Insulator (Heat and Frost)

SCHOOL OF CONSTRUCTION

Overview

Learn to apply, remove and repair thermal and acoustical insulation on all types of commercial and industrial equipment – such as calcium silicate, glass foam, mineral wool, Styrofoam and fibreglass.

Throughout your career, you'll:

- read and interpret drawings and specifications to determine insulation requirements
- select the type and amount of insulation to be installed
- determine the method of securing the insulation according to different factors like the type and shape of the surface, whether the equipment is cold or hot, if the equipment is inside or outside or what the equipment is going to be used for
- measure, cut and fit insulating material and coverings to the required shape and dimension
- install vapour barriers
- finish insulated surfaces by applying metal cladding, canvas, plastic sheet or cement.

Traits, skills and aptitudes

Insulators are skilled tradespeople comfortable working at heights, collaborating with others and working independently. This line of work is most fulfilling for those who enjoy working with their hands and are driven by quality, precise work.

To succeed in this trade, you should:

- enjoy creative problem-solving
- pay attention to detail
- produce precise work
- have manual dexterity
- have the strength and stamina to work with heavy glass materials
- be comfortable working at various elevations, in confined spaces and in hot and cold environments
- be able to work alone or in a team environment
- be committed to maintaining safe work habits.

Credentials

Upon successfully completing the required working hours and technical training periods, you'll be awarded a diploma in addition to journeyperson status by Alberta's Apprenticeship and Industry Training.

This is a Red Seal Endorsed trade – a recognizable standard that allows tradespeople to work across Canada.

Admission requirements

To enter an apprenticeship, you must have the educational qualifications required or recommended education for the trade to which you apply.

Entrance requirements are monitored and set by Alberta Apprenticeship and Industry Training.

Minimum requirements

Successful completion of the following courses:

- English 10-2
- Math 10-3
- Science 10

OR

A pass mark in all five Canadian General Educational Development (GED) or Canadian Adult Education Credential (CAEC) tests

OR

Alberta Apprenticeship and Industry Training Entrance exam.

Recommended requirements

Apprentices with an Alberta High School Diploma that includes the following courses:

- English 30-2
- Math 30-3
- Physics 20 OR Chemistry 20 OR Science 20
- Related career and technology studies (CTS) courses

Costs

2026/27 tuition and fees

The following costs are effective as of July 1, 2026.

Period	Number of weeks	Tuition fees	Additional fees	Total
1	6	$942	$338	$1,280
2	6	$942	$338	$1,280
3	6	$942	$338	$1,280
4	6	$942	$338	$1,280
			Total cost:	**$5,120**

The estimated total cost of tuition and fees in each period of technical training.

Books and Supplies

This is a bring-your-own-device program with standard computer hardware and software requirements. See the specific requirements on our computers and laptops page.

Books or modules, along with other items for classes, are approximately $600 per period.

We recommend you don't purchase books or modules ahead of time as they might be outdated by the time you attend classes, and they cannot be returned to the Bookstore.

This program requires personal protective equipment (PPE), which may be an additional cost.