

INDUSTRY TYPE b/c - Information Sheet

Overview

INDUSTRY Type b/c Infrared Heater.

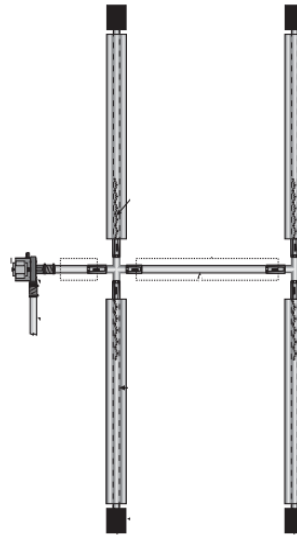
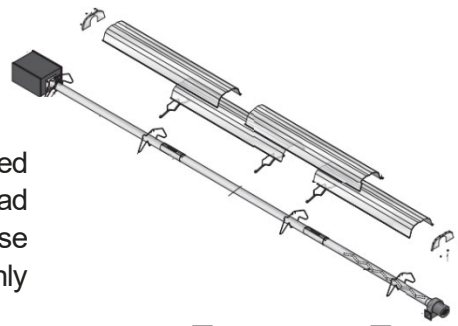
Type b/c Heaters operate via modified Type c burner heads that have had blowers removed or are otherwise designed for end burner only functionality.

Burner operating pressure via a standard gas valve that opens and closes based on voltage is at .75" w.c.. The flue gasses are drawn thru the system and exhausted with a blower or vacuum pump.

Medium initial temperatures and combined venting make for a cost effective way to eliminate building penetrations.

Individual burner styles :

- Unitary
- Multi-Burner



INDUSTRY Type b/c	
INPUT	TEMP @ 5'
40 Mbh	500°F
60 Mbh	650°F
80 Mbh	800°F
100 Mbh	950°F
125 Mbh	1000°F
150 Mbh	1050°F
175 Mbh	1100°F
200 Mbh	1100°F

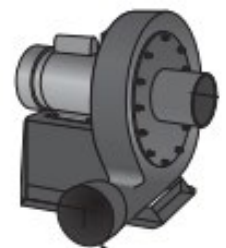
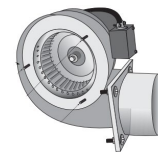
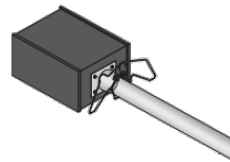
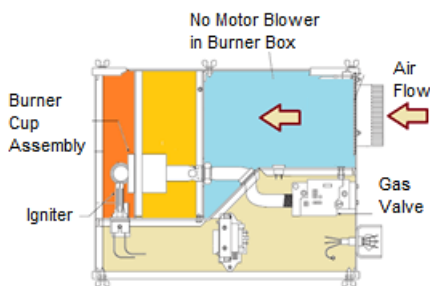
(Approx. Temps)

EXAMPLE OF AN INDUSTRY Type 1b/c :

80Mbh 30' Unitary and Multi Burner System depicted above

(Taken from RG literature)

Burner Information and Blower Types (Unitary and Multi Burner)



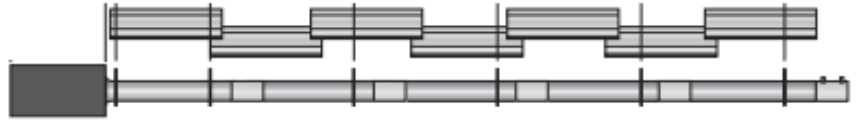
Burner

Unitary-Blower

Multi-Burner Vacuum Pump

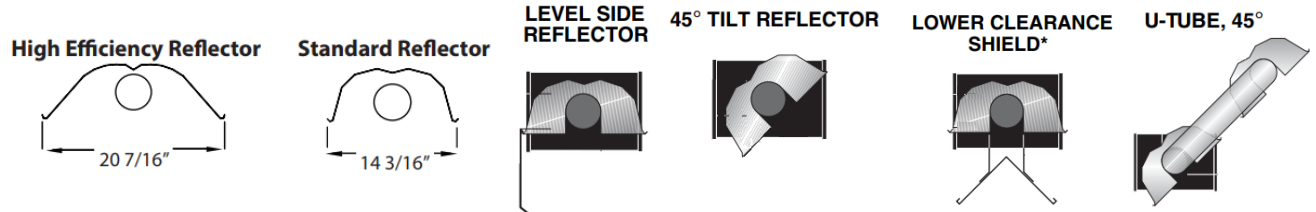
PRODUCT ASSEMBLY GRID	SELECT (MARK)	INFRARED SELECTION TABLE		
		Product Assembly: STEPS # 1 - # 5		
STEP #1	SELECT AS REQ'D	ASHRAE / INDUSTRY TYPE	DESCRIPTION OF HEATER SELECTED	
BURNER TYPE		<input type="checkbox"/> TYPE b	<input type="checkbox"/> TYPE b - SINGLE STAGE	<input type="checkbox"/> TYPE b - MODULATING VIA MOTOR SPEED
		<input type="checkbox"/> TYPE b/c	<input type="checkbox"/> TYPE b/c - UNITARY	<input type="checkbox"/> TYPE b/c - MULTI-BURNER
		<input type="checkbox"/> TYPE c	<input type="checkbox"/> HARSH ENVIRONMENT	<input type="checkbox"/> COMMODITY
		<input type="checkbox"/> SPECIFICATION GRADE	<input type="checkbox"/> SINGLE STAGE	<input type="checkbox"/> TWO STAGE

