



Lochinvar®

HIGH EFFICIENCY BOILERS & WATER HEATERS

POWER-FIN COMMERCIAL BOILER

Submittal Sheet

PBXT-Sub-07

POWER-FIN® GAS BOILERS, MODELS PB 2500 – PB 5000

Job Name: _____ Model No. _____

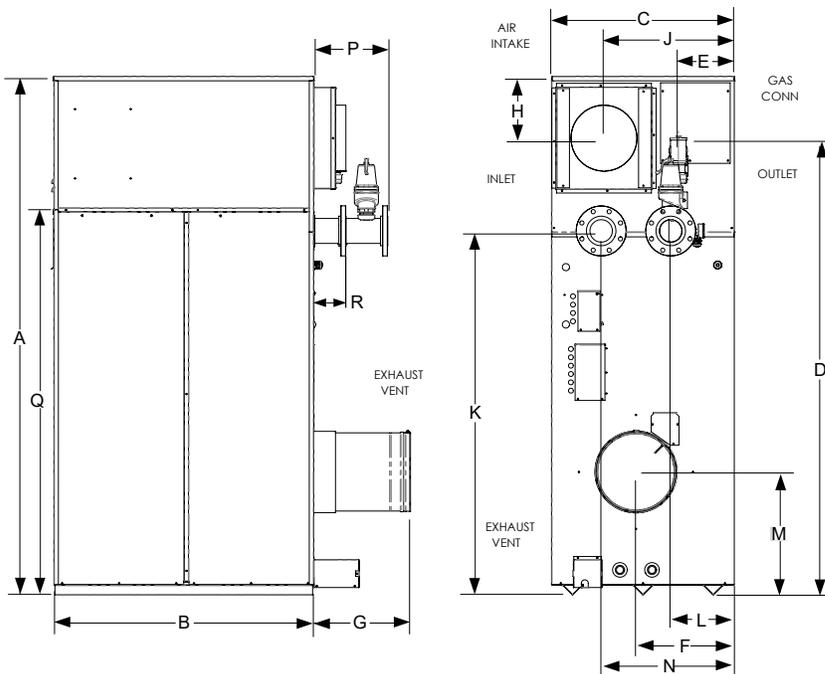
Location: _____ Type Gas: _____

Engineer: _____ Equipment Tag(s): _____

Agent/Wholesaler: _____

Contractor: _____

NOTES:



Model Number Guide

PB	N	2500	M9
Model	Natural Gas	Btu/hr Input	Firing Controls

Power-Fin Boiler,
Natural Gas,
2,500,000 Btu/hr input,
M9 firing controls

Power-Fin Boiler						Dimensions and Specifications																				
Model No.	Input MBH	AHRI Thermal %	Combustion Efficiency	Gross Output MBH	Net AHRI Rating MBH	A	B	C	D	E	F	Model No.	G	H	J	K	L	M	N	P	Q	R	Gas Conn.	Air Inlet	Vent Outlet	Ship Wt.
PBN2500	2,500	87.0%	87.0%	2,175	1,891	59"	44-1/2"	29-3/4"	49-3/4"	4"	15"	PBN2500	16"	9"	20-1/4"	37"	8-3/4"	23"	21-1/4"	14"	N/A	4-1/2"	2"	9"	9"	1470
PBN3000	3,000	87.0%	87.0%	2,610	2,270	65"	44-1/2"	29-3/4"	55-3/4"	4"	15"	PBN3000	16-1/4"	9"	20-1/4"	43"	8-3/4"	23"	21-1/4"	14"	N/A	4-1/2"	2"	9"	10"	1550
PBN3500	3,500	87.0%	87.0%	3,045	2,648	70-1/4"	47-1/4"	29-3/4"	62-1/2"	8-1/4"	15"	PBN3500	16-1/4"	9"	20-1/4"	48-1/2"	9"	23"	21-1/2"	14"	N/A	4-1/2"	2"	10"	10"	1696
PBN4000	4,000	87.0%	87.0%	3,480	3,026	79-3/4"	47-1/4"	29-3/4"	68-3/4"	8-1/4"	15"	PBN4000	16-1/4"	10-1/2"	20"	54"	8-3/4"	22-1/4"	21-1/4"	14"	58-1/2"	4-1/2"	2-1/2"	10"	12"	1841
PBN5000	4,999	87.0%	87.0%	4,349	3,782	93-1/4"	46-3/4"	32-3/4"	82-1/4"	10"	17-3/4"	PBN5000	17-1/2"	11"	23-1/2"	65-1/2"	11-1/2"	22"	24"	15-1/4"	69-1/2"	5-3/4"	2-1/2"	12"	14"	2152

Models listed above are natural gas. Change "N" to "L" for LP gas models. • Information is subject to change without notice. Dimensions shown are approximate and should not be used for construction purposes.



