

University of Illinois at Urbana-Champaign (UIUC)

Engineering

McHenry County College (MCC) Transfer Guide

(2019-2020 Academic Year)

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Transfer guides are produced as a service to MCC students. Every effort is made to maintain up-to-date and accurate information; however, this information is subject to change. Such changes take precedence over the information on this guide. Students should work with an MCC advisor and check with the four-year school as soon as the transfer decision is made. Responsibility for complying with all applicable requirements ultimately rests with the student.

Transfer Tools on UIUC's Website: <https://admissions.illinois.edu/Apply/transfer>

- Open and closed programs
- Dates and deadlines
- Transfer Handbook – Recommended course sequences and transfer prerequisite requirements
- GPA guidelines
- Also use Transferology to find course equivalencies: www.transferology.com.

Transfer Options

- **Associate in Engineering Science (AES) Degree** - Course recommendations on the following pages of this guide apply to MCC's AES degree and to specific engineering majors at UIUC. The AES degree does not include the complete IAI GECC. Engineering baccalaureate programs are highly structured and require extensive, sequential math and science courses at freshman and sophomore levels; some general education courses are postponed to junior and senior years.
- **Illinois Articulation Initiative General Education Core Curriculum (IAI GECC)** - Completing the IAI GECC prior to transferring is not recommended. Students should focus on completing prerequisite math and science courses and some courses that fulfill UIUC general education requirements. See course recommendations on this guide.

Transfer Application

- **Fall Admission Only - Application filing periods:** Fall, December 15 – March 1; priority deadline is February 1. **Application after Jan 1 and meeting priority deadline recommended.**
- **Second choice major** can be noted on the admission application and in the essay.
 - Following can only be first choice majors: Computer Science and Mechanical Engineering. Note: Admission for Electrical Engineering and Computer Engineering are through same department. Both should not be selected. If students are not admitted into one, they will not be admitted to the other.
 - Transfer students are expected to complete the major to which they were accepted. Allowing a major change is rare.
- **Following majors are closed to sophomore-level transfers:** Computer Engineering, Computer Science, Electrical Engineering, and Mechanical Engineering.

Transfer Admission

See UIUC's Transfer [Handbook](#) for details and major-specific course recommendations.

- Admission is based on overall GPA, GPA in technical coursework, academic rigor of coursework, essay, and relevant activities & work experience. **Courses being completed over the summer prior to fall admission will not be considered as part of the application review.**
- **Junior Level Course Requirements** (60 transferable credits)
 - ENG151 & 152; MAT175, 245, & 255; PHY291, 292, 293 & 294; CHM165 & 166; completing other required courses will enhance admissibility
- **Sophomore Level Transfer** (30-59 transferable semester hours)
 - ENG151 & 152; MAT175 & 245; PHY291; CHM165 & 166
 - High school academics (transcript) and ACT or SAT scores are reviewed in admission process. **Sophomore transfer admission preference given to those who would have been admitted as freshmen.**

- **As and Bs in math and science courses are a must.**
- **Minimum Transfer GPA** –Minimum B grade in the required technical subjects (chemistry, math, physics, computer science, etc.) is expected and minimum 3.0 cumulative GPA of all coursework completed is required. **Average admission GPAs by major are significantly higher.** See UIUC [Transfer Handbook](#) for average admission GPAs by major.
- **Calculation for Admission GPA** – All grades (including repeated) from transferable courses are calculated into the admission GPA. There is no grade forgiveness policy.
- **Foreign Language Graduation Requirement** –Three years of the same foreign language in high school or three semesters in college. This includes Chemical Engineering, which is in the College of Liberal Arts & Sciences. **It is strongly recommended that the foreign language graduation requirement be completed prior to transfer.**
- At least 60 hours of the bachelor's degree requirements must be UIUC credit. Generally, UIUC engineering programs require a minimum of 128 credits.

Course recommendations For recommended semester course sequencing, see next page. **Some courses are only offered one time each year.** Work with an academic advisor to plan your schedule.

