

B.S. in Computer Science

knowledge (aerospace, aviation, business, communications, human factors, mathematics, etc.), or further depth in computer science or related disciplines.

BS in Computer Science – Standard Program Requirements

Students should be aware that several courses in each academic year may have prerequisites and/or corequisites (check the course descriptions before registering for classes to ensure requisite sequencing).

See the Common Year One outline in the Engineering Fundamentals Program Introduction.

Suggested Plan of Study

Year One

	Credits
See the Common Year One outline in the College of Engineering introduction.	33
Credits Subtotal	33.0

Year Two

CEC 220	Digital Circuit Design	3
CEC 222	Digital Circuit Design Laboratory	1
	HU/SS Lower Level	3
COM 219	Speech	3
SE 300	Software Engineering Practices (with Lab)	3
MA 412	Probability and Statistics	3
CEC 320	Microprocessor Systems	3
CEC 322	Microprocessor Systems Laboratory	1
COM 221	Technical Report Writing	3
CS 344	C Programming and UNIX	3
	Physical and Life Sciences *	4
Credits Subtotal		30.0

Year Three

CS 362	Computing Theory	3
CS 315	Data Structures and Analysis of Algorithms	3
CS 332	Organization of Programming Languages	3
CS 420	Operating Systems	3
	HU/SS 300/400 Level	3
	Open Elective	6
CS 303	Cryptography and Network Security	3
CS 317	Files and Database Systems	3
CS 455	Artificial Intelligence	3
Credits Subtotal		30.0

Year Four

CEC 470	Computer Architecture	3
CS 462	Computer Networks	3
	Specified Electives **	9
CS 490	Computer Science Capstone Design I	3
CS 432	Information and Computer Security	3
	Open Elective	3
CS 491	Computer Science Capstone Design II	3
Credits Subtotal		27.0
Credits Total:		120

* Select one lecture course and one lab combination from the following list: BIO 120 and 120L, or CHM 110 and 110L, or PS 224 and PS 224L, or PS 226 and 226L, or PS 250 and PS 253.

** Courses to be selected, with the approval of the program coordinator, to support acquiring a minor, an identified concentration of domain