element of our undergraduate courses is now being assessed at every level. In the School of Computer Science and Informatics, the module which holds this assessment in the final year is the project module, which provides a natural forum for considering the wider aspects of your learning and demonstrable knowledge. Your project will include a Global Impact checklist.

The rationale for this inclusion of an international component in the project module is to support the central #DMUGlobal campaign. The educational value is the assessment of impact with consideration of an international context. The format of this checklist is similar to the Ethics form and includes some free text in which you can articulate how the chosen global attributes have been addressed. You can complete the form in consultation with your project supervisor.

No matter how technical a project may be, there will always be some global aspect attached to it. Please see below for an example from Richard Gatward that has circulated in the past:

*“one of my students is developing an Uber like system to be used in a similar way with a mobile app, but that is intended to be used by a traditional locally based mini-cab company. There is a clear need for these companies to embraces this technology to keep up with the competition, and I’ve agreed with the student that there are clear aspects of Global consideration that are relevant to the development. Generalising such an app has legal implications, and variation in the way the legal rulings, such as the recent one on Uber in the UK courts, effects the different ways in which these approaches are rolled out across different countries is a relevant consideration. Learning from the varying international approach that has resulted in the ways that different countries have reacted to the spread of Uber is also relevant, particular in the light of the recent development in China.”*

*“For the Maths example, my student is doing a research project considering the invention of zero, and the potential implications of modern life without the concept of zero either as an expression of nothingness, or as a placeholder. The global cultural dimension here is obvious, and the ways in which use of the concept effected the historical technological development timeline in different regions of the world is still relevant in understanding present day political power dynamics, as well as appreciating the prestige which can be attributed to the particular societies which brought about the concept in the first place. So a very clear global cultural dimension.”*

The checklist can be found in the Appendix and on the Blackboard shell.

# Deliverables

Make sure to submit your deliverables by the deadline.

Also note that if your submission is successful, Turnitin will give you a submission ID. Make sure you click on the ‘confirm’ button. After this you should receive a confirmation email about your submission. **If you don’t receive the email, that means you have not submitted and you have to go through the submission process again.**

## Development Projects

Your final submission includes a Project contract, Project plan, an Ethical review, and the Global checklist, like all projects, and also a Final Report, that documents the following:

* a Literature Review
* the Requirements for the software you are building.
* Use Case Diagrams/Use Case Descriptions/Class diagrams/ER model/State transition diagrams
* Story boards/Interface Designs
* Design Documentation
* A Test Plan
* Critical evaluation of your product and your design choices
* Prototype
* Software
* Appendices (e.g. further design documentation, test logs, project progress reports)

and it should be referenced properly using Harvard style, also referring to appendices where appropriate.

As there is only a single deadline for the project, make sure that you attend your supervision meetings diligently.

**DEADLINE: week 27, 05/04/2019**

By the time you submit the Final Deliverable, you should also have agreed a date for the project viva, which should include a demonstration of the software you produced.

Detailed submission instructions (file types, how to submit files that are not checked by TurnItIn, etc) will appear on the Blackboard shell well before the deadline day.

For a Development Project of a student on a BCS accredited course, the first marker will also fill out a checklist to confirm that the relevant BCS criteria will be achieved. This take place by the end of week 4. This is done alongside the marking grid, but does not affect the student’s mark.

## Research Projects

Your final submission includes a Project contract, Project plan, an Ethical review, and the Global checklist, like all projects, and also a Final Report, that documents the following:

* Full literature Review
* the Research Questions that your project will address.
* Research Methodology
* Report on the field study, where appropriate
* Findings and analysis
* Conclusions etc.
* Reference list
* Appendices (surveys, interviews evidence, project progress reports etc)

and it should be referenced properly using Harvard style, also referring to appendices where appropriate.

As there is only a single deadline for the project, make sure that you attend your supervision meetings diligently.

**DEADLINE: week 27, 05/04/2019**

By the time you submit the Final Deliverable, you should also have agreed a date for the project viva, which should include a demonstration of the software you produced.

Detailed submission instructions (file types, how to submit files that are not checked by TurnItIn, etc) will appear on the Blackboard shell well before the deadline day.

