PROGRAMME SPECIFICATION



1	Awarding Institution	Newcastle University
2	Teaching Institution	Newcastle University Medicine Malaysia
3	Final Award	Foundation Award
4	Programme Title	Foundation in Science
5	UCAS/Programme Code	From May 2026:
		May Intake: 1925U
		September intake:1493U
6	Programme Accreditation	Malaysian Qualifications Agency
		N/010/3/0361
7	QAA Subject Benchmark(s)	N/A
8	FHEQ Level	3
9	Last updated	July 2025

10 Programme Aims

The programme is intended to serve as a pre-undergraduate Foundation programme for both Malaysian and international students intending to study medicine, biomedical sciences or biological science at undergraduate level in Malaysia at Newcastle University Medicine Malaysia, in the UK or at another Malaysian or UK HE institution, depending on the final grades achieved. As such the academic aims of the programme are as follows:

- To provide students with the intellectual development and subject knowledge that they
 will require to be academically capable of studying medicine, or biological and biomedical
 and other science_subjects at Undergraduate Level at Newcastle University or in another
 UK or Malaysian HEI after they graduate
- 2. To equip Malaysian and International students with the English language competence they need to study at Foundation level at Newcastle University or in another UK HEI
- 3. To develop students' study skills so that they are capable of successfully entering UK or Malaysian Higher Education.
- 4. To provide practical experience of British University teaching methods
- 5. To enable students to develop confidence in communicating with native English speakers
- 6. To encourage students to undertake self-evaluation to help them identify additional needs
- 7. To provide a flexible programme which leads to a qualification which meets the criteria for Foundation award as laid down in the Malaysian Qualifications Framework, the Quality Assurance Agency's (QAA) National Qualifications Framework.

11 Learning Outcomes

The programme provides opportunities for students to develop and demonstrate knowledge and understanding, qualities, skills and other attributes in the following areas.

Knowledge and Understanding

On completing the programme students should:

A1. Have acquired a basic knowledge and understanding of topics and concepts in biology, chemistry, physics, computing, mathematics and statistics thus allowing students to successfully study at undergraduate level in the biological sciences,

biomedical sciences or medicine.

- A2. Have an appreciation of the culture of UK higher education and its expectations of students
- A3. Have a knowledge and understanding of academic English such that they may successfully start an undergraduate degree programme at Newcastle University Medicine Malaysia or in the UK
- A4. Understand the basic requirements for writing competent scientific essays, case studies and laboratory reports

Teaching and Learning Methods

Knowledge and understanding is primarily taught through lectures and practical laboratory sessions supported by reading, seminar discussion and tutorials. English is primarily taught in smaller classes and reinforced through practice. Case studies and project work will involve an element of student research.

Assessment Strategy

Knowledge and understanding is assessed primarily through unseen examinations, written coursework (such as numerical exercises, essays, case studies, project reports, laboratory reports), in-course tests and observation of ability to carry out specific practical experiments.

Intellectual Skills

On completing the programme students should be able to:

- B1. Apply appropriate quantitative and computational methods to experimental data and to interpret experimental results
- B2. Read academic texts and other sources of information with some degree of analytical skill
- B3. Discuss and evaluate the results of experiments or other forms of research either orally or in writing
- B4. Use quantitative techniques related to biological and chemical experimentation
- B5. Apply appropriate mathematical techniques to numerical data

Teaching and Learning Methods

These skills are best taught and learned through practice, although the Study Skills module will provide students with advice on what is expected of UK students and strategies for developing these skills, particularly B2 and B3. Laboratory and seminar/tutorial/calculation class work will assist in development of B1, B3-B5.

Assessment Strategy

All of the above intellectual skills will be assessed as part of the overall assessment of case study and project reports and/or oral presentations, calculation class exercises, laboratory work and laboratory reports. The Study Skills module will assess B2 and B3 in particular. Unseen examinations will assess B1, B4, B5.

