

BS (4 Years) Computer Science

(4 Years)
8 Semesters

Total Credit Hours 120

Admission Requirements

The minimum requirements for admission in a bachelor's degree program in any computing program is any of the of following:

- At least 50% marks in the Intermediate (HSSC) examination with Mathematics or equivalent qualification with Mathematics, certified by IBCC.
- OR
- At least 50% marks in the Intermediate (HSSC) examination with pre-Medical or equivalent qualification, certified by IBCC. Deficiency: "Students with pre-medical, must have to pass deficiency courses of Mathematics of 6 credit hours in first two semesters."

Scheme of Studies BS Computer Science

Semester 1			
COURSE CODE	COURSE TITLE	COURSE TYPE	CREDIT HOURS
CS-311	Fundamental of ICT	Major	03(2+1)
	English-I	General Education	03(3+0)
	Islamic Studies	General Education	03(3+0)
	QR-I	General Education	03(3+0)
	Arts and Humanities-I (Languages)	General Education	03(3+0)
Semester 2			
CS-321	Programming Fundamentals	Major	03(2+1)
	English-II	General Education	03(3+0)
	Pakistan Studies	General Education	03(3+0)
	Arts and Humanities-II	General Education	03(3+0)
	QR-II	General Education	03(3+0)
Semester 3			
CS-411	Object Oriented Programming	Major	03(2+1)
BSCS-411	Theory of Automata	Major	03(3+0)
	English-III	General Education	03(3+0)
	Natural Sciences-I	General Education	03(3+0)
	Social Sciences-I	General Education	03(3+0)

Semester 4			
COURSE CODE	COURSE TITLE	COURSE TYPE	CREDIT HOURS
CS-421	Data Structure and Algorithms	Major	03(2+1)
CS-422	Introduction to Software Engineering	Major	03(3+0)
	CS Supporting-I	Major	03(3+0)
	Social Sciences-II	General Education	03(3+0)
	Natural Sciences-II	General Education	03(2+1)
Semester 5			
BSCS-511	Digital Logic Design	Major	03(2+1)
BSCS-512	Design and Analysis of Algorithms	Major	03(3+0)
BSCS-513	Comp Organization & Assembly Lang.	Major	03(3+0)
CS-514	Operating Systems	Major	03(2+1)
	CS Supporting-II	Major	03(3+0)
Semester 6			
CS-521	Database Systems	Major	03(2+1)
CS-522	Human Computer Interaction	Major	03(3+0)
BSCS-521	Compiler Construction	Major	03(3+0)
CS-523	Computer Networks	Major	03(2+1)
	CS Elective-I	Major	03(3+0)
Semester 7			
BSCS-611	Parallel and Distributed Computing	Major	03(2+1)
BSCS-612	Artificial Intelligence	Major	03(2+1)
BSCS-621	FYP-I CS	Major	03(0+3)
	CS Elective II	Major	03(3+0)
	CS Elective III	Major	03(3+0)
Semester 8			
CS-621	Information Security	Major	03(2+1)
CS-622	Professional Practices	Major	03(2+1)
BSCS-621	FYP-II CS	Major	03(0+3)
	CS Elective IV	Major	03(3+0)
	CS Elective V	Major	03(0+3)