CIV2101 Theory of Structures I

Hours per Semester				Weighted Total Mark	Weighted Exam Mark	Weighted Continuous Assessment Mark	Credit Units
LH	PH	TH	CH	WTM	WEM	WCM	CU
45	0	0	45	100	60	40	3

Course Description

This course introduces the student to various structural forms that support structures and convey an understanding of the primary aspects of their behaviour. Methods of static analysis of linear statically determinate elastic structures subjected to both fixed and movable loads are introduced; as well as computation of displacements using classical methods and its importance in the solution of statically indeterminate systems.

Objectives

- The student will be able to apply principles of mechanics in the determination of the reactions and q internal forces in statically determinate structures such as beams, trusses, frames and arches.
- The student should be able to categorise the different types of actions, quantify their corresponding deformations and appreciate the final displaced shape of simple structures.
- The student should be able to assess the effect of placement of the loads on the structure using influence lines