

Faculty	Faculty of Natural Sciences			
Home Department	Statistics and Population Studies			
Module Topic	Introductory Multivariate Analysis 739			
Generic Module Name	Statistics 739			
Alpha-numeric Code	STA739			
NQF Level	8			
NQF Credit Value	15			
Duration	Semester			
Proposed semester to be offered	First Semester			
Programmes in which the module will be offered	BSc Hons (Statistical Science) (3737)			
Year Level	1			
Main Outcomes	<p>On completion of this module students should be able to:</p> <ul style="list-style-type: none"> • Apply and understand matrix algebra for multivariate analysis; • Characterize multivariate data; • Perform and interpret principal component analysis; • Calculate and interpret discriminant analysis results; • Apply the taught theory to data problems using SAS and/or RStudio. 			
Main Content	Topics in matrix algebra such as vector and matrix theory, linear transformations and systems of linear transformations will be introduced to understand multivariate analysis with specific emphasis on principal component analysis and discriminant analysis.			
Pre-Requisite Modules	None			
Co-Requisite Modules	None			
Prohibited Module Combination	None			
Breakdown of Learning Time	Hours	Timetable Requirement per week		Other teaching modes that does not require time-table
Contact with lecturer / tutor:	30	<i>Lectures p.w.</i>	3	
Assignments & tasks:	30	<i>Practicals p.w.</i>	2	
Practicals:	30	<i>Tutorials p.w.</i>	0	
Assessment:	10			
Self-study	50			
Other:	0			
Total Learning Time	150			
Methods of Student Assessment	Continuous Assessment (CA): 0% Final Assessment (FA): 100%			
Assessment Module type	Final Assessment (FA)			