

Electrical Engineering Checksheet

The Academic Plan of Study is a guide. Always confer with your Academic Advisor for your semester course plans

	Term(s)	Course #	Course Title	Hrs	Prerequisites		
Common First Year (CFY)	Fall	ENGR 13xx	Foundational ENGR Course (ENGR 1300, 1301, 1302, or 1303)*	2-3		Only 2 attempts allowed	
		ENGR 13xx	Foundational ENGR Course (ENGR 1300, 1301, 1302, or 1303)*	2-3		Only 2 attempts allowed	
		MATH 1241	Calculus I*	3		Only 2 attempts allowed	Math Placement Level 4/MATH 1103
		XXXX 15xx	Gen Ed Requirement (Theme 1501, 1502, 1511/1512 End Amer Demo 1575)	3		Only 2 attempts allowed	https://ge.charlotte.edu/charlotte-ccc-general-education-curriculum/
		XXXX 15xx	Gen Ed Requirement (Theme 1501, 1502, 1511/1512 End Amer Demo 1575)	3		Only 2 attempts allowed	https://ge.charlotte.edu/charlotte-ccc-general-education-curriculum/
	Total: 14-15						
	Spring	ENGR 13xx	Foundational ENGR Course (ENGR 1300, 1301, 1302, or 1303)*	2-3		Only 2 attempts allowed	
		ENGR 13xx	Foundational ENGR Course (ENGR 1300, 1301, 1302, or 1303)*	2-3		Only 2 attempts allowed	
		MATH 1242	Calculus II*	3		Only 2 attempts allowed	MATH 1241
		PHYS 2101	Physics I*	3		Only 2 attempts allowed	MATH 1241, PHYS 2101L
PHYS 2101L		Physics I Lab*	1		Only 2 attempts allowed	PHYS 2101	
WRDS 1103/1104		Writing & Inquiry in Academic Contexts*	3			Note: WRDS 1104 is 4 credit hours	
Total: 14-15							
Second Year	Fall	ECGR 2111	Network Theory I*	3		Only 2 attempts allowed	MATH 2171
		ECGR 2181	Logic System Design*	3		Only 2 attempts allowed	ENGR 1302, ECGR 2103, or ITSC 1212 w/grade of C or higher
		ECGR 2181L	Logic System Design Lab	1		Only 2 attempts allowed	ECGR 2181
		MATH 2171	Differential Equations*	3		Only 2 attempts allowed	MATH 1242 w/grade of C or higher
		PHYS 2102	Physics II	3		Only 2 attempts allowed	MATH 1242, PHYS 2101 w/grade of C or higher
		MATH 2164	Matrices and Linear Algebra	3		Only 2 attempts allowed	MATH 1241 w/grade of C or higher
	Total: 16						
	Spring	ECGR 2112	Network Theory II*	3		Only 2 attempts allowed	ECGR 2111, MATH 2171, PHYS 2102 w/grade of C or higher ECGR 2254
		ECGR 2112L	Network Theory II Lab	1		Only 2 attempts allowed	ECGR 2112
		ECGR 2254	Analytical Foundations of EEGR & CPGR*	3		Only 2 attempts allowed	MATH 2171 & MATH 2164 w/grade of C or higher
MATH 2241		Calculus III*	3		Only 2 attempts allowed	MATH 1242 w/grade of C or higher	
ECGR 2105		Computer Programming*	3		Only 2 attempts allowed	ENGR 1302, ECGR 2103, or ITSC 1212 w/grade of C or higher	
CTCM 2530		Critical Thinking and Comm	3		Only 2 attempts allowed	WRDS 1103 or 1104 & Sophomore Standing	
Total: 16							
Third Year	Fall	ECGR 3111	Signals and Systems*	3		Only 2 attempts allowed	ECGR 2112 & ECGR 2254 w/grade of C or higher
		ECGR 3120	Electromagnetic Fields & Waves	3		Only 2 attempts allowed	ECGR 2112 & MATH 2241 w/grade of C or higher
		ECGR 3130	Fundamentals of Electronics & Semiconductors*	3		Only 2 attempts allowed	ECGR 2112 w/grade of C or higher
		ECGR 3130L	Electronics Lab	1		Only 2 attempts allowed	ECGR 3130
		STAT 3128	Probability & Statistics for Engineers	3		Only 2 attempts allowed	MATH 2241 w/grade of C or higher
		ENGR 3295	Professional Development	1		Only 2 attempts allowed	Junior Standing
		Total: 14					
	Spring	ECGR 3157	ECE Junior Design*	3		Only 2 attempts allowed	ECGR 3111 and ECGR 3130 or ECGR 3131
		ECGR 3142	Electrical Energy Conversion	3		Only 2 attempts allowed	ECGR 3120 or ECGR 3121 w/ grade of C or higher
		ECGR 3142L	Electrical Energy Conversion Lab	1		Only 2 attempts allowed	ECGR 3142
ECGR 3112	System Analysis II	3		Only 2 attempts allowed	ECGR 3111 w/grade of C or higher		
PHYS 3141	Introduction to Modern Physics	3		Only 2 attempts allowed	PHYS 2101 and MATH 1241 w/grade of C or higher MATH 1242		
XXXX XXXX	Other Technical Elective (OTE)	3		Only 2 attempts allowed	See Degree Works for options		
Total: 16							
Fourth Year	Fall	ECGR 4241	Electrical Engineering Senior Design I	2		Only 2 attempts allowed	ECGR 3111, ECGR 3157 & ECGR 3120 or ECGR 3121, & ECGR 3130 or ECGR 3131 all w/grade of C or higher
		ECGR 4XXX	Technical Elective	3		Only 2 attempts allowed	
		ECGR 4XXX	Technical Elective	3		Only 2 attempts allowed	
		ECGR 4XXX	Technical Elective	3		Only 2 attempts allowed	
		XXXX 15xx	Gen Ed Requirement (Theme 1501, 1502, 1511/1512 End Amer Demo 1575)	3		Only 2 attempts allowed	
	Total: 14						
	Spring	ECGR 4242	Electrical Engineering Senior Design II	2		Only 2 attempts allowed	ECGR 4241 w/grade of C or higher
		XXXX XXXX	Other Technical Elective (OTE)	3		Only 2 attempts allowed	See Degree Works for options
		ECGR 4XXX	Technical Elective	3		Only 2 attempts allowed	
		ECGR 4XXX	Technical Elective	3		Only 2 attempts allowed	Junior Standing
XXXX 15xx		Gen Ed Requirement (Theme 1501, 1502, 1511/1512 End Amer Demo 1575)	3		Only 2 attempts allowed	https://ge.charlotte.edu/charlotte-ccc-general-education-curriculum/	
Total: 14							

* = grade of C or better is required for degree progression
 Courses in *italics* can be taken as a **pre** or **co**-requisite
 Course in **bold** must be taken as a co-requisite