COLLEGE OF ENGINEERING & APPLIED SCIENCE
UNIVERSITY of WYOMING

MECHANICAL ENGINEERING
Academic Year 2019 - 2020

FALL

Course number	Course Title	USP / CMTS	Credits	Min Grade	Grade Earned
FRESHMAN YEAR					
____ 1101	**First Year Seminar**	**FYS**	**3**	**C**	
	None				
CHEM 1020	**General Chemistry I**	**PN**	**4**	**D**	
	ACT 23 or concurrent enrollment MATH 1400, 1405 or 1450				
ENGL 1010	**College Comp & Rhetoric**	**COM1**	**3**	**C**	
	None				
MATH 2200	**Calculus I**	**Q**	**4**	**C**	
	C in Math 1405 or 1450, or MPE 5, or ACT 27/SAT ≥ 640				
	US & Wyo Constitution Course	V	**3**	**C**	
	Total		**17**		
SOPHOMORE YEAR					
ES 1060	**Intro to Eng Problem Solving**		**3**	**C-**	
	MATH 2200 or concurrent enrollment			*SC*	
ES 2120	**Dynamics**		**3**	**C**	
	C in MATH 2205 and ES 2110			*SC*	
ES 2210	**Electric Circuit Analysis**		**3**	**C-**	
	C in MATH 2205 and ES 2110			*SC*	
MATH 2210	**Calculus III**		**4**	**C**	
	C or better in MATH 2205			*SC*	
PHYS 1220	**Engineering Physics II**		**4**	**C**	
	C in MATH 2200, MATH 2205, and concurrent in MATH 2210				
	Total		**17**		
JUNIOR YEAR					
ME 3005	**Engineering Experimentation**	**ESE**	**3**	**D**	
	ME Success Curriculum, ES 1060, ES 2120				
ME 3010	**Intermed. Mechanics of Mat.**		**3**	**D**	
	ME Success Curriculum, ES 2410				
ME 3020	**System Dynamics**	**ESE**	**3**	**D**	
	ME Success Curriculum, ES 2210 and MATH 2310				
ME 3040	**Thermodynamics II**	**ESE**	**3**	**D**	
	ME Success Curriculum, CHEM 1020 and ES 2310				
ME 3060	**Numerical Meth. For Engineers**	**ESE**	**3**	**D**	
	ME Success Curriculum, ES 1060, and MATH 2310 or concurrent enrollment				
	Math/Science Elective		**3**		
	Total		**18**		
SENIOR YEAR					
ME 4060	**Systems Design I**		**3**	**D**	
	ME Success Curriculum, ME 3010 (or concurrent enrollment), ME 3170, and ME/ESE/ARE 3360				
ME 4150	**Mech. Behavior of Materials**		**3**	**D**	
	ME Success Curriculum, ME 3450				
	ME Elective		**3**		
	ME Elective		**3**		
	USP COM3	**COM3**	**3**		
	Total		**15**		

SPRING

Course Number	Course Title	USP / CMTS	Credits	Min Grade	Grade Earned
FRESHMAN YEAR					
ES 2110	**Statics**		**3**	**C**	
	Concurrent in MATH 2205			*SC*	
MATH 2205	**Calculus II**		**4**	**C**	
	D in CHEM 1020			*SC*	
	USP COM2	**COM 2**	**3**	**C**	
	Com 1				
	Math/Science Elective		**3**		
	Human Culture Elective	**HC**	**3**		
	None				
	Total		**16**		
SOPHOMORE YEAR					
ES 2310	**Thermodynamics**		**3**	**C**	
	C in MATH 2210 and ES 2120/PHYS 1210			*SC*	
ES 2330	**Fluid Dynamics**		**3**	**C**	
	C in MATH 2210 and ES 2120			*SC*	
ES 2410	**Mechanics of Materials**		**3**	**C**	
	ES 2110 and MATH 2205			*SC*	
MATH 2310	**Applied Differential Equations I**		**3**	**D**	
	C or better in MATH 2205				
One of CHEM 1030 or PHYS 2310 or PHYS 2320			**4**	**D**	
	CHEM 1020 if CHEM 1030; PHYS 1220 or 1320 or equivalent for PHYS 2310 or PHYS 2320				
	Human Culture Elective	**HC**	**3**		
	None				
	Total		**18/19**		
JUNIOR YEAR					
ME 3160	**Thermal/Fluid Science Lab**		**3**	**D**	
	ME Success Curriculum, ES 2330; ME/ESE 3005				
ME 3170	**Machine Design**		**3**	**D**	
	ME Success Curriculum, ES 2410				
ME 3360	**Fund. Of Transport Phenom**		**3**	**D**	
	ME Success Curriculum, MATH 2310, ES 2310, and ES 2330				
ME 3450	**Properties of Materials**		**3**	**D**	
	ME Success Curriculum, CHEM 1020 and ES 2310				
ME 4020	**Design of Mech/Elec. Syst.**		**3**	**D**	
	ME Success Curriculum, ME 3020				
	Total		**15**		
SENIOR YEAR					
ME 4070	**Systems Design II**		**3**	**D**	
	ME Success Curriculum, ME 4060 and COM2				
	ME Elective		**3**		
	ME Elective		**3**		
	Business Elective		**3**		
	Technical Elective		**3**		
	Total		**15**		

Total Program Credits: 131

KEY

Fall only
Spring only
Prerequisite(s)

*Students must have a minimum cumulative GPA of 2.0 in all Engineering courses and overall GPA of 2.0 for graduation. Grade r equirements of D or better except those specificially listed.
Note: a minimum of 42 hours of upper division coursework, 30 hours of which must be from the University of Wyoming.

***Success Curriculum (SC): Before enrolling in any upper division ME course, students must complete the ME Success Curriculum (MESC). The MESC is completed when the student has a 3.0 overall GPA in the seven courses: MATH2200, MATH 2205, MATH 2210, ES 1060, ES 2120, ES 2210, ES 2310, ES 2 330 and ES 2410.**
***ESE: Crosslisted with Energy Systems Engineering**
***Math/Science and Business electives must be selected from the department -approved list**
***ME Electives: any upper division ME course or EE 4620**
***Technical Elective: any engineering, math/science, or business course approved by the ME Department**

rev: 6/5/19