

Kaskaskia College — Missouri S&T

General Engineering

Transfer Guide Effective as of Fall 2025

Complete Group 1 - Core Requirements and Group 2 - Major Requirements for major of choice.

Students are not required to complete all courses on this guide before transferring to Missouri S&T.

Group 1 - Core Requirements: All Majors Take All Courses

Engineering students take all Group 1 - Core Requirements and Group 2 - Major Requirements for major of choice. Math prerequisites: While they are not part of Missouri S&T engineering degree requirements, algebra and trigonometry skills are critical to success in calculus. To prepare for entry into calculus, students should follow math placement testing and advising recommendations at their college.

<u>Kaskaskia College</u>			<u>Semester</u>	<u>Missouri S&T</u>		
MATH 166	Calculus and Analytical Geometry I	5		MATH 1214	Calculus I	Grade of C or better is required. 4
MATH 267	Calculus and Analytical Geometry II	4		MATH 1215	Calculus II	Grade of C or better is required. 4
MATH 268	Calculus and Analytical Geometry III	4		MATH 2222	Calculus III	Grade of C or better is required. 4
MATH 269	Differential Equations	3		MATH 3304	Elementary Differential Equations	3
PHYS 201	University Physics I	5		PHYSICS 1135	Engineering Physics I	Grade of C or better is required. 4
PHYS 202	University Physics II	5		PHYSICS 2135	Engineering Physics II	Grade of C or better is required. 4
ENGL 101	English Composition	3		ENGLISH 1120	Exposition and Argumentation	3
		Total Hours	29			Total Hours 26

Group 2 - Major Requirements: Take All Courses for Major of Choice

Engineering students take all Group 1 - Core Requirements (above) and Group 2 - Major Requirements for chosen major from list below. See course requirements on following pages.

Aerospace Engineering
Architectural Engineering
Biomedical Engineering/Biomanufacturing or Biomaterials
Ceramic Engineering
Chemical Engineering and Biochemistry Emphasis
Civil Engineering
Computer Engineering
Electrical Engineering

Engineering Management
Environmental Engineering
Geological Engineering
Mechanical Engineering
Metallurgical Engineering
Mining Engineering
Nuclear Engineering
Petroleum Engineering

Engineering Major Requirements are detailed on the following pages.

Free Electives: Some programs allow Free Electives as indicated within each major. Free Electives should be selected in consultation with your advisor and may not include remedial/deficiency courses, algebra, trigonometry, pre-calculus, or extra credits in required courses.

This transfer guide is published by Missouri University of Science and Technology and is in effect as of Fall 2025.
Further information or updates are available from Missouri S&T Transfer Admissions at transfer.mst.edu, transfer@mst.edu, or 800-522-0938.

Aerospace Engineering Group 2 Major Requirements

Kaskaskia College			Semester	Missouri S&T		
ENGL 102 or COMM 103	English Composition or Fundamentals of Speech Communication	3	ENGLISH 1160 or SPMS 1185	Writing and Research or Principles of Speech	3	
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310*, 1319	General Chemistry I and Lab *CHEM 1310 will be substituted for CHEM 1305.	5	
ENGR 210	Electrical Circuits	4	ELEC ENG 2800	Electrical Circuits	3	
ENGR 203	Statics	3	CIV ENG 2200	Engineering Mechanics-Statics	3	
ENGR 205	Mechanics of Materials	3	CIV ENG 2210	Mechanics of Materials	3	
MATH 236	Linear Algebra	3	MATH 3108	Linear Algebra I Satisfies the Advanced Math/Comp Sci elective requirement.	3	
PHLE 201	Professional Ethics for Engineers or other engineering, business, bio, social ethics approved by advisor	3	PHILOS 3225	Engineering Ethics or other engineering, business, bio, social ethics approved by advisor	3	
Humanities, Arts, and Social Sciences General Education Requirements						
From the options listed in each group below, select 15 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines.						
*At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.						
Humanities and Fine Arts						
Select 6 hours from at least two specific disciplines.						
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6	ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6	
Behavioral and Social Sciences						
Select 6 hours from at least two specific disciplines.						
HIST 101 or HIST 102* or GEOG 104 or PHLE 121 or PHLE 110 or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or Intro to Philosophy or Logic or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	
Humanities, Arts, and Social Sciences						
Select 3 hours.						
HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	
No free electives applied to the degree.		0	Maximum Free Electives		0	
Group 2 Major Requirements		39	Group 2 Major Requirements		38	
Group 1 Core Requirements		29	Group 1 Core Requirements		26	
Total Hours		68			Total Hours*	
					64	
*S&T advisor permission is required to transfer more than 68 credits toward the S&T Aerospace Engineering degree.						

