



**California State Polytechnic University, Pomona
Degree Curriculum Sheet**

Plan (Major) MECHANICAL ENGINEERING
Subplan/Option _____

Catalog Year 2008-2009
Minimum Units Required 198

Name _____
Student ID _____

Evaluator _____
GWT Satisfied _____ Yes _____ No

Required Core Courses		
Course		Units
<i>Students in this major are expected to maintain a GPA of at least 2.00 in all core courses.</i>		
Mechanical Engineering Orientation	ME 100L	1
Vector Statics	ME 214	3
Mechanics Lab	ME 224L	1
Vector Dynamics	ME 215	4
Strength Materials	ME 218	3
Strength Materials	ME 219	3
Strength Materials Lab	ME 220L	1
Engineering Digital Computations	ME 232/232A	2/1
Introduction to Mechanical Design	ME 233/233L	3/1
Thermodynamics	ME 301	4
Thermodynamics	ME 302	4
Fluid Mechanics	ME 311	3
Fluid Mechanics	ME 312	3
Fluid Mechanics	ME 313L	1
Engineering Materials	ME 315	4
Intermediate Vector Dynamics	ME 316	3
Stress Analysis	ME 319	4
Machine Design	ME 325/L	4
Modeling of Systems	ME 340	3
Materials Science & Selection Lab	ME 350L	1
Finite Element Analysis	ME 406/406A	3/1
Heat Transfer	ME 415	4
Air Conditioning or Thermal Systems Design	ME 418/418L ME 427	4 (4)
Theory & Design for Mech. Measurement	ME 435/435L	3/1
Control of Mechanical Systems	ME 439/439L	3/1
Analytic Geometry/Calculus II	MAT 115	4
Analytic Geometry/Calculus III	MAT 116	4
Calculus of Several Variables I	MAT 214	3
Calculus of Several Variables II	MAT 215	3
Linear Algebra & Differential Equations	MAT 224	4
General Physics	PHY 131/131L	3/1
General Physics	PHY 133/133L	3/1
Total Units		103

Elective Core Courses	
Course	Units
Technical Electives	13
Select from department's list with advisor's approval.	
Total Units	13

Required Support Courses		
Course		Units
Analytic Geometry/Calculus I (B4)	MAT 114	4
General Chemistry/Lab (B1, B3)	CHM 121/121L	3/1
General Chemistry II	CHM 122	3
General Chemistry II Lab (B1, B3)	CHM 122L	1
Project Design Principles and Application (B5)	EGR 481, 482	4
Ethical Considerations in Technology and Applied Science (C4)	EGR 402	4
Principles of Economics (D2)	EC 201 or 202	4
Elements of Electrical Engineering/Lab	ECE 231/231L	3/1
Asset Allocation in Technical Decision Making (D4)	EGR 403	4
Engineering Graphics I/Lab	MFE 126/126L	2/1
Manufacturing & Systems Processes/ Lab	MFE 201/201L	3/1
Total Units		39

General Education Requirements		IGE (G.E. Alternative)
Area	Units	
Area A Communication & Critical Thinking	12	IGE 120 4 IGE 121 4 IGE 122 4 IGE 220 4
1 Oral Communication		
2 Written Communication		
3 Critical Thinking		
Area B Mathematics & Natural Sciences	16	IGE 221 4 IGE 222 4 IGE 223 4 IGE 224 4
<i>Select at least one lab course from sub-area 1 or 2.</i>		
1 Physical Science		
2 Biological Science		
3 Laboratory Activity		Area A2 4
4 Math/Quantitative Reasoning		Area A3 4
5 Science & Technology Synthesis		Area B 16
Area C Humanities	16	Area C1, C2 or C3 4 Area C4 4 Area D4 4
1 Fine and Performing Arts		
2 Philosophy and Civilization		
3 Literature and Foreign Language		
4 Humanities Synthesis		
Area D Social Sciences	20	See University Catalog for information on how IGE meets G.E. require- ments.
1 U.S. History, Constitution, American Ideals		
2 History, Economics and Political Science		
3 Sociology, Anthropology, Ethnic & Gender Studies		
4 Social Science Synthesis		
Area E Lifelong Understanding & Self Development	4	
Total Units	68	

American Institutions	
Courses that satisfy this requirement may also satisfy G.E. Area D1	8

American Cultural Perspectives Requirement	
Refer to catalog for list of courses that satisfy this requirement. Course may also satisfy major, minor, GE, or unrestricted elective requirements.	4

The following required support courses should be taken to satisfy the indicated GE Requirements to achieve the minimum units to degree listed at the top of this sheet.

