

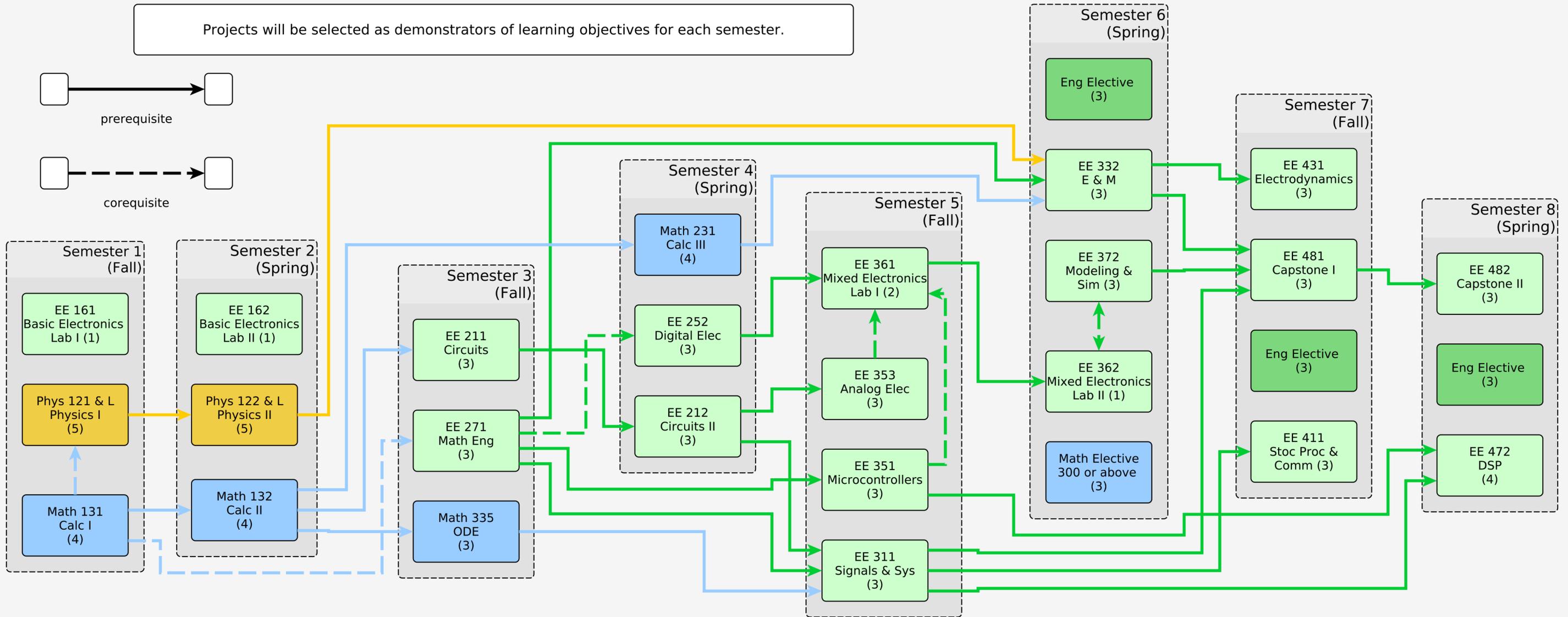


New
Electrical Engineering Undergraduate
Curriculum 2019-2020

Date: 02/01/2019

NMT Electrical Engineering Critical Path (120 Credit Hours Total)

Projects will be selected as demonstrators of learning objectives for each semester.

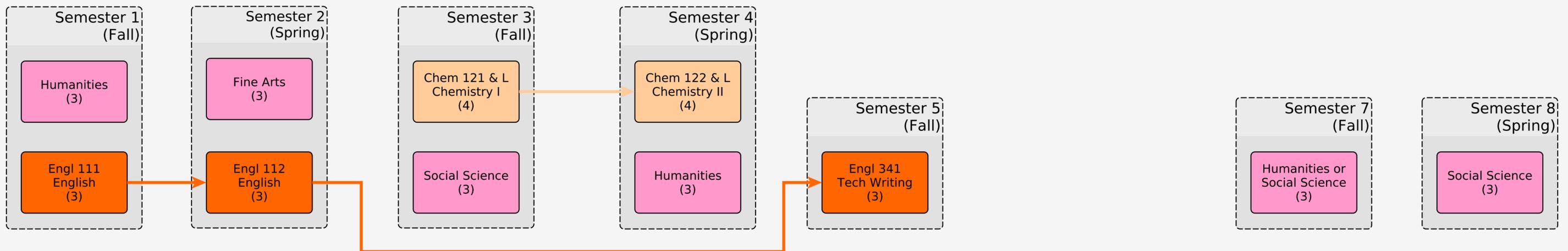


Disclaimer: Use this document as only a general idea regarding the flow of the program. Changes may occur and requirements differ by the catalog you are under. Always check the course catalog as it is the ultimate source for the curriculum and its requirements.

