

MECHANICAL ENGINEERING (ME) BS DEGREE
ME Four-Year Study Plan With Prerequisites

Freshman Year

Course	Title	LT	LB	CR	Pre-Requisites	Course	Title	LT	LB	CR	Pre-Requisites
MATH 101	Calculus I	4	0	4	None	MATH 102	Calculus II	4	0	4	MATH-101
PHYS 101	General Physics I	3	3	4	MATH 101-CR	PHYS 102	General Physics II	3	3	4	PHYS-101
CHEM 101	General Chemistry I	3	3	4	None	CSE 101	Introduction to Computer Programming	2	3	3	None
ENGL 101	Introduction to Academic Discourse	3	0	3	None	ENGL 102	Introduction to Report Writing	3	0	3	ENGL-101
AIS 101	Language Foundation	2	0	2	None	AIS 111	Belief & Its Consequences	2	0	2	None
Total						Total					

Sophomore Year

Course	Title	LT	LB	CR	Pre-Requisites	Course	Title	LT	LB	CR	Pre-Requisites
ENGL 201	Academic & Professional Communication	3	0	3	ENGL-102	EE 201	Electrical Circuits I	3	3	4	PHYS 102
MATH 201	Calculus III	3	0	3	MATH-102	MATH 202	Differential Equations	3	0	3	MATH-201
STAT 200	Engineering Probability & Statistics	2	3	3	MATH-102	ME 202	Dynamics	2	0	2	CE 201
CE 201	Statics & Structural Mechanics I	3	0	3	PHYS 101, MATH 102	ME 203	Thermodynamics	3	0	3	PHYS 101, MATH 102
ME 201	Engineering Graphics	1	3	2	Sophomore Standing	ME 204	Introduction to ME Design	1	3	2	CE 201, ME 201
PRO 201	Engineering Profession I	2	0	2	Sophomore Standing	AIS 211	Ethics and Governance	2	0	2	AIS-111
AIS 201	Professional Writing	2	0	2	AIS-101						
Total						Total					

Junior Year

Course	Title	LT	LB	CR	Pre-Requisites	Course	Title	LT	LB	CR	Pre-Requisites
MATH 203	Linear Algebra	3	0	3	MATH 102	ME 302	Machine Design II	2	3	3	ME 301
CSE 203	Introduction to Data Science	2	3	3	CSE 101, STAT 200	ME 304	Heat Transfer	2	3	3	ME 303
ME 301	Machine Design I	3	0	3	ME 204	ME 305	Materials Science & Engineering	2	3	3	CHEM 101, CE 201
ME 303	Fluid Mechanics	2	3	3	ME 203	ME 306	Manufacturing Processes	2	3	3	ME 305-CR
AIS 301	Effective Language Communication	2	0	2	AIS-201	XXX xxx	Free Elective I	3	0	3	None
PRO 301	Engineering Profession II	2	0	2	PRO-201	AIS 311	Human Rights in Islam	2	0	2	AIS-211
Total						Total					

Summer Session

ME 399	Summer Training	0	0	0	
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Senior Year

Course	Title	LT	LB	CR	Pre-Requisites	Course	Title	LT	LB	CR	Pre-Requisites
ME 401	System Dynamics & Control	2	3	3	MATH 202, EE 201, ME 304	ME 4xx	ME Elective II	3	0	3	As per opted elective
ME 4xx	ME Elective I	3	0	3	As per opted elective	ME 4xx	ME Elective III	3	0	3	As per opted elective
SOS xxx	Social Science Elective I	3	0	3	None	SOS xxx	Social Science Elective II	3	0	3	None
XXX xxx	Free Elective II	3	0	3	None	XXX xxx	Free Elective III	3	0	3	None
PRO 401	Engineering Profession III	2	0	2	PRO-301	ME 492	Senior Design Project II	4	0	4	ME-491
ME 491	Senior Design Project I	2	0	2	ME 302, ME 304						
Total						Total					

Total Credit Hours 132