



EE 445 INDUSTRIAL ELECTRONICS (062)

INSTRUCTOR:

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Office Hours:

Saturday & Monday 10:00 – 11:30 AM, Tuesday 1:00 - 2:00 PM, or by appointment.

Course Content

1. 555 Timers
2. Power semiconductor devices, Thyristors (SCR, Diacs, Triacs, UJT)
3. Sensors (Temperature sensors, Pressure sensors, etc.)
4. Industrial OP-AMP applications (Instrumentation Amplifier, Comparators, Multivibrators)
5. Some Examples of Industrial Electronic Circuits

Some Reference Books

1. Modern Industrial Electronics (T. J. Maloney) – Text Book
2. Sensors and Signal Conditioning Circuits (Ramon P. Areny)
3. Design with Operational Amplifier (S. Franco)
4. Electronic Devices (T. Floyd)

Grade Distribution

• Two Major Exams	25%
• Attendance	3%
• Quizzes + HW	7%
• Course Presentation	5%
• Lab (Class performance + Final)	10% + 10%
• Project	10%
• Final	30%

Official Excuses: Any make up will require official excuses. Personal excuses will not be accepted. Excuses must be submitted within a week.

Absence:

1. University Rule: 6 unexcused absences → Warning; 9 unexcused absences → DN
2. Every unexcused absence after the second one result in -0.5, 8 absences results in 0 out of 3% in the attendance, 9 absences results in DN.
3. Two late arrival= One absence.