

School:		School of Engineering and School of Business Management										Student's Pathway									
Program:		Dual Degree Program (BEng in Civil and Environmental Engineering and BBA in General Business Management)																			
Course Offering Dept. (course code profile)	Course Code	Course Title / Courses List	Credits	Year 1 Fall	Year 1 Spring	Year 2 Fall	Year 2 Spring	Year 3 Fall	Year 3 Spring	Year 4 Fall	Year 4 Spring	Year 5 Fall	Year 5 Spring	Year 6 Fall	Year 6 Spring	Remarks					
BEng in Civil and Environmental Engineering																					
Engineering Fundamental Courses																					
CIVL	1021	New: CIVL 1121 OR COMP 1022P OR COMP 1023 OR COMP2011 OR COMP 2012H	3-5																		
CIVL	1022P	Introduction to Computation for Civil Engineers	3		3										3	Students should take COMP 1022P, COMP 1023, COMP 2011 or COMP 2012H which will also be used to substitute ISOM 2010 and to waive ISOM 2020					
COMP	1023	Introduction to Computing with Java	3																		
COMP	2011	Introduction to Python Programming	4																		
COMP	2012H	Honors Object-Oriented Programming and Data Structures	5																		
CHEM	1012	General Chemistry B: Atomic Structure, Molecules, and Bonding Theories	3		3										3						
		New: (MATH 1013 OR MATH1023) AND (MATH 1014 OR MATH 1024) OR (MATH 1025)	4-6																		
MATH	1013	Calculus IB	3		3	3										6					
MATH	1014	Calculus II	3																		
MATH	1020	Accelerated Calculus	4																		
MATH	1023	Honors Calculus I	3																		
MATH	1024	Honors Calculus II	3																		
MATH	2011	Introduction to Multivariable Calculus	3			3									3						
MATH	2350	Applied Linear Algebra and Differential Equations	3			3									3						
		New: PHYS 1112 OR PHYS 1312	3																		
PHYS	1112	General Physics I with Calculus	3	3																	
PHYS	1312	Honors General Physics I	3													21					
Required credits for Engineering Fundamental Courses				19-23	6	9	6	0	0	0	0	0	0	0	0	0					
Major Required Courses and Electives																					
CIVL	1000	Academic and Professional Development for Civil and Environmental Engineering I	0	0	0										0	Students admitted via school-based admission are exempted from taking CIVL 1000					
CIVL	1100	Discovering Civil and Environmental Engineering	3	3											3						
CIVL	2000	Academic and Professional Development for Civil and Environmental Engineering II	0			0	0								0						
CIVL	2020	Industrial and BIM Training	0				0*									Student should attend the training modules in Year 2 Winter and Spring terms					
CIVL	2110	Statics	3			3	3								3						
CIVL	2120	Mechanics of Materials	3												3						
CIVL	2140	Modeling Systems with Uncertainties	3			3	3								3	This course will also be used to substitute ISOM 2020					
CIVL	2170	Infrastructure Systems Engineering and Management	3				3								3						
CIVL	2410	Environmental Assessment and Management	3												3						
CIVL	2510	Fluid Mechanics	3				3								3						
CIVL	2810	Construction Materials	3					3	3						3						
CIVL	3000	Academic and Professional Development for Civil and Environmental Engineering III	0					0	0						0						
CIVL	3020	Internship Training	0						0*						0						
		New: CIVL3210 OR CIVL3610	3																		
CIVL	3210	Introduction to Construction Management	3					3							3						
CIVL	3610	Construction Management	3																		
CIVL	3310	Structural Analysis	3					3							3						
CIVL	3320	Reinforced Concrete Design	3						3						3						
CIVL	3420	Water and Wastewater Engineering	3						3						3						
CIVL	3510	Hydrogeomatics Engineering	3						3	3					3						
CIVL	3730	Fundamentals of Geotechnics	3					3	3						3						
CIVL	3740	Geotechnical Analysis and Design	3						3	3					3						
CIVL	4000	Academic and Professional Development for Civil and Environmental Engineering IV	0							0	0				0						
		New: CIVL 4010 OR CIVL 4020 (Students taking the Research Option must take CIVL 4020)	6										2	4	6						