Associate in Engineering Science Degree Requirements		
General Core and Support Courses (Refer to MCC's catalog for approved IAI courses.) Courses in bold print should be completed prior to transfer.		
Communications (6 credits) _____ ENG151 Composition I, C or better (3 cr) _____ ENG152 Composition II, C or better (3 cr)	Mathematics (17 credits) _____ MAT175 Calculus w/Analytic Geo I (5 cr) _____ MAT245 Calculus w/Analytic Geo II (5 cr) _____ MAT255 Calculus w/Analytic Geo III (4 cr) _____ MAT260 Differential Equations (3 cr) (MAT260 is not required for Comp Sci majors – a higher level course will be taken at UIUC)	
Humanities & Fine Arts (3-6 credits) _____ IAI Humanities or Fine Arts (3 cr)	Science (13 credits) _____ CHM165 General Chemistry I (5 cr) _____ PHY291 Principles of Physics I (4 cr) _____ PHY292 Principles of Physics II (4 cr)	
Social & Behavioral Sciences (3-6 credits) _____ IAI Social & Behavioral Sciences (ECO251 strongly recommended)	Computer Science (4 credits) _____ CSC121 Comp Sci I (4 cr)	
Non-Western Cultures or Minority Cultures within the United States Select 0-3 credit from the following. One non-western/minority cultures course required, which also can satisfy Hum/Fine Arts or Soc/Beh Sci requirement. _____ ANT151; ART155, 165; ENG 276; GEG203; HIS165; MUS153; PHI160, 261		
Total Credits for General Core and Support Courses		46-53 credits
Engineering Specialty Courses (It is <u>important</u> to complete sequence courses at MCC.) NOTE: Prerequisite for MAT175 is not included on this guide (MAT165 – 5 credits). If your math placements require you to take MAT165, it strongly is recommended that you to take it the summer prior to your first semester at MCC in order to be in sequence for taking required calculus and physics courses and to complete your prerequisite courses in a timely manner.		Total AES Credits (includes general core, support, & major-related courses)
Bioengineering (currently not accepting transfer students)		
Aerospace, Agricultural & Biological, Civil & Environmental, Engineering Mechanics, Industrial, Mechanical, Systems Eng, & Design, and Nuclear, Plasma & Radiological _____ CHM166 General Chemistry II (5) _____ CSC122 Computer Science II (4) _____ PHY293 Principles of Physics III (4) _____ PHY294 Thermal Physics (2) (<i>PHY294 applies to Aerospace, Agr & Bio, Civil, Eng Mech, Industrial, & Systems</i>)		60-68
_____ EGR251 Statics (3) _____ EGR252 Dynamics (3) _____ EGR151 Eng. Graphics (4) (<i>only Agr & Bio, Civil, Eng. Mech, Industrial, Mechanical, and Sys Eng & Design</i>)		
Computer Science, Computer Engineering, Electrical Engineering, Engineering Physics, and Materials Science & Engineering _____ CHM166 General Chemistry II (5) _____ PHY293 Principles of Physics III (4) _____ PHY294 Thermal Physics (2) (<i>PHY294 applies to Comp Eng, Electrical, & Eng Physics</i>)		Minimum 60
_____ CSC122 Comp. Sci. II (4) _____ MAT253 Linear Algebra (3) (<i>Comp Sci, Comp Eng, EE</i>) _____ EGR251 Statics (3) (<i>Tech Elective for Comp Eng & Elec Eng</i>)		

NOTE: For Comp. Eng. and Electrical Eng, ECE110, Intro to Electronics, is a prerequisite to upper-level courses and is recommended for junior admission. MCC has no equivalent. The course can be taken at UIUC.

Recommended Semester Course Sequencing (See AES degree requirements on previous page)

Please note that some courses are only offered one time each year. Work with an academic advisor to plan your schedule.

Summer 1

MAT165 College Algebra & Trigonometry (5 cr)

Note: Based on your placement exam. Prereq for MAT175, not AES requirement. Take course summer prior to beginning coursework at MCC in order to complete the highly sequential pre-engineering courses.

