

**Eastern Illinois University**  
**Revised Course Proposal**  
**MIS 3200, Networking Fundamentals**

Agenda Item #06-45  
Effective Fall 2007  
Effective Fall 2016, with revisions

1. Catalog description

1. Course number: MIS 3200
2. Title: Networking Fundamentals
3. Meeting times and credit: 3-0-3
4. Term(s) to be offered: F, S
5. Short title: NETWORK FUND
6. Course description: Study of business telecommunications, teleprocessing, and computer networks. Installing, configuring and administering local area networks.
7. Prerequisite(s): Sophomore standing, BUS 1950 with C or better, or permission of the Associate Chair, School of Business.
8. Initial term of course offering: FA2007.

2. Student Learning Objectives and Evaluation

- A. Upon successful completion of this course, students will be able to:
1. Describe the layers in the OSI 7-layer model and analyze their application in real-world networks.
  2. Describe the various types of networks and internetworks and evaluate their application in business situations.
  3. List and describe the principles of good network design, network management, and network security.
  4. Install, configure, and administer local area networks.
- B. The students' achievement of the stated objectives will be assessed and grades will be earned on the basis of examinations, projects, homework and lab assignments.

	Exams (50%)	Homework and labs (10%)	Projects (20%)	Final Exam (20%)
Describe the layers in the OSI 7-layer model and analyze their application in real-world networks	X	X	X	X
Describe the various types of networks and internetworks and evaluate their application in business situations	X	X	X	X
List and describe the principles of good network design, network management, and network security	X	X	X	X
Install, configure, and administer local area networks	X	X	X	X

- C. This is not a technology delivered class.
- D. This class is not numbered 4750-4999
- E. This class is writing active. Students will complete at least one project and one homework assignment in which they will analyze the use of networks and telecommunications systems in organizations.

3. Outline of the Course

Weeks	Topic
1.0	Introduction to data networks
1.0	OSI Reference model and TCP/IP
1.0	LAN transmission methods and conducted media
1.0	Network layer: IP addresses' classes and structure
1.0	Devices for connecting networks
1.0	Basic network design
1.0	Telecommunications systems
1.0	Server installation and configuration
1.0	Disk and file systems management

1.0	Directory services
1.0	Managing user and group accounts
1.0	Implementing group policies and security
1.0	Configuring network protocols and services
1.0	Configuring web services (web, email, telnet)
1.0	Examinations

#### 4. Rationale

- a) Purpose and need: This course covers the principles and applications of computer networks and telecommunications systems that Information Systems' students need to be exposed to in order to be successful in their careers.
- b) Justification of the level of the course and of course prerequisites: Because exposure to some computer concepts is required to be successful in this course, BUS 1950 is a prerequisite to this course.
- c) Similarity to existing courses: This course is not similar to other courses. This course replaces CIS 3200 and CIS 3700.
- d) Impact on Program(s): There should be little impact on the program as a result of focusing on the most important topics of CIS 3200 and CIS 3700.

#### 5. Implementation

- a) Faculty member(s) to whom the course may be assigned: Garrett, Illia.
- b) Students will be expected to submit projects in hard copy (paper) and on appropriate digital media. Additional costs to students will be minimal.
- c) Text and supplementary materials to be used:  
 Business Data Communications and Computer Networks, by Curt M. White. Course Technology, 3<sup>rd</sup> edition, 2004. ISBN 0-619-16035-7  
 Managing a Microsoft Windows Server 2003 Environment, by Dan DiNicolò and Brian McCann, Course Technology, 2006. ISBN 0-619-21752-9

#### 6. Community College Transfer

A community college course will not be judged as equivalent to this course.

7. Date approved by the department or school: 2/15/06

8. Date approved by the college curriculum committee: 3/6/06

9. Date approved by CAA: 4/20/06