Course	GE Area
General Chemistry/Lab	CHM 121/121L B1, B3
and General Chemistry II Lab	CHM 122L B3
Analytic Geometry/Calculus I	MAT 114 B4
Project Design Principles & Application I	EGR 481, 482 B5
Ethical Considerations in Tech. & Applied Sci	EGR 402 C4
Principles of Economics	EC 201 or 202 D2
Asset Allocation in Tech Decision Making	EGR 403 D4

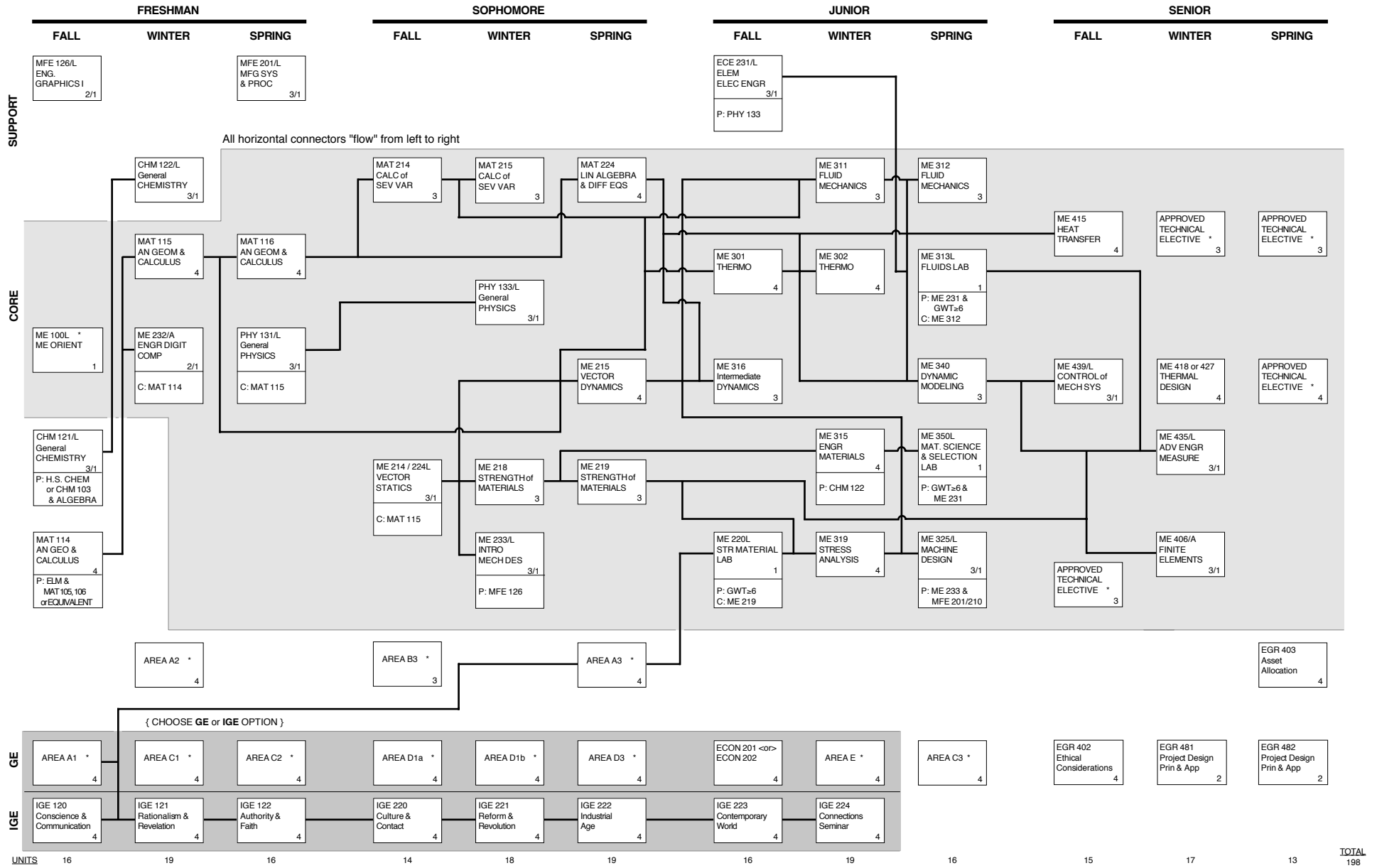
The remaining GE requirements may be satisfied by any course approved for that area.

