

School administrators and Heads of Learning Area – Science and teachers of Biology ATAR Year 11 are requested to note for 2023 the following courses that have minor syllabus changes. These syllabuses are now available on course pages and labelled as 'For teaching from 2023'.

Syllabus change

The content identified by ~~strikethrough~~ has been deleted from the syllabus and the content identified in *italics* has been revised in the syllabus for teaching from 2023

Unit 1

Science Inquiry Skills

- design investigations, including the procedure(s) to be followed, the materials required, and the type and amount of primary and/or secondary data to be collected; conduct risk assessments; and consider research ethics, including ~~animal ethics~~ the ethics of research involving living organisms
- represent data in meaningful and useful ways; organise and analyse data to identify trends, patterns and relationships; qualitatively describe sources of measurement error, ~~and uncertainty~~ and limitations in data; and select, synthesise and use evidence to make and justify conclusions

Science as a Human Endeavour

- ~~Australia's Biodiversity Conservation Strategy 2010–2030~~ presents a long-term view of the future and the actions that need to be implemented to conserve biodiversity

Science Understanding

Ecosystem dynamics

- human activities that can affect biodiversity and can impact on the magnitude, duration and speed of ecosystem change include examples of
 - habitat destruction, fragmentation or degradation, *including erosion and dryland salinity*
 - the introduction of invasive species
 - unsustainable use of natural resources
 - the impact of pollutants, including biomagnification *and eutrophication*
 - *emissions contributing to enhanced greenhouse effect which impact climate change*

Unit 2

Science Inquiry Skills

- design investigations, including the procedure(s) to be followed, the materials required, and the type and amount of primary and/or secondary data to be collected; conduct risk assessments; and consider research ethics, including ~~animal ethics~~ the ethics of research involving living organisms
- conduct investigations, ~~including micropoxy techniques, real or virtual dissections and chemical analysis~~ safely, competently, ethically and methodically for the collection of valid and reliable data
- represent data in meaningful and useful ways; organise and analyse data to identify trends, patterns and relationships; qualitatively describe sources of measurement error, ~~and uncertainty~~ and limitations in data; and select, synthesise and use evidence to make and justify conclusions

Science Understanding

Multicellular organisms

- in animals, the acquisition and processing of nutrients is facilitated by the structure of the digestive system; animals may have a gastrovascular cavity ~~with one opening~~ or a specialised alimentary canal ~~with two openings~~; specialisation of alimentary canals is related to diet, for example, herbivores and carnivores
- *in animals, waste such as carbon dioxide, water, nitrogenous compounds and salts are excreted; different types of nitrogenous wastes are produced by the breakdown of proteins; most aquatic animals excrete nitrogenous wastes directly into their surroundings; terrestrial animals require specialised mechanisms*
- ~~terrestrial Australian plants are adapted to minimise water loss in an arid environment~~