Architectural Engineering Group 2 Major Requirements

Kaskaskia College		Semester	Missouri S&T			
ENGL 102 or COMM 103	English Composition or Fundamentals of Speech Communication	3	ENGLISH 1160 or SPMS 1185	Writing and Research or Principles of Speech	3	
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310*, 1319	General Chemistry I and Lab *CHEM 1310 will be substituted for CHEM 1305.	5	
ENGR 203	Statics	3	CIV ENG 2200	Engineering Mechanics-Statics	3	
ENGR 204	Dynamics	3	MECH ENG 2350	Engineering Mechanics-Dynamics	2	
ENGR 205	Mechanics of Materials	3	CIV ENG 2210	Mechanics of Materials	3	
PSCI 103	Geology	4	GEOLOGY 1110 (GEO ENG 1150)	Physical and Environmental Geology	3	
Humanities, Arts, and Social Sciences General Education Requirements						
From the options listed in each group below, select 12 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines.						
*At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.						
Humanities and Fine Arts						
Select 6 hours from at least two specific disciplines.						
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6	ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6	
Behavioral and Social Sciences						
Select 6 hours from at least two specific disciplines to include HISTORY 1200.						
HIST 102*	History of Western Civilization* *Satisfies the State of Missouri government requirement.	3	HISTORY 1200*	Modern Western Civilization* *Satisfies the State of Missouri Government requirement.	3	
PHLE 121 or PHLE 110 or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	Intro to Philosophy or Logic or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	3	PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	3	
No free electives applied to the degree.		0	Maximum Free Electives		0	
Group 2 Major Requirements		33	Group 2 Major Requirements		31	
Group 1 Core Requirements		29	Group 1 Core Requirements		26	
Total Hours		62			Total Hours*	57
*S&T advisor permission is required to transfer more than 69 credits toward the S&T Architectural Engineering degree.						

Biomedical Engineering-Biomanufacturing Group 2 Major Requirements

Kaskaskia College		Semester	Missouri S&T		
COMM 103	Fundamentals of Speech Communication	3	SP&MS 1185 Principles of Speech Applies to degree as Gen Ed Communication requirement.	3	
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310, 1319 General Chemistry I and Lab	5	
CHEM 112	Chemistry II (Physical and Analytical)	5	CHEM 1320, 1510* General Chemistry II (3) and Qualitative Analysis (2) *CHEM 1510 is not a degree requirement, transfers as general elective credit.	3	
CHEM 208	Organic Chemistry I	5	CHEM 2210, 2219 Organic Chemistry I and Lab	4	
CHM 209 or BIOL 101	Organic Chemistry II (5) or Biology (4)	4	CHEM 2220, 2229 or BIO SCI 1113, 1219 Organic Chemistry II and Lab or General Biology and Lab Applies to degree as Track Elective.	4	
CITP 155	Programming I	3	COMP SCI 1500 Computational Problem Solving	3	
Humanities, Arts, and Social Sciences General Education Requirements					
From the options listed in each group below, select 9 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 3 hours Behavioral and Social Sciences.					
*At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.					
Humanities and Fine Arts					
Select 6 hours from at least two specific disciplines.					
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6	ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6
Behavioral and Social Sciences					
Select 3 hours.					
HIST 101 or HIST 102* or GEOG 104or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	3	HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	3
No free electives applied to the degree.					
Group 2 Major Requirements		34	Maximum Free Electives		0
Group 1 Core Requirements		29	Group 2 Major Requirements		31
Total Hours		63	Group 1 Core Requirements		26
			Total Hours*		57
*S&T advisor permission is required to transfer more than 69 credit hours toward the degree.					

Biomedical Engineering-Biomaterials Group 2 Major Requirements

Kaskaskia College		Semester	Missouri S&T	
COMM 103	Fundamentals of Speech Communication	3	SP&MS 1185	Principles of Speech Applies to degree as Gen Ed Communication requirement.
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310, 1319	General Chemistry I and Lab
CHEM 112	Chemistry II (Physical and Analytical)	5	CHEM 1320, 1510*	General Chemistry II (3) and Qualitative Analysis (2) *CHEM 1510 is not a degree requirement, transfers as general elective credit.
CHEM 208	Organic Chemistry I	5	CHEM 2210, 2219*	Organic Chemistry I and Lab* *CHEM 2219 Lab applies to the degree as a Track Elective (non-engineering).
CHEM 209	Organic Chemistry II	5	CHEM 2220, 2229*	Organic Chemistry II and Lab* CHEM 2229 Lab applies to the degree as a Track Elective (non-engineering).
BIOL 101	Biology	4	BIO SCI 1113*, 1219*	General Biology* and Lab* *Applies to degree as Track Elective (Non-engineering).
CITP 155	Programming I	3	COMP SCI 1500	Computational Problem Solving
ENGR 203	Statics	3	CIV ENG 2200	Engineering Mechanics-Statics
ENGR 210	Electrical Circuits	4	ELEC ENG 2100*, 2101	Circuits I* (3) and Circuit Analysis Lab (1) *A passing grade on the Missouri S&T EE Advancement Exam I is required to receive credit for ELEC ENG 2100. Applies to the degree as a Track Elective (Engineering).
Humanities, Arts, and Social Sciences General Education Requirements From the options listed in each group below, select 9 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 3 hours Behavioral and Social Sciences. *At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.				
Humanities and Fine Arts Select 6 hours from at least two specific disciplines.				
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation <i>*Satisfies the State of Missouri government requirement.</i>	6	ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or Intro 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation <i>*Satisfies the State of Missouri government requirement.</i>
Behavioral and Social Sciences Select 3 hours.				
HIST 101 or HIST 102* or GEOG 104or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language <i>*Satisfies the State of Missouri government requirement.</i>	3	HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language <i>*Satisfies the State of Missouri government requirement.</i>
<i>No free electives applied to the degree.</i>		0	Maximum Free Electives	
Group 2 Major Requirements		46	Group 2 Major Requirements	
Group 1 Core Requirements		29	Group 1 Core Requirements	
Total Hours		75	Total Hours* 68	
<i>*S&T advisor permission is required to transfer more than 69 credits toward the S&T Biomedical Engineering degree.</i>				

