

UCF Degree Programs

ELECTRICAL ENGINEERING TECHNOLOGY - ELECTRICAL SYSTEMS CONCENTRATION (B.S.E.E.T.)

College of Engineering and Computer Science
Engineering Technology (ENT) Department
ENGR 207, 407-823-4749; Fax: 407-823-4746
<http://www.ent.ucf.edu>

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Admission Requirements none

Degree Requirements

- Students should check with their ENT advisor frequently to ensure that they are making proper progress toward the degree.
- A grade of "C" (2.0) or better is required in all prerequisites and upper level courses.

1. UCF General Education Program (36+2 hrs)

A. Communication Foundations	9 hrs
1. ENC 1101 & 1102	
2. Prefer SPC 1016	
B. Cultural and Historical Foundations	9 hrs
C. Mathematical Foundations	6 hrs
1. Select MAC 1105	
2. Select STA 2023	
D. Social Foundations	6 hrs
E. Science Foundations	8 hrs
1. Select PHY 2053C	
2. Select BSC 1005/1005L, BSC 1050/1050L, or BSC2010C	

2. Common Program Prerequisites (CPP) (6/8 hrs)

(C 2.0) or better grades are required in all courses)		
MAC 2253	Calculus I	3/4 hrs
or MAC 2311	Calculus w/Analytical Geometry I	
MAC 2254	Applied Calculus II or equiv	3/4 hrs
or MAC 2312	Calculus w/Analytical Geometry II	
PHY 2053C	College Physics I/Lab	GEP
or PHY 2048/L	Physics for Engrs & Scientists I	

See "Common Prerequisites" in the Transfer and Transitions Services section (pg. 46) for more information.

3. Engineering Technology Core Requirements (25 hrs)

(C 2.0) or better grades are required in all courses)		
BSC 1005/L, BSC 1050/L, GEO 1200/L, BSC2010C	GEP	
ENC 3241	Writing for the Technical Professional	3 hrs
MAC 1105	College Algebra	GEP
MAC 1114	College Trigonometry	3 hrs
MAC 2253	Applied Calculus I	CPP
or MAC 2311		
MAP 3401	Problem Analysis	CPP
or MAC 2312	Calculus II	
PHY 2053C	College Physics I	CPP
PHY 2054C	College Physics II	4 hrs
ETG 3541	Applied Mechanics	3 hrs
ETI 3651C	Computer Applications	3 hrs
ETI 3671	Technical Economic Analysis	3 hrs
ETI 3116	Applied Engrng Quality Assurance	3 hrs
ETI 4448	Applied Project Management	3 hrs
STA 2023	Statistical Methods I	GEP

4. Technical Specialization (56 hrs)

Lower Level Required and Elective Courses (24 hrs)

(C 2.0) or better grades are required in all courses)		
EST 3543C	Programmable Logic Controllers	3 hrs
CET 3323C	Digital Fundamentals	4 hrs
CET 2364	System Applications in C	3 hrs
EET 3143C	Electronic Devices and Circuits	4 hrs
EET 2025C	Electrical Circuits	4 hrs
EET 3085C	Electricity and Electronics	4 hrs
	Lower Level Technical Elective	2 hrs

Upper Level Required Courses (23 hrs)

(C 2.0) or better grades are required in all courses)		
CET 3198C	Digital Systems	3 hrs
CET 3503	Microcomputer Technology I	3 hrs
CET 4134C	Microprocessor Electronics II	3 hrs
EET 3716	Network Analysis	3 hrs
EET 4158C	Linear Integrated Circuits	3 hrs
EET 4548C	Power Systems	4 hrs
EET 4732C	Feedback Control Systems	4 hrs

Upper Level Technical Electives (9 hrs)

Select 9 hours from courses listed below:
(C 2.0) or better grades are required in all courses)

CET 4138C	Digital Programmable Devices	3 hrs
CET 4333	Computer Organization & Design	3 hrs
CET 4931	Current Topics in Tech	3 hrs
EET 4329C	Communication Systems	4 hrs
EET 4339C	Antennas and Propagation	3 hrs
EET 4359C	Digital Communications	4 hrs
EST 3222	Intro to Photonics	3 hrs

5. Departmental Exit Requirement (3 hrs)

- (C 2.0) or better grade is required)**
- ETG 4950C Senior Design Project 3 hrs
 - A grade of 2.0 or better is required in all prerequisites.

