

Transfer Guide Associate of Science BS Mechanical Engineering



JCCC—Fall Semester 1	Hrs	JCCC—Spring Semester 1	Hrs	JCCC—Summer Semester 1	Hrs
CHEM 124/125 General Chemistry I/Lab	5	ENGL 122 Composition II	3		
ENGL 121 Composition I	3	MATH 242 Calculus II	5		
MATH 241 Calculus I	5	PHYS 220 Engineering Physics I	5		
		Social Sciences & Economics Course	3		

JCCC—Fall Semester 2	Hrs	JCCC—Spring Semester 2	Hrs	UMKC—Summer Semester 2	Hrs
ENGR 251 Statics	3	ENGR 131 Engineering Graphics	4		
MATH 243 Calculus III	5	MATH 254 Differential Equations	4		
PHYS 221 Engineering Physics II	5	Cultural Diversity Course	3		
Humanities Course	3	Social Sciences & Economics Course	3		

JCCC—Fall Semester 3	Hrs	UMKC—Spring Semester 3	Hrs	UMKC—Summer Semester 3	Hrs
CS 200 Concepts of Programming Algorithms C++	4	CE 276 Strength of Materials	3		
COMS 120 or 121	3	ECE 276/277 Circuit Theory I/Lab	4		
MATH 246 Elementary Linear Algebra	3	ME 131 Engineering Graphics (3D)	1		
Humanities Course	3	ME 285 Engineering Dynamics	3		
		ME 299 Engineering Thermodynamics	3		

UMKC—Fall Semester 4	Hrs	UMKC—Spring Semester 4	Hrs	UMKC—Summer Semester 4	Hrs
ME 324 Engineering Materials	3	ME 306 Numerical Analysis	3		
ME 351 Fluid Mechanics	3	ME 352 Mechanical Instruments Lab	3		
ME 356 Mechanical Component Design	3	ME 380 Manufacturing Methods	3		
ME 360 Applied Thermodynamics	3	ME 385 System Dynamics	3		
		ME 399/399L Heat Transfer/Lab	4		

UMKC—Fall Semester 5	Hrs	UMKC—Spring Semester 5	Hrs	UMKC—Summer Semester 4	Hrs
ME 492 Mechanical Design Synthesis I	3	ME 496WI Mechanical Design Synthesis II	3		
ME 415 Control Systems Theory	3	ME 400 Technical Elective	3		
ME 400 Technical Elective	3	ME 400 Design Elective	3		
ME 400 Technical Elective	3				

To be exempt from the UMKC Essentials or Missouri Core 42 general education requirements, JCCC students are encouraged to complete the Associate of Science degree.