■ Tubing Material - Pipe



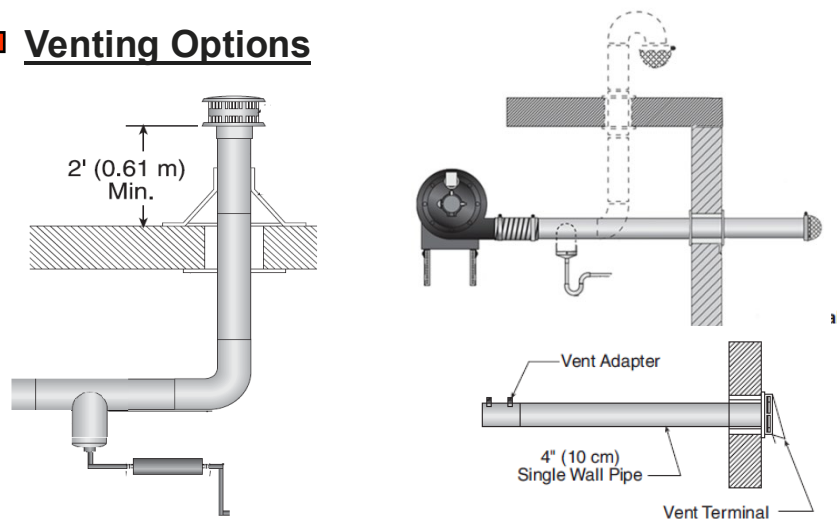
STEP #2		RADIANT PIPE	TAIL PIPE	TUBING MATERIAL	EMISSIVITY RATING	CORROSION RESISTANCE
TUBING MATERIAL AND QUALITY	SELECT AS REQ'D	<input type="checkbox"/>		HOT ROLLED STEEL	.80	NONE
		<input type="checkbox"/>	<input type="checkbox"/>	HEAT TREATED ALUM	.80	RESISTANT
		<input type="checkbox"/>	<input type="checkbox"/>	PORCELAIN COATED	.90	HIGHEST RESISTANCE
		<input type="checkbox"/>	<input type="checkbox"/>	SCHED. '40' STEEL	.93	LOW
STAINLESS STEEL IS NOT RECOMMENDED AS A HEAT EXCHANGER BECAUSE OF ITS INHERENT LOW EMISSIVITY						

■ Reflector Options

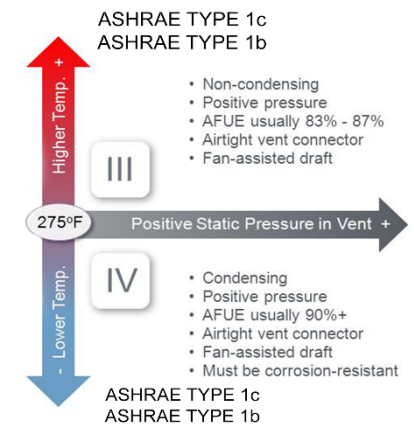


STEP #3	REFLECTOR MATERIAL AND ACCESSORIES	SELECT AS REQ'D	REFLECTOR		REFLECTOR ACCESSORIES	
			STANDARD DESIGN	HIGH EFFICIENCY DESIGN		
			MAX 'IF' 12 (8 SURFACES)	MAX 'IF' 15 (12 SURFACES)		
			<input type="checkbox"/> ALUMINUM	<input type="checkbox"/> ALUMINUM	<input type="checkbox"/> TILT AT 45°	<input type="checkbox"/> UNIVERSAL SHIELD
			<input type="checkbox"/> STAINLESS STEEL		<input type="checkbox"/> SIDE SHIELD	<input type="checkbox"/> LOW CLEARANCE SHIELD
					<input type="checkbox"/> BARRIER SHIELD	<input type="checkbox"/> UNIVERSAL SHIELD WITH HOLES

■ Venting Options



NFPA 54 Vent Categories (Gas)



U.S. DEPARTMENT OF ENERGY Energy Efficiency & Renewable Energy

STEP #4	* VENTING MATERIAL AND ACCESSORIES	SELECT AS REQ'D	* VENTING		VENTING ACCESSORIES	
			NON CONDENSING DESIGN	CONDENSING DESIGN		
			CATEGORY III	CATEGORY IV		
			<input type="checkbox"/> INFRARED TYPE b	<input type="checkbox"/> INFRARED TYPE b	<input type="checkbox"/> NEUTRALIZATION SYSTEM	<input type="checkbox"/> HIGH WIND VENT HOOD
			<input type="checkbox"/> INFRARED TYPE b/c	<input type="checkbox"/> INFRARED TYPE b/c	<input type="checkbox"/> TJERNLUND VENT HOOD	<input type="checkbox"/> GOOSE NECK ON ROOF
			<input type="checkbox"/> INFRARED TYPE c	<input type="checkbox"/> INFRARED TYPE c	<input type="checkbox"/> BIRDSCREEN @ DISCHARGE	<input type="checkbox"/> HIGH TEMP CAULK