TE561 트래픽 및 대기이론

- 담당: 황강욱 (월, 수 16:00 - 17:30, guhwang@amath.kaist.ac.kr)
- Office hours : TUE 3:00 p.m. - 5:00 p.m
- Lecture note: http://amath.kaist.ac.kr/∼palab

Week	Topics
1주	Basic concept of Probability and stochastic processes
2주	Discrete Time Markov Chain
3주	Continuous Time Markov Chain
4주	Birth and Death process and Knapsack theory
5주	The G/M/m Queue
6주	The M/G/1 Queue I
7주	The M/G/1 Queue II
8주	Midterm Exam
9주	Time Reversibility and Queueing Networks
10주	Quasi Birth and Death Process
11주	Fluid Flow Analysis
12주	Matrix Analytic Method I
13주	Matrix Analytic Method II
14주	Self-similar traffic: Theory
15주	Self-similar traffic: Recent results
16주	Final Exam

Grading : mid term 40%, final term 40%, Homework 20%

References:

1. Leonard Kleinrock, Queueing Systems I, II, John Wiley & Sons, 1975
2. S.M. Ross, Stochastic processes, 2nd ed., John Wiley & Sons, 1996
3. Mischa Schwartz, Broadband Integrated Networks, Prentice Hall, 1996
4. Marcel F. Neuts, Matrix-Geometric Solutions in Stochastic Models, The John Hopkins University Press, 1981
5. Marcel F. Neuts, Structured Stochastic Matrices of M/G/1 Type and Their Applications, Marcel Dekker, Inc., 1989
6. Recent journal papers