MECHANICAL ENGINEERING TECHNICIAN (METN)

Are you fascinated by the design and construction of mechanical devices?

Mechanical engineering technicians are essential spokes in the wheels of almost every industry by innovating, problem-solving, and providing insights into how all types of machinery work. Your computer is your go-to tool. You'll use programs like AutoCAD and SolidWorks to create and analyze designs, run simulations, and test how machines will operate. You'll explore manufacturing techniques like 3D printing and CNC machining throughout the program. On-campus labs will bring your 3D designs to life.

Upon graduation, you can boost your leadership and technical skills by applying to enter directly into the final year of Cambrian's Mechanical Engineering Technology (METY) program and open the door to more career opportunities.

Program highlights

- Computer-aided design (CAD) tools like AutoCAD and SolidWorks
- Explore manufacturing techniques like 3D printing and CNC machining
- Real-world community and applied research projects in state-of-the-art labs
- Grads can apply for the final year of Cambrian's Mechanical Engineering Technology program
- Careers available in variety of industries including mining, health care, manufacturing, and more
- Graduates may be eligible to register as a Certified Technician (C.Tech) with the Ontario Association of Certified Technicians and Technologists (OACETT)

Program of study for 2027-28 Academic Year

Semester 1		**Credits**
CAD 1001	Engineering Graphics	3
ELC 1013	Electrical Fundamentals	4
ENG 1002	College Communications	3
MEC 1002	Introduction to Metrology and Geometric Dimensioning	3
MEC 1003	Engineering Materials	3
MTH 1050	Algebra I	3
PHY 1112	Physical Principles I [1]	4
	Credits	**23**
Semester 2		
CAD 1003	Solid Modeling [1]	3
MCH 1153	Mechanical Lab I [1]	3
MCH 1165	Industrial Design I [1]	3
MCH 1207	Fluid Mechanics	4
MTH 1250	Algebra II	3
PHY 1212	Physical Principles II	3
One General Education Course [2]		3
	Credits	**22**
Semester 3		
ENG 1754	Technical Communication	3
MCH 1301	Dynamics of Machines [1]	3
MCH 1303	Strength of Materials	5
MCH 1365	Industrial Design II [1]	3
MTH 2325	Technical Math III	3
MTH 2332	Applied Calculus	3
One General Education Course. [2]		3
	Credits	**23**
Semester 4		
CAD 1004	Advanced Solid Modelling [1]	4
INT 1001	Instrumentation I	3
MCH 1002	Thermodynamics	3
MCH 1401	Advanced Structural Design	4
MCH 1402	Materials and Processes	3
MCH 1410	Codes and Standards	3
One General Education Course. [2]		3
	Credits	**23**
	Total Credits	**91**

[1] Course with Lab Component

[2] For more information regarding General Education courses, click here (https://cambriancollege.ca/general-electives/).

Admission requirements

For graduates of the new curriculum (OSS): Ontario Secondary School Diploma (30 credits) or equivalent or mature student status, including:

- Any grade 12 English (C) or (U)
- Any grade 12 mathematics (C) or (U) (MCT4C is highly recommended)

Additional admission requirements

Recommendations

- Any grade 11 or 12 physics (C) or (U)

Program delivery

2027-2028
Fall term start

SEMESTER 1: Fall 2027
SEMESTER 2: Winter 2028
SEMESTER 3: Fall 2028
SEMESTER 4: Winter 2029

Employment opportunities

Graduates may find employment in areas such as:

- Consulting engineering firms
- Manufacturing companies
- Resource industries
- Mechanical designer
- Sales representative
- Government departments