Current curriculum layout encourages students to pursue minors with a path to graduate in 4 years. Most suitable minors are:

- Minor in Optical Science & Engineering - requiring only 1 additional credits if courses used for Eng. Electives
- Minor in Mathematics or Minor in Engineering Management - requiring 12 additional credits
- Minor in Environmental Engineering - requiring 9 additional credits

Requirements to Finish Gen Ed (suggested distribution)



Sample Curriculum Credit Count

Semester 1: 16 Semester 2: 16 Semester 3: 16 Semester 4: 17 Semester 5: 14 Semester 6: 13 Semester 7: 15 Semester 8: 13

New NMT Electrical Engineering Undergraduate Curriculum

Key changes:

1. EE curriculum is now 120 Credits
2. EE 101 (2) is now split between two semesters and became EE 161 (1) and EE 162 (1)
3. EE 251 (3) is now EE 271 (3) and is a prerequisite for more EE courses
4. Labs from EE 212, EE 231, EE 308 and EE 321 have been combined and better integrated into EE 361 (2) and EE 362 (1) Mixed Electronics labs in 3rd year
5. EE 382 is no longer required
6. A new course EE 372: Modeling & Simulation course has been added
7. Some courses have been moved from normally offered in the Fall to Spring and vice versa
8. Math 254: Linear Algebra is no longer required for EE but if you plan to pursue a math minor it is still required
9. Now only three technical electives are required instead of four
10. No explicit requirement of EE elective vs engineering elective

Freshmen Going to Sophomore

If you are currently a freshmen in electrical engineering and going to your sophomore year starting Fall 2019 assuming:

EE Courses (based on current and previous catalogs) probably already taken are

- EE 101: Introduction to Electrical Engineering

EE courses you need to take are

Fall 2019	Spring 2020
EE 211: Circuits I (3) EE 271: Mathematical Engineering (3)	EE 252: Digital Electronics (3) EE 212: Circuits II (3)

Fall 2020	Spring 2021
EE 311: Signals and Systems (3) EE 351: Microcontrollers (3) EE 353: Analog Electronics (3) EE 361: Mixed Electronics I (2)	EE 332: E & M (3) EE 362: Mixed Electronics II (1) EE 372: Modeling and Sim (3) Engineering Elective (3)

Fall 2021	Spring 2022
EE 411: Stochastic Process & Comm (3) EE 431: Electrodynamics (3) EE 481: Capstone I (3) Engineering Elective (3)	EE 472: DSP (4) EE 482: Capstone II (3) Engineering Elective

If you remain on an older catalog you will have to check that catalog for additional requirements which requires additional credits as well as distinction between electrical engineering electives and engineering electives.

Sophomore Going to Junior

If you are currently a sophomore in electrical engineering and going to your junior year starting Fall 2019 assuming:

EE Courses (based on current and previous catalogs) probably already taken are

- EE 101: Introduction to Electrical Engineering
- EE 211: Circuits I
- EE 212: Circuits II
- EE 231: Digital Electronics
- EE 251: Mathematical Engineering
- **EE 308: Microcontrollers (will not be offered in Fall 2019 or Spring 2019 unless there are special cases)**

EE courses (under new curriculum) you need to take are

Fall 2019	Spring 2020
EE 311: Signals and Systems (3) EE 353: Analog Electronics (3) EE 361: Mixed Electronics I (2)	EE 332: E & M (3) EE 362: Mixed Electronics II (1) EE 372: Modeling and Sim (3) Engineering Elective (3)

Fall 2021	Spring 2022
EE 411: Stochastic Process & Comm (3) EE 431: Electrodynamics (3) EE 481: Capstone I (3) Engineering Elective (3)	EE 472: DSP (4) EE 482: Capstone II (3) Engineering Elective (3)

If you remain on an older catalog you will have to check that catalog for additional requirements which requires additional credits as well as distinction between electrical engineering electives and engineering electives.

Junior Going to Senior

If you are currently a junior in electrical engineering and going to your senior year starting Fall 2019 assuming:

EE Courses (based on current and previous catalogs) taken probably are

- EE 101: Introduction to Electrical Engineering
- EE 211: Circuits I
- EE 212: Circuits II
- EE 231: Digital Electronics
- EE 251: Mathematical Engineering
- EE 308: Microcontrollers
- EE 321: Analog Electronics and Lab
- EE 333: E&M I
- EE 341: Signals and Systems
- EE 382: Introduction to Design
- **EE 434: E&M II (will not be offered Fall 2019 or Spring 2020 unless there are special cases)**

EE courses (under new curriculum) you need to take are

Fall 2019	Spring 2020
EE 411: Stochastic Process & Comm (3)	EE 472: DSP (4)
EE 481: Capstone I (3)	EE 482: Capstone II (3)
Engineering Elective (3)	Engineering Elective (3)

If you remain on an older catalog you will have to check that catalog for additional requirements which requires additional credits as well as distinction between electrical engineering electives and engineering electives.