

Steamfitter-Pipefitter Consultation Guide

SUBMISSIONS DUE: March 08, 2019

Introduction

This consultation guide is sent on behalf of the Steamfitter-Pipefitter Provincial Advisory Committee (PAC). All PACs are established by the Apprenticeship and Certification Board (Board) and make recommendations regarding technical training and the content of regulations.

Before it makes any recommendations, the PAC must seek input from stakeholders in the trade. This discussion guide has been created to solicit your feedback in order to inform the final recommendations.

Background

The trade regulation for Steamfitter-Pipefitter was registered on January 8, 2009 and updated in 2011. The new Steamfitter-Pipefitter technical training program was realigned to reflect the new interprovincial standard.

Recommended Changes and Potential Impacts

A. Training Standards

The **Steamfitter-Pipefitter** PAC is asking for your feedback on the proposed Level Chart (Appendix A) which outlines the units in each level of technical training. You may refer to the existing Level Chart (Appendix B) for comparison. Do you agree or disagree with the changes to the Level Chart? If you disagree, what changes would you recommend?

B. Regulatory

Scope

Recommended Changes	Potential Impacts
The PAC is recommending that the “piping systems” definition be amended to refer to piping equipment, tubing, fittings, supports and accessories used for processes in any installation. The current regulation stipulates that the processes are only used in industrial, commercial or institutional installations.	The intent is to include the residential sector in the definition to identify where piping system installations may occur. Since steamfitter-pipefitter is a compulsory trade, only registered apprentices or certified journeypersons may perform work on these tasks of the trade.

Minimum Wage Rates

This is the minimum wage rate that must be paid to an apprentice, and employers may choose to pay more.

The current minimum wage rate for apprentices is based on the steamfitter-pipefitter journeyman minimum wage rate that is identified in the Construction Industry Minimum Wage Regulation or the prevailing wage rate of a journeyman who is employed on the same contract as the apprentice.

As of January 1, 2017, the steamfitter-pipefitter journeyman minimum wage rate is \$37.00 per hour. This is the reference wage rate for apprentice minimum wage rates in the trade.

Level	Current Wage Rate	Amt	Proposed Wage Rate	Amt
Level One	40% of the reference wage rate.	\$14.80	50% of the reference wage rate.	\$18.50
Level Two	50% of the reference wage rate.	\$18.50	60% of the reference wage rate.	\$22.20
Level Three	60% of the reference wage rate.	\$22.20	70% of the reference wage rate.	\$25.90
Level Four	70% of the reference wage rate.	\$25.90	80% of the reference wage rate.	\$29.60
Level Five	80% of the reference wage rate.	\$29.60	90% of the reference wage rate.	\$33.30

Response

The deadline for written comments on the proposed recommendations is March 08, 2019. You may also include additional comments for consideration. You may be contacted for more information regarding your response.

Feedback gathered will be considered by the PACs as they review and confirm their final recommendations to the Board.

Contact Information

Written submissions (including electronic submissions) may be sent to:

Steamfitter-Pipefitter
Provincial Advisory Committee
C/o Manager, Policy, Legislation and Board Operations
Apprenticeship Manitoba
100 – 111 Lombard Ave
Winnipeg MB, R3B 0T4
Phone: 204-945-3337
Fax : 204-948-2539
E-mail: apprenticeshipboard@gov.mb.ca

Appendix A
Proposed Level Chart: Harmonized Steamfitter-Pipefitter Technical Training
Level Chart: Steamfitter-Pipefitter - Technical Training 2019

Note: Each subunit requires 70% pass

Level One (9 weeks)				Level Two (9 weeks)			
Code	Unit Title	T	P	Code	Unit Title	T	P
A1	SAFETY AND ORIENTATION			B1	TOOLS AND EQUIPMENT II		
A1a	Safety and Orientation	6	0	B1a	Tools and Equipment II	7	0
A1b	Learning About Work	5	0	B1b	Advanced Hoisting, Lifting, and Rigging	7	0
A1c	Communications and Trade Communication	14	0	B2	FABRICATION II		
A2	TOOLS AND EQUIPMENT			B2a	Spool and Fitting Fabrication	8	14
A2a	Tools and Equipment I	10	0	B2b	Stainless Steel Piping	8	7
A2b	Access Equipment	5	0	B2c	Specialty Piping	24	0
A3	RIGGING, HOISTING AND LIFTING			B2d	Industrial Drawings I	15	0
A3a	Rigging, Hoisting and Lifting	12	0	B2e	GTAW Welding	5	20
A4	LAYOUT			B3	LAYOUT II		
A4a	Pipe, Tube and Tubing, and Fundamentals Theory I	10	0	B3a	Industrial Drawings II	15	0
A4b	Copper Tube and Tubing Theory	10	0	B3b	Template Development	15	0
A4c	Plastic Piping Theory	5	0	B4	HYDRONIC SYSTEMS		
A4d	Black Iron Piping Theory	20	0	B4a	Hydronic Systems	40	16
A5	FABRICATION I			B4b	Hydronic System Controls	14	4
A5a	Pipe, Tube and Tubing, and Fundamentals Theory II	11	0	B4c	Cross Connection Controls Awareness	7	0
A5b	Copper Tube and Tubing Practical	0	18	B5	HEAT TRACING SYSTEMS (INCLUDES LIQUID)		
A5c	Plastic Piping Practical	0	7	B5a	Hydronic Heat Trace Systems	16	9
A5d	Black Iron Piping Practical	0	35	B5b	Hydronic Heat Trace System Controls	7	2
A5e	Introduction to Welding, Arc Welding and Cutting	5	20	B6	MATHEMATICS II		
A6	VALVES			B6a	Mathematics II (includes heat load calculations, fan laws and pumps.	20	0
A6a	Piping Valves	7	0	B7	SCIENCE II		
A7	MATHEMATICS I			B7a	Science II	15	0
A7a	Mathematics I	20	0	B8	ELECTRICAL II		
A8	SCIENCE I			B8a	Electrical II	20	0
A8a	Science I	20	0				
A9	ELECTRICAL I						
A9a	Electrical I	25	0				
A10	DRAWINGS & BLUEPRINTS						
A10a	Drawings	15	0				
A10b	Blueprints	15	0				
A11	GAS CODE						
A11a	Gas Code	20	0				
	Subtotals	235	80		Subtotals	243	72
	Total	315 Hours			Total	315 Hours	

