

BIOLOGY

Course Overview for Years 12 -13

DETAILS OF COURSE

Students will follow the OCR A Biology Specification, a content-led approach that is designed to engage and inspire students. The specification has been designed with teachers, universities and professional bodies, to produce a course that places more emphasis on developing students' understanding and application of biological concepts. By taking this approach, students will develop not only their biological skills but transferrable skills, such as problem solving, which will benefit them in all subjects that they study both now and in the future. The OCR A specification provides a flexible approach to learning that allows the teaching of practical scientific skills to be integrated with the theoretical topics. Thus providing students with an in-depth and broad knowledge of Biology that will be challenging to all.

A Level:

Module 1: Development of Practical Skills

Module 2: Foundations in Biology

Module 3: Exchange and Transport

Module 4: Biodiversity, Evolution and Disease

Module 5: Communication, Homeostasis and Energy

Module 6: Genetics, Evolution and Ecosystems

A-Level Practical Endorsement

ASSESSMENT:

A Level:

Paper 1: Biological Processes (written paper assessing modules 1, 2, 3 and 5)

Paper 2: Biological Diversity (written paper assessing modules 1, 2, 4 and 6)

Paper 3: Unified Biology (written paper assessing modules 1-6)

Practical Endorsement for Biology (non-examined assessment)

QUALITIES AND COMMITMENT EXPECTED FROM THE STUDENT:

This is a fun yet intensive course. Students are required to be dedicated as well as committed to independent study. Students are expected to be pro-active in their learning and should aspire to achieve their target grade or above. At AS and A level it is expected that students demonstrate very high levels of practical skill.

THE FUTURE:

The A Level Biology course is an excellent starting point for many professional careers. Traditional areas include Medicine, Dentistry, Pharmacy and Veterinary Science. Other areas include Biotechnology, Food Science, Microbiology, Pharmacology, Forensic Science, Genetic Engineering, Cell Biology, Physiotherapy and Sports Science. Education and Research could also be considered.



BEAL SIXTH FORM

| TERM | AUTUMN 1 | AUTUMN 2 | SPRING 1 | SPRING 2 | SUMMER 1 | SUMMER 2 |
|-----------------------------|---|--|--|--|--|---|
| YEAR 12 Teacher 1 | Biological Molecules | Nucleic Acids Cell Division, Diversity & Differentiation | Communicable Diseases Mid Year Assessment | Biodiversity | Classification & Evolution | Ecosystems End of Year Exam |
| YEAR 12 Teacher 2 | Cell Structure Enzymes (L1-5) | Enzymes (L6-9) Biological Membranes | Exchange Surfaces & Breathing Mid Year Assessment | Transport in Animals | Transport in Plants | Populations & Sustainability End of Year Exam |
| YEAR 13 Teacher 1 | Neuronal Communication Hormonal Communication Mock Exams | Photosynthesis Respiration (L1-3) | Respiration (L4-9) Cellular Control Patterns of Inheritance (L1-3) | Patterns of Inheritance (L4-9) Mock Exams | Patterns of Inheritance (L10-14) Revision Programme | A-Level Exams |
| YEAR 13 Teacher 2 | Communication & Homeostasis Excretion (L1-6) Mock Exams | Excretion (L7-8) Animal & Plant Responses (L1-8) | Animal & Plant Responses (L9-11) Manipulating Genomes (L1-6) | Manipulating Genomes (L7-8) Cloning & Biotechnology (L1-7) Mock Exams | Cloning & Biotechnology (L8-9) Revision Programme | A-Level Exams |