## Hybrid Projects

Your final submission includes a Project contract, Project plan, an Ethical review, and the Global checklist, like all projects, and also a Final Report, that documents the following:

* a Literature Review
* the Requirements for the software you are building
* Use Case Diagrams/Use Case Descriptions/Class diagrams/ER model/State transition diagrams
* Story boards/Interface Designs
* Design Documentation
* A Test Plan
* Critical evaluation of your product and your design choices
* Prototype
* Software
* Appendices (e.g. further design documentation, test logs, project progress reports)

and it should be referenced properly using Harvard style, also referring to appendices where appropriate.

Superficially, these may make a Hybrid project appear like a Development project. However, the marking process for Hybrid projects has significantly reduced expectations on the quantity and sophistication of the software produced to compensate for the extra research and writing included.

As there is only a single deadline for the project, make sure that you attend your supervision meetings diligently.

**DEADLINE: week 27, 05/04/2019**

By the time you submit the Final Deliverable, you should also have agreed a date for the project viva, which should include a demonstration of the software you produced.

Detailed submission instructions (file types, how to submit files that are not checked by TurnItIn, etc) will appear on the Blackboard shell well before the deadline day.

For a Hybrid Project of a student on a BCS accredited course, the first marker will also fill out a checklist to confirm that the relevant BCS criteria will be achieved. This take place by the end of week 4. This is done alongside the marking grid, but does not affect the student’s mark.

# Supervision

Your supervisor has been allocated 5 hours for face to face supervision, with additional time for reading drafts, marking deliverables, and providing feedback on all of those. In order to get the most out of supervision sessions, we suggest that before every supervision session, you

* Produce a summary of your progress since the last meeting: the work you have completed, the problems you have encountered and how you propose to solve them, etc. This should be documented on a Project Progress Report (available in the Appendix and on the Blackboard shell)
* Prepare a list of questions that you want to ask your supervisor, or issues about which you need some advice/guidance.
* Prepare a list of tasks you intend to work on between this and the next supervision meeting.

and during the supervision session, you

* Make sure you are clear about any feedback and advice you are given: ask for clarification, and consider taking notes.
* Agree with your supervisor the work you plan to tackle next.
* Agree the date of the next supervision meeting OR how contact will be made to agree the next meeting.

and after the supervision session, you

* Revise your project plan, if necessary.
* Plan your time until the next supervision meeting, considering your other commitments.
* Put in 10 hours per week work on your project, more if you have fallen behind.

# Use of Blackboard VLE and TurnItIn

All essential information for the module is included in this module handbook, which is also available on Blackboard. Students should check their email regularly, and also the Blackboard shell for the module, for any relevant announcements. The Blackboard shell also includes a number of useful documents, such as

* The module template
* All the module forms that you will need to complete throughout the year
* Marking grids for the first and second coursework component, per project type
* slides of the lectures supporting this module
* Advice provided by CLaSS for various of the activities and products in the module
* Suggested reading lists
* Advice to support you on making the most out of your supervisor, advice on the viva examination, and more.

All deliverables for the module should be submitted via TurnItIn links provided. As per the DMU assessment policy, there is a University requirement for written coursework to be checked for originality using TurnItIn where this is appropriate to the learning outcomes and assessment design. This includes both dissertations and major projects.

# Academic Offences and the Academic Practice Officer

You are reminded that the work you submit must be your own, except where its original author is clearly referenced. Please refer to **Chapter 4** of the **General Regulations and Procedures Affecting Students**: <http://www.dmu.ac.uk/dmu-students/the-student-gateway/academic-support-office/student-regulations.aspx> for a broader and more detailed description of good standards of academic practice, including a discussion of what does and does not constitute plagiarism. Please contact your supervisor or the module leaders if you remain uncertain about a specific issue related to this after reading the official guidance.

The **Faculty academic practice officer** is Dr Moira Carroll-Mayer (Gateway House 5.52, email: [mcm@dmu.ac.uk](mailto:mcm@dmu.ac.uk), phone extension 1551).

