

ASSOCIATE OF SCIENCE TRANSFER DEGREE - effective 2022-2023
Engineering emphasis (64 credit hours)

Minimum 2.00 Cumulative Grade Point Average for A.S. Degree. 15 hour residency requirement.

			Course Areas/Titles	Course Numbers	Done	Now	Need	
A.S. Engineering emphasis GENERAL EDUCATION OPTIONS AND REQUIREMENTS (27 credit hours) <small>MOTR CORE 42 completion not required for A.S. degree</small>	Communications	3 hours	Written Communications	ENG 101(H)				
	Humanities and Fine Arts AND/OR Social and Behavioral Sciences	3 hours	Civics	HST 103(H), 104(H); PSC 102(H)				
				<i>PSC001 MO Higher Ed Civics Exam must also be completed</i>				
		3 hours	Economics	ECO 101, 102				
		3 hours	Art	ART 101, 103, 105				
			Civilization	HST 201, 202				
			Foreign Language	FRN 101, 102; GRM 101, 102; SPN 101, 102				
Literature			ENG 105, 106, 215(H), 216(H), 225, 226, 228, 229					
Geography			GEO 103					
Music			MSC 101, 131, 133, 231, 232					
Philosophy/Religion			PHL 101, 102(H), 201, 202(H)					
Political Science	PSC 155							
Psychology	PSY 101(H)							
Sociology	SOC 101(H)							
Theatre	THT 100(H)							
Mathematical Sciences	5 hours	Mathematical Sciences	MTH 180 (not a MOTR course but meets general education requirement for math)					
Natural Sciences	10 hours with 2 labs*	Physical Sciences	CHM 111(H)*					
			PHY 223*					
A.S. Engineering emphasis DEGREE ELECTIVE OPTIONS AND REQUIREMENTS (37 hours)	Institutional Requirements	Computer Literacy met with required Engineering emphasis General Education course PHY223			Required course listed above			
		First Year Experience (FYE 1 hr)	Exploring the Field of Engineering	EGR 100 (counts as elective degree requirement)				
	REQUIRED ENGINEERING COURSES	18 hours	Calculus II (5)	MTH 185				
			Calculus III (5)	MTH 201				
			Differential Equations (3)	MTH 205				
			General Physics II (5)	PHY 224				
	Associate of Science Technical Elective Options	19** hours (Including FYE course)	Biology for Majors I (4)	BIO 103				
			Genetics (4)	BIO 201				
			General Chemistry II (5)	CHM 112				
			Organic Chemistry I (5)	CHM 200				
			Organic Chemistry II (5)	CHM 201				
			Advanced Communications (3)	COM 110 or ENG 102(H)				
			Introduction to Computer Programming (3)	CIS 155				
			Computer Aided Engineering Design (3)	EGR 101				
			Engineering Mechanics-Statics (3)	EGR 228				
Engineering Mechanics-Dynamics (3)			EGR 250					
Circuit Analysis I (3)			EGR 261					
Introduction to Statistics (3)			MTH 132					
Linear Algebra (3)			MTH 172					
Introduction to Metallurgy (3)	MTT 148							
Physical Geology (4)	PHY 105							
TOTAL A.S. Engineering emphasis degree credit hours (at least 64 hours required)								
Institution Student Plans to Transfer to and Major Area of Study:								
Student Signature/Date:								
Advisor Signature/Date:								

Total may vary depending on major areas of study requirements related to specific Engineering discipline: Aerospace, Agricultural, Ceramic, Chemical, Civil, Electrical, Engineering Management, Food Biochemical and Environmental, Geological, Geology and Geophysics, Industrial, Mechanical, Metallurgical, Mining, Nuclear, and Petroleum Engineering. **Consult your Engineering Advisor and 4-year transfer institution for assistance in selecting courses for your specific degree, major, and transfer institution requirements.