GUILFORD COUNTY SCHOOLS JOB DESCRIPTION

JOB TITLE: PROGRAMMER/ANALYST III TECHNOLOGY SERVICES DEPARTMENT

GENERAL STATEMENT OF JOB

Under minimal supervision, provides support to the (EMS) environment throughout Guilford County Schools and performs specialized technical work in the design and development of enterprise-wide computer applications for the computer information systems in the Technology Services Department. This position will be a member of a team providing this support and works closely with the HR, Payroll, Finance, Purchasing, as well as other District Departments and schools.

This position's primary responsibility will be to provide technical assistance/expertise to the District's financial system, which entails, currently, iSeries Administration support for all iSeries running within the school district.

Primary areas of expertise should be software support, deployment and analysis using approved tools and techniques (see Minimum Training and Experience).

Employee must ensure standard quality levels are met and data integrity is maintained. Employee reports to the appropriate supervisor.

SPECIFIC DUTIES AND RESPONSIBILITIES

ESSENTIAL JOB FUNCTIONS

Function as a fully operational applications programmer for Enterprise Management Services Administration functions including patching, monitoring and tuning of the EMS environment.

Perform the full range of programming skills, including program design, coding, testing, debugging, maintenance and documentation through the use of analytical skill, experience and judgment

Provide support for the development, testing, and production instances of the Enterprise Management Services applications.

Review the enforcement of user access policies and procedures. This applies to both development and production.

Based upon user requirements, this position will be responsible for designing, modifying and maintaining specialized programs, processes, scripts and reports.

Provide support to the application resources as needed regarding design, development and problem resolution for the Enterprise Management Services applications.

Perform backup and restore operations

Uses query or business intelligence tools to create ad hoc queries and complex reports.

Maintains documentation regarding operating procedures and workflow for computer applications.

Writes interface procedures and automated processes between various database structures or computer platforms.

- Troubleshoot hardware and software problems, determines cause of error or stoppage and applies corrective steps in cases where problems can be corrected or reports problem to appropriate staff for assistance.
- Monitors new data processing projects to ensure proper function and output of computer programs.
- Develops and manages system security and backup/recovery procedures for computer applications.
- Works with operations staff to schedule processing and ensure user schedules are met.
- Works closely with users to identify/recommend/redesign business strategies to enhance computerized applications and automated processes.
- Reviews and tests software packages and makes recommendations concerning acquisitions.
- Uses development tools to write interactive web applications that support, interface with or provide end user access to various computer applications.
- Incorporates pages, forms, views in building web-based applications and automated workflow processes.
- Participates in long and short range technology planning.
- May lead or train programming staff.
- Prepares instructions to guide users and prepares instructions to guide the computer operations personnel during production runs.
- Assists users by printing special reports and forms, restoring databases, and resolving communications problems.
- Work as an active team member on various team projects and initiatives, as necessary in support of short-term and long-term team goals and initiatives

ADDITIONAL JOB FUNCTIONS

Performs other related work as required.

MINIMUM TRAINING AND EXPERIENCE

Bachelor's degree in Computer Science or related field. Related work experience may be considered as a substitute for the Bachelor's degree requirement.

Previous IT experience in Enterprise Management and administration is required, with experience as related to HR, Payroll and Benefits.

Demonstrated technical abilities and effective teamwork skills in an Enterprise Applications Systems team-centric environment.

Excellent customer service skills are required. Must be able to deal effectively with a variety of customers in a demanding and service-oriented climate.

Strong computer programming skills with experience with SQL, .NET, DB2, COBOL, and RPG.

Excellent analytical and problem-solving skills are required.

Must be organized, detail oriented and able to complete work in a timely manner with a high degree of accuracy.

Excellent knowledge of Interactive Query and methodology.

Excellent verbal and written communication skills and interpersonal skills, with a demonstrated ability to work with diverse groups.

Extensive experience with implementing cross-functional and intra-departmental projects and systems.

Excellent knowledge of Microsoft Office.

MINIMUM QUALIFICATIONS OR STANDARDS REQUIRED TO PERFORM ESSENTIAL JOB FUNCTIONS

Physical Requirements: Must be physically able to operate a variety of equipment and tools including computers, scanners, adding machines, computer software, etc. Must be able to exert up to 30 pounds of force occasionally, and/or up to 5 pounds of force frequently, and/or a negligible amount of force constantly to move objects. Physical demand requirements are in excess of those for Sedentary Work. Light Work usually requires walking or standing to a significant degree. However, if the use of arm and/or leg controls requires exertion of forces greater than that for Sedentary Work and the worker sits most of the time, the job is rated for Light Work.

