

CSUCI MECHATRONICS ENGINEERING B.S. DEGREE CHART - CATALOG YEAR 2026-27

Year 1

Fall

Spring

CHEM 105
Intro to Chemistry (3)
Prerequisite: None

GE - 5A& 5C: PHYS 200
General Physics I (4)
Prerequisite: MATH 150

GE - 2: MATH 150
Calculus I (4)
Prerequisite: Calculus Placement Exam or MATH 104, 105, or 105S

MATH 151
Calculus II (4)
Prerequisite: MATH 150

EMEC 101
Intro to Engineering (1)
Prerequisite: None

GE - 1C (3)
Oral Communication

GE - 1B: COMP 121
Introduction to Programming in C for STEAM (3)
Prerequisite: None

GE - 3B (3/4)
Humanities-Language

GE- 1A: ENGL 105
Composition and Rhetoric (3)
Prerequisite: None

GE - 4 (3)
Social and Behavioral Sciences

Year 2

Fall

Spring

PHYS 201
General Physics II (4)
Prerequisite: MATH 151 & PHYS 200

EMEC 250
Electrical Circuit Analysis (4)
Prerequisite: PHYS 201
Co-requisite: MATH 350

MATH 250
Calculus III (3)
Prerequisite: MATH 151

MATH 350
Differential Equation and Dynamical System (3)
Prerequisite: MATH 250

MATH 240
Linear Algebra (3)
Prerequisite: MATH 151

EMEC 231
Dynamics (3)
Prerequisite: EMEC 230

EMEC 230
Statics (3)
Prerequisite: MATH 151 & PHYS 200

EMEC 200
Logic Circuits (4)
Prerequisite: MATH 151 & PHYS 201

GE -3A (3)
Arts

Year 3

Fall

Spring

EMEC 325
Engineering Design (3)
Prerequisite: EMEC 250

US History(3)

GE - 5B (3/4)
Biological Science

EMEC 316
Sensors and Measurements (3)
Prerequisite: EMEC 250

EMEC 310
Electronics (4)
Prerequisite: PHYS 201

EMEC 221
Engineering Materials (3)
Prerequisite: PHYS 200, CHEM 105 or CHEM 121

UDGE -3 (3)

MATH 352
Probability and Statistics (3)
Prerequisite: MATH 151

EMEC 311
Digital Systems Design (3)
Prerequisite: EMEC 200

GE - 6 (3)
Ethnic Studies & Multicultural Requirement

Year 4

Fall

Spring

EMEC 462
Embedded Systems (3)
Prerequisite: EMEC 310

EMEC 470
Mobile Robotics (3)
Pre-requisites: EMEC 310 & MATH 240

EMEC 315
Modeling of Mechatronics Systems(3)
Pre-requisites: MATH 240, MATH 350, EMEC 250, & EMEC 231

UDGE - 5 or 2 (3)

EMEC 491
Capstone Preparation (1)
Prerequisite: EMEC 325 & Senior standing

EMEC 463
Feedback Control Systems (3)
Prerequisite: EMEC 315

GE - 4 : POLS 150 (3)

EMEC 499
Capstone (3)
Prerequisite: EMEC 491

EMEC 431
Mechanisms and Machine Design(3)
Prerequisite: EMEC 231

UDGE -4 (3)

- GE Requirements
- Major Core Requirements
- COMP Requirements
- Curriculum Requirements
- MATH Requirements
- GWAR Requirement



