ECE 542 SPRING 2014

COMPUTER NETWORK ARCHITECTURES AND PROTOCOLS

Instructor       Dr. Shih-Chun Chang
Office           Engineering 3234    Office Hours  3:00-5 PM    Tuesday
Phone            703 993 1617      E-mail        schang@gmu.edu
Classroom        Engineering 1110    Time         7:20-10 PM    Monday

Textbooks (required)

References

Prerequisite     STAT 346: Probability for Engineers

Course Outlines:
1. Overview
2. Architectures and Applications
3. Data Link Controls
4. Queueing Analysis
5. Multiplexing
6. MAC and LAN
7. Routing and Switching
8. High-Speed Network
9. TCP/IP
10. Network Security
Grading:

1. HW 5%
2. Test 1: 3/17 30%
3. Test 2: 4/14 30%
4. Final: 5/12 35%

Weekly Schedule:

1. 1/27 Layered Architectures
2. 2/3 Application Protocols
3. 2/10 PPP and HDLC Protocols
4. 2/17 CRC and Error Controls
5. 2/24 Queueing Analysis
6. 3/3 Multiplexing and SONET
7. 3/10 Spring Break
8. 3/17 Test 1
9. 3/24 MAC and LAN Protocols
10. 3/31 Wireless LAN
11. 4/7 Routing Algorithms and Switching
12. 4/14 Test 2
13. 4/21 High Speed Network
14. 4/28 TCP/IP Protocols
15. 5/5 Network Securities
16. 5/12 Final Examination