Robotics Engineering B.S. Degree
2016-2017 Curriculum Chart

Math Courses

- MATH 19A
  Calculus I

- MATH 19B
  Calculus II

- MATH 23A
  Multivariable Calculus

- EE 103/L
  Signals & Systems

- MATH 19B
  Calculus II

- CMPE 107
  Probability & Statistics

- AMS 10*
  Engr. Math Methods I
  or
  MATH 21
  Linear Algebra

- AMS 20*
  Engr. Math Methods II

- CMPE 8**
  Robot Automation

- CMPE 16
  Discrete Math

- AMS 10*
  Engr. Math Methods I
  or
  MATH 21
  Linear Algebra

- AMS 20*
  Engr. Math Methods II

Science Courses

- PHYS 5A/L
  Mechanics

- CMPE 9
  Intro. to Statics, Dynamics & Biomechanics

- PHYS 5C/N
  Electricity & Magnetism

- CMPE 10
  Fundamentals of Robot Kinematics & Dynamics

- CMPS 12B/M
  Data Structures

- CMPE 101
  Abstract Data Types & Algorithms

Digital Electronics

- CMPE 100/L
  Logic Design

- CMPE 121/L
  Microprocessor System Design

- EE 101/L
  Electronic Circuits

Robotics

- CMPE 118/L
  Intro to Mechatronics

- CMPE 141
  Feedback Control Systems

- CMPE 167/L
  Sensing & Sensor Technologies

- Advanced Robotics Elective

Breadth

- CMPE 185#
  Technical Writing

Elective*

- CMPE 141
  Feedback Control Systems

- CMPE 167/L
  Sensing & Sensor Technologies

- * Electives can be an upper division or graduate course from Approved List on the back
- # Satisfies the DC requirement

Capstone

- CMPE 129A, 129B, & 129C
  Capstone Project I, II, & III

- CMPE 129A & CMPE 195:
  Senior Thesis & Submission of approved thesis

Exit Requirements

1. Portfolio  https://www.soe.ucsc.edu/departments/computer-engineering/undergraduate/undergraduate-portfolio
2. Exit Survey  https://ua.soe.ucsc.edu/exit-survey
3. Exit Interview

* Strongly recommended
** Not required, but strongly recommended for freshmen.

https://ua.soe.ucsc.edu • advising@soe.ucsc.edu • (831) 459-5840 • 11/3/2016
## Robotics Engineering B.S. Degree
### 2016-2017 Curriculum Chart

<table>
<thead>
<tr>
<th>Fall _______</th>
<th>Winter _______</th>
<th>Spring _______</th>
<th>Summer _______</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Fall _______</th>
<th>Winter _______</th>
<th>Spring _______</th>
<th>Summer _______</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Fall _______</th>
<th>Winter _______</th>
<th>Spring _______</th>
<th>Summer _______</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Fall _______</th>
<th>Winter _______</th>
<th>Spring _______</th>
<th>Summer _______</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Approved List of Upper Division Electives**
Please refer to the Undergraduate Advising website for the list of approved courses

**Approved List of Advanced Robotic Electives**
Please refer to the Undergraduate Advising website for the list of approved courses

**Notes:**
- The School of Engineering has different major declaration deadlines than the UCSC Academic/Administrative calendar. Our deadlines and process can be found on: [https://ua.soe.ucsc.edu/declare-your-major](https://ua.soe.ucsc.edu/declare-your-major)
- All students admitted to a School of Engineering major, or seeking admission to a major, must take all courses required for that major for a letter grade.
- Courses in which you receive a grade of C-, D+, D, or D- earn credit toward graduation, but cannot be used to satisfy a major requirement or a general education requirement, and cannot satisfy a prerequisite for another course.
- In addition to this list, any 5-unit CE, CS, or EE graduate course (200+) may also be used as an elective.
- At most, only one elective may be substituted by an upper-division individual or field study (CMPE, CMPS, EE 193 or 198) with approval.

**Student Name:**

**Staff Advisor:**

**Faculty Advisor:**

- I have discussed the BS/MS program with my advisor.