ARCHIVED COMPUTER SCIENCE ARTICULATION AGREEMENT GUIDE

Schoolcraft College – **AAS** in CIS: Programming Eastern Michigan University – **BA** in Computer Science

Schoolcraft College Courses:

Transfer to Eastern Michigan University:

Michigan Transfer Agreement (MTA) Requirements (30 credits)

Students with the MTA endorsement on their community college transcript have satisfied EMU's General Education Core Requirements and will be required to complete only the EMU General Education Application Requirements of one Perspectives on a Diverse World course, one Learning beyond the Classroom experience, and one Writing Intensive course in the major. Specific courses listed below for the MTA will also satisfy program requirements at Schoolcraft and/or EMU. For courses approved by Schoolcraft to satisfy the MTA go to Schoolcraft's website. Students who do not have a MACRAO or MTA endorsement must complete EMU's general education program.

CIS 115 * CIS 129 * CIS 290 CIS 176 * CIS 211 * CIS 221 CIS 225 * CIS 238 CIS 250 CIS 255 CNT 115 Choose 0	aft CIS: Programming Requirements (43-44 Introduction to Computer Based Systems	3 IS 215 6 COSC 111 3 BMMT 000 4 COSC 211 3 IS 000 3 COSC 231 4 IS 000 3 IA 212 3 ISAC 000 3 BMMT 000 9 University	Information Systems for Business 3 /112 Intro to Computer Programming (4)+2 6 0 University Elective 3 /212 Programming Data Structures 4 University Elective 3 Internet Based Computing 3 University Elective 4 University Elective 3 University Elective 3 University Elective 3 Electives 8-9
CIS 115 * CIS 129 * CIS 290 CIS 176 * CIS 211 * CIS 221 CIS 225 * CIS 238 CIS 250 CIS 255 CNT 115 Choose 0	Introduction to Computer Based Systems. Introduction to Programming Logic (3) and0 Object-Oriented Programming w/Java (3) Visual Basic.NET Introduction to C++ (2) and Advanced C++ (2) Database Management Systems JavaScript (Program Elective) Systems Development and Design Introduction to Linux Cybersecurity Fundamentals one of the following: CIS 170 or 178	3 IS 215 6 COSC 111 3 BMMT 000 4 COSC 211 3 IS 000 3 COSC 231 4 IS 000 3 IA 212 3 ISAC 000 3 BMMT 000	/112 Intro to Computer Programming (4)+2 6 0 University Elective 3 /212 Programming Data Structures 4 University Elective 3 Internet Based Computing 3 University Elective 4 University Elective 3 University Elective 3 University Elective 3 University Elective 3 University Elective 3
CIS 115 * CIS 129 * CIS 290 CIS 176 * CIS 211 * CIS 221 CIS 225 * CIS 238 CIS 250 CIS 255 CNT 115 Choose o	Introduction to Computer Based Systems	3 IS 215 6 COSC 111 3 BMMT 000 4 COSC 211 3 IS 000 3 COSC 231 4 IS 000 3 IA 212 3 ISAC 000 3 BMMT 000	/112 Intro to Computer Programming (4)+2 6 0 University Elective 3 /212 Programming Data Structures 4 University Elective 3 Internet Based Computing 3 University Elective 4 University Elective 3 University Elective 3 University Elective 3 University Elective 3
CIS 115 * CIS 129 * CIS 290 CIS 176 * CIS 211 * CIS 221 CIS 225 * CIS 238 CIS 250 CIS 255	Introduction to Computer Based Systems	3 IS 215 6 COSC 111 3 BMMT 000 4 COSC 211 3 IS 000 3 COSC 231 4 IS 000 3 IA 212	/112 Intro to Computer Programming (4)+2 6 0 University Elective 3 /212 Programming Data Structures 4 University Elective 3 Internet Based Computing 3 University Elective 4 University Elective 3
CIS 115 * CIS 129 * CIS 290 CIS 176 * CIS 211 * CIS 221 CIS 225 * CIS 238 CIS 250	Introduction to Computer Based Systems	3 IS 215 6 COSC 111 3 BMMT 000 4 COSC 211 3 IS 000 3 COSC 231 4 IS 000	/112 Intro to Computer Programming (4)+2 6 0 University Elective 3 /212 Programming Data Structures 4 University Elective 3 Internet Based Computing 3 University Elective 4
