

## BRC Curriculum Structure of Bachelor of Engineering (Civil) with Industrial Orientation for 2012/13 cohort

Year	Course	AU	Course	AU	Course	AU	Course	AU	Course	AU	Course	AU	Course	AU	TOTAL AU
Year 1 Semester 1	MH1810 Mathematics 1	3	FE1008 Computing	3	PH1011 Physics <i>*(Students w/o A-level Physics to do "FE1012 Physics A")</i>	3	FE1073 Introduction to Engineering & Practices	1	GER - Elective (AHSS)	3	HW0110 Effective Communication	2			15
Year 1 Semester 2	MH1811 Mathematics 2	3	CV0001 Civil Engineering and Sustainable Built Environment	3	CV1011 Mechanics of Materials	4	CV1012 Fluid Mechanics	3	CV1013 Civil Engineering Materials	3	CV1711 Civil Engineering Drawing	1			17
Year 2 Semester 1	CV2011 Structural Analysis I <i>*(CV1011)</i>	3	CV2013 Engineering Geology & Soil Mechanics	3	CV2015 Hydraulics <i>*(CV1012)</i>	3	CV2018 Probability & Statistics	3	CV2711 Civil Engineering Laboratory A	1	HW0210 Technical Communication	2	GER (Free Elective)	3	18
Year 2 Semester 2	CV2012 Structural Analysis II <i>*(CV2011)</i>	3	CV2014 Geotechnical Engineering	3	CV2016 Hydrology	3	CV2019 Matrix Algebra & Computational Methods	3	CV2712 Civil Engineering Laboratory B	1	GER (Free Elective)	3			16
Year 3 Semester 1	CV3011 Reinforced Concrete Design <i>*(CV2011)</i>	3	CV3013 Foundation Engineering <i>*(CV2013 &amp; CV2014)</i>	3	CV3014 Transportation Engineering	3	CV3015 Environmental Engineering <i>*(CV1012)</i>	3	HW0310 Professional Communication	2	GER - Elective (LS)	3			17
Year 3 Semester 2	CV3012 Steel Design <i>*(CV2011)</i>	3	CV3016 Construction Technology & Processes	3	GER - Elective (STS)	3	GER - Elective	3	GER (Free Elective)	3					15
Special Semester	CV3912 Industrial Orientation	4	<i>*(Year 3 Standing &amp; Completed at least 4 Semesters of study)</i>												4
Year 4 Semester 1	CV0002 Engineers & Society	3	CV4011 Project Planning & Management <i>*(Year 4 Standing)</i>	3	CV4711 Seminars & Site Visits	1	CV4911 Final Year Project <i>*(Year 4 Standing)</i>	4	CV4XXX Specialization Course <i>*(Refer to Syllabus)</i>	3	GER - Elective (BM)	3			17
Year 4 Semester 2	CV4911 Final Year Project <i>*(Year 4 Standing)</i>	4	CV4912 Integrated Design Project <i>*(Year 4 Standing)</i>	3	CV4XXX Specialization Course <i>*(Refer to Syllabus)</i>	3	CV4XXX Specialization Course <i>*(Refer to Syllabus)</i>	3	GER (Free Elective)	3	GER (Free Elective)	3			19

*\*( ) denotes pre-requisite*

**Total AU for Graduation 138**