<u>Data Conception</u>: Requires the ability to compare and/or judge the readily observable, functional, structural or composite characteristics (whether similar or divergent from obvious standards) of data, people or things.

<u>Interpersonal Communication:</u> Requires the ability to speak and/or signal people to convey or exchange information. Includes receiving instructions, assignments or directions from superiors.

<u>Language Ability:</u> Requires the ability to read a variety of correspondences, technical manuals, trade journals, newsletters, etc. Requires the ability to prepare reports, forms, system documentation, presentations, etc. using prescribed formats and conforming to all rules of punctuation, grammar, diction, and style. Requires the ability to speak to people with poise, voice control and confidence.

<u>Intelligence:</u> Requires the ability to apply principles of logical or scientific thinking to define problems, collect data, establish facts, and draw valid conclusions; to interpret an extensive variety of technical instructions in mathematical or diagrammatic form; and to deal with several abstract and concrete variables.

<u>Verbal Aptitude</u>: Requires the ability to record and deliver information, to explain procedures, to give oral and written instructions. Must be able to communicate effectively and efficiently in a variety of technical or professional languages including computer terminology.

<u>Numerical Aptitude:</u> Requires the ability to utilize mathematical formulas; to add and subtract; multiply and divide; utilize decimals and percentages; and to apply the theories of algebra, geometry, and statistics.

Form/Spatial Aptitude: Requires the ability to inspect items for proper length, width and shape.

Motor Coordination: Requires the ability coordinate hands and eyes rapidly and accurately in using computer equipment.

<u>Manual Dexterity:</u> Requires the ability to handle a variety of items such as computer equipment. Must have minimal levels of eye/hand/foot coordination.

Color Discrimination: Requires the ability to differentiate between colors and shades of color.

Interpersonal Temperament: Requires the ability to deal with people beyond giving and receiving instructions. Must be adaptable to performing under stress and when confronted with persons acting under stress.

<u>Physical Communication</u>: Requires the ability to talk and hear: (Talking: expressing or exchanging ideas by means of spoken words. Hearing: perceiving nature of sounds by ear.)

Must be able to communicate via telephone.

KNOWLEDGE, SKILLS AND ABILITIES

Significant skills developing enterprise web applications using Microsoft .NET frameworks, ASP.NET, C#, .NET frameworks, XML, XHTML, SQL, PERL, Java, Visual Basic, web-services and Python and Visual Basic.

Significant knowledge of Microsoft SQL Server DBMS and related SQL programming techniques, with proficient abilities writing queries against complex database structures.

Significant knowledge of the architecture of clients/servers, and internet systems.

Considerable knowledge of computer components, connectivity and operating systems.

Considerable knowledge of various methods and approaches to debugging system and program errors.

Considerable knowledge of several programming languages and of Job Control Language.

Knowledge of relational database structures, OLAP technology and data warehouse concepts.

Knowledge of Job Control Language.

Considerable knowledge of query tools.

Knowledge of network communications programming for incorporating data from various databases and computer platforms.

Knowledge of standards and procedures regarding programming and security.

Knowledge of system development methodology.

Knowledge of the current literature, trends and developments in the field of information systems and data processing.

Ability to evaluate the performance of hardware/software and make recommendations for improvement.

Ability to systematically determine the source of problems in a computer system and to take appropriate action.

Ability to translate user requirements into effective program designs.

Ability to evaluate requests for changes and/or updates to the system.

Ability to evaluate packaged software for use in the school system.

Ability to schedule and monitor development projects.

Ability to determine and document user requirements.

Ability to develop clear, effective instructions for operations staff and for users.

Ability to design, develop and schedule programs to ensure efficient processing.

Ability to maintain complete and accurate records.

Ability to communicate effectively both orally and in writing.

Ability to handle multiple projects and prioritize tasks.

Ability to react quickly and appropriately to high pressure / high impact situations and determine the best solution.

Ability to learn new technologies quickly.

Ability to take the lead, as appropriate.

Ability to maintain good customer support.

DISCLAIMER

The preceding job description has been designed to indicate the general nature and level of work performed by employees within this classification. It is not designed to contain or be interpreted as a comprehensive inventory of all duties, responsibilities, and qualifications required of employees to this job.