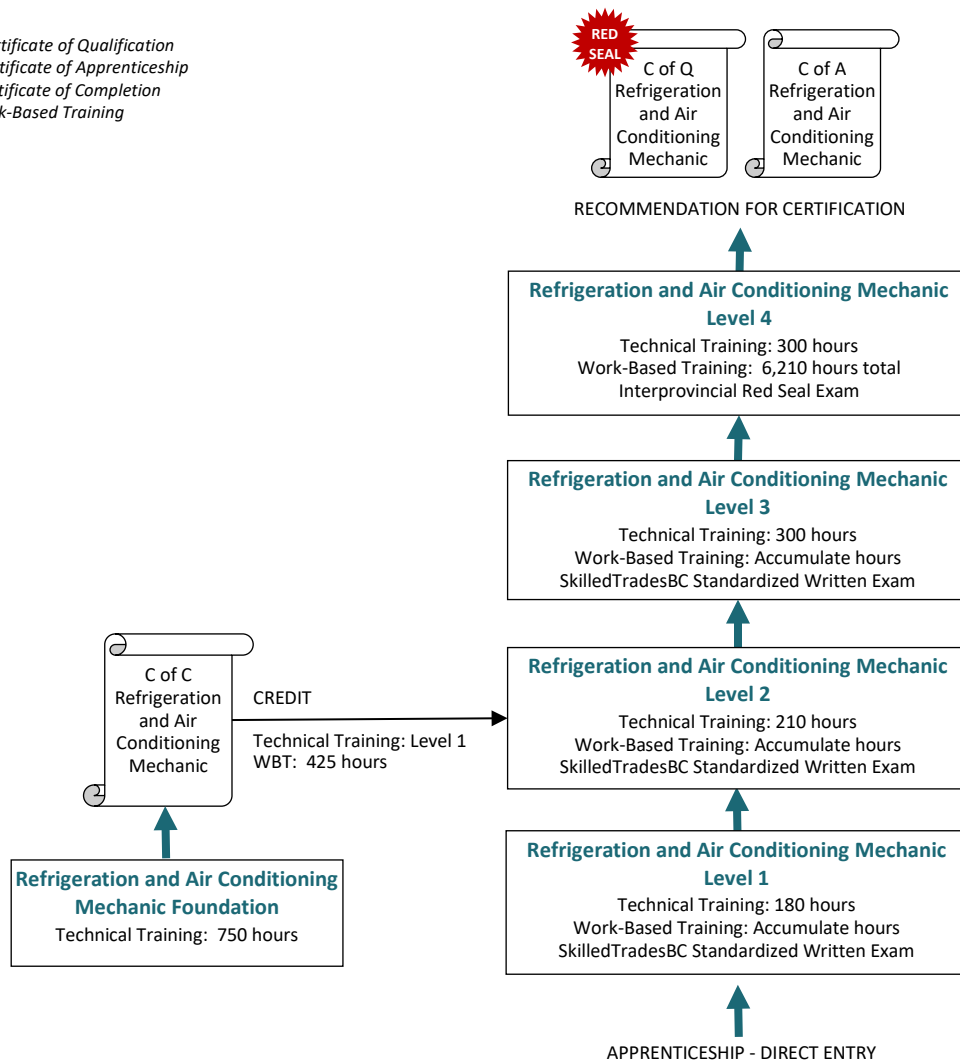


Program Credentialing Model

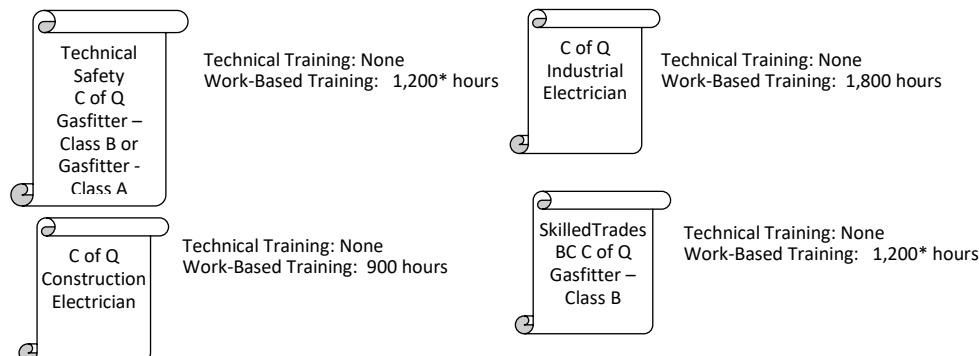
C of Q = Certificate of Qualification
C of A = Certificate of Apprenticeship
C of C = Certificate of Completion
WBT = Work-Based Training