# Appendix

**De Montfort University**

**Module template proforma**

**Basic module information**

Module Title: **Final Year Project**

|  |  |  |
| --- | --- | --- |
| Module Code: **IMAT3451** | Credit value:**30** | Credit level:**6** |

Owning Board: **BCM**

Faculty: **Technology**

Term: **Y**

Module Leader: **Efpraxia Zamani**

Module pre-requisites: The project normally requires students to have undertaken successfully the requirements at level 5 and level 4 of their degree programme prior to commencing the project. The prior learning for each project, however, is dependent on the nature of that project. It is expected that students will choose their project topics, based on their individual course's requirements and with reference to their own prior learning

Maximum student numbers on module: **NA**

**Module description**: The project provides students with the opportunity to carry out a significant piece of work involving critical analysis and reflection to provide an effective solution to a given technical and/or research-based problem. It enables students to apply and integrate previous material covered on the student's course as well as to extend the work covered on the course through research and self-learning. Students will be expected to demonstrate appropriate and proactive project management, and written/verbal presentation skills throughout the period of the project. As well as analysing, designing, delivering and appraising a product of suitable quality, they will be expected to undertake, research, analyse, design, evaluate and report on some aspects of a subject explicitly allied to the project.

Indicative Content

The range of projects will be wide. Projects are obtained from a variety of sources; internal academics, from external organisations, and many from students themselves. A Computer systems project, for example, could involve a range of activities necessary to create a successful system, from the initial fact finding, through to implementation and user training. A research-based project may concentrate on the investigation and analysis of academic and/or empirical research relating to a given research question/topic.

Some courses may have mandatory requirements that restrict the nature of project work in order to satisfy, for example, course validation conditions and/or the requirements of professional bodies such as the British Computer Society (BCS).

In all cases, the project report submission (Final Submission) normally takes the following structure:

1. A **Main Report** providing a summary of the project experience, to normally include:

* an abstract
* an introduction and overview to the problem being addressed and the objectives of the project
* an overview of the project management approach adopted
* an overview of the methodology selected with justification
* one or more sections summarising activities that were undertaken as part of the project, probably corresponding to the activities that are prescribed by the chosen methodology.
* one or more sections summarising the academic literature review undertaken as part of the project requirements.
* a critical evaluation and reflection on the whole project experience, including the student's project management, as well as on the product produced.
* a conclusions section, with possible directions for further work.
* a reference list
* acknowledgements

2. A **set of Appendices** that are referred to within the Main Report, and which contain the substantive work on the project, including product deliverables, such as requirements and design specifications and other project documents (project contract, inform consent, ethics review form etc.).

Students also undertake a Viva examination (a presentation or a demonstration depending on the nature of their project) shortly after the submission of the Final Deliverable.

Project assessment will normally be based on criteria associated with the following areas:

* conduct and general motivation
* comprehension of problem and possible solutions
* approaches and methods adopted
* results/deliverables
* organisation and presentation

These are evaluated from the following sources:

* the Final Submission
* the Viva examination
* the student's Project Supervisor and second marker
* the Project Proposer (if applicable)

**Table of Deliverables**

|  |  |  |  |
| --- | --- | --- | --- |
|  | **Research Projects** | **Development Projects** | **Hybrid Projects** |
| **Final Submission**  These are some examples: each project will need a complete set of objectives/deliverables  Week 27 | * Project contract * Ethics form * Project Plan (e.g., Gantt Chart) * Global Checklist * Research Questions * Literature Review * Report on the field study * Findings and analysis * Critical evaluation * Conclusions * Reference list * Appendices (surveys, interviews evidence etc) * Maximum word count (main body): 15.000 | * Project contract * Ethics form * Project Plan (e.g., Gantt Chart) * Global Checklist * Literature Review * Requirements * Use Case Diagrams/Use Case Descriptions/Class diagrams/ER model/State transition diagrams * Story boards/Interface Designs * Design Documentation * Test Plan * Prototype * Critical evaluation * Software * Appendices (e.g. further design documentation, test logs) * Reference List * Maximum word count (main body): 10.000 | * Project contract * Ethics form * Project Plan (e.g., Gantt Chart) * Global Checklist * Literature Review * Requirements * Use Case Diagrams/Use Case Descriptions/Class diagrams/ER model/State transition diagrams * Story boards/Interface Designs * Design Documentation * Test Plan * Prototype * Critical evaluation * Software * Appendices (e.g. further design documentation, test logs, surveys, interviews evidence) * Reference List * Maximum word count (main body): 12.500 |
| **Viva examination:** attended by the supervisor and the 2nd marker  Weeks 31-33 | * Oral examination (presentation and defence of your work) | * Oral examination (demo and defence of your work) | * Oral examination (presentation and demo and defence of your work) |

\*the content of the deliverables is indicative and may be different for the various projects; students will need to agree on the specifics with their supervisor.

