



**SUMMER  
SPRINGBOARD**  
Look Inward. Go Upward.

# FUNDAMENTALS OF ENGINEERING INFOSHEET

New student admissions for  
Summer 2026 are open

**2-Week Course**

This is a two-week program where you'll focus on one course for the entire duration.



## Academic Program Overview

Engineering is the application of scientific knowledge and real-world data to solve problems within given constraints. In this program, you'll explore the core principles of major engineering fields, such as mechanical, electrical, computer/programming, aerospace, electro-chemical, and civil engineering. You'll also gain insight into potential college paths while boosting your chances of admission to top engineering schools.

Hands-on learning is at the heart of this program. You'll start with an introduction to MATLAB programming through given online tutorial, students will learn the principles of MATLAB programming before they arrive to MIT Campus., MATLAB is used in this course for which supports the delivery of course material through simulations and projects computations. Learn directly from professionals about cutting-edge innovations in engineering and technology.

### Required Computer Specs:

- Hardware: PC laptop (not Mac/Apple, ChromeBook, or tablet),
- Operating System: Windows 10 or newer
- USB Interface: If your computer only has a USB-C interface, you also need a USB-C to regular USB adapter, available from many vendors

\* To maximize the hands-on experience of this academic course (9am - noon), it will be held off the campus of MIT, in the Kendall Square, Cambridge, MA area. Located next to the campus of MIT, Kendall Square is widely recognized as one of the world's leading hubs for technology, research and innovation.



## Excursions

Excursions includes visiting various science and technology labs on and off the MIT Campus surrounding area.



## Program Highlights

- Learn about the Fundamentals of Engineering through hands-on projects and simulations.
- The program starts with a practical introduction to MATLAB computer programming (a pioneering computational programming language in science and technology) that will be used for better delivery of our course material on various science and engineering fields
- Learn from professionals in the field about the latest advancements in engineering and technology

## 2026 Dates

### MIT Campus\*

- Session 1: June 21 - July 3
- Session 2: July 5 - July 17
- Session 3: July 19 - July 31

Summer Springboard programs are not run by our campus locations. Universities and their affiliated departments are not responsible for the Summer Springboard program in any way. This program is not sponsored by MIT.

# Instructor

## Dr. Ali Talebinejad

Dr. Ali Talebinejad is an experienced lecturer who has taught engineering courses at MIT for over 10 years. He has done his PhD at MIT Artificial Intelligence Laboratory in the area of Robotics and Computer Vision and has received his MS from MIT Mechanical Engineering in the area of System Dynamics and Control. His postdoctoral research was a pioneering work on Tracking Moving Objects Using Video Images at the Canadian Institute for Robotics and Intelligent Systems. His industrial experience includes his work at Parametric Technology Corporation (PTC) on “Pro Engineer” which was the leading software suite in CAD/CAM area at the time. Dr. Talebinejad has been involved in research and teaching in various areas for over 20 years inside and outside MIT from Design, Manufacturing, Numerical Computation, System Dynamics, Control, Robotics, Computer Vision, and Computer Programming, ... to Calculus and CAD. In 2018, he was involved in teaching a course titled “Computational Thinking for Modelling and Simulation” through MIT edX program internationally that attracted over 10,000 students. Dr. Talebinejad is private pilot and a member of the American Society of Mechanical Engineers and Institute of Electrical and Electronics Engineers.

## Tuition Information:

### Residential Students:

- **Includes:** all meals, lodging, excursions, academic course, weekend excursions
- **Excludes:** optional airport pickup and drop off service (available for an additional fee)
- **Price:** \$6,798

### Commuter Students:

- **Includes:** lunch, academic course, excursions, programming from 9am to 5pm, Monday-Friday
- **Excludes:** lodging, breakfast, dinner, weekend excursions
  - Weekend excursions can be added on for \$125 per day
- **Price:** \$3,498

## Supplements:

- **Application fee:** Starting at \$99 (mandatory, non-refundable)
- **Fundamentals of Engineering Course Supplement:** \$250 (mandatory)
- **Tuition Protection Plan:** Allows for cancellation for any reason up until the day of the program. Click [here](#) for more info.

[More info on Airport Transfer](#)

[More info on Unaccompanied Minor Service](#)

[Apply Now!](#)



## Course Structure

There are nine 3-hour class sessions over the two-week course. During week one, students have class from 9am-12pm, Monday - Friday. During week two students have class from 9am-12pm Monday through Thursday. Wednesday afternoons are dedicated to additional academic time (excursions, speakers).



## Typical Schedule

8AM	Breakfast	
9AM	Academic Course / Commuter Student Arrival	
12PM	Lunch	
1:30PM	Academic Excursions or Recreational Activity	
3:30PM	College Readiness Workshop or True You	
5PM- 6:30PM	Commuter Student Departure	
6PM	Dinner	
7PM	Clubs	
10:30PM	Night Checks	

Summer Springboard programs are not run by our campus partners (with the exception of Cal Poly, University of Washington Foster School of Business, and NYSID which are run in partnership with SSB). Universities and their affiliated departments and partners do not control and are not responsible or liable in any manner for any part of the Summer Springboard program.