RPAS Drone Technology 1 -7683

40 weeks 1 Credit

Students will get hands-on experience as they explore new applications of drone technology. This program is a hands-on problem-solving program that explores a variety of topics including, photography & videography, engineering, robotics, agriculture, and emergency services and drone flying. Successful students who have completed all requirements will be eligible to take part in the *optional* FAA Part 107 Remote Pilot test license.

RPAS Drone Technology 2 -7684

40 weeks 1 Credit

Students will get extensive experience in all aspects of drone technology including how to use Photoshop, Premiere Pro, Pix4D and 3d mapping. and hands-on experience as they explore new applications of drone technology. Students will pilot various types of drones and gain valuable experience for a host of different fields.

Did You Know?

A 5-unit sequence in Technology can be taken in lieu of a foreign language.

Many Technology classes can be taken to earn college credit while in high school.

The Baker Technology classrooms are equipped with the latest engineering equipment and graphic design software.

Technology classes are designed to give you exposure to many potential careers or help you decide on your future.

Baldwinsville Teachers are some of the most respected and awarded winning teachers in NY State.

Current Students going into technical careers are in high demand by colleges and industries.

Baldwinsville *Technology Education*

Baker High School Technology

Course Offerings

Project Lead the Way & Engineering at Baker

Principles of Engineering -7672
40 weeks 1 credit (College Credit)
This course is designed to help students understand the field of engineering and technology and its career possibilities. Students will develop engineering problem solving skills that are involved in engineering careers.

Robotics Engineering -7633
20 weeks 1/2 credit
This class challenges students to work through the key steps of Engineering Design for problem-solving using equipment from Vex Robotics. Students will be asked to design, assemble, program a robot for specific tasks.

Pre-Engineering -7622
20 weeks 1/2 Credit
A lab course designed for students who want to purse an engineering, math/science or technology related career. Activities will include: engineering drawing, problem solving machine tool theory and materials selection.

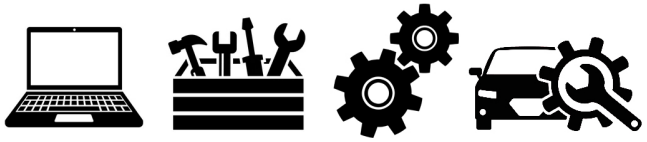
Computer Integrated Manufacturing (CIM) -7682
40 weeks 1 credit (College Credit)
This course introduces the key concepts and technologies in Computer Integrated Manufacturing (CIM), focusing on Robotics and Computer Numerical Control (CNC) Machining. Key topics include programming and operating CNC machines, 3D printers, laser cutters, and robotics while preparing students for real-world challenges in advanced manufacturing and automation with a variety of projects determined by the student.

Digital Electronics -7662
40 weeks 1 credit (College Credit)
Digital Electronics is a course of study of applied digital logic. Students will study the application of electronic logic circuits and devices and apply Boolean logic to the solution of problems.

Engineering Drawing 1 -7655
20 weeks 1/2 credit (3 College Credits)
MET 161 - Mechanical Drawing is a 3-credit OCC course-designed to provide students with hands-on experience in creating industry-standard mechanical drawings using AutoCAD. The course introduces students to the fundamentals of technical drawing and the application of AutoCAD software to produce precise, professional-quality designs. Throughout the semester, students will work on a variety of projects that simulate real-world mechanical design tasks, including part drawings, assemblies, and detailed technical schematics.

Program Design & Development C++ -6480
20 weeks 1/2 credit (College Credit)
This 1/2-unit course is an introductory course to computer programming using C++ language. This course is recommended for students interested in careers in computer science and engineering.

Capstone (Formerly EDD) -7654
40 weeks 1 Credit
Engineering Design and Development (EDD) is a capstone course where students apply the knowledge and skills gained from previous coursework to design and construct a solution to a real-world engineering problem of their choice. Throughout the course, students will work through the complete engineering design process, including problem identification, research, prototyping, testing, and refinement. Emphasis will be placed on teamwork, critical thinking, and effective communication as students collaborate to create innovative, functional solutions. A final presentation in front of engineers showcasing their final project concludes this class.



Graphic Communications -7512
20 weeks 1/2 Credits
This hands-on course is designed for individuals with an interest in commercial art, graphic design, or photography. Students will explore a variety of creative projects and advanced printing techniques using Adobe Photoshop. Key activities include designing custom iron-on shirt graphics, creating impactful advertisements, crafting surreal and horror/zombie-themed self-portraits, and producing personalized pinback buttons, cultural composition and collage-making.

Media Production Technology -7522
20 weeks 1/2 Credits
Introduces students to the world of modern communication media, focusing on video production and editing techniques. Students will explore various forms of media content creation using Adobe Premiere, one of the industry's leading video editing software. Key projects include producing a music video, a "history of" video, movie trailers, and a destination video, among others. This course is ideal for students interested in pursuing careers in film, television, digital media, or content creation.

Architectural Drawing -7612
20 weeks 1/2 Credit
This course challenges students in architectural design and drawing. Hand drawings and computer software will be used to design a house of their choice then build a scale model of your design. This course is good for students with a wide range of interests including architecture, art, engineering and construction.

Materials Processing -7702
20 weeks 1/2 credit
This is a hands-on practical skill building class. Students will make several useful take home projects using many tools in the Materials Processing Lab including a cutting board, spoon/spatula, mallet, wooden pens, lamps, bowls and wire trees. Areas of study include Woodworking, Lathe Turning, Metal Working.

Production (Construction & Manufacturing) -7722
20 weeks 1/2 Credit
This hands-on course is designed for students interested in learning the fundamentals of production, construction, and manufacturing. Students will gain practical experience in the safe operation of a variety of tools and machinery while working on a range of projects. Students will develop skills in woodworking and basic construction techniques. Emphasis will be placed on safety, precision, and craftsmanship, with opportunities to apply problem-solving and teamwork in real-world scenarios. Projects include designing and building a scale model of a tiny house, laser cut out logo, a wooden flag and a potential community-based project.

Basic Automotive Technology -7752
20 weeks 1/2 Credit
This course is for anyone interested in automobiles or any motorized vehicles. Activities include car maintenance, car care, tune ups, brake repair, lubrication, cooling systems, and small engines.

Radio Broadcasting & Communications -9771
20 weeks 1/2 credit
This course is designed for students interested in exploring broadcasting, podcasts and radio communications. Students will go live several times on our Radio station- 90.5FM as well as broadcast a variety of sporting events in Baldwinsville.

Webpage Design -7582
20 weeks 1/2 Credit
This course provides students with a hands-on introduction to the world of webpage design, combining foundational skills in HTML coding, graphic design with Adobe Photoshop, and the use of template-based webpage creation. Projects include tutorials that link together to create the students first interactive webpage along with creating an interactive webpage from a template.

Communication Systems -7502
20 weeks 1/2 Credit
This foundational course explores the fundamental principles of communication systems through hands-on, project-based learning. Key projects include silk screening a t-shirt, designing business cards, creating whiteboard animations, and producing public service announcements (PSAs). By working with industry-standard software applications such as Adobe Photoshop, students will gain practical experience in visual communication, graphic design, and multimedia production.

These Courses offered at Baker