CLASS DESCRIPTION CLASS CODE 3804 UNIT D

SENIOR DEVELOPER

DEFINITION

Leads and is responsible for the design, build, development, upgrade and maintenance of software, web and/or mobile applications. Oversees, manages and monitors implementation of applications for the District.

TYPICAL DUTIES

Serves as the lead applications developer by managing the design, development, implementation, upgrading, configuration, and maintenance of both new and existing software and mobile applications, and provides functional and advanced technical support when required.

Leads the design and development of cloud implementation strategies for school based software applications.

Identifies, evaluates, troubleshoots and resolves application issues and oversees and guides other application developers in troubleshooting applications.

Works closely with IT software project managers, stakeholders and support staff to develop specifications and business requirements for the development of new or modifications to existing software applications.

Validates and evaluates the work of other developers and tests all development and upgrades outside of the production environment before their release into the production environment.

Collaborates with various ITD Business units and the ITD Project Management Office to develop websites' technical architecture.

Utilizes tools to design and build, interfaces, functions, and develop technical documentation to support District software applications and build custom applications.

Develops documentation and conducts training for applications.

Serves as the technical lead in database design, programming and implementation.

Manages data loads and ensures quality assurance by reviewing and evaluating work product/output.

Codes by using multiple programming languages such as Sharepoint, C#, Java, SQL, and Angular with advanced algorithms to ensure application scalability, efficiency and security.

Translates complex business requirements into workflows and specifications for creating software solutions.

Performs other related duties as assigned.

DISTINGUISHING CHARACTERISTICS AMONG RELATED CLASSES

A Senior Developer designs, develops, implements, and supports complex and critical webbased applications based on District and customer needs and modifies and maintains existing applications.

A Technical Specialist directs and manages global architecture activities, analyzes existing business practices, and develops workflow improvements and conducts feasibility studies for the development and maintenance of web applications.

A . Net Developer is responsible for the design, development, implementation, and support of .NET-based software applications and components.

SUPERVISION

Supervision is received from a Technical Specialist. Senior developer provides technical supervision to .NET or SharePoint developers.

CLASS QUALIFICATIONS

Knowledge of:

Web application/site design and development

Structured programming, object-oriented programming, and design patterns

Data management, SQL database design, and RDBMS technologies

Programming languages including .NET framework 4.5 (or higher) or .NET core 2.0 framework, including C#, ASP.NET, ASP.NET MVC, Entity Framework, ADO.NET

New trends in the field of information technology

Principles of program documentation, TFS source control management, DevOps concept, and Continuous Integration (CI)/Continuous Delivery (CD) implementation

Test-driven development and automated testing

Design of modern and responsive web UI that are cross-browser compatible.

Web related technologies including HTML, CSS, Bootstrap, JavaScript, jQuery, REST API, JSON, Ajax, TypeScript, Angular.

Report development tools such as Crystal Reports, Oracle Reports, Power BI, SQL Server Reporting Services (SSRS), SSIS, Tableau, etc.

Hybrid mobile application development using frameworks such as Cordova, React, Xamarin, Vue.is, Angular.is, and Node.is

Industry standards and best practices

Application software project life cycle

Project management principles

Ability to:

Establish programming, quality assurance standards, and practices for application development in the technical environment

Communicate clearly and concisely, both orally and in writing

Express difficult concepts in a manner that is understandable to both technical and non-technical personnel

Work effectively with all levels of District personnel and the public

Manage multiple concurrent projects

Work independently with minimal supervision

Develop test data and analyze problems in programs

Learn the characteristics of new systems and update skills to adapt to changing technology

ENTRANCE QUALIFICATIONS

Education:

Graduation from a recognized college or university with a bachelor's degree, preferably in Computer Science, Information Technology, or a related field. Additional qualifying experience may be substituted on a year-for-year basis of the required education provided that the requirement of a high school diploma or equivalent is met.

Experience:

Four years of experience in software development using two or more of the following technologies such as: C#, ASP.NET MVC, TFS, Entity Framework, REST API/Webservices, Ajax, jQuery, SharePoint, JavaScript, .Net Core, Bootstrap and modern UI design. Two years

of experience using and programming relational Databases. Mobile application development experience is preferred. Experience can be concurrent.

SPECIAL NOTES

Employees in this class may be subject to call at any hour.

This class description is not a complete statement of essential functions, responsibilities, or requirements. Entrance requirements are representative of the minimum level of knowledge, skill, and/or abilities. To the extent permitted by law, management retains the discretion to add or change typical duties of a position at any time, as long as such addition or change is reasonably related to existing duties.

New Class 08-05-21 JAP