CSIT 3353 - SYSTEM ADMINISTRATION

CREDIT HOURS: 3
PREREQUISITES: CSIT 2301 or CSCI 3302; CSCI 2311
GRADE REMINDER: Must have a grade of C or better in each prerequisite course.

CATALOG DESCRIPTION

The configuration, installation and maintenance of a computer using a current operating system in a networked environment. Emphasis will be placed on resource management, performance and security. May not be used to satisfy computer science requirements for a major or minor in computer science or computer information systems.

PURPOSE OF COURSE

To acquaint the student with operating system and network administration through the assignment of a variety of problems requiring system design, development and implementation.

EDUCATIONAL OBJECTIVES

Upon successful completion of the course, students should be able to:

1. Demonstrate an understanding of operating systems concepts.
2. Maintain a networked computer system.
3. Describe the life-cycle of a computer.
4. Identify tools and techniques for system administration.
5. Configure, install, and maintain a networked computer system.
6. Identify relevant security issues.

COURSE CALENDAR

This course meets for a minimum of 37.5 lecture contact hours during the semester, including the final exam. Students have significant weekly extracurricular assignments which involve readings, operating system configuration, virtual machine creation, programming, or engaging in other forms of preparation. Students are expected to complete 4-5 major homework assignments related to the above topics, multiple in-class laboratory assignments, and 2-3 exams in addition to the final exam. Students are expected to prepare for any class assignments or quizzes over the material covered in class or the extracurricular assignments. Successful completion of these activities requires at a minimum six additional hours of outside of classroom work each week.

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### User Management
- Create/Delete/Update
- Groups and Permissions
- Policies and Procedures

### File Systems
- Format and Layout
- Organization and Operation
- Configuration

### Peripherals
- Hardware Management
- Printer Installation, Configuration, Management
- Device Driver Installation, Configuration, Management

### Networking
- Network Interface Configuration
- Setup and Masking
- Wireless

### Applications
- Installation, Configuration, Management
- Office Suite
- ISV Software
- Utilities
- Policies and Procedures

### Performance
- Tuning - Files System, Tools (Defragment, Compress, etc.)
- Tasks - TSR issues
- Registry Management

### Security
- Tools - Web Setup, Firewalls, Virus, Spyware, blockers
- Policies and Procedures - Access/Permissions/Accounts

### Maintenance
- Backup/Restore
- RAID Organization and Operation
- Hardware/Software Updates

### Exams (plus final)

**TOTAL 45**

### REFERENCES


*Installing, Configuring, and Administering Microsoft 7 Windows 7 XP Professional (70-270)*, 2nd Ed.,
http://www.microsoft.com/MSPress/books/7721.asp


Microsoft® Windows® XP Professional Administrator's Pocket Consultant, 2nd Ed.,
http://www.microsoft.com/MSPress/books/7777.asp

Microsoft® Windows® XP Networking and Security Inside Out: Also Covers Windows 2000
http://www.microsoft.com/MSPress/books/7110.asp


Supporting Users and Troubleshooting a Microsoft® Windows® XP Operating System (70-271)
http://www.microsoft.com/MSPress/books/7250.asp

Supporting Users and Troubleshooting Desktop Applications on a Microsoft® Windows® XP Operating System (70-272), http://www.microsoft.com/MSPress/books/7576.asp