“It’s important to take a rich variety of classes and learn everything you can because you never know. Life changes. Getting a full education will benefit you later on in ways you can’t imagine now.”

— Tara Teich, Computer Engineer

Recommended High School Coursework

You’re probably already taking the classes you’ll need for admission to an engineering program. Recommended courses include:

- **Math (Four Years):** Algebra I and II, Geometry, Trigonometry, Calculus

- **Science (Four Years):** Biology, Physics, Chemistry
  (Other science options for the fourth-year requirement and electives include advanced levels of Biology, Chemistry, Physics, or Ecology, Astronomy, and Earth Sciences.)

- **Language Arts (Four Years):** English
  (Elective courses in this area include Speech/Debate, Communications/Media, and Journalism.)

- **Foreign Language (Three Years):** Your choice, based on what your school offers.

Other Courses and Requirements

No matter what colleges and majors you’re considering, you’ll want to show that you’re well rounded, with a wide range of experiences and knowledge. So it’s also important to take courses in History/Social Studies, Geography, Computers, Social Sciences (Psychology and Sociology), and the Arts, and to get involved in extracurricular activities that you love. All of these offer skills that will be valuable in your future studies and your chosen career.

You’ll also need to do well on your standardized tests (score requirements vary by college), and it’s a good idea to take some AP and Honors courses when they’re offered.
Your Application
When you’re filling out college applications, make it clear you intend to major in engineering. Even if you’re not sure about engineering, go ahead and apply as an engineering student, as most schools require you to enter the program your freshman year. If you decide later on that engineering isn’t a good fit, you can easily move out of the program and into another major at your chosen school.

For More Information
These Web sites offer helpful information on preparing for admission to engineering schools.

• **JETS: Junior Engineering Technical Society** ([http://jets.org](http://jets.org)) offers a wealth of programs and resources to help high school students explore engineering, including student competitions, assessment tools, career guidance resources, an e-newsletter, and more.

• **The American Society for Engineering Education’s K-12 Center** ([http://www.engineeringk12.org](http://www.engineeringk12.org)) has a student section that features interesting profiles of engineers as well as information on what engineering careers and schools are like. The ASEE also offers an excellent 64-page booklet, *Engineering, Go For It!* ([https://www.engineering-goforit.com](https://www.engineering-goforit.com)), that you can order for a small fee.

• **TryEngineering** ([http://www.tryengineering.org/home.php](http://www.tryengineering.org/home.php)) offers information about engineering careers and education, links to interactive games, and an online form through which you can send questions to engineering students and professionals. The *Become an Engineer* ([http://www.tryengineering.org/become.php](http://www.tryengineering.org/become.php)) section includes listings of engineering societies and of pre-college projects, contests, and summer camps.

Check out [www.EngineerYourLife.org](http://www.EngineerYourLife.org)
a guide to engineering for high school girls.

• Find out about cool jobs and different kinds of engineering
• Meet inspiring women who love their careers
• Learn from students about what engineering programs are like
• Get info on how to get started towards an engineering career