

PROGRAM ARTICULATION DEGREE PLAN				
Southeastern Illinois College	2024-2025		Southern Illinois University Carbondale	
Associate in Engineering Science (AES) - 68 hrs			BS Mechanical Engineering (ME) - 126 hrs	
			University Core Curriculum (UCC) Capstone Option - 30 hrs	
		Hrs		Hrs
			UNIV 101	Saluki Success
			CMST 101	Intro to Oral Communication
ENG 121	Rhetoric & Composition I	3	ENGL 101	English Composition I
ENG 122	Rhetoric & Composition II	3	ENGL 102	English Composition II
MATH 162	Calculus & Analytic Geometry I	5	MATH 150	Calculus I
ECON 122	Intro to Microeconomics	3	ECON 240	Intro to Microeconomics
	Social & Behavior Sciences	3	SOCIAL SCIENCE	See SIUC Transfer Equivalency Guide
	Humanities	3	HUMANITIES	See SIUC Transfer Equivalency Guide
			HUMANITIES	NA
CHEM 121	General Chemistry I	5	CHEM 200 -and- 201	Intro to Chemical Principles w/Lab
			LIFE SCIENCE	3
	Fine Arts	3	FINE ARTS	See SIUC Transfer Equivalency Guide
			BIOL 202	Human Genetics & Human Health
			MULTICULTURAL	3
		28		11
Program Requirements			Program Requirements	
GRAP 121	Engineering Graphics 1	3	Any unarticulated courses will be used to satisfy general elective credit	
CHEM 122	General Chemistry & Analysis II	5	CHEM 210 -and- 211	General & Inorganic Chemistry w/Lab
MATH 165	Scientific Programming	3	ECE 222 (elective)	Intro to Digital Computation
MATH 221	Calculus & Analytic Geometry II	5	MATH 250	Calculus II
MATH 222	Calculus & Analytic Geometry III	5	MATH 251	Calculus III
MATH 225	Differential Equations	3	MATH 305	Intro to Differential Equations
PHYS 221	General Physics	5	PHYS 205A -and- 255A	University Physics w/Lab
PHYS 222	General Physics II	5	PHYS 205B -and- 255B	University Physics w/Lab
PHYS 241	Statics	3	ENGR 250	Statics
PHYS 242	Dynamics	3	ENGR 261	Dynamics
		40		
			Select 1 Course:	ENGR 222 -or- 296 -or- ME 222
			ENGR 335	Electric Circuits I
			ENGR 350A	Mechanics of Materials
			ENGR 351	Numerical Methods in Engineering
			ENGR 370A	Fluid Mechanics
			ME 102	Computer-Aided Engineering Drawing
			ME 300	Engineering Thermodynamics I
			ME 302	Engineering Heat Transfer
			ME 309	Mechanical Analysis & Design
			ME 312	Materials Science Fundamentals
			ME 336	System Dynamics & Control
			ME 401	Thermal Measurements Lab
			ME 407	Measurements & Instrumentation
			ME 411	Manufacturing Methods for Engineering Materials
			ME 475	Machine Design I
			ME 495A	Mechanical Engineering Design
			ME 495B	Mechanical Engineering Design
			Mechanical Engineering Electives	At least 12 credit hours must be from 400-level ME courses and 3 credit hours may be from IMAE 470A or a 400-level course used for a Math minor.
				15
				61
Total semester hrs completed with AES degree:		68	Total semester hrs completed with BS degree:	72
			Total hrs to BS degree:	140