Liverpool John Moores University

Title: RESEARCH PROJECT
Status: Definitive
Code: **5501NCCG**   (129434)
Version Start Date: 01-08-2021

Owning School/Faculty: Engineering
Teaching School/Faculty: Nelson Campus

Team	Leader
Christian Matthews	Y

Academic Level:	FHEQ5	**Credit Value:**	20	**Total Delivered Hours:**	38
Total Learning Hours:	200	**Private Study:**	162		

Delivery Options
Course typically offered: S1, S2, Sum, NS2 (S2 for Jan)

Component	Contact Hours
Lecture	24
Tutorial	14

Grading Basis: 40 %

Assessment Details

Category	Short Description	Description	Weighting (%)	Exam Duration
Report	Report	Project Report	60	
Presentation	Pres.	Poster Presentation (15 mins + Q&A)	40	

Aims

This module introduces students to the skills necessary to deliver a complex, independently conducted research project that fits within an engineering context. On successful completion of this module students will be able to deliver a complex and independent research project in line with the original objectives, explain the critical thinking skills associated with solving engineering problems, consider multiple perspectives in reaching a balanced and justifiable conclusion, and communicate

effectively a research project's outcome. Therefore, students develop skills such as critical thinking, analysis, reasoning, interpretation, decision-making, information literacy, information and communication technology literacy, innovation, conflict resolution, creativity, collaboration, adaptability and written and oral communication.

Learning Outcomes

After completing the module the student should be able to:

1	Conduct the preliminary stages involved in the creation of an engineering research project.
2	Examine the analytical techniques used to work on all stages of the project and strategies required to overcome the challenges involved in a research project.
3	Reflect on the impact the research experience could have in enhancing personal or group performance within an engineering context.
4	Explore the communication approach used for the preparation and presentation of the research project's outcomes.

Learning Outcomes of Assessments

The assessment item list is assessed via the learning outcomes listed:

Project Report   1   2   3

Poster Presentation   4

Outline Syllabus

Preliminaries: project proposal, developing a research question(s), selection of project approach,
resource requirements, key objectives, goals and rationale, development of project specification
Investigative skills and project strategies: selecting the method(s) of collecting data, data analysis and interpreting findings, literature review, engaging with technical literature, technical depth, multi-perspectives analysis, risk issues including health and safety, environmental and
commercial, project management and key milestones.
Research purpose: detailed statement of project aims, relevance of the research, benefits and beneficiaries of the research,
Project outputs: preparation of a final project report, writing research report, oral presentation
and conclusions

Learning Activities

Lectures
The theoretical underpinning of this module is taught formally by means of interactive lectures to small groups of up to 20 students

Group Tutorials
The bulk of the module will be made up of group tutorial support and supervision by staff of students' evolving project work.

Independent Study
Students are expected to undertake personal reading and research into topic areas that have been stimulated from the lectures and seminars. This reading will enhance their academic work and enable valid contribution to lectures and seminars.

VLE support
This will provide links to academic web-sites and on-line journals, facilitate group discussion outside of the classroom, access to outline lecture notes, and provide students with assessment details.

Notes

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