Practical Skills

On completing the programme students should be able to:

- C1. Carry out a range of basic laboratory techniques with an emphasis on the development of good laboratory skills/technique and an understanding of laboratory safety.
- C2. Present scientific data and ideas in clear and logical form, either tabulated, graphically or in written or oral English
- C3. Develop strategies for effective note taking in lectures and seminars
- C4. Read and take notes from an academic text or other sources of information
- C5. Take part in seminar and tutorial discussions

- C6. Write essays and laboratory reports in an academic context in acceptable English following the appropriate conventions
- C7. Apply proper referencing and other aspects of good academic practice
- C8. Demonstrate competence in appropriate basic mathematical techniques

Teaching and Learning Methods

The study skills module will deliver C3 and introduce C4 and C5, and the lessons learned here will be reinforced and practised in the other taught modules. The skills, C4 and C5, will also be taught through the English for Academic Purposes module largely through small group teaching and C7 will also be introduced in this module. These skills will be practised and reinforced in the other modules in this programme with laboratory classes and seminar/tutorials exercises developing C1, C2, C6, C8.

Assessment Strategy

Practical laboratory and scientific skills will be assessed through observation of experimental technique and laboratory reports, seminar/tutorial exercises and in some tests and exams. English language competency will be tested directly in the English for Academic Purposes module using a mixture of tests and coursework and cover reading, writing, speaking and listening. Other modules will indirectly assess English language competence and the ability to take notes and use sources, as they all require an ability to express ideas in English. C7 will be assessed through specific exercises in the study skills module and as part of assessment of case studies, project reports and essays submitted in the academic modules.

Transferable/Key Skills

On completing the programme students should be able to:

- D1. Work as a member of a team with colleagues from other cultures and backgrounds
- D2. Make oral presentations using appropriate scientific language and terminology
- D3. Use IT skills effectively
- D4. Manage their time effectively
- D5. Use library and other information sources effectively
- D6. Think and work effectively on their own when required
- D7. Express ideas and facts in an acceptable format in acceptable English
- D8. Understand and communicate effectively with native speakers of English
- D9. Analyse their own strengths and weaknesses and take action accordingly
- D10. Demonstrate good levels of numeracy

Teaching and Learning Methods

The lectures in the Study Skills module will introduce students to all of these key skills and provide guidance on techniques, with practice occurring largely in the other modules and in small group teaching on the Study Skills module. Students will further develop D8 through studies within the English for Academic Purposes module and from English language practice in the academic modules.

Assessment Strategy

Group work is required throughout the programme of study and students' success in working in teams will, therefore, be assessed via the quality of the end product. Several assessed oral presentations are built into the Study Skills module. D3-D7 and D10 will be assessed via coursework assessment and in particular through case studies, essays and laboratory reports. The Study Skills module will also assess teamwork and essay writing. D9 will be assessed through preparation of a reflective log with particular emphasis on development of D8 skills.

12 Programme Curriculum, Structure and Features

Basic structure of the programme

A one year, three semester, 180 credit programme as approved by the Malaysian Quality Agency which combines study of English for academic purposes with the study of ICT and study skills and academic study in biology, chemistry, physics, computing, mathematics and statistics.

Key features of the programme (including what makes the programme distinctive)

The Foundation award in science prepares Malaysian and International pre-University students to study medicine, biological or biomedical sciences or science at an Undergraduate level at Newcastle University Medicine Malaysia or in another Higher Education Provider in Malaysia or the UK. The combination of English for academic purposes, study skills and academic content will support pre-University students and bring them up to the standard required for entry to one of the undergraduate programmes offered at Newcastle University Medicine Malaysia or Newcastle University UK.

The programme consists of 2 pathways, Biological/Biomedical and Medical Sciences pathway and Data Science pathway. The programme consists of 120 credits of compulsory modules in English, study skill and physics, mathematics & statistics and medical studies and 60 credits of compulsory modules based on the pathway. The 60 credits of compulsory modules in Biological/Biomedical and Medical Sciences pathway consist of modules in biology and chemistry while the Data Science pathway consist of modules in mathematics and computing.

Programme regulations (link to on-line version)

-R1925U 1493U 2526 vFinal.pdf

13 Support for Student Learning

Generic information regarding University provision is available at the following link.

General Information

14 Methods for evaluating and improving the quality and standards of teaching and learning

Generic information regarding University provision is available at the following link.

General Information

15 Regulation of assessment

Generic information regarding University provision is available at the following link.