Ceramic Engineering Group 2 Major Requirements

Kaskaskia College			Semester	Missouri S&T		
ENGL 102 or COMM 103	English Composition or Fundamentals of Speech Communication	3	ENGLISH 1160 or SPMS 1185	Writing and Research or Principles of Speech	3	
ENGR 203	Statics	3	CIV ENG 2200	Engineering Mechanics-Statics	3	
ENGR 205	Mechanics of Materials	3	CIV ENG 2210	Mechanics of Materials	3	
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310, 1319	General Chemistry I and Lab	5	
CHEM 112	Chemistry II (Physical and Analytical)	5	CHEM 1320, 1510*	General Chemistry II (3) and Qualitative Analysis (2) *CHEM 1510 is not a degree requirement, transfers as general elective credit.	3	
CHEM 208	Organic Chemistry I	5	CHEM 2210	Organic Chemistry I (3) and Lab* (1) Satisfies the advanced chemistry elective requirement. *The lab is not a degree requirement, transfers as general elective credit.	3	
Humanities, Arts, and Social Sciences General Education Requirements From the options listed in each group below, select 15 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines. *At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.						
Humanities and Fine Arts Select 6 hours from at least two specific disciplines.						
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6	ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6	
Behavioral and Social Sciences Select 6 hours from at least two specific disciplines.						
HIST 101 or HIST 102* or GEOG 104 or PHLE 121 or PHLE 110 or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or Intro to Philosophy or Logic or American Government* or Psychology or Principles of Macroeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or General Psychology or Principles of Macroeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	
Humanities, Arts, and Social Sciences Select 3 hours.						
HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	
No free electives applied to the degree.		0	Maximum Free Electives		0	
Group 2 Major Requirements		39	Group 2 Major Requirements		35	
Group 1 Core Requirements		29	Group 1 Core Requirements		26	
Total Hours		68	Total Hours*		61	
*S&T advisor permission is required to transfer more than 68 credits toward the S&T Ceramic Engineering degree.						

**Chemical Engineering or
Chemical Engineering - Biochemical Engineering Emphasis
Group 2 Major Requirements**

Kaskaskia College		Semester	Missouri S&T		
COMM 103	Fundamentals of Speech Communication	3	SP&MS 1185	Principles of Speech Applies to degree as Gen Ed Communication requirement.	3
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310, 1319	General Chemistry I and Lab	5
CHEM 112	Chemistry II (Physical and Analytical)	5	CHEM 1320, 1510*	General Chemistry II (3) and Qualitative Analysis* (2) *CHEM 1510 is not a degree requirement, transfers as general elective credit.	3
CHEM 208	Organic Chemistry I	5	CHEM 2210, 2219*	Organic Chemistry I and Lab* *CHEM 2210 is a degree requirement. CHEM 2219 applies to the degree as 1 of 9 required science elective credits. See note below .	4
CHEM 209 or BIOL 215 or CHEM 210	Organic Chemistry II (5) or Microbiology (4) or Biochemistry (5)	4	CHEM 2220 or BIO SCI 3313, 3319 or CHEM 4610, 4619	Organic Chemistry II (3) or Microbiology and Lab (5) or General Biochemistry and Lab (5) Applies to the degree as required science elective credits. Select up to 9 hours from these options or CHEM 2219 Organic Chemistry Lab.	8
CITP 155	Programming I	3	COMP SCI 1500	Computational Problem Solving	3
Humanities, Arts, and Social Sciences General Education Requirements From the options listed in each group below, select 12 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines.					
*At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.					
Humanities and Fine Arts Select 6 hours from at least two specific disciplines.					
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6	ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6
Behavioral and Social Sciences Select 6 hours from at least two specific disciplines.					
HIST 101 or HIST 102* or GEOG 104 or PHLE 121 or PHLE 110 or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or Intro to Philosophy or Logic or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6
		0	Maximum Free Electives		0
		37	Group 2 Major Requirements		38
		29	Group 1 Core Requirements		26
Total Hours		66			Total Hours*
					64
*S&T advisor permission is required to transfer more than 68 credits toward the S&T Chemical Engineering degree.					

Civil Engineering Group 2 Major Requirements

Kaskaskia College			Semester	Missouri S&T		
ENGL 102 or COMM 103	English Composition or Fundamentals of Speech Communication	3	ENGLISH 1160 or SPMS 1185	Writing and Research or Principles of Speech	3	
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310, 1319	General Chemistry I and Lab	5	
PSCI 103	Geology	4	GEOLOGY 1110 (GEO ENG 1150)	Physical and Environmental Geology	3	
ENGR 203	Statics	3	CIV ENG 2200	Engineering Mechanics-Statics	3	
ENGR 204	Dynamics	3	MECH ENG 2350	Engineering Mechanics-Dynamics	2	
ENGR 205	Mechanics of Materials	3	CIV ENG 2210	Mechanics of Materials	3	
Humanities, Arts, and Social Sciences General Education Requirements						
From the options listed in each group below, select 15 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines.						
*At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.						
Humanities and Fine Arts						
Select 6 hours from at least two specific disciplines.						
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ART 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation	6	ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation	6	
*Satisfies the State of Missouri government requirement.						
Behavioral and Social Sciences						
Select 6 hours from at least two specific disciplines.						
HIST 101 or HIST 102* or GEOG 104 or PHLE 121 or PHLE 110 or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or Intro to Philosophy or Logic or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language	6	HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language	6	
*Satisfies the State of Missouri government requirement.						
Humanities, Arts, and Social Sciences						
Select 3 hours.						
HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	
No free electives applied to the degree.		0	Maximum Free Electives		0	
Group 2 Major Requirements		36	Group 2 Major Requirements		34	
Group 1 Core Requirements		29	Group 1 Core Requirements		26	
Total Hours		65	Total Hours*		60	
*S&T advisor permission is required to transfer more than 69 credits toward the S&T Civil Engineering degree.						