CIVL	4010	Civil and Environmental Engineering Final Year Project	6																		
CIVL	4020	Civil and Environmental Engineering Final Year Thesis	6																		
CIVL	4050	Civil Engineering Capstone Design Project	3							3	3	3			3						
CIVL/ENGR		CIVL (Environmental) Electives (3 courses from the specified elective list. At least 2 courses (6 credits) should be selected from the "Restricted Electives", of which 1 course must be taken from CIVL 4450, CIVL 5450 or CIVL 5460.)	9							3	3	3			3						
BEng in Civil and Environmental Engineering Major Requirements				63	3	0	6	12	12	12	6	3	0	5	4	63					
BBA in General Business Management																					
School Requirements																					
ACCT	2010	Principles of Accounting I	3	3											3						
ACCT	2200	Principles of Accounting II	3							3											
		New: ECON 2103 OR ECON 3113	3		3										3						
ECON	2103	Principles of Microeconomics	3																		
ECON	3113	Microeconomics	3																		
		New: ECON 2123 OR ECON 3123	3																		
ECON	2123	Macroeconomics	3					3							3						
ECON	3123	Macroeconomic Theory I	3																		
FINA	2303	Financial Management	3				3								3						
ISOM	2010	Introduction to Information Systems	3	-	-	-	-	-	-	-	-	-	-	-	0	COMP 1023, COMP 1022P, COMP 2011 and COMP 2012H are more advanced computing courses as compared to ISOM 2010. Students SHOULD take COMP 1022P, COMP 1023, COMP 2011 or COMP 2012H instead of ISOM 2010.					
ISOM	2020	Coding for Business	1	-	-	-	-	-	-	-	-	-	-	-	0	ISOM 2020 is waived for DEP students who have taken and passed COMP 1022P, COMP 1023, COMP 2011 or COMP 2012H. These COMP courses are similar or more advanced coding (Python) courses as ISOM 2020.					
ISOM	2030	Business Statistics	3	-	-	-	-	-	-	-	-	-	-	-	0	Substituted by CIVL 2160					
ISOM	2090	Introduction to Business Analytics	1				1								1						
ISOM	2700	Operations Management	3		-	-			3						3						
MARK	2120	Marketing Management	3				3														
MGMT	2010	Business Ethics and the Individual	2				2								2						
MGMT	2110	Organizational Behavior	3			3									3						
MGMT	2130	Business Ethics and Social Responsibility	2							2					2						
		New: MATH 1002 OR MATH 1013 OR MATH 1020 OR MATH 1023	3-4																		
MATH	1003	Calculus and Linear Algebra	3		(3)											0					
MATH	1013	Calculus I	3																		
MATH	1020	Accelerated Calculus	4																		
MATH	1023	Honors Calculus I	3																		
Required Credits for School Requirements				39-40	3	3	6	7	3	3	3	3	0	0	0	29					
Major Required Courses and Electives																					
BBAM		BBAM Electives (Any 9 courses offered by the departments under BBAM, of which at least 4 courses are of 3000-level or above.)	20						3	4	7	3	6	6	20						
Required Credits for Major Required Courses and Electives				23	0	0	0	0	0	3	4	7	3	6	6	29					
Additional Requirement for Dual Degree																					
Requirements for Dual Degree Program																					
TEMG	1011	TSM Professional Activities I	0	0	0										0						
TEMG	1012	TSM Professional Activities II	0			0	0								0						
TEMG	1013	TSM Professional Activities III	0					0	0						0						
TEMG	1014	TSM Professional Activities IV	0							0	0				0						
TEMG	1015	TSM Professional Activities V	0									0	0		0						
TEMG	3050	TSM Case Analysis and Product Innovation	3		3										3						
TEMG	4050	TSM Corporate Consulting Project	3-5								4				4						
Required Credits for Additional Requirements				7	0	3	0	0	0	0	0	0	4	0	0	7					
University Common Core Requirement																					
CORE	C3 - C9	U CORE - Others	21							3	6	6	6	6	21						
CORE	C1 & C2	U CORE - English Language	6	3	3										6						
BBAAW	1905	Behavioral Foundations of University Education: Habits, Mindsets, and Wellness	3	1	2										3						
Sub-total for University CORE				30	4	6	0	0	0	0	0	3	6	6	6	30					
Term load (excl. free credits)																					
16 20 17 19 18 19 19 18 17 16																					
179##																					