CIS 115 * CIS 129 * CIS 290 CIS 176 * CIS 211 * CIS 221 CIS 225 * CIS 238	Introduction to Computer Based Systems	3 IS 215 6 COSC 111 3 BMMT 000 4 COSC 211 3 IS 000 3 COSC 231	/112 Intro to Computer Programming (4)+2 6 0 University Elective 3 /212 Programming Data Structures 4 University Elective 3 Internet Based Computing 3
CIS 115 * CIS 129 * CIS 290 CIS 176 * CIS 211 * CIS 221 CIS 225	Introduction to Computer Based Systems	3 IS 215 6 COSC 111 3 BMMT 000 4 COSC 211 3 IS 000	/112 Intro to Computer Programming (4)+2 6) University Elective 3 /212 Programming Data Structures 4 University Elective 3
CIS 115 * CIS 129 * CIS 290 CIS 176 * CIS 211 * CIS 221	Introduction to Computer Based Systems Introduction to Programming Logic (3) and0 Object-Oriented Programming w/Java (3) Visual Basic.NET Introduction to C++ (2) and Advanced C++ (2)	3 IS 215 6 COSC 111 3 BMMT 000 4 COSC 211	/112 Intro to Computer Programming (4)+2
CIS 115 * CIS 129 * CIS 290 CIS 176 * CIS 211	Introduction to Computer Based Systems Introduction to Programming Logic (3) and0 Object-Oriented Programming w/Java (3) Visual Basic.NET Introduction to C++ (2) and	3 IS 215 6 COSC 111 3 BMMT 000	/112 Intro to Computer Programming (4)+2
CIS 115 *CIS 129 *CIS 290 CIS 176	Introduction to Computer Based SystemsIntroduction to Programming Logic (3) and0 Object-Oriented Programming w/Java (3)Visual Basic.NET	3 IS 215 6 COSC 111	/112 Intro to Computer Programming (4)+26
CIS 115 *CIS 129 *CIS 290	Introduction to Computer Based SystemsIntroduction to Programming Logic (3) and Object-Oriented Programming w/Java (3)	3 IS 215 6 COSC 111	/112 Intro to Computer Programming (4)+26
CIS 115 *CIS 129	Introduction to Computer Based SystemsIntroduction to Programming Logic (3) and0	3 IS 215	
CIS 115	Introduction to Computer Based Systems		Information Systems for Business 3
			Information Contains for Desirate
^	6 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	\	
These cou	urses apply, but do <u>not</u> satisfy the MTA: BUS 240; CC	D 217; EDUC 20	0; SPE 100
202, 203, 2	204; Social Sciences: ANTH 112, 201, 214; GEOG 133;	HIST 138; POLS	S 207, 209; SOC 210
	urses also satisfy an MTA area: Natural Science: BIOI		
	spectives on a Diverse World requirement: Complete	•	
	complete additional courses in any of the above cate	•	
	e from the approved MTA list		Electives
	e one of the following: POLS 105; PSYCH 153 or 201 .3-	4 University	Electives
	ocial Science courses from different disciplines	o omvorsity	U
	e from the approved MTA list		Electives
	103 Fundamentals of Speech	3 CTAC 124	Foundations of Speech Communication
	e from the approved MTA list7- umanities courses from different disciplines	o University	Elective
	atural Science courses from different disciplines (on		Floative 7.0
	126 College Algebra (in place of MATH 102, 113)		College Algebra4
	rse in Mathematics		
	02 English Composition 2	3 University	Elective3
	ond Course in English Composition or Communication	on	
ENG 10			
ENG 10 2. A Seco ENG 10	rse in English Composition 01 English Composition 1	3 University	Elective3

^{*} This course is required for EMU's Computer Science Major-Applied.

<u>Sign up with us:</u> If you let us know you are using this articulation agreement, we can stay in touch with you and provide information and advising to you while you are still at your community college.