Computer Engineering Group 2 Major Requirements

Kaskaskia College			Semester	Missouri S&T	
COMM 103	Fundamentals of Speech Communication	3	SPMS 1185	Principles of Speech Applies to degree as Gen Ed Communication requirement.	3
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310, 1319	General Chemistry I and Lab	5
CITP 155	Programming I	3	COMP SCI 1500	Computational Problem Solving	3
ENGR 203 or ENGR 204 or CHEM 208	Statics and Dynamics or Organic Chemistry I (5)	3	CIV ENG 2200 or MECH ENG 2350 or CHEM 2210, 2219	Engineering Mechanics-Statics (3) or Engineering Mechanics-Dynamics (2) or Organic Chemistry I and Lab (4) Satisfies a required engineering/science elective.	3
ENGR 210	Electrical Circuits	4	ELEC ENG 2100*, 2101	Circuits I* (3) and Circuit Analysis Lab (1) *A passing grade on the Missouri S&T EE Advancement Exam I is required to receive credit for ELEC ENG 2100.	4
MATH 236	Linear Algebra	3	MATH 3108	Linear Algebra Satisfies a required math elective.	3
Humanities, Arts, and Social Sciences General Education Requirements From the options listed in each group below, select 15 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines. *At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.					
Humanities and Fine Arts Select 6 hours from at least two specific disciplines.					
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6	ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6
Behavioral and Social Sciences Select 6 hours from at least two specific disciplines.					
HIST 101 or HIST 102* or GEOG 104 or PHLE 121 or PHLE 110 or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or Intro to Philosophy or Logic or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6
Humanities, Arts, and Social Sciences Select 3 hours.					
ENGL 102	English Composition	3	ENGLISH 1160	Writing and Research	3
Electives	Maximum Free Electives	3	Electives	Maximum Free Electives	3
	Group 2 Major Requirements	39		Group 2 Major Requirements	39
	Group 1 Core Requirements	29		Group 1 Core Requirements	26
	Total Hours	68		Total Hours*	65
*S&T advisor permission is required to transfer more than 68 credits toward the S&T Computer Engineering degree.					

*S&T advisor permission is required to transfer more than 68 credits toward the S&T Computer Engineering degree.

Electrical Engineering Group 2 Major Requirements

Kaskaskia College			Semester	Missouri S&T		
COMM 103	Fundamentals of Speech Communication	3		SPMS 1185	Principles of Speech Applies to degree as Gen Ed Communication requirement.	3
CHEM 111	Chemistry I (Inorganic Chemistry)	5		CHEM 1310, 1319	General Chemistry I and Lab	5
CITP 155	Programming I	3		COMP SCI 1500	Computational Problem Solving	3
ENGR 203 and ENGR 204	Statics and Dynamics			CIV ENG 2200 and MECH ENG 2350	Engineering Mechanics-Statics (3) and Engineering Mechanics-Dynamics (2)	
BOTH of the courses above or ONE of the courses below. OR CHEM 208	Both courses above combined or any one of the following courses will satisfy a required engineering science elective. OR Organic Chemistry I (5)	3		BOTH of the courses above or ONE of the courses below. OR CHEM 2210	Both courses above combined or any one of the following courses will satisfy a required engineering science elective. OR Organic Chemistry I and Lab (3) or	3
ENGR 210	Electrical Circuits	4		ELEC ENG 2100*, 2101	Circuits I* (3) and Circuit Analysis Lab (1) *A passing grade on the Missouri S&T EE Advancement Exam I is required to receive credit for ELEC ENG 2100.	4
MATH 236	Linear Algebra	3		MATH 3108	Linear Algebra	3
Humanities, Arts, and Social Sciences General Education Requirements From the options listed in each group below, select 15 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines. *At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.						
Humanities and Fine Arts Select 6 hours from at least two specific disciplines.						
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6		ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6
Behavioral and Social Sciences Select 6 hours from at least two specific disciplines.						
HIST 101 or HIST 102* or GEOG 104 or PHLE 121 or PHLE 110 or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or Intro to Philosophy or Logic or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6		HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6
Humanities, Arts, and Social Sciences Select 3 hours.						
ENGL 102	English Composition	3		ENGLISH 1160	Writing and Research	3
Electives	Maximum Free Electives	6		Electives	Maximum Free Electives	6
	Group 2 Major Requirements	42			Group 2 Major Requirements	42
	Group 1 Core Requirements	29			Group 1 Core Requirements	26
	Total Hours	71			Total Hours*	68

*S&T advisor permission is required to transfer more than 68 credits toward the S&T
Electrical Engineering degree.

