



CST 201 Advanced Operating Systems 3 Credit Hours Revision Date: 06/13/2022

# **Department:**

**Computer Support Specialist** 

# **Course Description:**

Advanced instruction on the most commonly used major operating systems. Components covered will be installation and configuration of dual boot operating systems, system file configuration and editing, system files, and system conflict resolution.

# **Course Competencies:**

The learning outcomes and competencies detailed in this syllabus meet or exceed the learning outcomes and competencies specified by the Kansas Core Outcomes Groups for this course as approved by the Kansas Board of Regents.

Upon completion of the course, the student should be able to:

- 1. Install and maintain Windows Operating System
- 2. Install and maintain Linux Operating Systems
- 3. Manage Windows Operating Systems in command line environment
- 4. Manage Linux Operating Systems in command line environment
- 5. Manage and maintain backups for the Operating System
- 6. Apply updates for the Operating System and Software

### **Course Content:**

- A. Fundamentals
- B. Modern Client and Server Operating Systems
- C. The Central Processing Unit
- D. File Systems
- E. Installing Operating Systems
- F. Devices and Device Drivers
- G. Using and Configuring Storage Devices
- H. Virtualization and Cloud Computing Fundamentals
- I. Network Fundamentals and Configuration
- J. Account and Resource Management
- K. Securing and Maintaining an Operating System
- L. Appendix A: Operating System Command-Line Commands

## **Learning Assessments:**

Competencies will be assessed by assignments, case problems, quizzes, chapter tests, hands-on projects, lab assignments, a midterm test, and a final test. The test can be in the objective format or in a problem solving format.

## **Instructional Materials:**

Textbooks: Tomsho, G. (2021). *Guide to Operating Systems*, (6<sup>th</sup> ed.). Course Technology. ISBN 978-0357433836

#### Guidelines for Requesting Accommodations Based on Documented Disability or Medical Condition

It is the intention of Highland Community College to work toward full compliance with the Americans with Disabilities Act, to make instructional programs accessible to all people, and to provide reasonable accommodations according to the law.

Students should understand that it is their responsibility to self-identify their need(s) for accommodation and that they must provide current, comprehensive diagnosis of a specific disability or medical condition from a qualified professional in order to receive services. Documentation must include specific recommendations for accommodation(s). Documentation should be provided in a timely manner prior to or early in the semester so that the requested accommodation can be considered and, if warranted, arranged.

In order to begin the process all students **must** complete the "Disabilities Self-Identification Form" on our <u>Disability Services</u> website.

This form can also be accessed at the Highland Community College homepage under Students Services/Student Resources/Disability Service or by contacting the Disabilities Coordinator.

#### A Note on Harassment, Discrimination and Sexual Misconduct

Highland Community College seeks to assure all community members learn and work in a welcoming and inclusive environment. Title VII, Title IX, and College policy prohibit harassment, discrimination and sexual misconduct. Highland Community College encourages anyone experiencing harassment, discrimination or sexual misconduct to talk to report to the Vice President for Student Services, the Human Resources Director or complete an online report about what happened so that they can get the support they need and Highland Community College can respond appropriately.

There are both confidential and non-confidential resources and reporting options available to you. Highland Community College is legally obligated to respond to reports of sexual misconduct, and therefore we cannot guarantee the confidentiality of a report, unless made to a confidential resource. Responses may vary from support services to formal investigations. As a faculty member, I am required to report incidents of sexual misconduct and thus cannot guarantee confidentiality. I must provide our Title IX coordinator with relevant details such as the names of those involved in the incident. For more information about policies and resources or reporting options, please review our <u>Equity Grievance Policy</u>.