No more than 105 community college quarter units or 36 extension credit quarter units may be applied toward a Bachelor's degree.
A minimum 2.0 cumulative GPA is required in core (including option) courses, Cal Poly Pomona courses, and overall work completed in order to receive a degree in this major.

**CALIFORNIA STATE POLYTECHNIC UNIVERSITY, POMONA
MECHANICAL ENGINEERING DEPARTMENT**

2008-2009

COURSE
P: Prerequisite
C: Corequisite



* SEE LISTS OF APPROVED COURSES IN THESE AREAS

Mechanical Engineering Department
Mechanical Engineering Major
Curriculum Year: 2008-2009

*Your department has developed this road plan, taking into account prerequisites and schedule restrictions.
 You should pay attention to these concerns when deviating from this plan.*

Year 1	Fall	Units	Winter	Units	Spring	Units	Comment
	ME 100L Major Core	1	MAT 115 Major Core	4	MAT 116 Major Core	4	<i>Students in this major are expected to maintain a GPA of at least 2.00 in all core courses.</i> <i>MAT 114, CHM 121/121L, and CHM 122L satisfy both major and general education requirements</i> <i>One course must be completed in each of the GE areas A2-3, B1-3, C1-3, D3, and E.</i>
	MFE 126/126L Major Support	3	ME 232/232A Major Core	3	PHY 131/131L Major Core	4	
	CHM 121/121L GE Area B2	4	CHM 122 Major Support	3	MFE 201/201L Major Support	4	
	ENG 104 GE Area A1	4	GE Area A2	4	GE Area Any approved course in C2	4	
	MAT 114 GE Area B1	4	CHM 122L GE area B2	1			
			GE Area C1 Any approved course in C1	4			
Total Units	16	Total Units	19	Total Units	16		
					Total Units for Year	51	

Year 2	Fall	Units	Winter	Units	Spring	Units	Comment
	MAT 214 Major Core	3	MAT 215 Major Core	3	MAT 224 Major Core	4	
	ME 214/224L Major Core	4	PHY 133/133L Major Core	4	ME 215 Major Core	4	
	PLS 201 GE Area D1a	4	ME 218 Major Core	3	ME 219 Major Core	3	
	GE Area B3	3	ME 233/233L Major Core	4	GE Area D3	4	
			HST 202 GE Area D1b	4	GE Area A3	4	
		14	Total Units	18	Total Units	19	
					Total Units for Year	51	

Year 3	Fall	Units	Winter	Units	Spring	Units	Comment
	ME 301 Major Core	4	ME 311 Major Core	3	ME 312 Major Core	3	
	ME 316 Major Core	3	ME 302 Major Core	4	ME 313L Major Core	1	
	ME 220L Major Core	1	ME 315 Major Core	4	ME 340 Major Core	3	
	ECE 231/231L Major Support	4	ME 319 Major Core	4	ME 350L Major Core	1	
	Econ 201 or 202 GE Area D2	4	GE Area E	4	ME 325/325L Major Core	4	
	<i>Take the Graduation Writing Test</i>				GE Area C3	4	
Total Units	16	Total Units	19	Total Units	16		
					Total Units for Year	51	

Year 4	Fall	Units	Winter	Units	Spring	Units	Comment
	ME 415 Major Core	4	Technical Elective Major Core	3	Technical Elective Major Core	3	<i>Technical Electives must be selected from the departmental list with the approval of the advisor.</i> <i>All GE Area A courses and all lower division GE courses in a GE area must be completed before taking the GE Synthesis course in that area.</i>
	ME 439/439L Major Core	4	ME 418/418L or ME 427 Major Core	4	Technical Elective Major Core	4	
	Technical Elective Major Core	3	ME 435/435L Major Core	4	EGR 403 GE Area D4	4	
	EGR 402 GE Area C4	4	ME 406/406A Major Core	4	EGR 482 GE Area B4	2	
			EGR 481 GE Area B4	2			
				<i>Request a graduation check</i>		<i>File an application for graduation</i>	
Total Units	15	Total Units	17	Total Units	13		
					Total Units for Year	45	

Total Units on Plan	198
Major Core Units	116
Major Support Units	14
General Education Units	68
Unrestricted Elective Units	0