CROSS-PROGRAM CREDITS

Individuals who hold the credentials listed below are entitled to receive partial credit toward the completion requirements of this program

Please note: Certifications obtained outside of British Columbia may not be eligible for the same credit towards certification in this trade. Please contact SkilledTradesBC to verify the Cross-Program Credits applicable to out-of-province certifications.



* Individuals who are holders of more than one of these credentials will only be awarded credit for up to 1,200 hours total

Training Topics and Suggested Time Allocation – Level 1

REFRIGERATION AND AIR CONDITIONING MECHANIC

		% of Time Allocated to:			
Level 1		% of Time	Theory	Practical	Total
Line A	PERFORM SAFETY RELATED FUNCTIONS	7%	80%	20%	100%
A1	Maintains Safe Work Environment		✓		
A2	Use Personal Protective Equipment (PPE) and Safety Equipment		✓	✓	
A3	Perform Lock-Out and Tag-Out Procedures		✓	✓	
A4	Practice Fire Prevention		✓		
Line B	USE TOOLS AND EQUIPMENT	7%	60%	40%	100%
B1	Use Hand Tools and Equipment		✓		
B2	Use Portable and Stationary Power Tools		✓		
B3	Use Cutting, Brazing and Soldering Equipment		✓	✓	
B4	Use Charging, Evacuation and Recovery Tools		✓	✓	
B5	Use Diagnostic and Measuring Tools and Equipment		✓	✓	
B6	Use Access Equipment		✓		
B7	Use Rigging, Hoisting, Lifting and Positioning Equipment		✓		
B8	Use Digital Technology		✓		
Line C	PERFORM ROUTINE TRADE ACTIVITIES	28.5%	70%	30%	100%
C1	Apply Mathematics and Science		✓		
C2	Interpret Drawings and Specifications		✓	✓	
C3	Use Codes, Regulations and Standards		✓	✓	
C4	Use Manufacturer and Supplier Documentation		✓		
C5	Organize Work and Maintain Records		✓		
C6	Select Refrigerants, Compressed Gases and Oils		✓		
C7	Apply Sealants and Adhesives		✓		
C8	Select HVAC/R Components and Accessories		✓		
C9	Select Fasteners, Brackets and Hangers		✓		
C10	Install Valves		✓		
Line D	USE COMMUNICATION TECHNIQUES	1.5%	100%	0%	100%
D1	Use Communication Techniques		✓		
Line E	APPLY ELECTRICAL CONCEPTS	28.5%	70%	30%	100%
E1	Use the Principles of Electricity and Electronics		✓	✓	
E2	Use Electrical Wiring Diagrams and Schematics		✓		
E3	Apply Motor and Motor Control Theory		✓	✓	
E4	Select Control Systems		✓		
E5	Apply Wiring Practices		✓		
Line F	APPLY REFRIGERATION AND AIR CONDITIONING THEORY	3%	100%	0%	100%
F1	Analyze Heat Pumps and Air Conditioning Systems		✓		
F2	Analyze Refrigeration Systems		✓		

		% of Time Allocated to:			
Level 1		% of Time	Theory	Practical	Total
Line G	PLAN REFRIGERATION AND AIR CONDITIONING INSTALLATIONS	6%	100%	0%	100%
G1	Perform Work Site Preparation		✓		
G2	Plan HVAC/R System Installation		✓		
Line H	INSTALL REFRIGERATION AND AIR CONDITIONING SYSTEMS	14%	70%	30%	100%
H1	Install HVAC/R Piping and Tubing		✓	✓	
H2	Install HVAC/R Systems		✓		
H3	Install Control Systems		✓		
Line L	SERVICE REFRIGERATION AND AIR CONITIONING SYSTEMS	4.5%	100%	0%	100%
L1	Maintain HVAC/R Systems		✓		
Total Percentage for Refrigeration and Air Conditioning Mechanic Level 1		100%			