

# **BACHELOR OF SCIENCE COMPUTER SCIENCE**

Computer Science students develop an ability to design, implement and evaluate computer based solutions that solve real world problems. Computer Science provides engaging learning experiences designed to help students pursue careers that contribute to the technological advancement of the world. Graduates of the program are prepared for careers in a wide variety of fields such as software engineering, information security, data science, web development, networking, and artificial intelligence and machine learning.

*College of  
Science,  
Engineering,  
and Technology*



## COURSE TYPE DESCRIPTIONS

General Education Core	GEC	<b>General Education Core (GEC)</b> courses are courses that every student must take in order to obtain a degree from Jackson State University. GEC courses are essential to every undergraduate degree at Jackson State University. Collectively, there are 30 credit hours of GEC course requirements.
General Education Pathway	PATH	<b>General Education Pathway (PATH)</b> courses are courses that are connected through interdisciplinary themes and are selected at the student's discretion to fulfill the general education curriculum. Through experiential learning and reflective writing, students will have the opportunity to integrate knowledge across courses, develop their skills and an enhanced sense of civic responsibility. Students select nine (9) hours from the pathway of choice. Each pathway concludes with a related one (1) credit hour a University Required (UR) course.
University Required	UR	<b>University Required (UR)</b> courses are courses that are specific to Jackson State University and are designed to integrate students within the Jackson State University community by promoting student success resources, strategies and high impact practices.
Degree Program Requirement	DPR	<b>Degree Program Required (DPR)</b> courses are courses that are required for completion of a degree program within the specified major.
Electives	DPE or GEL	<b>Electives</b> are courses selected at a student's discretion and provide opportunities for students to pursue their academic interests. There are two types of electives. <b>Degree Program Elective (DPE)</b> courses are elective courses that are partially restricted such that students select courses from a specified group of identified courses (e.g., departmental elective courses) to fulfill a particular requirement. <b>General Elective (GEL)</b> courses are courses that may be selected from any program for which the student has fulfilled the proper prerequisites.
Professional Concentrations	PC	<b>Professional Concentration (PC)</b> courses complement Degree Program Required courses and allow students to have a concentrated area of study within the major.

**COLLEGE OF  
SCIENCE, ENGINEERING, AND TECHNOLOGY  
COMPUTER SCIENCE**

**FRESHMAN YEAR FALL 1ST SEMESTER**

COURSE	COURSE TITLE	CREDIT HOURS	COURSE TYPE	GRADE	SUCCESS MARKER/NOTE
UNIV 100	University Success	2	UR		
ENG 104	Composition I	3	GEC		
MATH 241	Calculus I	3	GEC		
CSC 118	Computer Science I	3	DPR		
	Humanities & Fine Arts Option	3	GEC		
	Social & Behavioral Science Option	3	GEC		
	<b>TOTAL CREDIT HOURS</b>	<b>17</b>	<b>TERM GPA:</b>		

Comments: \_\_\_\_\_

**FRESHMAN YEAR SPRING 2nd SEMESTER**

COURSE	COURSE TITLE	CREDIT HOURS	COURSE TYPE	GRADE	SUCCESS MARKER/NOTE
CSC 119	Computer Science II	3	DPR		
CSC 225	Discrete Structures	3	DPR		
MATH 242	Calculus II	3	DPR		
ENG 105	Composition II	3	GEC		
	Pathway Option	3	PATH		
	<b>TOTAL CREDIT HOURS</b>	<b>15</b>	<b>TERM GPA:</b>		

Comments: \_\_\_\_\_

**SOPHOMORE YEAR FALL 1ST SEMESTER**

COURSE	COURSE TITLE	CREDIT HOURS	COURSE TYPE	GRADE	SUCCESS MARKER/NOTE
EN 212	Digital Logic	3	DPR		
ENL 212	Digital Logic Lab	1	DPR		
CSC 228	Data Structures & Algorithms	3	DPR		
MATH 243	Calculus III	3	DPR		
	Natural Science Option w/Lab	3	GEC		
	Pathway Option	3	PATH		
	<b>TOTAL CREDIT HOURS</b>	<b>16</b>	<b>TERM GPA:</b>		

Comments: \_\_\_\_\_

**SOPHOMORE YEAR SPRING 2ND SEMESTER**

COURSE	COURSE TITLE	CREDIT HOURS	COURSE TYPE	GRADE	SUCCESS MARKER/NOTE
UNIV 200	Civic Engagement	1	UR		
CSC 215	Data Analytics	3	DPR		
CSC 216	Computer Architecture & Organization	3	DPR		
CHEM 141 & CHML 141	General Chemistry I & Lab	4	GEC		
MATH 307	Probability & Statistics	3	DPR		
	Pathway Option	3	PATH		
	<b>TOTAL CREDIT HOURS</b>	<b>17</b>	<b>TERM GPA:</b>		

Comments: \_\_\_\_\_

JUNIOR YEAR FALL 1ST SEMESTER					
COURSE	COURSE TITLE	CREDIT HOURS	COURSE TYPE	GRADE	SUCCESS MARKER/NOTE
CSC 325	Operating Systems	3	DPR		
CSC 350	Organization of Programming Language	3	DPR		
CSC 390	Computer Science Seminar	1	DPR		
PHY 211 & PHYL 211	General Physics & Lab	4	DPR		
	Humanities & Fine Arts Option	3	GEC		
	TOTAL CREDIT HOURS	14	TERM GPA:		
Comments:					
JUNIOR YEAR SPRING 2ND SEMESTER					
COURSE	COURSE TITLE	CREDIT HOURS	COURSE TYPE	GRADE	SUCCESS MARKER/NOTE
CSC 323	Algorithm Design & Analysis	3	DPR		
CSC 330	Database Systems	3	DPR		
CSC 360	Client Server Programming	3	DPR		
	Humanities & Fine Arts Option	3	GEC		
	Social & Behavioral Science Option	3	GEC		
	TOTAL CREDIT HOURS	15	TERM GPA:		
Comments:					
SENIOR YEAR FALL 1ST SEMESTER					
COURSE	COURSE TITLE	CREDIT HOURS	COURSE TYPE	GRADE	SUCCESS MARKER/NOTE
CSC 435	Computer Networks	3	DPR		
CSC 437	Computer Security	3	DPR		
CSC 475	Software Engineering	3	DPR		
	Computer Science Elective I	3	DPE		
	Computer Science Elective II	3	DPE		
	TOTAL CREDIT HOURS	15	TERM GPA:		
Comments:					
SENIOR YEAR SPRING 2ND SEMESTER					
COURSE	COURSE TITLE	CREDIT HOURS	COURSE TYPE	GRADE	SUCCESS MARKER/NOTE
CSC 450	Senior Project	3	DPR		Spring Only
	Computer Science Elective III	3	DPE		
	Computer Science Elective IV	3	DPE		
	Computer Science Elective V	3	DPE		
	TOTAL CREDIT HOURS	12	TERM GPA:		
Comments:					

TOTAL HOURS: 121 REQUIRED

Candidates that transfer 12 or more hours of college credit are exempt from UNIV 100: University Success; however, the student must take 2 hours of general electives to replace UNIV 100.

Student Signature: \_\_\_\_\_ Advisor Signature: \_\_\_\_\_