## **Apprenticeship** Manitoba

## Level Chart: Steamfitter/Pipefitter - Technical Training

Level One (9 weeks)				Level Two (9 weeks)			
Code	Unit Title	Т	Р	Code	Unit Title	Т	Р
A1	Orientation I: The Structure and Scope	7	0	B1	Industrial Drawings	30	0
	of Steamfitter-Pipefitter Trade Learning						
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, Lifting, and Rigging	12	0	B6	Fibreglass Piping	3	0
A7	Mathematics/Science I	40	0	B7	Specialty Piping	21	0
A8	Pipe, Tube, and Tubing Fundamentals	21	0	B8	Hydronic Systems	66	25
A9	Piping Valves	10	0	B9	Hydronic System 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 F	lours		Total	315 Hours	

Level Three (9 Weeks)				Level Four (8 Weeks)			
Code	Unit Title	Т	Р	Code	Unit Title	Т	Р
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
C6	Medical Gas and Gas Piping Systems	7	0	D6	Electrical III	20	10
C7	Mathematics/Science III (includes heat	40	0	D7	Mathematics/Science IV	40	0
	load calculations, fan laws, and pumps)						
C8	Refrigeration Systems	15	0	D8	National Requirements Review	35	33
C9	Gas Code II	20	5				
C10	Electrical II	20	10				
	Subtotals	230	85		Subtotals	232	48
	Total	315 Hours			Total	280 Hours	

## **Apprenticeship** Manitoba

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

Level Five (10 Weeks)					
Code	Unit Title		Р		
E1	Gas/Safety Control Requirements	28	7		
E2	Supply Air/Venting Permit Requirements		6		
E3	Gas Burning Equip. and Materials Determination/Burner Orifice Sizing/Conversion Work		18		
E4	Longest Run/Gas Burning Equip. BTUH Input Demand, Systems/Pipe Size Determination/Pressure	28	14		
	and Measurement Requirements				
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		) hrs		

