Middle East Technical University
EE 281 Electrical Circuits - Fall 2015

Course Content:

Circuit laws and basic elements. Resistive circuits, analysis methods. Network theorems. First and second order circuits. Sinusoidal steady-state analysis and power.

Instructors :

Sec 01: Dr. Ozan Keysan – Office:A-304 , EEE Department
Office hours: Mondays 10:30 – 11:30

Sec 02: Dr. Murat Göl – Office: E-110, EEE Department
Office hours: Wednesdays 10:30 – 12:00

Sec 03: Dr. Uluç Saranlı – Office: B-208, CENG Department
Office hours: Mondays 10:30 – 12:00

Schedule :

Sec 01: Mon 08.40-10.30, DZ-13, Thu 10.40-11.30, DZ13
Sec 02: Mon 08.40-10.30, EA-310, Wed 09.40-10.30, EA-202
Sec 03: Mon 12.40-13.30, BMB-3, Wed 15.40-17.30, BMB-3

Web resources :

- Homeworks, resources and grades will be posted on COW
- Announcements will be made through the newsgroup course.ee281

Textbooks :

1. Electric Circuits, 8th Ed. James W. Nilsson, Susan A. Riedel, Prentice Hall, 2008.
2. Electric Circuit Analysis, 3rd Ed. D.E. Johnson, J.R. Johnson, J.L. Hilburn, P.D.Scott, Prentice Hall, 1997.

Additional References :

- Fundamentals of Electric Circuits, 2nd Ed. C.Alexander and M.Sadiku, McGraw Hill, 2004.

Grading :

- 2 Midterm Examinations: 40%
- Final Examination: 30%
- Laboratory: 20%
- Unannounced in-class exams: 10%

Requirements :

- To get a passing grade you need to have 100% attendance to labs
- The following conditions should be met to take the final exam
  - at least 50% of lab grades
  - at least 30% of midterm exam grades
  - at least 30% of in-class exam grades

Course Outline (with corresponding Nilsson & Riedel Chapters) :

1) Basic Concepts (Ch. 1)
2) Basic Laws (Ch. 2)
3) Resistive Circuits (Ch. 3)
4) Methods of Analysis (Ch. 4)
5) Circuit Theorems (Ch. 4)
6) Operational Amplifiers (Ch. 5)
7) Capacitors and Inductors (Ch.6 up to 6.5)
8) First Order Circuits (Ch. 7)
9) Phasors and Sinusoids (Ch. 9)