Engineering Management Group 2 Major Requirements

Kaskaskia College			Semester	Missouri S&T		
COMM 103	Fundamentals of Speech Communication	3		SPMS 1185	Principles of Speech Applies to degree as Gen Ed Communication requirement.	3
CHEM 111	Chemistry I (Inorganic Chemistry)	5		CHEM 1310, 1319	General Chemistry I and Lab	5
ENGR 210	Electrical Circuits	4		ELEC ENG 2800	Electrical Circuits	3
ENGR 203	Statics	3		CIV ENG 2200	Engineering Mechanics-Statics	3
ENGR 204	Dynamics	3		MECH ENG 2350	Engineering Mechanics-Dynamics	2
ENGR 205	Mechanics of Materials	3		CIV ENG 2210	Mechanics of Materials	3
Humanities, Arts, and Social Sciences General Education Requirements From the options listed in each group below, select 15 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines. *At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.						
Humanities and Fine Arts Select 6 hours from at least two specific disciplines.						
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6		ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6
Behavioral and Social Sciences Select 6 hours from at least two specific disciplines to include PSYCH 1101.						
PSYH 101	Psychology	3		PSYCH 1101	General Psychology Required	3
HIST 101 or HIST 102* or GEOG 104 or PHLE 121 or PHLE 110 or POLS 101* or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or Intro to Philosophy or Logic or American Government* or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	3		HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	3
Humanities, Arts, and Social Sciences Select 3 hours.						
ENGL 102	English Composition	3		ENGLISH 1160	Writing and Research	3
	No free electives applied to the degree.	0		Electives	Maximum Free Electives	0
	Group 2 Major Requirements	36			Group 2 Major Requirements	34
	Group 1 Core Requirements	29			Group 1 Core Requirements	26
	Total Hours	65			Total Hours*	61
				*S&T advisor permission is required to transfer more than 61 credits toward the S&T Engineering Management degree.		

Environmental Engineering Group 2 Major Requirements

Kaskaskia College			Semester	Missouri S&T		
ENGL 102 or COMM 103	English Composition or Fundamentals of Speech Communication	3		ENGLISH 1160 or SPMS 1185	Writing and Research or Principles of Speech	3
PSCI 103	Geology	4		GEOLOGY 1110 (GEO ENG 1150)	Physical and Environmental Geology	3
CHEM 111	Chemistry I (Inorganic Chemistry)	5		CHEM 1310, 1319	General Chemistry I and Lab	5
CHEM 112	Chemistry II (Physical and Analytical)	5		CHEM 1320, 1510*	General Chemistry II (3) and Qualitative Analysis (2) *CHEM 1510 is not a degree requirement, transfers as general elective credit.	3
BIOL 101	Biology	4		BIO SCI 1113, 1219*	General Biology (3) and Lab* (1) *The lab is not a degree requirement, transfers as general elective credit.	3
ENGR 203	Statics	3		CIV ENG 2200	Engineering Mechanics-Statics	3
ENGR 204	Dynamics	3		MECH ENG 2350	Engineering Mechanics-Dynamics	2
ENGR 205	Mechanics of Materials	3		CIV ENG 2210	Mechanics of Materials	3
Humanities, Arts, and Social Sciences General Education Requirements						
From the options listed in each group below, select 12 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines.						
*At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.						
Humanities and Fine Arts						
Select 6 hours from at least two specific disciplines.						
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6		ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6
Behavioral and Social Sciences						
Select 6 hours from at least two specific disciplines to include HISTORY 1200						
HIST 102*	History of Western Civilization* *Satisfies the State of Missouri government requirement.	3		HISTORY 1200*	Modern Western Civilization* *Satisfies the State of Missouri Government requirement.	3
PHLE 121 or PHLE 110 or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	Intro to Philosophy or Logic or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	3		PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	3
No free electives applied to the degree.		0		Maximum Free Electives		0
Group 2 Major Requirements		42		Group 2 Major Requirements		37
Group 1 Core Requirements		29		Group 1 Core Requirements		26
Total Hours		71				Total Hours*
						63
*S&T advisor permission is required to transfer more than 69 credits toward the S&T Environmental Engineering degree.						

Geological Engineering Group 2 Major Requirements

Kaskaskia College			Semester	Missouri S&T		
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310, 1319	General Chemistry I and Lab	5	
CITP 155	Programming I	3	CS 1500	Computational Problem Solving	3	
PSCI 103	Geology	4	GEO ENG 1150 (GEOLOGY 1110)	Physical and Environmental Geology	3	
ENGR 203	Statics	3	CIV ENG 2200	Engineering Mechanics-Statics	3	
ENGR 204	Dynamics	3	MECH ENG 2350	Engineering Mechanics-Dynamics	2	
ENGR 205	Mechanics of Materials	3	CIV ENG 2210	Mechanics of Materials	3	
Humanities, Arts, and Social Sciences General Education Requirements						
From the options listed in each group below, select 15 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines.						
*At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.						
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6	ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6	
Behavioral and Social Sciences						
Select 6 hours from at least two specific disciplines.						
HIST 101 or HIST 102* or GEOG 104 or PHLE 121 or PHLE 110 or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or Intro to Philosophy or Logic or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	
Humanities, Arts, and Social Sciences						
Select 3 hours.						
HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	
No free electives applied to the degree.		0	Maximum Free Electives		0	
Group 2 Major Requirements		36	Group 2 Major Requirements		34	
Group 1 Core Requirements		29	Group 1 Core Requirements		26	
Total Hours		65	Total Hours*		60	
*S&T advisor permission is required to transfer more than 65 credits toward the S&T Geological Engineering degree.						

