COMPUTER SCIENCE

What can I do with a major in computer science?

Students interested in software programming, developing new software applications, or using computer technology to solve problems in other fields may choose to study computer science. Closely related majors include computer engineering and applied computing. Computer engineering focuses on hardware development, and applied computing is designed to help students apply computer technology to other practical or academic fields. Some common concentrations within the computer science major include:

- Artificial intelligence
- Computer systems
- Information systems
- Scientific computing
- Software design and engineering
- Web development

Computer science is a growing and usually well-compensated field. Students majoring in computer science will find that there are many possible applications of their degree beyond the technology sector, including in health care, general business, education, and government. Possible jobs for a student who majors in computer science include:

- Computer programmer
- Software engineer
- Software developer
- Systems administrator
- Network administrator
- Web designer

How can I prepare at Seattle Central for a major in computer science?

Students planning to major in computer science at a baccalaureate institution usually take courses in **computer programming, calculus, calculus-based physics, and possibly additional math, science, or computer programming classes, as well as general education requirements,** to prepare to transfer. Specific requirements can vary substantially depending on the transfer university, so it is strongly recommended that students work with an advisor at Seattle Central as well as advisors at the universities where they are considering transferring to ensure they take the appropriate classes to be prepared to enter the major when they transfer.

Students planning to major in computer science should meet with an advisor to determine which degree is best for them. It is possible to meet the prerequisite requirements for computer science by following the Associate of Science – Option #2 degree, the Associate of Science – DTA degree, or even the Associate of Arts – DTA degree.

Tips for Success as a Computer Science Major

- Check prerequisites, admission requirements, and GPA requirements at your intended transfer university early so you can be well-prepared to transfer. Prerequisite requirements may vary considerably depending on the university, so researching your potential transfer universities early will give you plenty of time to take the necessary classes.
- Students planning to study computer science will need to take several sequences of courses, for example, a three-quarter sequences of calculus and at least two progressive courses in computer programming. Some programs may also require multiple courses in calculus-based physics or other sciences. Check prerequisites for these courses, start early, and make sure to complete the entire sequence at the same college.
- Math is key to preparing for the computer science major. If it has been a while since you took math or you feel your math skills are not strong, you should start working on math immediately.
- Check both university *admission* and *graduation* requirements at your preferred transfer university as a guide to choosing your classes. Some universities, for example, may require a year of foreign language as a graduation requirement. It may be much easier (and cheaper!) to meet that requirement at Seattle Central rather than waiting until later.

Where can I earn a bachelor's degree in computer science in Washington?

Many universities offer computer science as an undergraduate major. You can use the College Navigator search engine found at http://nces.ed.gov/collegenavigator/ to find computer science programs in Washington State or around the country.

Next Steps:

- Research the universities you are interested in attending and the prerequisite classes they require for your major.
- Meet with an advisor to choose a transfer degree, discuss prerequisites, and plan what classes you need to take in the next quarter or two.
- Explore the professional organizations in your area of interest for more information about education and career options.