CARPFD – Carpenter Foundation

Trades

Effective Term & Year: Fall 2022
Program Outline Review Date: 2026-03-01

Program Area: Trades Foundation Training

Description:

This comprehensive 24 -week Carpenter Foundation (pre-apprenticeship) program provides students with the skills, knowledge and training necessary to enter the various sectors of the construction industry (residential, light commercial, light industrial or the heavy construction) and covers the program competencies for Level 1 of the four-level Carpenter Apprenticeship program. Content covered includes construction drawings, building codes and bylaws, hand tools, portable and stationary power tools, ladders and scaffolds, concrete formwork, work frame construction as well as survey instruments and equipment. The program includes classroom theory, demonstrations, and practical hands-on training in a carpenter workshop setting. Safe work habits are emphasized, reinforced and practiced throughout the program.

Credentials Granted:

Upon successful completion of the 24-week Carpenter Foundation program, students receive:

- Level 1 Technical Training credit from SkilledTradesBC of the 4 Level Carpenter Apprenticeship program
- Certificate of Completion Carpenter Foundation from SkilledTradesBC
- College of the Rockies Carpenter Foundation Certificate
- Credit for 450 Work-based Training hours from SkilledTradesBC

Delivery Methods: On-Campus (Face-to-Face), Online

Program Duration: 24 weeks

Instructional Activity and Hours:

Activity	Hours
Instructional Hours (hrs/wk)	28 hrs/wk
Directed Studies (hrs/wk)	2 hrs/wk
Total (hrs/wk)	30 hrs/wk
Total Program Hours	720 hours

Content Weighting:

Activity	Percentage
Theory	50%
Practical Skills	50%

Admission Requirements:

Secondary school graduation or equivalent, or completion of a College of the Rockies assessment to an acceptable level.

Highly Recommended Admission Prerequisites:

The following education is **highly** recommended for student success within the program:

- Workplace MATH 10 and Apprenticeship MATH 12. Either Apprenticeship and Workplace Math 11, Trades Mathematics 11, or equivalent
- Either English 12, English Studies 12, English First Peoples 12, ENGL 090, or equivalent (refer to Course Equivalency information on the College Website)

Flexible Assessment:

Credit can be awarded for this program through Flexible Assessment.

Program Transfer Credit:

For information about block transfer agreements between programs in British Columbia, Alberta, and elsewhere, please visit http://www.cotr.bc.ca/transfer.

To minimize transfer issues, check with an academic advisor at the institution that will receive

the transfer credits.

Textbooks and Required Resources:

Textbook selection varies by instructor and may change from year to year. At the Program Outline Effective Date the following textbooks were in use (most current edition):

Carpenter Apprenticeship Competencies Level 1, Queen's Printer

WorkSafeBC and OHS Regulations (free online access)

Optional:

BC Building Code – 2018

Stephenson, T. (2014) *Understanding Construction Drawings* (3rd ed). Nelson Education Ltd.

Vogt, F. *Carpentry* (3rd Canadian Ed). Nelson Education Ltd

Program Competencies and Technical Training Content:

Upon the successful completion of this program, students will be able to:

CAAP 101 Safe Work Practices

- Apply shop and site safety practices
- Apply personal safety practices

CAAP 102 Documentation and Organizational Skills

- Use construction drawings and specifications
- Interpret building codes and bylaws
- Plan and organize work
- Perform trade math

CAAP 103 Tools and Equipment

- Use hand tools
- Use portable power tools
- Use stationary power tools

CAAP 104 Survey Instruments and Equipment

- Use leveling instruments and equipment

CAAP 105 Access, Rigging and Hoisting Equipment

- Use ladders, scaffolds and access equipment
- Use rigging and hoisting equipment

CAAP 106 Site Layout

- Lay out building locations

CAAP 107 Concrete Formwork

- Use concrete types, materials, additives and treatments
- Select concrete forming systems
- Build footing and vertical formwork
- Build slab-on-grade forms and suspended slab forms
- Install reinforcement and embedded items
- Place and finish concrete

CAAP 108 Wood Frame Construction

- Describe wood frame construction
- Select framing materials
- Build floor systems
- Build stair systems
- Build decks and exterior structures

CAAP 109 Building Science

- Control the forces acting on a building

Evaluation and Assessment:

CARPENTER FOUNDATION

COTR COURSE	SUBJECT COMPETENCIES	THEORY WEIGHTING	PRACTICAL WEIGHTING
CAAP 101	Safe Work Practices	6%	3%
CAAP 102	Documentation and Organizational Skills	16%	12%
CAAP 103	Tools and Equipment	17%	16%
CAAP 104	Survey Instruments and Equipment	6%	6%

CAAP 105	Access, Rigging and Hoisting Equipment	15%	15%
CAAP 106	Site Layout	2%	3%
CAAP 107	Concrete Formwork	20%	30%
CAAP 108	Wood Frame Construction	16%	15%
CAAP 109	Building Science	2%	0%
	Total	**100%**	**100%**
In-School Theory/Practical Subject Competency Weighting		50%	50%
Final in-school percentage score Students must achieve a minimum 70% overall as the final in-school percentage score		**IN-SCHOOL %**	

Pass Requirements:

- Successful completion of the in-school training is defined as a final overall minumum of 70% to meet SkilledTradesBC standards.
    - Students must maintain an acceptable level of attendance, complete all assigned projects and pass all exams to successfully complete the program.
    - Complete of allWorkplace Health and Safety courses within the program.

Students must provide their own:

- Safety-toed leather work boots
- Safety glasses
- Coveralls/carpenter’s apron
- Gloves
- Computer
- Pens, pencils, three-ring binder, paper
- Calculator

Workplace Health and Safety Courses:

Workplace Hazardous Material Information System (WHMIS: PVHE-700)

Fall Protection (PVHE-517)

Basic First Aid – (PVHE-100)

Workplace Health and Safety Courses Grade Scheme:

COM	NCG

Completed to the minimum defined standard	No credit granted – less than minimum defined standard

Academic Policies:

College of the Rockies policies related to courses can be found at https://cotr.bc.ca/about-us/college-policies/ and include the following:

- Policy 2.4.3 Students with Documented Disabilities
- Policy 2.4.4 Student Conduct (plagiarism, other cheating, behavioral misconduct)
- Policy 2.4.8 Academic Performance
- Policy 2.5.3 Grade Appeal
- Policy 2.4.9 Student Concerns Re Faculty

Program Grade

COM	NCG
Completed to the defined standard – 70% or greater	No Credit Granted – less than 70%

Program Changes:

Information contained in program outlines is correct at the time of publication. Content of the program is revised on an ongoing basis to ensure relevance to changing educational, employment, and marketing needs. The instructor endeavours to provide notice of changes to students as soon as possible. The instructor reserves the right to add material to programs.

Industry Training:

The program competencies and technical training content delivered in this program follow the SkilledTradesBC Program Outline for this trade.

Safety Catalog:

WorkSafeBC regulations apply to all trades programs. Students are expected to follow all safe work practices and have high regard for the safety of others as well as of themselves. Students are responsible to wear personal protective equipment (PPE) as directed. At a minimum, students must provide and wear approved safety footwear and eyewear at all times in the shop. Additional PPE may be required for specific tasks. Students are expected to wear clothing suitable for working safely in the shop.