

# UH - Mechanical Engineering: BSME Degree Plan

128 Total Credit Hours. Effective Fall 2016.

Name: \_\_\_\_\_

UHID# \_\_\_\_\_

	Semester #								Semester Credit Hrs.
Fall	1	<i>MATH 1330</i> <b>MATH 1431</b>	<i>MATH 1330</i> <b>CHEM 1331</b>	<b>CHEM 1111</b> <i>CHEM 1331</i>		<b>ENGI 1100</b> MATH 1431	<b>ENGL 1303</b>	<b>POLS 1336</b>	15
Spring	2	<i>MATH 1431</i> <b>MATH 1432</b>	<b>PHYS 1321</b> <i>MATH 1432</i>	<i>CHEM 1331</i> <b>CHEM 1332</b>	<i>CHEM 1111</i> <b>CHEM 1112</b> <i>CHEM 1332</i>	<i>MATH 1431, plus</i> <i>CHEM 1331 or</i> <i>PHYS 1321</i> <b>ENGI 1331</b>	<i>ENGL 1303</i> <b>ENGL 1304</b>		17
Fall	3	<i>MATH 1432</i> <b>MATH 2433</b>	<i>PHYS 1321</i> <b>PHYS 1322</b> <i>MATH 2433</i>		<i>PHYS 1321</i> <b>MECE 2336 (H) or</b> <b>CIVE 2330</b> <i>ENGI 1331, MATH 2433</i>		<b>POLS 1337</b>	<b>Language, Phil, Culture Core</b>	16
Spring	4	<i>MATH 1432</i> <b>MATH 3321</b>		<i>PHYS 1322, MATH</i> <i>2433, CHEM 1332,</i> <i>1112</i> <b>MECE 2334</b>	<i>ENGI 1331, CIVE</i> <i>2330 or MECE 2336</i> <b>MECE 3336</b> <i>MATH 3321</i>	<i>ENGI 1100, MECT 3341</i> <b>MECE 2361</b> <i>ENGI 2304</i>	<i>ENGL 1304, ENGI</i> <i>1100, CIVE 2330</i> <b>ENGI 2304</b>		15
Fall	5	<i>MATH 2433, 3321</i> <b>MATH 3363</b>		<i>MECE 2361, 3336</i> <b>MECE 3338</b>	<i>CHEM 1332, 1112,</i> <i>MECE 2334</i> <b>MECE 3345</b>	<i>MECE 3336</i> <b>MECE 3369</b> <i>MATH 3363</i>	<b>HIST 1377</b>	<b>Social &amp; Behavioral Science Core</b>	18
Spring	6	<i>MECE 3369</i> <b>MECE 3381</b> <i>MATH 3363</i>	<i>MECE 2334, 3336,</i> <i>ENGI 2304</i> <b>MECE 3360</b>	<i>MECE 2334, 3336</i> <b>MECE 3363</b> <i>MATH 3363</i>	<i>MECE 3345, ENGI</i> <i>2304</i> <b>MECE 3245</b>		<b>HIST 1378</b>	<b>Creative Arts Core</b>	17
Fall	7	<i>Senior standing in</i> <i>ME</i> <b>MECE Elective</b>	<i>MATH 3363</i> <b>MECE 4331</b> <i>MECE 3381</i>	<i>MATH 3363, MECE</i> <i>3363</i> <b>MECE 4364</b>	<i>MECE 3338, 3345,</i> <i>3360, 3381</i> <b>MECE 4340</b> <i>MECE 4331, 4364</i>	<i>MECE 2334</i> <b>MECE 4343</b> <i>MECE 4364</i>			15
Spring	8	<i>Senior standing in</i> <i>ME</i> <b>MECE Elective</b>	<i>MECE 3360, 4364</i> <b>MECE 4371</b> <span style="font-size: 2em; vertical-align: middle;">or</span> <i>MECE 3338, 3360</i> <b>MECE 4372</b>	<i>MECE 4340</i> <b>MECE 4341</b>	<i>Senior standing in</i> <i>ME</i> <b>MECE Elective</b>	<i>Senior standing in</i> <i>ME</i> <b>MECE Elective</b>			15
<b>Total</b>									<b>128</b>

