

BS Computer Science

2019-20

What can you do with a BS in Computer Science from SPU?

The BS in Computer Science is the traditional degree in computer science that emphasizes the mathematical and engineering foundations of computing along with software design and development. It prepares you for graduate study or a career in computer science. **Potential occupations** include:

- Computer Game Designer
- Computer Security Investigator
- Information Security Manager
- Internet Applications Programmer
- Network Administrator
- Network Analyst
- Programmer Analyst
- Software Developer
- Software Engineer

- Systems Programmer
- Virtual Reality Programmer
- Web Developer

Suggested Transfer Preparation at Edmonds Community College

Associate in Science-Transfer (AS-T) Track 2 or Associate in Arts Direct Transfer Agreement (DTA) with careful selection of distribution courses and electives to complete the courses listed below. C++ courses are preferred but not required.

Majors with similar requirements in first two years

BS in Computer Engineering

Courses in the major you may complete at Edmonds Community College

Edmonds Community College Courses	Equivalent SPU Courses	
CS& 131 Computer Science I C++ (5)	CSC 1230 Problem Solving & Programming (5)	
CS 132 Computer Science II C++ (5)	CSC 2430 Data Structures I (5)	
CS 133 Computer Science III C++ (5)	CSC 2431 Data Structures II (5)	
MATH& 151 Calculus I (5)	MAT 1234 Calculus I (5)	
MATH& 152 Calculus II (5)	MAT 1235 Calculus II (5)	
MATH& 153 Calculus III (5)	MAT elective unless MATH& 254 is completed too (5)	
MATH& 254 Calculus IV (5)	MAT 1236 Calculus III (5) if MATH& 153 is also	
	completed	
MATH& 146 Intro to Statistics (5)	MAT 2360 Intro to Stats for Sciences (5)	
MATH 272 Linear Algebra (5)	MAT 2401 Linear Algebra (5)	
PHYS& 221 Engineering Physics I (5)	PHY 1121 Physics for Science & Engineering (5)	
PHYS& 222 Engineering Physics II (5)	PHY 1122 Physics for Sci & Eng II (5) if with PHYS&	
	223	
PHYS& 223 Engineering Physics III (5)	PHY 1123 Physics for Sci & Eng III(5) if with PHYS&	
	222	

Note: Completion of these courses is not required for transfer, but will aid in timely completion of your degree. Only courses with a regular grade of 1.7 (C-) or higher may count toward a major or minor.

Consult with SPU Computer Science faculty for additional Edmonds CC courses that transfer

Admission to the Major

Admission to this major is guaranteed for transfer students admitted to SPU. Once you begin classes at SPU, complete the Major Application form in the Banner Information System to formalize your acceptance to the major.

Learn more about the BS in Computer Science:

http://spu.edu/computer-sci-engineering http://spu.edu/computer-science-bs-regs

Courses in the major to complete at SPU

EE 1210 Intro to Logic System Design (5)				
CSC 3150 Systems Design (5)				
CSC 3220 Applications Programming (3)				
CSC 3221 Netcentric Computing (3)				
CSC 3310 Concepts in Programming Languages				
(3)				
CSC 3350 Operating Systems Programming (3)				
CSC 3430 Algorithm Design & Analysis (3)				
CSC 3760 Computer Org and Assembly Language				
(5)				
CSC 4898 Senior Capstone in CSC (2)				
MAT 2720 Discrete Mathematics (5)				
CPE/EE 3280 Microcontroller System Design (5)				
CSC 3000 CSC Internship Preparation (1)				
CSC 4151 Software Engineering I (3)				
CSC 4152 Software Engineering II (3)				
CSC 4941 (1) CSC Internship Review (1)				
Technical Electives (3 courses; at least 9 credits)				
In addition to the major, the degree requires				
completion of any remaining general education and				
University requirements, and at least 180 college-				
level credits total, including 60 upper-division (UD)				
credits.				

University Foundations Requirement

All students must complete the University Foundations Requirement at SPU—even those who have completed the Direct Transfer Agreement (DTA) Associate Degree.

Students admitted with fewer than 90 credits (freshmen and sophomores) complete 15 credits:

UFDN 1000 The Christian Faith (5) UFDN 2000 Christian Scriptures (5) UFDN 3100 Christian Theology (5)

Students admitted with 90 credits or more (juniors and seniors) complete 10 credits: UFDN 3001 Christian Scriptures (5) UFDN 3100 Christian Theology (5)

Suggested course plan for your junior and senior years at SPU

Assumes satisfactory completion of CS& 131, CS 132, CS 133, MATH& 151, MATH& 152, MATH& 153, MATH& 254, MATH& 146, MATH 272, PHYS& 221, PHYS& 222, and PHYS& 223 prior to transfer.

Junior Year				
AUTUMN	WINTER	SPRING	NOTES	
 EE 1210 (5 credits) CSC 3000 (1) UFDN 3001 (5) +4-7 	 CSC 3220 (3) CSC 3760 (5) UFDN 3100 (5) + 2-5 	 CSC 3221 (3) CSC 3150 (5) MAT 2720 (5) +2-5 Apply to graduate! 	 Complete 45 credits total this year Apply to the major when you have met minimum admission requirements 	
ANY QUARTER UFDN, General Education and University Requirements as needed. Begin to work on technical electives. Senior Year			Internship: 200+ hours (usually occurs in the summer between junior and senior year)	
AUTUMN	WINTER	SPRING	NOTES	
 CSC 3310 (3) CSC 4898 (2) CSC 4941 (1) CSC Tech Elective (3-5) + 6-9 credits ANY QUARTER	 CSC 3430 (3) CSC 4151 (3) CSC Tech Elective (3-5) +7-9 credits 	 CSC 3350 (3) CPE/EE 3280 (5) CSC Tech Elective (3-5 credits) CSC 4152 (3) 	 Be sure to complete at least 3 technical electives courses totaling at least 9 credits. Be sure you take enough credits to total 180, with at least 60 numbered 3000-4999. 	
UFDN, General Education and University Requirements, as needed				

Get more information about transfer admission to Seattle Pacific University at: http://spu.edu/transfer Questions? Contact transfer@spu.edu