

<b>BS: Systems Engineering and Engineering Management</b>					
NOTE: This 4-year plan should be used in conjunction with regular consultation with an advisor					
Required for Admission to UNCC in Systems Engineering and Engineering Management (SEEM)	<b>If 24 or more transfer hours</b>		OR	<b>If less than 24 transfer hours</b>	
	2.5 transfer GPA			Transfer admissions requirements	
	MATH 1103, Grade of 'C' or better			AND Freshman Admissions Requirements	
See <a href="#">Transfer Requirements</a>	on the Office of Undergraduate Admissions web page for more details				
Additional Requirements for Admission to the upper division in Systems Engineering and Engineering Management	Not applicable				
<b>Associate of Engineering</b>					
Courses in BOLD are required for the major					
UGETC -- Associate of Engineering					
Area	Prefix/Number	Course Name	Credits	UNC Charlotte Equivalent	Credits
English Composition (6 CR)					
English Composition	ENG 111	Expository Writing	3	UWRT 1101:	3
	ENG 112	Argument-Based Research	3	UWRT 1102:	3
Humanities / Fine Arts (6 CR)					
Arts: (choose <b>ONE</b> )	ART 111	Art Appreciation	3	LBST 1105	3
	ART 114	Art History Survey I		ARTH 1211 (and LBST 1105 exemption)	
	ART 115	Art History Survey II		ARTH 1212 (and LBST 1105 exemption)	
	MUS 110	Music Appreciation		LBST 1103	
	MUS 112	Introduction to Jazz		TRNF 0001 (and LBST 1103 exemption)	
Literature / Philosophy (choose <b>ONE</b> )	ENG 231	American Literature I	3	ENGL 2104 (and LBST 2212 exemption)	3
	ENG 232	American Literature II		ENGL 0001 (and LBST 2212 exemption)	
	PHI 215	Philosophical Issues		PHIL 2101 (and LBST 2211 exemption)	
	PHI 240	Introduction to Ethics		PHIL 0001 (and LBST 2211 exemption)	
	ENG 241	British Literature I		British Literature I (LBST 2212 exemption)	
	ENG 242	British Literature II		Literature Elective (LBST 2212 exemption)	
Social / Behavioral Science (6 CR)					
<b>Required Course</b>	<b>ECO 251</b>	<b>Principles of Microeconomics</b>	3	ECON 2102 (will replace ECON 1101 when transferred to SEEM)	3
Social / Behavioral Science (choose <b>ONE</b> )	HIS 111	World Civilizations I	3	HIST 1120 (and LBST 2101 exemption)	3
	HIS 112	World Civilizations II		HIST 1121 (and LBST 2101 exemption)	
	HIS 131	American History I		HIST 1160 (and LBST 2101 exemption)	
	HIS 132	American History II		HIST 1161 (and LBST 2101 exemption)	
Science with Lab (12 CR)					
Natural Sciences	CHM 151 + Lab	General Chemistry I + Lab	12	CHEM 1251 + Lab	12
	PHY 251 + Lab	General Physics I + Lab		PHYS 2101 + lab	
	PHY 252 + Lab	General Physics II + Lab		PHYS 2102 + lab	
Mathematics (12 CR)					
Mathematics	MAT 271	Calculus I	12	MATH 1241 (3) + lab credit (1)	12
	MAT 272	Calculus II		MATH 1242 (3) + lab credit (1)	
	MAT 273	Calculus III		MATH 2241 (3) + lab credit (1)	
UGETC Subtotal			42		42

	ACA 122	Academic Transition	1	TRNF 0001	1
Pre Major - Course					
	EGR 150	Introduction to Engineering	2	ENGR 1201	2
Additional General Education and Pre Major Elective Hours (Choose a total of 15 credit Hours)					
Science Elective (choose <u>ONE</u> )	BIO 111 CHM 152	General Biology I General Chemistry II	3	BIOL 1110 CHEM 1252	3
Computer Elective (choose <u>ONE</u> )	CSC 134 CSC 151	C++ Programming Java Programming	3	SEGR 2105 (grade of 'C' or better)	3
Technical Elective (choose <u>ONE</u> )	ACC 120 <b>ACC 121</b> EGR 215	Prin of Financial Accounting <b>Prin of Managerial Accounting</b> Network Theory I	3	ACCT 2121 ACCT 2122 ECGR 2111	3
<b>Required Courses</b>	<b>MAT 280</b> <b>MAT 285</b>	<b>Linear Algebra</b> <b>Differential Equations</b>	6	MATH 2164 MATH 2171	6
Additional General Education and Pre- Major Elective Subtotal			18		18
<b>TOTAL AA Hours</b>			<b>60</b>		<b>60</b>
Only one science elective is required. Courses in bold font are important for future progression.					

<b>BS -- Systems Engineering and Engineering Management -- UNC Charlotte Courses</b> <small>Courses in <b>BOLD</b> are pre-requisites for subsequent courses</small>				
Third year				Credits
Fall	<b>ENGR 1202</b>	<b>Introduction to Engineering II</b>		2
	<b>SEGR 2101</b>	<b>Systems Engineering Concepts</b>		3
	OPRS 3111	Operations Research: Deterministic Models		3
	SEGR 2106	Engineering Economic Analysis		3
	<b>STAT 3128</b>	<b>Probability and Statistics for Engineers</b>		3
Spring	<b>SEGR 3101</b>	<b>System Design and Deployment</b>		3
	SEGR 3105	Computational Methods for System Engineering II		3
	SEGR 3107	Decision and Risk Analysis		3
	SEGR 3111	Project Management		3
	OPRS 3113	Operations Research: Probabilistic Models		3
Fourth year				
Fall	SEGR 3102	System Simulation, Modeling & Analysis		3
	<b>SEGR 3290</b>	<b>Systems Design Project I</b>		1
	SEGR 3114	Production Control Systems		3
	SEGR 4141	Engineering Experimental Design		3
	ENGR 3295	Multidisciplinary Professional Development		1
	XXXX XXXX	Concentration Course		3
Spring	SEGR 3291	Design Project II		3
	SEGR 3670	Total Quality Systems		3
	XXXX XXXX	Technical Elective		3
	XXXX XXXX	Concentration Course		3
	XXXX XXXX	Technical Elective		3
Summer sessions				
	LBST 2102	Global and Intercultural Connections		3
	XXXX XXXX	Concentration Course		3
	XXXX XXXX	Concentration Course		3
<b>TOTAL UNCC Hours</b>				<b>64</b>
	<b>TOTAL HOURS</b>			<b>124</b>