- The first digit in a course number indicates level, while the second digit is the number of credit hours. For example, MATH 2433 is a 4 credit hour sophomore-level course in mathematics.
- Prerequisites appear above the main course number, while co-requisites are shown below. Consult the instructor if you don't meet these requirements. Course titles are on the other side of this page. Specific senior level MECE Electives may have additional prerequisites.
- Students must satisfy a drafting requirement by completing MECT 3341 or by petitioning high school drafting or relevant industrial experience.
- For Chemistry, you are required to take CHEM 1331, CHEM 1332, CHEM 1111 and CHEM 1112.
- Guidelines for selecting MECE electives are listed on the other side of this page. You must petition any exceptions to these guidelines.
- Courses that include **(H)** are for the Honors College students Only

For advising, your first contact is Cyrena Edwards Bell, (713)743-4500, cedwards4@uh.edu

# UH - Mechanical Engineering: BSME Degree Plan. Effective Fall 20145

First advising contact is: Cyrena Edwards Bell, Advising Assistant  
N207, Engineering Bldg. 1, 713-743-4500, cedwards4@uh.edu

Core	
ENGL 1303	Freshman Composition I
ENGL 1304	Freshman Composition II
HIST 1377	The United States to 1877
HIST 1378	The United States since 1877
POLS 1336	U.S. and Texas Constitution and Politics
POLS 1337	U.S. Government: Congress, President and Courts
ENGI 2304	Technical Communications
For the Core requirements for: (i) Language, Philosophy & Culture, (ii) Social & Behavioral Sciences, and (iii) Creative Arts: Students need three courses. See UH Core Curriculum for approved list of courses.	
Natural Science and Mathematics	
CHEM 1331	Fundamentals of Chemistry - I
CHEM 1111	Fundamentals of Chemistry Laboratory - I
CHEM 1332	Fundamentals of Chemistry - II
CHEM 1112	Fundamentals of Chemistry Laboratory - II
MATH 1431	Calculus I
MATH 1432	Calculus II
MATH 2433	Calculus III
MATH 3321	Engineering Mathematics
MATH 3363	Introduction to Partial Differential Equations
PHYS 1321	University Physics I
PHYS 1322	University Physics II

Engineering	
MECT 3341	Computer-aided Drafting – required, but does not apply to BSME degree
ENGI 1100	Introduction to Engineering
ENGI 1331	Computing for Engineers
MECE 2334	Thermodynamics
MECE 2336 (H) or CIVE 2330	Mechanics I (Statics)
MECE 2361	Mechanical Design I: Design Analysis and Synthesis
MECE 3245	Materials Science Laboratory
MECE 3336	Mechanics II (Dynamics)
MECE 3338	Dynamics and Control of Mechanical Systems
MECE 3345	Material Science
MECE 3360	Experimental Methods Laboratory
MECE 3363	Introduction to Fluid Mechanics
MECE 3369	Solid Mechanics
MECE 3381	Introduction to Finite Element Methods
MECE 4331	Design of Machine Elements
MECE 4343	Thermal Design
MECE 4340	Mechanical Engineering Capstone I
MECE 4341	Mechanical Engineering Capstone II
MECE 4364	Heat Transfer
MECE 4371	Thermal/Fluids Laboratory
MECE 4372	Mechanics, Controls and Vibrations Laboratory
<b>Of the 4 required electives, only one may be non-MECE course</b>	
<b>Approved MECE Electives (must have senior standing in ME) are:</b>	
MECE 3399 and MECE 4399 Senior Honors Thesis	
MECE 4398: Special Problems (no more than one course)	
MECE 53xx or higher	
CHEE, CIVE, ECE, ENGI, INDE, PETR, BIO 33xx or higher <b>from an approved list (see advisor)</b>	
MATH 43xx (may also be used to apply for a Math Minor) <b>from an approved list (see advisor)</b>	

## Key

