

# MINING ENGINEERING TECHNICIAN (MNTN)

## Live and learn in one of the world's mining centres

Located in the heart of the mining industry in Sudbury, Ontario, our industry-experienced faculty prepares you to become an active member of mining engineering teams responsible for a wide range of projects in this dynamic and ever-changing industry. You'll explore surveying, drafting, design, mine safety, geological and geotechnical fieldwork, ventilation, ground control, and mine planning.

The program includes hands-on activities at the end of first year where you will gain a broad understanding of the various aspects of mining engineering as well as communication and leadership skills. Upon graduation, you may choose to continue your studies in the mining engineering technology advanced diploma program (MNTY).

## Program highlights

- Gain a solid foundation in surveying, geology, AutoCAD, mine development, mine ventilation, and more
- 10-day field school
- Field trips to mine sites and/or mining suppliers when available
- Networking opportunities including the Canadian Institute of Mining, Metallurgy and Petroleum (CIM) Student Night event
- Graduates can seek membership with the Ontario Association of Certified Engineering Technicians and Technologists (OACETT) to become certified as a C.Tech. (Certified Technician)

## Program of study for 2024-25 Academic Year

Students are required to successfully complete an online Lab Safety course (in Moodle) when starting their program at Cambrian. This course must be completed prior to entering the labs (as identified in the table below) in the Schools of Skills Training, Engineering Technology and Environmental Studies.

Semester 1		Credits
ENG 1002	College Communications	3
GEO 1100	Geology I <sup>1</sup>	4
MTH 1050	Algebra I	3
MNG 1101	Introduction to Mining <sup>1</sup>	3
CHM 1206	Chemistry for the Geosciences	3
MNG 1130	Surveying I - Mining	4
One General Education course. <sup>2</sup>		3
<b>Credits</b>		<b>23</b>
Semester 2		
ENG 1754	Technical Communication	3
MNG 1014	Mineral Resources Field Camp <sup>1</sup>	1
GEO 1212	Geology II <sup>1</sup>	3
MNG 1202	Mine Engineering Graphics	3
MNG 1200	Mining Methods <sup>1</sup>	4
MTH 1250	Algebra II	3
MNG 1230	Surveying II - Theory	3
MNG 1231	Surveying II - Lab	3
<b>Credits</b>		<b>23</b>

## Semester 3

GEO 2305	Geological Field & Data Collection <sup>1</sup>	5
MTH 2325	Technical Math III	3
MNG 2301	Mining Health and Safety <sup>1</sup>	3
MNG 2341	Mine Layouts and Planning <sup>1</sup>	4
MNG 2303	Mine Equipment <sup>1</sup>	3
MNG 2340	Technical Computer Applications <sup>1</sup>	3
One General Education course. <sup>2</sup>		3
<b>Credits</b>		<b>24</b>

## Semester 4

GEO 2420	Intro To Structural Geology <sup>1</sup>	4
MNG 1015	Ground Control <sup>1</sup>	4
MNG 2435	Applied Mine Survey and GIS <sup>1</sup>	3
MNG 2302	Mine Blasting Techniques	3
MNG 2430	Mineral Resources and Economics <sup>1</sup>	4
MNG 2426	Mine Services and Vent I	4
One General Education course. <sup>2</sup>		3
<b>Credits</b>		<b>25</b>
<b>Total Credits</b>		<b>95</b>

<sup>1</sup> Course with Lab Component

<sup>2</sup> 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 12 physics (C) or (U)
- Any grade 12 chemistry (C) or (U)
- Computer competency in relevant software

## Program delivery

### 2024-2025

#### Fall term start

SEMESTER 1: Fall 2024

SEMESTER 2: Winter 2025

SEMESTER 3: Fall 2025

SEMESTER 4: Winter 2026

## Specific program pathway

Graduates of Cambrian's MNTN program may apply to enter directly into Semester 5 of the Mining Engineering Technology (<https://cambriancollege.ca/programs/mining-engineering-technology/>) (MNTY) program.

### College or university degree opportunities

If you are a graduate of this program, you may continue your studies at a college or university and you may receive credit(s) for your prior college education. Refer to Cambrian's college and university agreement (<https://>

[cambriancollege.ca/admissions/academic-planning/pathways/](http://cambriancollege.ca/admissions/academic-planning/pathways/)) details for further information.

## Employment opportunities

Graduates may find employment in mineral resources exploration or in the operations of surface or underground mines. Graduates may be employed in a mine engineering office or in mine production. Some graduates may find work in more specialized areas such as:

- Mine Surveying
- Ground control
- Mine ventilation
- Mine safety
- Field exploration
- Mine Geology
- Mine Planning

## Contacts

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