

ARCH 558 Structural Wood Design

Fall 2025

3 credit hours

Instructor: Sudarshan Krishnan, Ph.D.

Time: 12:30 pm - 1:50 pm Tues. and Thu.

Classroom: G-48 Literatures, Cultures & Linguistics Bldg.
(formerly called 'Foreign Languages Bldg.')

Topics covered:

- Planning the layout of structural systems using dimensioned lumber, engineered wood and mass timber.
- Structural analysis and behavior under gravity and lateral loads.
- Design of deck, beams, columns, diaphragms and shear walls using NDS specifications.
- Long span and tall timber buildings
- Fabrication and connection detailing

The course also includes a site-visit to a mass timber manufacturing facility, office tour/s of timber specialists, and guest lectures by practitioners on mass timber buildings and special topics such as fire safety and building performance.

