Instructor Information

Name: Sanjay Goel
Email: goel@albany.edu
Phone: (518) 442 4925
Office Hours: W 1:00-2:30 or by appointment
Office: BA 310b

Class Information

Time: MWF 9:05-10:00am (Section 4500)
                 MWF 10:10-11:05 (Section 4501)
Room: BA 231
Dates: Mar 4- Mar 25
Available Labs: MIS Lab

Course Overview

This course is a three module course. This is the second module. In this module, Networking and Computer Security will be covered. The Networking portion will cover the OSI model, LAN, VPNs, and TCP/IP. The course will discuss vulnerabilities of the network and techniques for protecting data such as Cryptography and Steganography. Public Key Infrastructure which is currently used for secure data transmission over the web will also be discussed. By the end of the class, the students should expect to have a basic understanding of Networking and Computer Security.

Books & Software

Text: Business Data Communications and Networking by Raymond R. Panko
Text: Professional Java Security by Jess Garms and Daniel Somerfield
Reference: Hackers Beware by Eric Cole
Reference: Computer Networking, A top down approach featuring the Internet by James W. Kurose and Keith Ross.

Grading

Homework: 25%
Paper: 50%
Final Exam: 25%

Course Schedule

Week	Date	Topics	Readings
1	03/04	Introduction & Internet	Chapters 6-7 (Panko)
	03/06	Layered Architecture	Chapter 9 (Panko)
	03/08	OSI Model	Module A (Panko)
2	03/11	Routing	Class Notes
	03/13	Introduction to Security / Hacker Attacks	Class Notes
	03/15	Cryptography - Symmetric	Java Security - Chapter 4
3	03/18	Cryptography - Asymmetric	Java Security - Chapter 5
	03/20	PKI (Public Key Infrastructure)	Java Security - Chapter 6
	03/22	Watermarking and Steganography	Class Notes
4	03/25	Exam	Closed Book
	05/06	Student Presentations	
	05/08	Student Presentations	