**Learning outcomes**

1. Effectively scope and plan an individual project of significant complexity.
2. Carry out work in accordance with the plan, and in a rigorous and sound manner.
3. Provide and justify an effective and informed resolution to the project.
4. Assess the potential global impact of the work
5. Present the project deliverables in a coherent and logical way, and in an suitable manner for the target audience.
6. Undertake appropriate research into one or more identified areas in a systematic and thorough manner.

**Assessment**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Type of assessment** | **Duration/**  **Volume** | **Assessment weighting %** | **Final assessment Y/N** | **Minimum threshold mark %** (if not 40% for UG, 50% for PGT) | **Essential component Y/N** | **Learning outcome(s)**  **assessed** | **Anonymously marked**  **Y/N** |
| **Final Submission (this includes the final submission and the Viva examination)** |  | **100%** | **Y** | **40%** | **N** | **1,2,3,4,5,6** | **N** |

**Assessment Notes**

It is the student's product that is a principal focus of the assessment, as is the student's ability to manage and undertake the project.

Each project submission will be assessed on general criteria associated with all projects, and on specific criteria that reflect the individual requirements of a particular project. The general criteria focus on those aspects (skills/knowledge) of the project work that all students should exhibit. The specific criteria refer to the substantive work undertaken by the student to achieve that particular project's product.

There are several means by which evidence for assessing project work may be gathered:

* Attendance and quality of supervisory meetings
* The written deliverable submission, in the manner as detailed in the current student project handbook
* Viva examination (Demo/presentation)

An appropriate marking scheme will be detailed and available on the module Blackboard shell, and used to guide the combining of the generic and specific aspects of a student's work to generate an overall mark for the project. A mark for a student's project is agreed jointly by the two markers, with the Project Co-ordinator adjudicating in the event of dispute. Any proposed mark for a student is subject to both internal and external moderation. Internal moderation will be sympathetic towards the differing nature of projects and the different initial programme-provided skill sets of students doing the project module across different programmes.

Unless there are exceptional circumstances:

**- students that fail to attend the viva examination will be given an overall project mark of zero percent;**

**- if during the viva examination a student cannot demonstrate an understanding of the work that has been submitted in their name they will fail the viva examination and will be awarded a mark of zero for the components they cannot explain.**

**Reassessment**

Referral normally involves either undergoing the entire project activity/assessment cycle with reference to a new project (if the project scores below 30%) or, if considered feasible by the assessment board, to the amendment/enhancement of the same project within an appropriate timeframe (if the project scores between 30% and 39%). The deferral method adopted for a particular student will typically be decided taking into account any recommendations from the student's project supervisor.

**Expected methods of delivery**

The project is primarily self-directed with guidance and support from an assigned supervisor. Project skills sessions will normally be provided to give students the necessary pre-requisite knowledge and skills for the project that are not covered elsewhere in the taught programme. A few 'Experts' may also be available to all students at appropriate times during the Project year to provide advice and help regarding particular software applications and systems development aspects. A project Blackboard shell is available as a resource for students, which contains all the necessary project documents/forms, the project calendar, project guidance notes, the list of available projects and supervisor allocations, deadline information, lecture notes etc.

Depending on the nature of the project, a viva examination (presentation and/or demo) is given towards the end of the module. This enables students to show their understanding of the findings of their work, and to defend what they have done and how they have done it.

**Module delivery variations** (if applicable)

|  |  |  |
| --- | --- | --- |
| **Module Name: Final Year Project Code: IMAT3451 Level: 6** | | |
| **Learning Approach for Module** | **Hours Per Module** | **Total: 300** |
| **a. Academic Led: Face to Face (f) or Virtual (v)** | | |
| **Fieldtrip** |  |  |
| **Practical** |  |  |
| **Lecture / Large Group** | 5 |  |
| **Seminar (currently called Tutorial)** |  |  |
| **Studio** |  |  |
| **Tutorial** | 5 |  |
| **Workshop** |  |  |
| **b. Non Academic Led: Placement Learning (PL)** | | |
| **Placement** |  |  |
| **c. Student Led: Self-Directed Learning (SDL)** | | |
| **On Line Learning** |  |  |
| **Reading – suggested reading is part of seminar work** |  |  |
| **Collaborative Activities** |  |  |
| **Reflection** |  |  |
| **Revision** |  |  |
| **Consolidation** | 290 |  |
| **PGR Training** |  |  |