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| **What will we be learning?****Year 12 Biodiversity** | **Why this? Why now?**Previous Learning Year 11 ecologyFuture Learning Year 13 ecologyEnquiry ProcessesAnalyse Patterns, Draw conclusions, Present data, Justify opinions, Collect data, Present data, Plan variables | **Key Words:****Abiotic factors****Bias****Biodiversity****Biomass****Biotic factors****Climax community****Community****Community****Conservation****Habitat****Habitat****Herbicide****Index of diversity****Interspecific competition** **Intraspecific competition****Monoculture****Niche****Niche****Pesticide****Pioneer species****Population****Population growth curve****Population size****Predator****Prey****Primary succession****Sample size****Secondary succession****Species richness****Succession****Tolerance range** |
| **What will we learn?*** how biodiversity may be considered at different levels
* how sampling is used in measuring the biodiversity of a habitat and the importance of sampling
* practical investigations collecting random and non-random samples in the field
* how to measure species richness and species evenness in a habitat
* the use and interpretation of Simpson’s Index of Diversity (D) to calculate the biodiversity of a habitat
* how genetic biodiversity may be assessed, including calculations
* the factors affecting biodiversity
* the ecological, economic and aesthetic reasons for maintaining biodiversity
* in situ and ex situ methods of maintaining biodiversity
* international and local conservation agreements made to protect species and habitats

**Misconceptions in this topic** |
| **What opportunities are there for wider study?**CareersEcology Forensics Horticulture Biochemistry Fisheries Work AgricultureFood Science Marine Biology Laboratory Work Environmental Health Teaching Pharmacology Biotechnology Veterinary work Environmental science ZoologySTE(A)M https://highcliffe.sharepoint.com/sites/LearnSTEM |
| **How will I be assessed?**End of topic assessment PAG 3.1 PAG 3.2 PAG 3.3 |