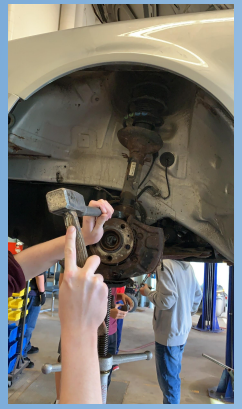
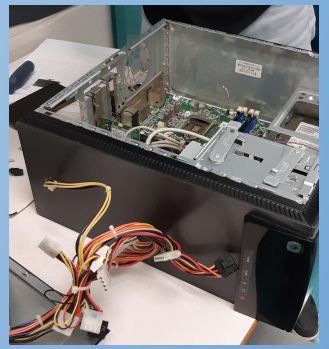
Sacred Heart H.S. Technology Department Electives



Grades 9 to 12



Technology Courses at Sacred Heart

Grade 9	Grade 10	Grade 11	Grade 12
• Technology and the Skilled Trades TAS1O	• Computer Engineering TEJ2O • Communications Technology TGJ2O • Construction Technology TCJ20 • Hairstyling and Aesthetics TXJ2O • Hospitality and Tourism TFJ2O • Technological Design TDJ2O • Transportation Technology TTJ2O • Manufacturing Tech	• Computer Engineering TEJ3M • Communications Technology TGJ3M • Construction Technology TCJ3C • Custom Woodwork TWJ3E • Hairstyling and Aesthetics TXJ3C (2026/7) • Hospitality and Tourism TFJ3C • Technological Design TDJ3M • Transportation Technology TTJ3C • Yearbook TGG3M • Manufacturing Tech	• Communications Technology TGJ4M • Construction Technology TCJ4C • Custom Woodwork TWJ4E • Hospitality and Tourism TFJ4C • Technological Design TDJ4M • Transportation Technology TTJ4C • Yearbook TGG4M

Three Reasons to Take a Technology Course?

1. You live in a time where all jobs have a technical aspect to them. Technology courses help you develop skills that you can draw upon no matter what job, career or pathway you follow.
2. Having a few skills is not only useful to you, but they can lead to an excellent career. There is currently a shortage of people with the required skills to program, design and make and repair the things our economy needs.
3. The courses are fun. They are hands on as you learn by doing. You will pick up skills. You just don't know how much you may enjoy something until you give it a go.

If you have questions about any courses please contact

Damien Brown-Graham.

Technology Dept Head

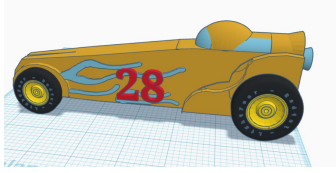
damien.brown-graham@ocsb.ca

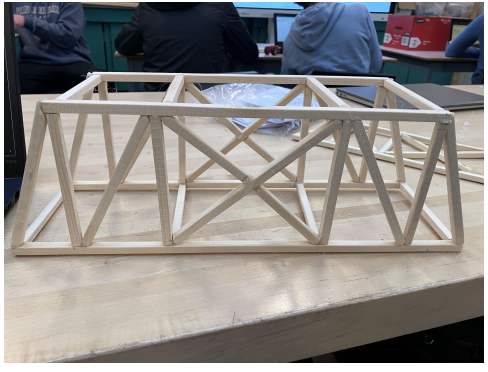
Technology and the Skilled Trades TAS1O

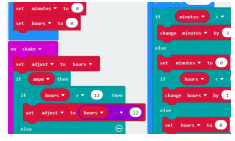
Grade 9

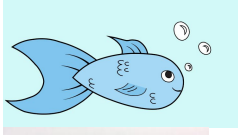
Technology and the Skilled Trades gives you an opportunity to explore a wide variety of technical experiences as you develop your understanding of how technology can is applied to solve real world problems. It is a Hands on course where you learn through projects. This course can also help you to make informed elective choices in Technological studies from grade 10 onwards.

Projects you can expect: 3D modeling and 3D Printing, Robotics, Woodwork, Transportation Modeling, Design, layout, and make stuff.

