

# Software Engineer: Associate Principal Software Engineer

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Designs, develops, documents, tests and debugs applications software and systems that contain logical and mathematical solutions. Conducts multidisciplinary research and collaborates with equipment designers and/or hardware engineers in the planning, design, development and utilization of electronic data processing systems for product and commercial software. Determines computer user needs; analyzes system capabilities to resolve problems on program intent, output requirements, input data acquisition, programming techniques and controls; prepares operating instructions; designs and develops compilers and assemblers, utility programs, and operating systems. Ensures software standards are met.

## **Discretion/Latitude**

Work is performed without appreciable direction. Exercises considerable latitude in determining technical objectives of assignments. Completed work is reviewed for desired results from a relatively long-term perspective.

## **Knowledge, Skills, and Abilities**

Applies extensive technical expertise and has full knowledge of other related disciplines. Answers technical questions regarding products and services, and may take part in putting together proposals, configurations and product offerings.

## **Problem Solving**

Develops technical solutions to complex problems that require the regular use of ingenuity and creativity.

## **Impact**

Regularly called upon to function in a project leadership role. Erroneous decisions or recommendations would typically result in failure to achieve major organization objectives

## **Liason**

Represents the organization as the prime technical contact on contracts and projects. Interacts with senior external personnel on significant technical matters often requiring coordination between organizations.

## **Minimum Education and Experience**

10-12+ years with a BS in designated Engineering or a related field. Employees usually have an advanced degree in their field of specialization.