

Module code	SB-4323		
Module Title	Population, Community and Ecosystem Ecology		
Degree/Diploma	Bachelor of Science (Biology)		
Type of Module	Major Option		
Modular Credits	4	Total student Workload	8 hours/week
		Contact hours	7 hours/week
Prerequisite	SB-1202 Organisms and Environment; SB-1203 Skills in Biological Sciences		
Anti-requisite	None		
Aims			
Students will be able to discover, analyse and evaluate ecological concepts underlying the organisation, distribution and abundance of biological populations, ecological communities and ecosystems, and interpret and critique ecological concepts during field trips to selected ecosystems in Brunei as well as lab-based practicals.			
Learning Outcomes			
<i>On successful completion of this module, a student will be expected to be able to:</i>			
Lower order :	10%	- Describe concepts and current knowledge in population and community ecology	
Middle order :	10%	- Analyse data from field practicals and interpret the results in written reports	
Higher order :	80%	<ul style="list-style-type: none"> - Prepare and conduct oral presentations on ecological concepts - Appraise case studies during group discussions - Work independently in critically reviewing journal articles in ecology - Work effectively and collaboratively in groups during practicals in the field 	
Module Contents			
<ul style="list-style-type: none"> - Hierarchical organisation of ecological systems - Properties of populations, population growth and regulation, and metapopulations - Species interactions - Interspecific and Intraspecific competition - Predation, parasitism and mutualism -Community structure and dynamics, community patterns in time -Primary and secondary succession -the island biogeography theory -Methods in community ecology -Measures of species diversity, richness and abundance -Multivariate analyses of ecological communities -Primary and secondary production -Ecosystem dynamics and ecosystem health 			
Assessment	Formative assessment	Tutorial assignments and feedback	
	Summative assessment	Examination: 0% Coursework: 100% <ul style="list-style-type: none"> - 3 practical reports (60%) - 1 journal critique (15%) - 1 oral presentation (15%) - 1 case study (10%) 	