

Module Specification

Module Title Module Code
Credit Value Level Mode of Delivery Semester A

Pre-requisite modules	Co-requisite modules	Overlapping modules
BMD261 Cellular and Molecular Neuroscience,		

1) Content Description

Provide a description of the module, as it will appear in the Module Directory and on the Student Information System (approx. 70-80 words).

The module will focus on understanding the mechanisms underlying complex brain disorders and injury. Topic covered will include an integrated view of the major neurotransmitter systems and in-depth analysis of the mechanisms underlying the effects of drugs used in central nervous system. Neuronal pathways using excitatory and inhibitory amino acids and neuropeptides will be reviewed, with emphasis on their involvement in neuropathological processes underlying disorders such as Parkinson's disease, dementia, schizophrenia, mood disorders, pain, head injury, stroke, epilepsy and drug abuse.

2) Module Aims

Specify the aims of the module, i.e. the broad educational purposes for offering this module.

The module aims to provide an in depth understanding of the cellular mechanisms underlying complex brain disorders and injury. Current therapies will be critically evaluated from a pharmacological perspective. Emerging concepts and the rationale of new therapeutic approaches in neurology and psychiatry will be discussed in the module.

3) Learning Outcomes

Identify the learning outcomes for this module, i.e. knowledge, skills and attributes to be developed through completion of this module. Outcomes should be referenced to the relevant [QAA benchmark statements](#) and the [Framework for Higher Education Qualifications in England, Wales and Northern Ireland \(2008\)](#). The [SEEC Credit Level Descriptors for Further and Higher Education 2003](#) and [Queen Mary Statement of Graduate Attributes](#) should also be used as a guiding framework for curriculum design.

Academic Content:

A1	Demonstrate a systematic understanding of neuropathological processes underlying complex brain disorders
A2	Identify cellular mechanisms underlying complex brain disorders
A3	Show a critical awareness of scientific research methods used to study brain disorders

Disciplinary skills - able to:	
B1	Critically appraise and interpret scientific evidence from primary research articles
B2	Integrate information from a variety of sources including primary research articles to construct a coherent argument
B3	Analyse and evaluate different models of brain disorders

Attributes:	
C1	Communicate effectively by written and verbal means
C2	Evaluate the relevance and reliability of information from a variety of sources
C3	Demonstrate an awareness of the clinical and translational aspects of neuroscience research

4) Reading List

Provide an indicative reading list for the module. This should include key texts and/or journals but **should not** be an exhaustive list of materials.

Research papers and reviews will be the primary literature required for this module

5) Teaching and Learning Profile

Provide details of the method of delivery (lectures, seminars, fieldwork, practical classes, etc.) used to enable the achievement of learning outcomes and an indicative number of hours for each activity to give an overall picture of the workload a student taking the module would be expected to undertake. This information will form the Key Information Set for each undergraduate programme and will be used to populate the KIS widget found on the QMUL programme information pages. More information can be found [online](#) about KIS. You may also wish to refer to the [QAA guidance on contact hours](#) when completing this section.

Activity Type	KIS Category	Time Spent (in hours)
Lecture	Scheduled	22
Tutorial	Scheduled	10
Guided independent study	Independent	118
Total		150

Specify the total module notional study hours. This should be a total of the hours given for each activity. The notional study hours for each academic credit point is 10. A 15 credit point module therefore represents 150 notional study hours.

Activity Type	Total Time Spent (in hours)	Percentage of Time Spent
Scheduled learning and teaching	32	21
Placement		
Independent Study	118	79
Total	150	100

Use the information provided in the box above to specify the total time spent and the percentage time spent in each category of teaching and learning activity.

6) Assessment Profile

Provide details of the assessment methods used to assess the achievement of learning outcomes.

Description of Assessment	Assessment Type	KIS Category	Duration/Length	Percentage Weighting	Final element of assessment	Qualifying Mark
Written Exam	Written Exam	Written	3 hours	80%	Yes	
Group Power point presentation (2 x 15 slides)	Oral	Coursework		5%		
Individual oral presentation	Oral	Practical		5%		
Opinion essay (In-class test)	In class assignment	In class assignment	1h 15m	10%		

Final element of assessment: The assessment that takes place last. **There should normally be only one element of assessment marked as final unless two assessment or submission dates occur on the same day.**

Qualifying mark: A specified minimum mark that must be obtained in one or more elements of assessment in order to pass a module. **This is in addition to, and distinct from, the requirement to achieve a pass in the module mark to pass the module.**

Reassessment

Provide details of the reassessment methods used, specifying whether reassessment is either standard reassessment or synoptic reassessment.

- Standard Reassessment
 Synoptic Reassessment

Synoptic reassessment details (if you have indicated synoptic reassessment above, please give details)		
Brief Description of Assessment	Assessment Type	Duration/Length of Examination/ Coursework
Examination	Written Exam	3 hours