3D Modeling	Making the car
	





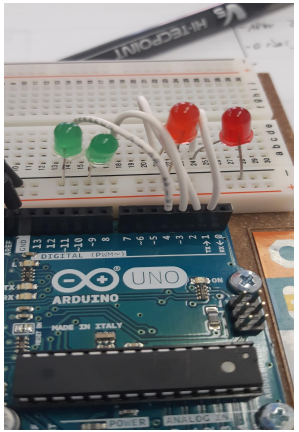


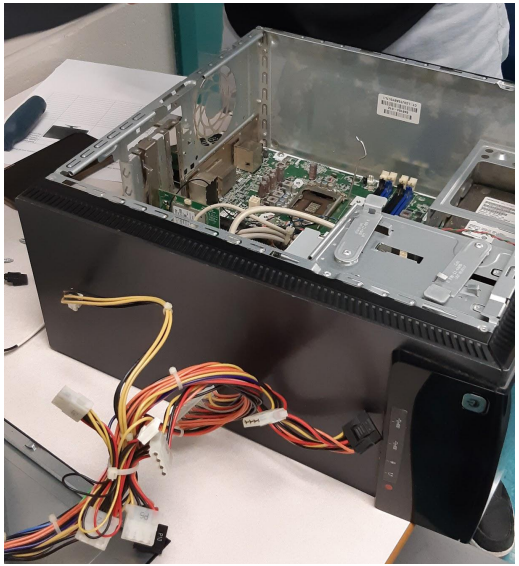
Computer Engineering TEJ2O and TEJ3M

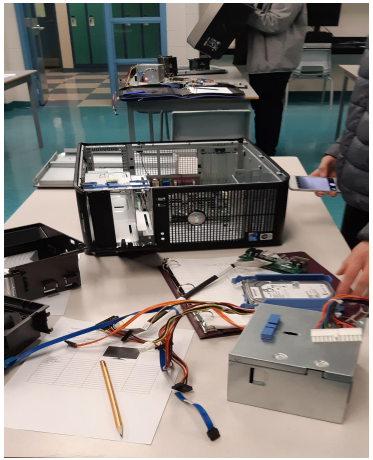
Grade 10 and 11

This course takes a look at computer hardware and software design, basic electronics and components with an introduction to robotics and mechatronics.

Typical projects: using an Arduino board to automate repetitive tasks. Perform a Computer dissection. Learn to code basic games.







Communications Technology TGJ2O, TGJ3M and TGJ4M

Gr 10, 11 and 12

This course takes a look at graphic design, web design, video and film editing, animation and sound editing. You will learn to use the Adobe suite of software including Photoshop, Dreamweaver, Premiere, Animate and Audition.

Typical projects: Magazine layout, Hand drawn computer aided animation, Commercial/Short video film and edit using green screen and special effects.

Construction Technology TCJ20, TCJ3C and TCJ4C

Grades 10, 11 and 12

Construction Technology is a great course to introduce you to the skills of residential home building and woodwork. At the different levels you will get an opportunity to learn about and apply the skills of construction as you build and finish real world structures and install system such as electrical and plumbing.

Typical hands on projects and experiences in Construction Technology: - Learn how to frame a building, install typical electrical circuits, install roofing on a structure, cast concrete.

Custom Woodwork TWJ3E and TWJ4E

Grades 11 and 12

If you like to build things then Custom Woodwork is a good course for you. This course allows you to learn how to design and build everyday items from wood. Through hands on projects you will learn how to transform lumber into finished objects that are not only functional but beautiful.

You will also have the opportunity to design and build your own custom creations in both the grade 11 and 12 levels. Students will also get an opportunity to make objects using leading edge technology like laser cutting and 3D Modeling.

Examples of projects built in Custom woodwork:- Small and large furniture, skateboards, household objects, boats and sporting goods.

Hairstyling and Aesthetics TXJ20, TXJ3O

NEW!

TXJ20 2025/6

TXJ3C 2026/7

In this **Hands On** Hairstyling and Aesthetics course students will explore the skills, tools and techniques used in the salon and personal care industries.

You will learn how to **prepare** and **care** for both your own and a clients hair. Have an opportunity to **Practice** cutting and styling techniques. **Discover** the chemistry and techniques used to colour hair.

Learn about the **tools and materials** used in different Aesthetics treatments. Discover how to **apply makeup**. Practice **nail** and **hand care**.

