

Upon successful completion of the Computer Science / A.S. Degree Program, graduates will be able to:

1. Define and explain the major components of a computing system such as data representation, hardware, low-level and high-level programming languages, algorithms, abstract data types, operating systems, networking, and application software.
2. Demonstrate proficiency in an object-oriented programming language with the ability to independently analyze a moderately complex problem, and to design, implement and evaluate its programming solution with at least 1000 lines of code.
3. Define and explain major concepts of computer architecture including digital logical structures, logical gates, storage elements, instruction cycles, I/O implementations, subroutines, processor performance evaluation, memory hierarchy, pipelining, and multiprocessing.
4. Implement data structures including list, stack, queue, and tree.