Mechanical Engineering Group 2 Major Requirements

Kaskaskia College			Semester	Missouri S&T		
ENGL 102 or COMM 103	English Composition or Fundamentals of Speech Communication	3	ENGLISH 1160 or SPMS 1185	Writing and Research or Principles of Speech	3	
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310*, 1319	General Chemistry I and Lab *CHEM 1310 will be substituted for CHEM 1305.	5	
ENGR 210	Electrical Circuits	4	ELEC ENG 2800	Electrical Circuits	3	
ENGR 203	Statics	3	CIV ENG 2200	Engineering Mechanics-Statics	3	
ENGR 205	Mechanics of Materials	3	CIV ENG 2210	Mechanics of Materials	3	
MATH 236	Linear Algebra	3	MATH 3108	Linear Algebra I Satisfies the Advanced Math/Statistics elective requirement.	3	
Humanities, Arts, and Social Sciences General Education Requirements						
From the options listed in each group below, select 15 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines.						
*At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.						
Humanities and Fine Arts						
Select 6 hours from at least two specific disciplines.						
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6	ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6	
Behavioral and Social Sciences						
Select 6 hours from at least two specific disciplines.						
HIST 101 or HIST 102* or GEOG 104 or PHLE 121 or PHLE 110 or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or Intro to Philosophy or Logic or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	
Humanities, Arts, and Social Sciences						
Select 3 hours.						
HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	
No free electives applied to the degree.		0	Maximum Free Electives		0	
Group 2 Major Requirements		36	Group 2 Major Requirements		35	
Group 1 Core Requirements		29	Group 1 Core Requirements		26	
Total Hours		65			Total Hours*	61
*S&T advisor permission is required to transfer more than 68 credits toward the S&T Mechanical Engineering degree.						

Metallurgical Engineering Group 2 Major Requirements

Kaskaskia College		Semester	Missouri S&T			
ENGL 102 or COMM 103	English Composition or Fundamentals of Speech Communication	3	ENGLISH 1160 or SPMS 1185	Writing and Research or Principles of Speech	3	
ENGR 203	Statics	3	CIV ENG 2200	Engineering Mechanics-Statics	3	
ENGR 205	Mechanics of Materials	3	CIV ENG 2210	Mechanics of Materials	3	
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310, 1319	General Chemistry I and Lab	5	
CHEM 112	Chemistry II (Physical and Analytical)	5	CHEM 1320, 1510*	General Chemistry II (3) and Qualitative Analysis (2) *CHEM 1510 is not a degree requirement, transfers as general elective credit.	3	
CHEM 208 or ENGR 210	Organic Chemistry I or Electrical Circuits	4	CHEM 2210 or EE 2800	Organic Chemistry I or Electrical Circuits Not specifically required for the degree but will satisfy Out-of-Department Technical Elective Requirement.	3	
Humanities, Arts, and Social Sciences General Education Requirements						
From the options listed in each group below, select 15 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines.						
*At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.						
Humanities and Fine Arts						
Select 6 hours from at least two specific disciplines.						
LITO 201 or LITO 202 or LITO 204 or LITO 205 or LITO 139 or HIST 103* or HIST 104* or ARTO 105 or MUSC 107	British Literature Survey, Part I or British Literature Survey, Part II or American Literature or American Literature or World Literature or History of the United States* or History of the United States* or Intro to Art or Music Appreciation *Satisfies the State of Missouri government requirement.	6	ENGLISH 1211 or ENGLISH 1212 or ENGLISH 1221 or ENGLISH 1222 or ENGLISH 1231 or HISTORY 1300* or HISTORY 1310* or ART 1180 or MUSIC 1150	British Literature I: The Beginnings to 1800 or British Literature II: 1800 to Present American Literature: 1600 to 1865 or American Literature: 1865 to Present or World Literature I: Beginnings to the Renaissance or American History to 1877* or American History Since 1877* or Art Appreciation or Music Understanding and Appreciation *Satisfies the State of Missouri government requirement.	6	
Behavioral and Social Sciences						
Select 6 hours from at least two specific disciplines.						
HIST 101 or HIST 102* or GEOG 104 or PHLE 121 or PHLE 110 or POLS 101* or PSYH 101 or ECON 206 or ECON 205 or Foreign Language	History of Western Civilization or History of Western Civilization* or World Geography or Intro to Philosophy or Logic or American Government* or Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	HISTORY 1100 or HISTORY 1200* or HISTORY 2110 or PHILOS 1105 or PHILOS 1115 or POL SCI 1200* or PSYCH 1101 or ECON 1100 or ECON 1200 or Foreign Language	Early Western Civilization or Modern Western Civilization* or World Regional Geography or Self and World: Intro to Philosophy or Logic and Reasoning: An Introduction or American Government* or General Psychology or Principles of Microeconomics or Principles of Macroeconomics or Elementary or Intermediate Foreign Language *Satisfies the State of Missouri government requirement.	6	
Humanities, Arts, and Social Sciences						
Select 3 hours.						
HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	
Maximum Free Electives		3	Maximum Free Electives		3	
Group 2 Major Requirements		41	Group 2 Major Requirements		38	
Group 1 Core Requirements		29	Group 1 Core Requirements		26	
Total Hours		70			Total Hours*	64
*S&T advisor permission is required to transfer more than 68 credits toward the S&T Metallurgical Engineering degree.						

