SYLLABUS PART I

EDISON STATE COMMUNITY COLLEGE CIS 217S CLOUD ADMINISTRATION 3 CREDIT HOURS

COURSE DESCRIPTION

Comprehensive study of cloud administration with an emphasis on installing, configuring, managing, maintaining, monitoring, and troubleshooting virtual cloud-based infrastructure. Prepares students for the CompTIA Cloud+ certification exam. Prerequisite: CIS 211S and CIS 214S. Lab fee.

COURSE GOALS

The student will:

Bloom's		Program
Level		Outcomes
4	1. Select, install, and configure operating systems in the cloud.	3, 5, 7
3	2. Establish identities and access to cloud-based resources and data.	1, 3, 7, 8
3	3. Migrate on-premise systems to the cloud.	1, 3, 6, 7
4	4. Analyze and troubleshoot issues and devise solutions to those issues.	3, 6, 8
3	5. Establish secure cloud-based resources using hardening best practices.	1, 3, 6, 7, 8
5	6. Measure system performance using appropriate monitoring tools.	3, 6, 7, 8

CORE VALUES

The Core Values are a set of principles that guide in creating educational programs and environments at Edison State. They include communication, ethics, critical thinking, human diversity, inquiry/respect for learning, and interpersonal skills/teamwork. The goals, objectives, and activities in this course will introduce/reinforce these Core Values whenever appropriate.

TOPIC OUTLINE

- 1. Introduction to Cloud Computing and Administration
- 2. Virtual Hardware
- 3. Migration to the Cloud
- 4. Cloud Infrastructure
- 5. Cloud Connectivity and Troubleshooting
- 6. Security of Cloud Resources
- 7. Identity and Access Management
- 8. Cloud Storage
- 9. Cloud Capacity and Performance Management
- 10. Cloud Automation