Computer Programming and Information Technology (HEGIS 5103) see College Catalog

ASSOCIATE OF OCCUPATIONAL STUDIES DEGREE; 64 Semester Credits Required for Graduation

1ST SEMESTER
Freshman Skills Seminar
Computer Concepts and Application
Computer Architecture
Telecommunications Concepts
Programming Languages Concepts
Arts and Sciences Elective

2ND SEMESTER
Research Methods
Object-Oriented Design
Web Design
Client-Specific Relational Database
Server-Specific Relational Database
Elective Professional Course I

3RD SEMESTER
Career Development Seminar
Systems Analysis and Design
English Composition I
College Math / College Algebra
Elective Professional Course II
Elective Professional Course III

4TH SEMESTER
Advanced Math for Computer Programmers
English Composition II
Elective Professional Course IV
Elective Professional Course V
Programming - Externship with one contact hour on campus

INDUSTRY CERTIFICATIONS:
- MTA: Microsoft Technology Associate
- MCSD: Microsoft Certified Solutions Developer
- ACA: Adobe Certified Associate
- MOS: Microsoft Office Specialist

Elective Professional Courses
(Any Five Courses from the following):

Automated Office Administration
Object Oriented Languages
Unix Operating System and Shell Programming
Database Management Systems
ASP .NET Applications Development
Client-Side Web Programming
Concepts of Computer Graphics
Introduction to Web Publishing
3-D Design Applications
Advanced Web Publishing

Web Development Focus
Graphic Design Focus

OCCUPATIONS: Computer Programmer; System Analyst; Programmer-Analyst; Web Developer; Desktop Publisher; Graphic Designer; Visual Image Developer; Layout Artist
Computer Programming and Information Technology

The Associate Degree in Computer Programming and Information Technology is intended to enable individuals with little or no computer knowledge to become business application programmers and/or software analysts. The program provides a comprehensive education covering many aspects of computer science including computer architecture, programming techniques, database management and design and development of internet applications using ASP.NET. Graduates have the opportunity to specialize in web development or graphic design.

Job outlook
According to the Bureau of Labor Statistics’ Occupational Outlook Handbook, computer programmers with B.A. degrees had median pay of $74,280 per year in 2012, and there is projected to grow 8 percent from 2012 to 2022, about as fast as the average for all occupations. The median annual wage for web developers with Bachelor’s degree was $62,500 in May 2012. Employment of web developers is projected to grow 20 percent from 2012 to 2022, faster than the average for all occupations. Demand will be driven by the growing popularity of mobile devices and e-commerce.

Job Flexibility
Full-time versus part-time: Most computer programmers and web developers work 40 hours per week and overtime may be required. Those working in IT facilities open 24 hours a day may work in the evenings or overnight shifts.


SAMPLE LIST OF 2017 - 2019
EXTERNSHIP SITES • JOB PLACEMENT SITES

The Law Firm of Frederic A Nicholson
Brooklyn Community Housing Services
Brooklyn Supreme Court
Figeroux & Associates
Good News Planet
Left Forum CUNY Grad Center
Digital Oxygen Corp
New Computers, Inc.
NYC Housing Works
NYC Tech Pros
Police Officers Quarterly Magazine
The Burgess Group
Wallace Graphics
EGT Network
Amerinfosys
DELL
EGT Network, Inc. **
Ksquare IT
Liquid Technology
Omnilink Corporation
Romeo&Juliet Couture**
SGC Digital Technology
Insourc
Unysis
Weilmangus Law Firm
Global Health Care IT

** Companies that have placed ASA students in externships and jobs.