Mining Engineering Group 2 Major Requirements

Kaskaskia College		Semester	Missouri S&T	
ENGL 102 or	English Composition or	3	ENGLISH 1160 or	Writing and Research or
COMM 103	Fundamentals of Speech Communication		SPMS 1185	Principles of Speech
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310, 1319	General Chemistry I and Lab
ENGR 203	Statics	3	CIV ENG 2200	Engineering Mechanics-Statics
ENGR 204	Dynamics	3	MECH ENG 2350	Engineering Mechanics-Dynamics
ENGR 205	Mechanics of Materials	3	CIV ENG 2210	Mechanics of Materials
PSCI 103	Geology	4	GEOLOGY 1110	Physical and Environmental Geology
			(GEO ENG 1150)	
Humanities, Arts, and Social Sciences General Education Requirements From the options listed in each group below, select 12 hours to include 6 hours Humanities and Fine Arts from at least two specific disciplines and 6 hours Behavioral and Social Sciences from at least two specific disciplines. *At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.				
Humanities and Fine Arts Select 6 hours from at least two specific disciplines.				
LITO 201 or	British Literature Survey, Part I or		ENGLISH 1211 or	British Literature I: The Beginnings to 1800 or
LITO 202 or	British Literature Survey, Part II or		ENGLISH 1212 or	British Literature II: 1800 to Present
LITO 204 or	American Literature or		ENGLISH 1221 or	American Literature: 1600 to 1865 or
LITO 205 or	American Literature or		ENGLISH 1222 or	American Literature: 1865 to Present or
LITO 139 or	World Literature or	6	ENGLISH 1231 or	World Literature I: Beginnings to the Renaissance or
HIST 103* or	History of the United States* or		HISTORY 1300* or	American History to 1877* or
HIST 104* or	History of the United States* or		HISTORY 1310* or	American History Since 1877* or
ARTO 105 or	Intro to Art or		ART 1180 or	Art Appreciation or
MUSC 107	Music Appreciation		MUSIC 1150	Music Understanding and Appreciation
	*Satisfies the State of Missouri government requirement.			*Satisfies the State of Missouri government requirement.
Behavioral and Social Sciences Select 6 hours from at least two specific disciplines.				
HIST 101 or	History of Western Civilization or		HISTORY 1100 or	Early Western Civilization or
HIST 102* or	History of Western Civilization* or		HISTORY 1200* or	Modern Western Civilization* or
GEOG 104 or	World Geography or		HISTORY 2110 or	World Regional Geography or
PHLE 121 or	Intro to Philosophy or		PHILOS 1105 or	Self and World: Intro to Philosophy or
PHLE 110 or	Logic or		PHILOS 1115 or	Logic and Reasoning: An Introduction or
POLS 101* or	American Government* or	6	POL SCI 1200* or	American Government* or
PSYH 101 or	Psychology or		PSYCH 1101 or	General Psychology or
ECON 206 or	Principles of Microeconomics or		ECON 1100 or	Principles of Microeconomics or
ECON 205 or	Principles of Macroeconomics or		ECON 1200 or	Principles of Macroeconomics or
Foreign Language	Elementary or Intermediate Foreign Language		Foreign Language	Elementary or Intermediate Foreign Language
	*Satisfies the State of Missouri government requirement.			*Satisfies the State of Missouri government requirement.
<i>No free electives applied to the degree.</i>		0	Maximum Free Electives	
Group 2 Major Requirements		33	Group 2 Major Requirements	
Group 1 Core Requirements		29	Group 1 Core Requirements	
Total Hours		62	Total Hours*	
			57	
*S&T advisor permission is required to transfer more than 68 credits toward the S&T Mining Engineering degree.				

Nuclear Engineering Group 2 Major Requirements

Kaskaskia College		Semester	Missouri S&T		
ENGL 102 or	English Composition or	3	ENGLISH 1160 or	Writing and Research or	3
COMM 103	Fundamentals of Speech Communication		SPMS 1185	Principles of Speech	
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310, 1319	General Chemistry I and Lab	5
MATH 236	Linear Algebra	3	MATH 3108	Linear Algebra I	3
ENGR 203	Statics	3	CIV ENG 2200	Engineering Mechanics-Statics	3
ENGR 205	Mechanics of Materials	3	CIV ENG 2210	Mechanics of Materials	3
ENGR 210	Electrical Circuits	4	ELEC ENG 2800	Electrical Circuits	3
Humanities, Arts, and Social Sciences General Education Requirements					
From the options listed in each group below, select 15 hours to include					
6 hours Humanities and Fine Arts from at least two specific disciplines and					
6 hours Behavioral and Social Sciences from at least two specific disciplines.					
*At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.					
Humanities and Fine Arts					
Select 6 hours from at least two specific disciplines.					
LITO 201 or	British Literature Survey, Part I or	6	ENGLISH 1211 or	British Literature I: The Beginnings to 1800 or	6
LITO 202 or	British Literature Survey, Part II or		ENGLISH 1212 or	British Literature II: 1800 to Present	
LITO 204 or	American Literature or		ENGLISH 1221 or	American Literature: 1600 to 1865 or	
LITO 205 or	American Literature or		ENGLISH 1222 or	American Literature: 1865 to Present or	
LITO 139 or	World Literature or		ENGLISH 1231 or	World Literature I: Beginnings to the Renaissance or	
HIST 103* or	History of the United States* or		HISTORY 1300* or	American History to 1877* or	
HIST 104* or	History of the United States* or		HISTORY 1310* or	American History Since 1877* or	
ARTO 105 or	Intro to Art or		ART 1180 or	Art Appreciation or	
MUSC 107	Music Appreciation		MUSIC 1150	Music Understanding and Appreciation	
			*Satisfies the State of Missouri government requirement.		
Behavioral and Social Sciences					
Select 6 hours from at least two specific disciplines.					
ECON 206 or	Principles of Microeconomics or	3	ECON 1100 or	Principles of Microeconomics or	3
ECON 205	Principles of Macroeconomics		ECON 1200	Principles of Macroeconomics	
HIST 101 or	History of Western Civilization or	6	HISTORY 1100 or	Early Western Civilization or	3
HIST 102* or	History of Western Civilization* or		HISTORY 1200* or	Modern Western Civilization* or	
GEOG 104 or	World Geography or		HISTORY 2110 or	World Regional Geography or	
PHLE 121 or	Intro to Philosophy or		PHILOS 1105 or	Self and World: Intro to Philosophy or	
PHLE 110 or	Logic or		PHILOS 1115 or	Logic and Reasoning: An Introduction or	
POLS 101* or	American Government* or		POL SCI 1200* or	American Government* or	
PSYH 101 or	Psychology or		PSYCH 1101 or	General Psychology or	
Foreign Language	Elementary or Intermediate Foreign Language		Foreign Language	Elementary or Intermediate Foreign Language	
			*Satisfies the State of Missouri government requirement.		
Humanities, Arts, and Social Sciences					
Select 3 hours.					
HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3
Maximum Free Electives		0	Maximum Free Electives		0
Group 2 Major Requirements		39	Group 2 Major Requirements		35
Group 1 Core Requirements		29	Group 1 Core Requirements		26
Total Hours		68			Total Hours* 61
*S&T advisor permission is required to transfer more than 69 credits toward the S&T Nuclear Engineering degree.					