Year 3

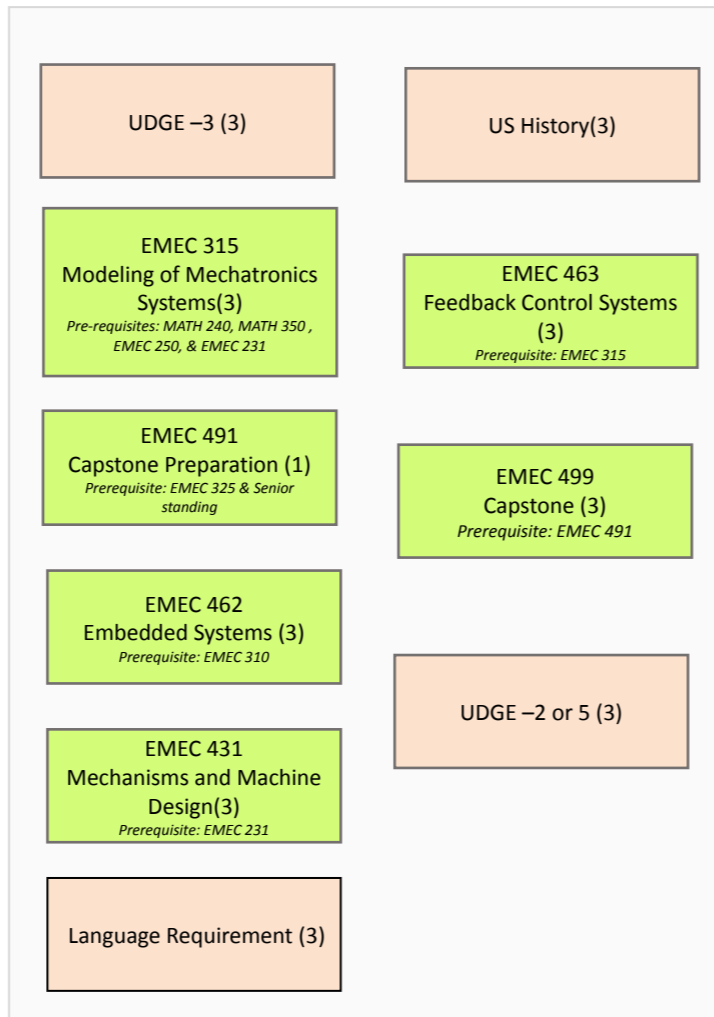
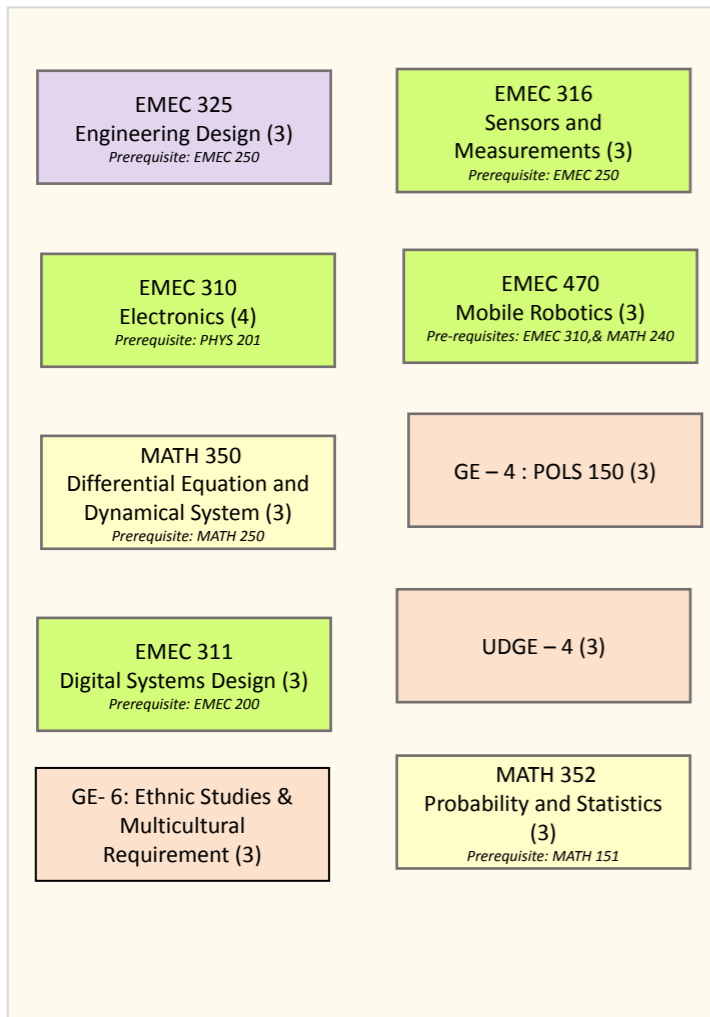
Year 4

Fall

Spring

Fall

Spring



- GE Requirements
- Major Core Requirements
- COMP Requirements
- Curriculum Requirements
- MATH Requirements
- GWAR Requirement

---> Corequisite

—> Prerequisite