Aerospace, Agricultural & Biological, Civil & Environmental, Engineering Mechanics, Industrial, Mechanical, Systems Eng, & Design, and Nuclear, Plasma & Radiological

Fall I	Spring I	Summer
ENG151 Composition I 3	ENG152 Composition II 3	IAI Humanities/Fine Arts 3
CHM165 General Chemistry I 5	CHM166 General Chemistry II 5	
IAI Soc/Behavioral Science (ECO251) 3	*EGR151 Engineering Graphics 4	
MAT175 Calc w/Analytic Geo 5	MAT245 Calculus w/Analytic Geometry II 4	
Semester Hours 16	PHY291 Principles of Physics I 4	
	Semester Hours 19	
Fall II	Spring II	Summer
CSC121 Computer Science I 4	CSC122 Computer Science II 4	
EGR251 Statics or Technical Elective 3	EGR252 Dynamics 3	
MAT255 Calculus w/Analytic Geometry III 5	MAT260 Differential Equations 3	
PHY292 Principles of Physics II 4	PHY293 Principles of Physics III 4	
IAI Hum/Fine Arts or Social/Beh Sci 3	** PHY294 Thermal Physics 2	
Semester Hours 19	Semester Hours 19	

* Agri & Biol; Civil & Environ; Eng Mech, Industrial; Mechanical; and Systems

** Aerospace, Agricultural & Biological, Civil & Environmental, Engineering Mechanics, Industrial, and Systems, Eng. & Design.

Computer Science, Computer Engineering, Electrical Engineering, Engineering Physics, and Materials Science & Engineering

Fall I	Spring I	Summer
ENG151 Composition I 3	ENG152 Composition II 3	IAI Humanities/Fine Arts 3
CHM165 General Chemistry I 5	CHM166 General Chemistry II 5	
IAI Social & Behavioral Science (ECO251) 3	MAT245 Calculus w/Analytic Geometry II 4	
MAT175 Calculus w/Analytic Geometry 5	PHY291 Principles of Physics I 4	
Semester Hours 16	Semester Hours 16	
Fall II	Spring II	Summer
CSC121 Computer Science I 4	CSC122 Computer Science II 4	
MAT255 Calculus w/Analytic Geometry III 5	MAT260 Differential Equations 3	
PHY292 Principles of Physics II 4	PHY293 Principles of Physics III 4	
IAI Hum/Fine Arts or Social/Beh Sci 3	* PHY294 Thermal Physics 2	
Semester Hours 16	Semester Hours 16	

* Computer Engineering, Electrical, and Engineering Physics.

Note: If additional credits are needed to reach the minimum 60 required for the AES degree, select general education courses that will satisfy both AES and UIUC requirements. Use IAI course options found in the MCC academic catalog and UIUC options noted below.

UIUC Social Science and Humanities Course Options

The College of Engineering requires 18 hours of social sciences and humanities coursework. (When selecting courses, take into consideration courses chosen to satisfy AES requirements in Humanities, Social Sciences, and Non-Western/Minority Cultures in US).

<u>Humanities (6 credits)</u> ANT155; ART150, 151, 155, 165, 171, 172, 174, 175, 176; EDU253; ENG240, 251, 253, 254, 255, 256, 260, 261, 270, 271, 272, 275, 276, 277; HIS130, 131, 132, 141, 165, 170, 172, 180; JRN180; MUS151, 153, 154, 171, 172; PHI151, 155, 160, 240, 251, 252, 261, 262; PLT281; THE151 <u>Social Science (6 credits)</u> ANT151, 160, 170; ECO150, 251, 252; GEG202, 203, 204; PHI255; PLT150, 151, 155, 251, 255; PSY151, 250, 251, 260, 265, 271, 275; SOC151, 175, 251, 260, 261; SPE251	<u>Cultures</u> NOTE: These courses may fulfill other curricular requirements (e.g., in the major, or in one of the other General Education categories) <u>Western/Comparative Cultures (3 credits)</u> ANT151; ENG253, 254, 255, 256, 260, 261, 271; HIS131, 132; MUS151 <u>Non-Western Cultures (3 credits)</u> ANT170; ART155; ENG276; GEG203; HIS165; MUS153; PHI160, 261; PLT281; SPE251 <u>US Minority Cultures (3 credits)</u> ART165; EDU255; HIS170, 172; SOC260
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