Petroleum Engineering Group 2 Major Requirements

Kaskaskia College			Semester	Missouri S&T		
ENGL 102 or	English Composition or	3	ENGLISH 1160 or	Writing and Research or	3	
COMM 103	Fundamentals of Speech Communication		SPMS 1185	Principles of Speech		
CHEM 111	Chemistry I (Inorganic Chemistry)	5	CHEM 1310, 1319	General Chemistry I and Lab	5	
CITP 155	Programming I	3	CS 1500	Computational Problem Solving	3	
PSCI 103	Geology	4	GEOLOGY 1110 (GEO ENG 1150)	Physical and Environmental Geology	3	
ENGR 203	Statics	3	CIV ENG 2200	Engineering Mechanics-Statics	3	
ENGR 204	Dynamics	3	MECH ENG 2350	Engineering Mechanics-Dynamics	2	
ENGR 205	Mechanics of Materials	3	CIV ENG 2210	Mechanics of Materials	3	
Humanities, Arts, and Social Sciences General Education Requirements						
From the options listed in each group below, select 15 hours to include						
6 hours Humanities and Fine Arts from at least two specific disciplines and						
6 hours Behavioral and Social Sciences from at least two specific disciplines.						
*At least one course must be selected from HISTORY 1200, 1300, 1310, or POL SCI 1200 to satisfy the State of Missouri government requirement.						
Humanities and Fine Arts						
Select 6 hours from at least two specific disciplines.						
LITO 201 or	British Literature Survey, Part I or		ENGLISH 1211 or	British Literature I: The Beginnings to 1800 or		
LITO 202 or	British Literature Survey, Part II or		ENGLISH 1212 or	British Literature II: 1800 to Present		
LITO 204 or	American Literature or		ENGLISH 1221 or	American Literature: 1600 to 1865 or		
LITO 205 or	American Literature or		ENGLISH 1222 or	American Literature: 1865 to Present or		
LITO 139 or	World Literature or		ENGLISH 1231 or	World Literature I: Beginnings to the Renaissance or		
HIST 103* or	History of the United States* or	6	HISTORY 1300* or	American History to 1877* or	6	
HIST 104* or	History of the United States* or		HISTORY 1310* or	American History Since 1877* or		
ARTO 105 or	Intro to Art or		ART 1180 or	Art Appreciation or		
MUSC 107	Music Appreciation		MUSIC 1150	Music Understanding and Appreciation		
*Satisfies the State of Missouri government requirement.						
Behavioral and Social Sciences						
Select 6 hours from at least two specific disciplines.						
HIST 101 or	History of Western Civilization or		HISTORY 1100 or	Early Western Civilization or		
HIST 102* or	History of Western Civilization* or		HISTORY 1200* or	Modern Western Civilization* or		
GEOG 104 or	World Geography or		HISTORY 2110 or	World Regional Geography or		
PHLE 121 or	Intro to Philosophy or		PHILOS 1105 or	Self and World: Intro to Philosophy or		
PHLE 110 or	Logic or		PHILOS 1115 or	Logic and Reasoning: An Introduction or		
POLS 101* or	American Government* or	6	POL SCI 1200* or	American Government*or	6	
PSYH 101 or	Psychology or		PSYCH 1101 or	General Psychology or		
ECON 206 or	Principles of Microeconomics or		ECON 1100 or	Principles of Microeconomics or		
ECON 205 or	Principles of Macroeconomics or		ECON 1200 or	Principles of Macroeconomics or		
Foreign Language	Elementary or Intermediate Foreign Language		Foreign Language	Elementary or Intermediate Foreign Language		
*Satisfies the State of Missouri government requirement.						
Humanities, Arts, and Social Sciences						
Select 3 hours.						
HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	HASS Elective	Humanities, Arts, Social Sciences Elective: Any history, art, music, theater, English and technical communication, philosophy, political science, psychology, economics, etymology, or foreign language.	3	
No free electives applied to the degree.		0	Maximum Free Electives		0	
Group 2 Major Requirements		39	Group 2 Major Requirements		37	
Group 1 Core Requirements		29	Group 1 Core Requirements		26	
Total Hours		68	Total Hours*		63	
*S&T advisor permission is required to transfer more than 69 credits toward the S&T Petroleum Engineering degree.						