

Job Title: LMS Technical Coordinator
Department: Microcomputer Services (MCS)
Supervisor: Microcomputer Services Manager
Date: Summer 2007
Updated: April 2008

A. PURPOSE OF THE JOB:

To administer the Learning Management System (LMS) servers.

B. DUTIES:

This is a senior technical position requiring knowledge of all aspects of systems administration and automated data processing in a mission critical higher-education environment. The LMS Technical Coordinator position is responsible for the management, administration, and development of expertise for WebCT in support of the faculty by integrating technology into their courses in WebCT. This position requires prior experience with WebCT tools and the incumbent must be able to apply existing and new online learning technologies into it. This position also requires technical skills in; ColdFusion, Java, SQL and PL/SQL, and Oracle database and assistance with systems integration of WebCT with campus systems along with being able to establish standards in order to ensure data integrity, high availability, and troubleshoot platform-wide problems in a complex computing environment.

The position requires good team building skills that can effectively address performance issues, inspire, develop, mentor, and supervise MCS team members. This position will be considered the technical lead in overseeing and evaluating the technical abilities of the rest of the LMS staff designated by the Microcomputer Services Manger. Additionally, this position's responsibilities are vital to the University's ability to deliver online coursework to a vast majority of the campus community. This operation must be available 24/7 throughout the year with staff and support personnel covering the given times.

1. Major Duties:

- a. Responsible for installing, administering, monitoring, configuring, and upgrading learning management system software (WebCT) on Linux in a 24/7 setting,
- b. Interprets and applies SCORM and IMS XML guidelines for integrating the LMS with other systems on campus,

- c. Develops and supports enterprise systems integration approaches by collaborating with peers in other Information Technology areas and enterprise system owners for systems integration issues,
- d. Evaluates new or upgraded technologies/standards in the education sector with regard to e-learning and assess their relevance to the operation and administration of the platform,
- e. Maintains existing applications in ColdFusion using Fusebox or similar frameworks for various in-house projects and also develops complex applications for this program,
- f. Develops scripts and applications using SQL, PL/SQL, XML, and other programming IDE's,
- g. Performs trend analysis and metrics definitions for improved operations, evaluates database and system performance and availability, and when required, takes corrective and/or preventive actions to resolve platform failure, security, or performance issues,
- h. Installs, administers, and monitors Oracle database as well as performing database configuration, patch management, and analyze database schemas for performance tuning,
- i. Devises and implements a comprehensive backup/restore, disaster recovery strategy for production systems, and
- j. Functions as the LMS Team leader responsible for the technical evaluation of LMS full time and part time staff, as well as accomplishing goals and objectives given by the Microcomputer Services Manger.

2. Occasional and subordinate duties: attends training and conferences.

C. KNOWLEDGE AND SKILLS:

1. Required education: Bachelor's Degree in Computer Science or computing- related discipline. Experience can substitute for education although education cannot substitute for experience.
2. Skills required:
 - a. Applied knowledge in WebCT (LMS) systems administration, security, maintenance, configuration, migration, backup, and recovery in an enterprise (24/7) environment,
 - b. Experience in WebCT systems administrator and integration,
 - c. Experience with integrating technology in the classroom with an online learning environment,
 - d. Experience in database, ColdFusion and web technologies development with experience in managing entire projects,
 - e. Knowledge of online learning technologies and their application in a classroom or online environment,
 - f. Experience with administration in Linux/UNIX and Windows Server systems. Demonstrates competence in utilizing: Java, SQL, PL/SQL, SQL*PLUS, XML, XML Parsers, XSLT, JavaScript, CSS, WML, XHTML, HTML, CVS, source code management environments, and enterprise server management tools,
 - g. Proficiency in creating and maintaining database object views, stored procedures, packages, functions, triggers etc., knows normalization, and query optimization,
 - h. Possesses good knowledge of; ODBC/JDBC, TCP/IP, SQLNET, WAP, and network routing,

- i. Experience with Web Server (ex: Apache, WebLogic) configuration and management with experience in, SSL, digital certificates, secure shell, and SFTP,
- j. Possesses strong decision making and negotiation skills as well as the ability to develop and maintain technical policies and procedures, and improve performance through process modification,
- k. Possesses the ability to navigate organizational structures and create professional networks,
- l. Possesses understanding of standard enterprise application issues including; scalability, reliability, data contention, availability, compatibility, security, etc.,
- m. Experience in analyzing functional requirements and organizing specifications,
- n. Possesses the capacity to determine the impact of integration or upgrade paths for WebCT, Oracle, and other components on system operation and performance as well as the availability and ability to perform functional testing of system upgrades,
- o. Exceptional troubleshooting, debugging, and problem solving skills with a high level of attention to detail,
- p. Strong conceptual, analytical, and technical architecture skills,
- q. Strong interpersonal, organizational, verbal, and written communication skills,
- r. Experience with technical writing, documentation, and
- s. Proven ability to manage multiple projects with changing priorities and must be able to work independently as part of a team, or group leader.

D. FISCAL RESPONSIBILITY:

This position is responsible for planning with allocated expenditures for computer production and operations.

E. APPLICATION OF KNOWLEDGE AND SKILLS:

Texas A&M University-Corpus Christi's (TAMU-CC) LMS user community consists of students, faculty, and staff. Each user is provided with access and resources in accordance with University policies. This requires knowledge of the available resources and policies along with skill in the application of available mechanisms for implementing the policies and utilizing the resources.

TAMU-CC's data processing requirements comprise all aspects of the University's operations and mission. This requires that data be transmitted to and received from groups within the department, other departments and; educational institutions, vendors and partners, state, and federal agencies. To achieve the highest degrees of security, reliability, timeliness, and accuracy, these exchanges are automated to the greatest extent possible using combinations of networking, scripting, and automated scheduling.

The LMS is a mission critical application and requires that the servers and subsystems exhibit a high degree of availability along with the ability to recover from inadvertent data loss. The backup procedures in place provide a crucial safety net to protect the information assets related to student records.

F. SUPERVISION:

1. Received: general direction from assigned supervisor.
2. Given: this position will be considered the technical lead overseeing and evaluating the technical abilities of the rest of the LMS staff designated by the Microcomputer Services Manger.

G. EXTENT OF PUBLIC CONTACT:

1. Within the University: daily contact occurs with students, faculty, and staff.
2. Outside the University: contact occurs with a wide variety of other institutions and organizations such as support groups for WebCT as they relate to learning management and administration.