education session

Classification

How and why do we classify organisms?

Year 10-11

Learning Outcomes:

At the end of the session:

All students will understand that organisms are grouped and sorted into taxonomic hierarchies

Most students will understand key features of some main taxonomic groups

Some students will understand ways that evolution and variation impact species

Session Outline:

The session begins by exploring the benefits of sorting and classifying. It then examines the taxonomic hierarchy from domain to order. Students investigate animal biofacts (skulls, furs, etc.) and work together to sort these into invertebrates and the five main vertebrate groups (fish, amphibian, reptile, bird, mammal). After this activity, the discussion covers the evidence scientists use to classify organisms (DNA, biochemistry, etc.). The session concludes with a focus on species-level variation, including how individuals exhibit genetic and environmental differences, which can be continuous or discontinuous.

Curriculum Links

Biology

AQA: 4.6.2.1 Variation; 4.6.2.2 Evolution; 4.6.4 Classification

OCR: B5.2 Natural Selection and Evolution

Edexcel: Topic 3 Genetics; Topic 4 Natural selection

