

Jurisdictional Class: Competitive  
Adopted: December 3, 1976  
Revised: May 3, 2010

## **COMPUTER PROGRAMMER**

**DISTINGUISHING FEATURES OF THE CLASS:** This position is responsible for creating and/or modifying computer programs. The work involves analyzing processes and projects proposed for computerization, systems analysis, defining end user requirements, designing, modifying, testing, debugging of programs, implementing, maintaining, and documenting appropriate software applications. An incumbent in this position operates computers and related peripheral equipment for production work on a regular basis. The position is also responsible for coordinating and implementing training methods pertaining to use of applications. The incumbent may work with more than one operating system and with more than one programming language including Visual Basic or other object-oriented/event-driven programming languages. Work is performed under the direct supervision of a higher level administrator with leeway allowed for the use of independent judgment in carrying out technical details of the work. The incumbent does related work as required.

### **TYPICAL WORK ACTIVITIES:** (Illustrative only)

Meets with employees and/or department heads and analyzes business processes and projects proposed for computerization, defines end user requirements, develops process logic and flowcharts, and determines the appropriate programming solution;

Designs software programs, prepares detailed programming instructions, and creates input and output forms, layouts, screens, file, and record layouts;

Analyzes communication requirements with other software applications;

Prepares sample test data, performs actual testing, and makes modifications, revisions, and corrections to software programs to ensure accuracy and compliance with end user needs;

Debugs new programs to assure completion according to predetermined requirements;

Supports an interface for vendor third-party software;

Operates a computer and peripheral equipment for production work;

Performs user needs assessments and develops and performs staff training on user software applications;

Trains others in the use of new programs and software;

Prepares, revises, modifies, and updates existing software systems according to agency needs;

Creates end user manuals and writes installation scripts for software;

Diagnoses and resolves software applications problems;

Attends training and other conferences related to the position;

Consults with superiors and reports problems and deviations affecting workload and scheduling;

Prepares and maintains a variety of records and reports related to the work.

## Computer Programmer

### **FULL PERFORMANCE KNOWLEDGE, SKILLS, ABILITIES & PERSONAL CHARACTERISTICS:**

Good knowledge of programming languages including Visual Basic or other object-oriented/event-driven languages;

Good working knowledge of the principles and practices of analyzing business processes and designing and developing computer programs;

Good knowledge of computer software related to storing, manipulating, and reporting on accounting and statistical data;

Working knowledge of personal computer hardware, software, and peripheral equipment;

Ability to create and modify computer programs;

Ability to perform business process analysis and design and develop object-oriented computer programs;

Ability to train others in the use of computer software;

Ability to understand and interpret complex oral instructions and written directions;

Ability to establish and maintain effective working relationships with others;

Ability to perform close, detail work involving considerable visual effort and concentration;

Ability to communicate effectively both orally and in writing.

### **MINIMUM QUALIFICATIONS:** Either:

- (a) Graduation from a regionally accredited or New York State registered four year college or university with a Bachelor's Degree, including at least twenty-four (24) credit hours in electronic data processing, computer science, computer programming, systems analysis, or related field and one (1) year of experience in Computer Programming; or
- (b) Graduation from a regionally accredited or New York State registered two year college with an Associate's Degree including at least eighteen (18) credit hours in electronic data processing, computer science, computer programming, system analysis, or related field and three (3) years of experience in Computer Programming; or
- (c) An equivalent combination of training and experience as defined by the limits of (a) and (b) above.