ARCHIVED COMPUTER SCIENCE ARTICULATION AGREEMENT GUIDE

Schoolcraft College – **AAS in CIS: Programming**Eastern Michigan University – **BA in Computer Science**

Completion of EMU's BA in Computer Science

<u>Science</u>		
Major Red	quirements	(34 credits)
Required Co	omputer Science Courses (22 cre	edits)
COSC 221	Computer Organization I	3
COSC 311	Algorithms and Data Structures	4
	Computational Discrete Structures.	
COSC 341	Programming Languages	4
	Software Engineering Solutions	
COSC 481V	N Software Engineering and Senior	r Project3
Restricted	d Electives (12 credits)	
COSC 374	Applied Cryptography	
COSC 421	Systems Programming	
COSC 423	Computer Operating Systems	
	Software Dvlpmnt for Mobile Device	es
	Web Programming	
COSC 439	Computing Network Principles	
COSC 445	•	
COSC 456	•	
COSC 457	1 5 5	
COSC 461	Heuristic Programming	
COSC 471	Database Principles	
	courses from below or above, not a	lready taken
	Symbolic Computing	
COSC 321	Computer Organization II	

LBC Requirement

Students must complete one Learning Beyond the Classroom course or noncredit experience offered by EMU. Consult advisor for options.

Minor Requirement (15-20 credits)

Students must complete a minor of at least 20 hours. Some of those hours may be completed at SC. At least 6 credits must be completed at EMU at the 300 level or above. Some minors are more than 20 hours.

Minimum Credits at EMU:	49
Transfer Credits:	
Minimum Credits to Graduate:	

COSC 405 Switching Theory

COSC 472 Big Data I COSC 473 Big Data II COSC 480 Special Topics

COSC 411 Algorithm Design & Analysis COSC 422 Intro to Microprocessors

COSC 444 Found of Automata & Languages COSC 462 Introduction to Information Retrieval

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Schoolcraft College – AAS in CIS: Programming
Eastern Michigan University – BS in Computer Science – Applied, BS in Computer Science –
Curriculum, or a BA in Computer Science

Additional information:

- 1. Each institution will determine the satisfaction of their individual program and degree requirements. Both Schoolcraft and EMU agree to accept transferrable courses from each other and from other institutions. Schoolcraft courses indicated with an * are required for EMU's BS in Computer Science or the BA in Computer Science. Substitutions for these courses must be approved by the EMU program coordinator.
- 2. Students with the MTA endorsement on their community college transcript have satisfied EMU's General Education Core Requirements and will be required to complete only the General Education Application Requirements of one "Perspectives on a Diverse World" course, one "Learning beyond the Classroom" experience, and a "Writing Intensive" course in the major. The Perspectives on a Diverse World requirement may be transferred to EMU.

 To use the Michigan Transfer Agreement (MTA), students must have an official community college transcript, with the "MTA Satisfied" endorsement sent to EMU's Admissions Office. Students who do not have "MTA Satisfied" on their community college transcript, will be required to satisfy EMU's general education requirements as applied to transfer students. The MTA may be completed after admission to EMU, however, students should inform their advisors or they may be advised to complete additional courses for the general education program. If already on the transcript, the MACRAO designation will be accepted at EMU after August 2019.
- 3. Only courses with a grade of "C" or better (2.0 on a 4.0 scale) will be accepted for transfer to either institution.
- 4. Under this agreement, EMU will waive the 60-hour rule with at least 30 hours in EMU courses, 15 hours of which must be in program requirements at the 300-level or above. Of the last 30 hours completed before graduating, a minimum of 10 credit hours must be in courses offered by EMU. A minimum of 120 credit hours, completed in-residence or accepted in transfer, is required for graduation.
- 5. Students must satisfy all admission requirements at the time of application for admission to EMU, including submitting transcripts from all previously attended colleges. Schoolcraft students will receive equal consideration with other students for course registration and financial aid.
- 6. Students are encouraged to contact EMU's Francine Parker Advising Center before applying to EMU. To facilitate advising and the evaluation of transcripts, <u>sign up for this articulation agreement</u> and bring a copy of this articulation guide to all advising sessions.

Effective Dates: September 1, 2019 until August 31, 2022

This agreement is consistent with the 2019-2020 catalog. Students have until summer 2027 to graduate from Eastern Michigan University following this agreement. In the event that a student does not complete the program within seven years, they may be required to have their credits reevaluated using the requirements of the current articulation guide.

Contacts:

Schoolcraft College Academic Advising McDowell 175 734.462.4429 eadvise@schoolcraft.edu Eastern Michigan University
Francine Parker Advising Center
Student Center, Room 120
734.487.4599
francineparker advising@emich.edu