

ROGERS STATE UNIVERSITY

B.S. Information Technology – Artificial Intelligence

Catalog Year	Department	Major Code	Required Hours
2025-2026	Technology & Justice Studies	BTAI	123
GENERAL EDUCATION REQUIREMENTS (44 Credit Hours)			
Code	Title	Credit Hours	
First Year Experience: 2 Credit Hours			
UNIV 1152	The University Experience	2	
Communications: 9 Credit Hours			
ENGL 1113	Composition I	3	
ENGL 1213	Composition II	3	
SPCH 1113	Speech Communication	3	
Social and Behavioral Sciences: 9 Credit Hours			
HIST 2483 or HIST 2493	American History to 1877 American History Since 1877	3	
POLS 1113	American Federal Government	3	
Choose one course from the social science general education list - PSY 1113 Introduction to Psychology Recommended		3	
Science and Mathematics: 12 Credit Hours			
BIOL XXX3	Biological Science w/Lab	4	
PHYS XXX3	Physical Science w/Lab	4	
MATH 1513 (or Higher)	College Algebra	3	
Humanities: 6 Credit Hours			
Choose two courses from the Humanities General Education list - ART 1113 Art Appreciation & HUM 2893 Cinema Recommended		6	
Global Studies: 3 Credit Hours			
Choose one course from the Global Studies General Education list - MGMT 3013 Conflict Resolution Recommended		3	
Elective: 3 Credit Hours			
Analytical Geometry and Calculus I		3	
All Major Requirements must be completed with grade a C or higher			
Mathematics for AI (3 Hours)			
MATH 1613	Trigonometry	3	
MAJOR REQUIREMENTS (77 Credit Hours)			
Code	Title	Credit Hours	
Program Core (35 Hours)			
CS 1113	Microcomputer Applications	3	
CS 1213	Introduction to Computing	3	
CS 2223	Programming I	3	
CS 2323	Programming II	3	
CS 3223	Data Modeling	3	

CS 3413	Systems Analysis	3
CS 3623	Human-Computer Interface Development	3
IT 1411	Orientation to Computer Technology	1
IT 2143	Introduction to Networking	3
IT 2153	Network Operating Systems I	3
IT 3723	Computer Architecture	3
IT 4504	Practicum and Capstone	4
<i>Artificial Intelligence Option (42 Hours)</i>		
CS 3363	Data Structures	3
CS 3303	Python Programming	3
CS 3423	Software Engineering	3
CS 1323	Introduction to Artificial Intelligence	3
CS 2513	Formal Languages and Automata	3
CS 2643	AI Ethics and Society	3
CS 3523	Artificial Intelligence	3
CS 3643	Machine Learning Fundamentals	3
CS 3663	Information Retrieval and Analysis	3
CS 3753	Data Mining and Analytics	3
CS 3863	Natural Language Processing (NLP)	3
CS 4643	Deep Learning	3
CS 4753	Computer Vision	3
CS 4823	Special Problems in Natural Language Processing	3

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Plan of Study

	FIRST SEMESTER			SECOND SEMESTER		
	Code	Title	Hours	Code	Title	Hours
FRESHMAN	UNIV 1152	The University Experience	2	MATH 1503	Mathematics for Critical Thinking	3
	ENGL 1113	Composition I	3	POLS 1113	American Federal Government	3
	IT 1411	Orientation to Computer TECH	1	CS 1323	Introduction to Artificial Intelligence	3
	MATH 1513	College Algebra	3	MATH 1613	Trigonometry	3
	CS 1213	Introduction to Computing	3	CS 2223	Programming I	3
	ART 1113	Art Appreciation	3			
	Credit Hours		15	Credit Hours		15
SOPHOMORE	THIRD SEMESTER			FOURTH SEMESTER		
	ENGL 1213	Composition II	3	BIOL XXX3	Biological Science w/Lab	4
	CS 2323	Programming II	3	CS 2513	Formal Languages and Automata	3
	CS 1113	Microcomputer Applications	3	HIST 24XX	American History Gen-Ed	3
	CS 3413	Systems Analysis (F)	3	CS 3003	Python Programming	3
	MATH 2264	Analytical Geometry and Calculus I	3	CS 3363	Data Structures	3
	Credit Hours		15	Credit Hours		16
JUNIOR/CS	FIFTH SEMESTER			SIXTH SEMESTER		
	IT 2143	Introduction to Networking	3	CS 3643	Machine Learning Fundamentals	3
	CS 3303	Software Engineering(F)	3	HUM 2893	Cinema	3
	CS 3223	Data Modeling (F)	3	CS 3753	Data Mining and Analytics	3
	CS 2643	Artificial Intelligence Ethics and Society	3	PHYS XXX4	Physical Science w/Lab	4
	CS 3523	Artificial Intelligence	3	IT 2153	Network Operating Systems I	3
	Credit Hours		15	Credit Hours		16
SENIOR	SEVENTH SEMESTER			EIGHTH SEMESTER		
	CS 3863	Natural Language Processing	3	CS 3623	Human Computer Interface – Development (S)	3
	CS 4753	Computer Vision	3	CS 3663	Information Retrieval and Analysis	3
	IT 3723	Computer Architecture	3	CS 4643	Deep Learning	3
	IT 4504	Practicum & Capstone	4	CS 4823	Special Problems in Natural Language Processing	3
	PSY 1113	INTRO to Psychology	3			
	Credit Hours		16	Credit Hours		12

“F” Denotes Fall Semester Only

“S” Denotes Spring Semester Only

CS 1213 - Introduction to Computing is a prerequisite for CS 2223

Math 1513 – College Algebra is a prerequisite for CS 1323

CS 2223 - Programming I is a prerequisite for CS 3223, CS 3413, & CS 3623

CS 2323 - Programming II is a prerequisite for CS 3333, CS 3363, & CS 3733

MATH 2264 - Analytical Geometry and Calculus I is a prerequisite for CS 2513

CS 1323 – Introduction to Artificial Intelligence is a prerequisite for CS 2643

CS 3003 Python Programming is a prerequisite for CS 3523 & CS 3663

CS 3413 System Analysis is a prerequisite for CS 3423

CS 3523 Artificial Intelligence is a prerequisite for CS 3643 & CS 3863

CS 3223 Data Modeling is a prerequisite for CS 3753

CS 3753 Data Mining and Analytics is a prerequisite for CS 3863

CS 3643 Machine Learning Fundamentals is a prerequisite for CS 4643 & CS 4753

CS 3863 Natural Language Processing is a prerequisite for CS 4823

Contact Information

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