6. Foreign Language Requirements (0-8 hrs)

Admission: Two years of one foreign language in high school, or one year of one foreign language in college (or equivalent proficiency exam) prior to graduation.

Graduation: none

7. Approved Technical Electives

Students should consult with the ENT Department for a list of the approved technical electives and the terms when specific courses of this type are to be offered.

8. University Minimum Graduation Requirements

- A 2.0 UCF GPA
- 60 semester hours earned after any CLEP award
- 48 semester hours of upper division credit completed
- 30 of the last 36 hours of course work must be completed in residency at UCF
- 25% of course work must be completed in residency at UCF
- A maximum of 45 hours of extension, correspondence, CLEP, Credit by Exam, and Armed Forces credits permitted
- Complete the General Education Program, the Gordon Rule, the CLAST, and nine semester hours of Summer credit (if applicable)

Total Semester Hours Required: 128 hrs

Related Programs: Electrical Engineering Technology (Computer Systems Concentration)

Related Minors: Interdisciplinary Informatics Technology

Transfer Notes:

- Students transferring from any Florida public institution with an AA degree or with the general education program (GEP) requirements of that institution met have thereby satisfied UCF GEP requirements.
- Students entering a UCF undergraduate program and having a previously earned baccalaureate degree from an accredited institution have thereby satisfied UCF GEP requirements. (See also the section on the GEP found elsewhere in this catalog.)
- Courses taken from Community Colleges do not substitute for Upper Division Courses.
- Courses transferred must be formally evaluated for equivalency credit. The student must provide all supporting information to the ENT Department for this evaluation.
- ENT Departmental Residency Requirements consist of at least 32 semester hours of regularly-scheduled 3000 or 4000 level courses taken from the UCF ENT Department.
- PHY 2048/L can substitute for PHY 2053C.

Program Academic Learning Compacts

- Program Academic Learning Compacts (student learning outcomes) for undergraduate programs are located at: http://www.oas.ucf.edu/alc/academic_learning_compacts.htm

Tentative Course Schedule for the Electrical Systems Concentration

The tentative course schedule listed below is a guide for those students who plan on completing their engineering technology degree requirements in two years. Many students choose to spread out these requirements over a longer period of time. All engineering technology students should meet with their faculty advisor to develop and maintain an appropriate plan of study.

Freshman Year

	13 hrs	Spring	12 hrs
Fall			
ENC 1101 Composition I	3	ENC 1102 Composition II	3
MAC 1105 College Algebra	3	STA 2023 Statistical Methods	3
Biological science	4	MAC 1114 Trigonometry	3
Cultural/Historical Foundation	3	Social Foundation	3

Sophomore Year

	16 hrs	Spring	14/15 hrs
Fall			
SPC 1600 Oral Communications	3	MAC 2253 Applied Calc I	3/4
PHY 2053C College Physics I	4	<i>or</i> MAC 2311 Calc w Anly Geo	
Cultural/Historical Foundation	3	ETI 3116 App Eng Quality Assur	3
ETI 3651C Computer Appl	3	CET 3323C Digital Technology	4
CET 2364 Sys Appl in C	3	PHY 2054C College Physics II	4
Summer	7 hrs		
ENC 3241 Writing Tech Pros	3		
EET 3085C Electricity and Electro	4		

Junior Year

	12/13 hrs	Spring	15 hrs
Fall			
MAP 3401 Problem Analysis	3/4	Cultural/Historical Foundation	3
<i>or</i> MAC 2312 Calculus II		EET 3716 Network Anals	3
<i>or</i> MAC 2254 Applied Calc II		CET 3198C Digital Systems	3
EET 2025C Electrical Circuits	4	ETI 3671 Tech Economic Analysis	3
ETG 3541 Applied Mechanics	3	Social Foundation	3
Lower level elective	2		
Summer	10 hrs		
CET 4134C Microprocessor Elec II	3		
EET 3143C Elect Devices and Circuits	4		
Upper level elective	3		

Senior Year

	16 hrs	Spring	13 hrs
Fall			
EET 4548C Power Systems	4	ETG 4950C Sr. Design Proj	3
EET 4158C Linear Inf Cir	3	Upper level elective	3
EST 3543C Programmable Logic Cont	3	EET 4732C Feedback Control	4
Upper level elective	3	ETI 4448 Applied Project Mgmt	3
CET 3503 Microcom Tech I	3		