General Information

In addition, information relating to the programme is provided in:

The Foundation award Brochure

https://www.ncl.ac.uk/numed/study-with-us/undergraduate-and-foundation-study/foundation-in-biological-and-biomedical-sciences/

Degree Programme and University Regulations (see

https://www.ncl.ac.uk/regulations/programmeregsandspec/)

Please note. This specification provides a concise summary of the main features of the programme and of the learning outcomes that a typical student might reasonably be expected to achieve if she/he takes full advantage of the learning opportunities provided.

Annex

Mapping of Intended Learning Outcomes onto Curriculum/Modules

May Intake)		lutondo	d I aanaina a			
Module Code	Module title	Credits	Туре	A	d Learning o	C	D
BBF0006	English for Academic Purposes	40	Compulsory/ Core	2,3,4	2,3	2,3,4,5,6,7	1,2,5,6,7,8
BBF0008	Study Skills and ICT for Science and Medicine	20	Compulsory	2,3,4	2,3	3,4,5,6	1,2,3,4,5,7,8,9
BBF0007	Foundation Medical Studies	20	Compulsory/ Core ₂	1,3,4	2,3	5,6,7	1,2,4,7,8,9
BBF0003	Foundation Chemistry	20	Compulsory/ Core ₂	1,3,4	1,2,3,4,5	1,2,5,6,8	1,5,6,7,8,10
BBF0001	Foundation Biology 1	20	Compulsory/ Core ₂	1,3,4	1,2,3,4,5	1,2,5,6,8	1,5,6,7,8,10
BBF0002	Foundation Biology 2	20	Compulsory/ Core ₂	1,3,4	1,2,3,4,5	1,2,5,6,8	1,5,6,7,8,10
BBF0004	Foundation Physics	20	Compulsory/ Core ₂	1,3,4	1,2,3,4,5	1,2,5,6,8	1,5,6,7,8,10

BBF0005	Foundation Mathematics and Statistics	20	Compulsory	1,3	1,4,5	2,5,8	1,3,5,6,10
BBF0021	Core Mathematics A	20	Compulsory/ Core ₁	1,3	1,4,5	2,5,8	1,3,5,6,10
BBF0022	Core Mathematics B	20	Compulsory/ Core ₁	1,3	1,4,5	2,5,8	1,3,5,6,10
BBF0023	Foundation Computing	20	Compulsory/ Core ₁	1,4	2,3,5	2,3,4,5,6,8	1,3,4,5,6

September Intake				Intended Learning outcomes				
Module Code	Module title	Credits	Туре	A	В	С	D	
BBF0016	English for Academic Purposes (40 Credits)	40	Compulsory/ Core	2,3,4	2,3	2,3,4,5,6,7	1,2,5,6,7,8	
BBF0018	Study Skills and ICT for Science and Medicine	20	Compulsory	2,3,4	2,3	3,4,5,6	1,2,3,4,5,7,8,9	
BBF0017	Foundation Medical Studies	20	Compulsory/ Core ₂	1,3,4	2,3	5,6,7	1,2,4,7,8,9	
BBF0013	Foundation Chemistry	20	Compulsory/ Core ₂	1,3,4	1,2,3,4,5	1,2,5,6,8	1,5,6,7,8,10	
BBF0011	Foundation Biology 1	20	Compulsory/ Core ₂	1,3,4	1,2,3,4,5	1,2,5,6,8	1,5,6,7,8,10	
BBF0012	Foundation Biology 2	20	Compulsory/ Core ₂	1,3,4	1,2,3,4,5	1,2,5,6,8	1,5,6,7,8,10	
BBF0014	Foundation Physics	20	Compulsory/	1,3,4	1,2,3,4,5	1,2,5,6,8	1,5,6,7,8,10	

			Core ₂				
BBF0015	Foundation Mathematics and Statistics	20	Compulsory	1,3	1,4,5	2,5,8	1,3,5,6,10
BBF0031	Core Mathematics A	20	Compulsory/ Core ₁	1,3	1,4,5	2,5,8	1,3,5,6,10
BBF0032	Core Mathematics B	20	Compulsory/ Core ₁	1,3	1,4,5	2,5,8	1,3,5,6,10
BBF0033	Foundation Computing	20	Compulsory/ Core ₁	1,4	2,3,5	2,3,4,5,6,8	1,3,4,5,6

All other modules are Compulsory or Compulsory and Core for all students

Core for Data Science Pathway only
 Core for Biological/Biomedical and Medical Sciences Pathways only