Level 5: Steamfitter/Pipefitter (Domestic Gasfitter Level 2)

Level Five (10 Weeks)			
Code	Unit Title	T	P
E1	Gas/Safety Control Requirements	28	7
E2	Supply Air/Venting Permit Requirements	28	6
E3	Gas Burning Equip. and Materials Determination/Burner Orifice Sizing/Conversion Work	20	18
E4	Longest Run/Gas Burning Equip. BTUH Input Demand, Systems/Pipe Size Determination/Pressure and Measurement Requirements	28	14
E5	Tests/Inspects Piping and Gas Appliance Efficiency	16	17
E6	Electrical Requirements	70	35
E7	Orientation II: The Job of Journeywork	14	0
E8	Applied Trade Projects	0	35
E9	Alternate Fuel Systems	14	0
	Subtotals	218	132
	Total	350 hrs	

Note: Grey area Units speak to the Gasfitter trade content.

Appendix B
Level Chart: Steamfitter-Pipefitter - Technical Training

Level One (9 weeks)				Level Two (9 weeks)			
Code	Unit Title	T	P	Code	Unit Title	T	P
A1	Introduction to Your Apprenticeship	7	0	B1	Industrial Drawings	30	0
A2	Trade Safety Awareness	7	0	B2	Template Development	20	0
A3	Tools and Equipment	15	0	B3	Spool and Fitting Fabrication	8	14
A4	Access Equipment	5	0	B4	Advanced Hoisting, Lifting and Rigging	14	0
A5	Communications and Trade Communication	7	0	B5	Stainless Steel Piping	8	10
A6	Hoisting and Lifting and Rigging	12	0	B6	Fiberglass Piping	3	0
A7	Mathematics/Science I	40	0	B7	Specialty Piping	21	0
A8	Pipe, Tube and Tubing and Fundamentals	21	0	B8	Hydronic Systems	66	25
A9	Piping Valves	10	0	B9	Hydronic Systems Controls	21	6
A10	Copper Tube and Tubing	12	20	B10	Cross Connection Controls	7	0
A11	Plastic Piping	7	5	B11	Mathematics/ Science II	40	0
A12	Black Iron Piping	30	35	B12	Arc welding	7	15
A13	Drawings and Blueprints	30	0				
A14	Introduction to Welding, Fuel brazing and Cutting	7	15				
A15	Gas Code	20	0				
A16	Electrical	10	0				
	Subtotals	240	75		Subtotals	245	70
	Total	315 Hours			Total	315 Hours	

Level Three (9 Weeks)				Level Four (8 Weeks)			
Code	Unit Title	T	P	Code	Unit Title	T	P
C1	Low Pressure Steam Systems	35	20	D1	Process Piping Systems	77	0
C2	High Pressure Steam Systems	49	30	D2	System Testing and Commissioning	20	0
C3	Condensate Return Systems	30	7	D3	Quality Control	10	0
C4	Hydraulic Systems	7	6	D4	Job Planning	10	0
C5	Compressed Air Systems	7	7	D5	Gas Code III	20	5
				D6	Electrical III	20	10
C6	Medical Gas and Gas Piping Systems	7	0	D7	Mathematics/Sciences IV	40	0
C7	Mathematics/Sciences III (includes heat load calculations, fan laws, & pumps)	40	0	D8	National Requirements Review	35	33
C8	Refrigeration Systems	15	0				
C9	Gas Code II	20	5				
C10	Electrical II	20	10				
	Subtotals	230	85		Subtotals	232	48
	Total	315 Hours			Total	280 Hours	

Level 5: Steamfitter (Gasfitter B Level 2)

Level Five (10 Weeks)			
Code	Unit Title	T	P
E1	Gas/Safety Control Requirements	28	7
E2	Supply Air/Venting Permit Requirements	28	6
E3	Gas Burning Equip. & Materials Determination/Burner Orifice Sizing/Conversion Work	20	18
E4	Longest Run/Gas Burning Equip. BTUH Input Demand, Systems/Pipe Size Determination/Pressure & Measurement Requirements	28	14
E5	Tests/Inspects Piping & Gas Appliance Efficiency	16	17
E6	Electrical Requirements	70	35
E7	Mentoring/Coaching	14	0
E8	Applied Trade Projects	0	35
E9	Alternate Fuel Systems	14	0
	Subtotals	218	132
	Total	350 hrs	