



**Bachelor of Science in Computer Science (CSCI)**

**First Year**

**Fall Semester**

Code	Title	Credits	Prerequisites	Corequisites
CULT200	Introduction to Arab - Islamic Civilization	3		
MATH210	Calculus II	3	MATH161-MATH160	
CSCI205	Computer Science Overview	3	ENGL101	
MATH225	Linear Algebra with Applications	3	MATH160-ENGL051-MATH161	
ENGL201	Composition and Research Skills	3	ENGL151	
CSCI200	Introduction to Computers	3	ENGL051	
Total		18		

**Spring Semester**

Code	Title	Credits	Prerequisites	Corequisites
ENGL251	Communication Skills	3	ENGL201	
MATH260	Discrete Mathematics	3	MATH225	
ARAB200	Arabic Language and Literature	3		
	Elective	3		
CSCI250	Introduction to Programming	3	CSCI205-CSCI200	ENGL101-CSCI250L
CSCI250L	Introduction to Programming Lab	1	CSCI205-CSCI200	ENGL101-CSCI250
Total		16		

**Second Year**

**Fall Semester**

Code	Title	Credits	Prerequisites	Corequisites
CSCI300	Intermediate Programming with Objects	3	CSCI250L-CSCI250	CSCI300L
CSCI300L	Intermediate Programming with Objects Lab	1	CSCI250	CSCI300
CSCI342	Fundamentals of Networking Technologies	3	CSCI250	
CSCI335	Database Systems	3	CSCI250	
CSCI345	Digital Logic	3	CSCI250	
CSCI373	Robotics Design & Coding	3	CSCI250	
Total		16		

**Spring Semester**

Code	Title	Credits	Prerequisites	Corequisites
CSCI380	Software Engineering	3	ENGL201-CSCI335	
CSCI378	Data Structures and Algorithms	3	CSCI300	
CSCI392	Computer Networks	3	CSCI342	
CSCI351	Concepts of Programming Languages	3	CSCI300	
CSCI390	Web Programming	3	CSCI335-CSCI300	
	Elective	3		
Total		18		

**Third Year**

**Fall Semester**

Code	Title	Credits	Prerequisites	Corequisites
CSCI435	Computer Architecture	3	CSCI345	

CSCI441	Machine Learning	3	CSCI378	
CSCI430L	Operating Systems Lab	1	CSCI300	CSCI430
CSCI430	Operating Systems	3	CSCI300	CSCI430L
MATH310	Probability & Statistics for Scientists & Engineers	3	MATH210-ENGL201	
	Elective	3		
Total		16		

### Spring Semester

Code	Title	Credits	Prerequisites	Corequisites
	Elective	3		
CSCI475	Artificial Intelligence	3	CSCI378	
	Elective	3		
CSCI490	Information System Development	3	CSCI390-CSCI380	
CSCI452	Topics in Computer Science	1	CSCI390	
MATH375	Numerical Methods for Scientists & Engineers	3	MATH225	
Total		16		

### Major Elective Courses

Code	Title	Credits	Prerequisites	Corequisites
CSCI362	Network Security	3	CSCI342-CSCI300	
CSCI370	Visual Programming	3	CSCI335-CSCI300	
CSCI372	Natural Language Processing	3	CSCI300	
CSCI373	Robotics Design & Coding	3	CSCI250	
CSCI410	Mobile Application	3	CSCI300-CSCI335	
CSCI426	Web Programming Advanced	3	CSCI390	
CSCI441	Machine Learning	3	CSCI378	
CSCI443	Game Development	3	CSCI378	
CSCI454	Advanced Robotics	3	CSCI373	