

AE 6762: Applied Acoustics

- Credit Hours: 3-0-3
- Prerequisites: ME 6760 or AE 6760 or equivalent, or with the consent of the instructor.
- Catalog Description: Mufflers, resonators, acoustic materials, barriers, industrial noise, room acoustics, active noise control. Crosslisted with AE 6762.
- Textbooks: Charles E. Wilson, *Noise Control: Measurement, Analysis, and Control of Sound and Vibration*, 1st Edition, Krieger, 1994.
- Goals: The goal of this course is to expose students to the fundamental principles of noise control.
- Topics:
- Mufflers and resonators
 - Acoustic materials, damping
 - Sound transmission, enclosures
 - Barriers
 - Sound intensity, sound power measurements, Acoustic holography
 - Community and industrial noise metric- case studies
 - Room acoustics
 - Active noise control