

3.15 Technical data heating boiler ZBR42-3A...

	Unit	NG	LPG (propane)
Input/Output at elevation 0 - 2000 feet (0 - 610 m)			
Max. input rate 180/79 °F (82/26 °C)	BTU/hr (kW)	151,600 (44.4)	148,300 (43.5)
Max. output rate 104/86 °F (40/30 °C)	BTU/hr (kW)	137,500 (40.3)	137,500 (40.3)
Max. output rate 122/86 °F (50/30 °C)	BTU/hr (kW)	137,500 (40.3)	137,500 (40.3)
Max. output rate 176/140 °F (80/60 °C)	BTU/hr (kW)	134,400 (39.4)	134,400 (39.4)
Min. input rate 180/79 °F (82/26 °C)	BTU/hr (kW)	36,000 (10.5)	46,400 (13.6)
Min. output rate 104/86 °F (40/30 °C)	BTU/hr (kW)	35,500 (10.4)	46,400 (13.6)
Min. output rate 122/86 °F (50/30 °C)	BTU/hr (kW)	35,100 (10.3)	46,100 (13.5)
Min. output rate 176/140 °F (80/60 °C)	BTU/hr (kW)	31,700 (9.3)	42,000 (12.3)
Input/Output at elevation 2000 - 4500 feet (611 - 1372 m) above sea level			
Max. input rate 180/79 °F (82/26 °C)	BTU/hr (kW)	136,440 (40.0)	139,402 (40.9)
Max. output rate 104/86 °F (40/30 °C)	BTU/hr (kW)	123,750 (36.3)	129,250 (37.9)
Max. output rate 122/86 °F (50/30 °C)	BTU/hr (kW)	123,750 (36.3)	129,250 (37.9)
Max. output rate 176/140 °F (80/60 °C)	BTU/hr (kW)	120,960 (35.5)	126,336 (37.0)
Input/Output at elevation 4500 - 7000 feet (1373 - 2134 m) above sea level			
Max. input rate 180/79 °F (82/26 °C)	BTU/hr (kW)	125,828 (36.9)	129,021 (37.8)
Max. output rate 104/86 °F (40/30 °C)	BTU/hr (kW)	114,125 (33.5)	119,625 (35.1)
Max. output rate 122/86 °F (50/30 °C)	BTU/hr (kW)	114,125 (33.5)	119,625 (35.1)
Max. output rate 176/140 °F (80/60 °C)	BTU/hr (kW)	111,552 (32.7)	116,928 (34.3)
Gas connection value			
Natural Gas - H _s = 1,010 BTU/ft ³ (37.3MJ/m ³)	ft ³ /hr (m ³ /h)	149 (4.2)	-
Liquid Propane Gas - HD-S = 2,500 BTU/ft ³ (93.1MJ/m ³)	ft ³ /hr (m ³ /h)	-	59 (1.7)
Permissible inlet gas pressure			
NG	in. W.C. (mbar)	3.5-10.5" (8.7-26.1)	-
LPG (propane)	in. W.C. (mbar)	-	8-13" (19.9-32.3)
Flue gas			
Flue gas mass flow at maximum/minimum nominal output	gps	18.0/4.5	17.5/5.6
Flue gas temperature 176/140 °F (80/60 °C) at maximum/minimum nominal heat input	°F (°C)	171/135 (77/57)	171/135 (77/57)
Flue gas temperature 104/86 °F (40/30 °C) at maximum/minimum nominal heat input	°F (°C)	133/91 (56/33)	133/91 (56/33)
CO ₂ at max. nominal output	%	9.4	11.0
CO ₂ at minimum nominal output	%	8.6	10.4
Condensate			
Max. condensate quantity (t _R = 86 °F (30 °C))	gph (l/h)	0.9 (3.5)	0.9 (3.5)
pH level, approx.		4.8	4.8
General			
Voltage	VAC	120	120
Frequency	Hz	60	60
Max. power consumption (central heating mode)	W	205	205
Max. power consumption (Stand-by)	W	< 6	< 6
Sound pressure level	dB(A)	≤ 45	≤ 45
Max. supply temperature	°F (°C)	190 (88)	190 (88)
Max. permissible operating pressure (P _{MS}) heating	psi (bar)	30 (2.07)	30 (2.07)
Permissible ambient temperature	°F (°C)	32 - 122 (0 - 50)	32 - 122 (0 - 50)
Nominal water capacity (heating)	Gal (L)	0.925 (3.5)	0.925 (3.5)
Weight (without packaging)	lbs. (kg)	103.6 (47)	103.6 (47)
Dimensions, W x H x D	inch (mm)	17-21/64" x 33-15/32" x 13-57/64" (440 x 850 x 353)	

Table 7 Technical data heating boiler ZBR42-3A...