Hospitality and Tourism TFJ2O, TFJ3C and TFJ4C

Grades 10, 11 and 12

The Hospitality & Tourism classes have an emphasis on **cooking**. Students will learn about safe food handling practices and in our **hands-on cooking and baking labs**, students will have the opportunity to develop:

- **Culinary Skills** while preparing: breakfast foods, soups, salads, sandwiches, sauces, stir-fries, pastas, etc.
- **Baking & Pastry Applications** while preparing: cookies, muffins, scones, cakes, biscuits, breads, etc.

Students are encouraged to taste the food they prepare*.

Students will also explore careers in the **tourism industry** and develop:

- An awareness of cultural and economic forces that drive tourism trends.
- An understanding of environmental and societal issues in the tourism industry.

Students in the Hospitality & Tourism class will learn important **life skills** that will benefit them beyond the kitchen.

COURSE NOTE: For enhanced programming, there is a fee associated with this course. This course involves the use of a variety of food ingredients. Accommodations for food allergies and restrictions cannot be guaranteed.

@shhs_hospitality

Recipes

Technological Design TDJ2O, TDJ3M and TDJ4M

Grades 10, 11 and 12

Technological Design is a course that has a focus on using technical tools to help you design solutions to real world problems. It is a good place to explore engineering, graphic design, architecture and industrial design, all with a focus on real world problems. If you see yourself as a designer or engineer then you will get a real taste of what is involved. You will learn and apply many industry leading softwares such as Auto CAD, Illustrator and Inventor

Typical projects include:- Graphic design and printing of T shirts and logos, Fashion design, 3D modeling and printing, Architecture project, design of mechanisms and laser cutting. Final grade 12 project is self directed.

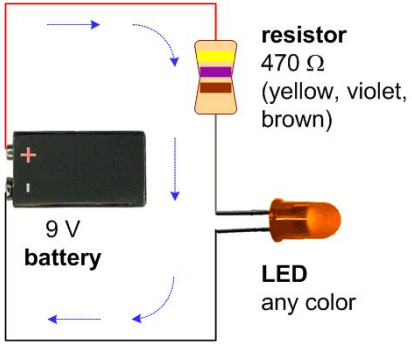
Transportation Technology TTJ2O, TTJ3C and TTJ4C

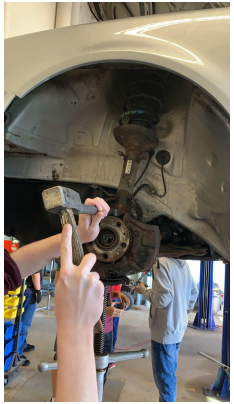
Grades 10, 11 and 12

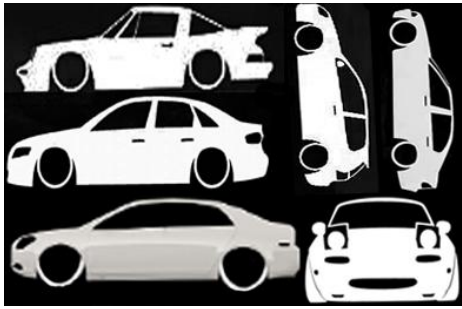
Mr. Blakely's YouTube Channel with videos demonstrating some lessons in class. Use of CAD (Onshape, Fusion 360). TTJ Courses offer an introduction to Automotive service.

Basic Metal work projects completed with transportation technology courses.

https://www.youtube.com/channel/UCDGiHxRZJehm8otEL52uqOQ







Yearbook TGG3M and TGG4M

Grades 11 and 12

Students in the Yearbook class are the leaders to **capture**, **design**, and **create** a quality yearbook that reflects the year at Sacred Heart High School.

In this hands-on class, students work collaboratively to develop **photography**, **written language/journalism**, and computer **graphic design** skills.

Students will gain useful, real world skills in time management, marketing, and teamwork through **real world projects**.

Select this link to view or print a table outlining all of the available Technology Courses at Sacred Heart

Manufacturing Technology TMJ2O and TMC3C Grade 10 and 11

Manufacturing Technology is a hands on course that explores the processes, tools and materials used in precision manufacturing. Students will learn how to build precise models using 3D modeling software. Use a variety of CNC machinery to make the models into real life projects.

In this course you will use Onshape and Fusion 360 software to create models and become familiar with CNC processes on Sacred Hearts CNC Mills and Plasma Cutter. Hands on project based learning that opens pathways in to the lucrative precision manufacturing industry.