

Liverpool John Moores University

Title: BIOMEDICAL RESEARCH METHODS
Status: Definitive
Code: **7010BMBMOL** (101510)
Version Start Date: 01-08-2011

Owning School/Faculty: Pharmacy & Biomolecular Sciences
Teaching School/Faculty: Pharmacy & Biomolecular Sciences

Team	Leader
Lesley Walton	Y
Kehinde Ross	
Susan Spiers	
Anne Humphreys	
Philip Rowe	
Carol Raper	
Patricia Burke	

Academic Level: FHEQ7 **Credit Value:** 10.00 **Total Delivered Hours:** 20.00
Total Learning Hours: 100 **Private Study:** 80

Delivery Options

Course typically offered: Standard Year Long

Component	Contact Hours
Lecture	10.000
Workshop	10.000

Grading Basis: 40 %

Assessment Details

Category	Short Description	Description	Weighting (%)	Exam Duration
Practice	AS1	Write a proposal detailing the intended MSc project	100.0	

Aims

To engender the confidence and academic skills required to undertake research in the area of biomedical science.

Learning Outcomes

After completing the module the student should be able to:

- 1 Develop a strategy for a research project.
- 2 Find and evaluate scientific literature relevant to a research project.
- 3 Design a research project using relevant techniques.
- 4 Evaluate the health and safety and ethical implications of a research project.
- 5 Evaluate data using statistical analysis

Learning Outcomes of Assessments

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

CW 1 2 3 4 5

Outline Syllabus

The research process and design of a project

Time management

Use of resources

Experimental procedures: controlled experiments, reproducibility, reliability, validity

Legal implications: medical ethics; local research ethics committees, the Human Tissue Act

Research governance in the UK National Health Service

Data analysis and statistical procedures; qualitative and quantitative analysis

Writing a proposal

Report writing and publication of results

Learning Activities

Students will attend workshops on the design, execution and dissemination of the findings of a research project.

References

Course Material	Book
Author	Bannerjee, A
Publishing Year	2003
Title	Medical statistics made clear: an introduction to basic concepts.
Subtitle	
Edition	
Publisher	Royal Society of Medicine, London

ISBN	1853155446
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Course Material	Book
Author	Doyal, L
Publishing Year	2001
Title	Informed consent in medical research
Subtitle	Eds: Doyal, L and Tobias, JS
Edition	
Publisher	BMJ
ISBN	0727914863

Course Material	Book
Author	Glatthorn, AA and Joyner RL
Publishing Year	2005
Title	Writing the winning thesis or dissertation: a step-by-step guide
Subtitle	
Edition	2nd
Publisher	Corwin Press, Thousand Oaks, California
ISBN	076193961X

Course Material	Book
Author	Holmes, D, Moody, P, Dine, D.
Publishing Year	2006
Title	Research methods for the biosciences
Subtitle	
Edition	
Publisher	OUP
ISBN	0199276927

Course Material	Book
Author	Mason, JK
Publishing Year	2005
Title	Mason and McCall Smith's Law and medical ethics
Subtitle	
Edition	7th
Publisher	OUP
ISBN	0199282390

Course Material	Book
Author	Pence, GE
Publishing Year	2002
Title	Brave new bioethics
Subtitle	
Edition	
Publisher	Rowan & Littlefield
ISBN	0742514374

Course Material	Book
Author	www.corec.org.uk
Publishing Year	0
Title	Central Office for Research Ethics Committees
Subtitle	
Edition	
Publisher	
ISBN	

Course Material	Book
Author	www.doh.gov.uk
Publishing Year	0
Title	
Subtitle	
Edition	
Publisher	
ISBN	

Course Material	Book
Author	www.nhs.uk
Publishing Year	0
Title	
Subtitle	
Edition	
Publisher	
ISBN	

Notes

This module prepares students for their Research Project (7007BMBMOL)