Codes & Registrations

ANSI Z21.13/CSA Certified
 ASME Certified, "H" Stamp / National Board
 California Code Compliant
 Bay Area Air Quality Management District Qualified
 CSD1 / Factory Mutual / GE Gap Compliant
 Canadian Registration Number (CRN)
 AHRI Certified

Standard Features

87% Thermal Efficiency (AHRI)
 Modulating Burner with 5:1 Turndown
 Outdoor Ready
 CSD-1 Compliant
 Direct-Spark Ignition
 Low NOx Operation
 Sealed Combustion
 ASME Copper-Finned Tube Heat Exchanger
 ASME Certified, "H" Stamped
 Gasketless Design
 160 psi Working Pressure
 On/Off Switch
 Adjustable High Limit with Manual Reset
 Condensate Trap w/Blocked Drain Switch
 Drain Valve
 System Sensor
 Outdoor Air Sensor
 Inlet & Outlet Temperature Sensors
 High-Voltage Terminal Strip
 Low-Voltage Terminal Strip
 50 psi ASME Relief Valve
 Temperature & Pressure Gauge
 Zero Clearances to Combustible Materials
 Low & High Manual Reset Gas Pressure Switches
See Warranty for Details:
 10-Year Limited Warranty
 1-Year Warranty on Parts

Smart Touch™ Features

CON-X-US Remote Connect
Full-Color 8" Touchscreen LCD Display
Built-in Cascading Sequencer for up to 8 Boilers
 > Built-in Redundancy
 > Cascade Multiple Sized Boilers
 > Lead/Lag Cascade
 > Efficiency Optimized Cascade
Front-End Loading Capability with Crest Boilers
Building Management System Integration w/ 0-10 VDC Input

Outdoor Reset Control

Password Security

Domestic Hot Water Prioritization

- > DHW tank piped with priority in the boiler loop
- > DHW tank piped as a zone in the system with the pumps controlled by the Smart System
- > DHW Modulation Limiting
- > Separately Adjustable SH/DHW Switching Times

Low Water Flow Safety Control & Indication

Inlet & Outlet Temperature Readout

Freeze Protection

Service Reminder

Time Clock

Data Logging

- > Hours Running, Space Heating
- > Hours Running, Domestic Hot Water
- > Hours Running, Modulation Rate
- > Ignition Attempts
- > Last 10 Lockouts

Programmable System Efficiency Optimizers

- > Night Setback
- > Anti-Cycling
- > Outdoor Air Reset Curve
- > Ramp Delay
- > Boost Temperature & Time
- > Modulation Factor Control

Three Pump Control

- > System Pump
- > Boiler Pump
- > Domestic Hot Water Pump

High-Voltage Terminal Strip

- > 240V/1PH/60Hz Power Supply (PB2500-PB3000)
- > 208V/3PH/60Hz Power Supply (PB3500-PB4000)
- > 480V/3PH/60Hz Power Supply (PB5000)
- > System Pump, Boiler Pump & DHW Pump Power

Low-Voltage Terminal Strip

- > 24 VAC Auxiliary Device Relay
- > Auxiliary Proving Switch Contacts
- > Alarm on Any Failure Contacts
- > Runtime Contacts
- > DHW Thermostat Contacts
- > Unit Enable/Disable Contacts
- > System Sensor Contacts
- > DHW Tank Sensor Contacts
- > Outdoor Air Sensor Contacts
- > Cascade Contacts
- > 0-10V DC BMS External Control Contact
- > 3 Way Valve Contacts

Firing Codes

- M9 Standard Construction
- M7 California Code

Optional Equipment

Alarm on Any Failure
 BACnet MSTP Communications
 BMS Gateway to LON or BacNet IP
 Cupro-Nickel Heat Exchanger
 Low Temperature Valve
 Low Temperature Valve (Motorized)
 Low Water Cutoff w/ Manual Reset & Test
 Modbus Communications
 Outdoor Kit
 Step Down Gas Regulator
 > 2 PSI Inlet Max
 > 5 PSI Inlet Max
 Transformer Kit (field installed)
All unit requirements and kits are 60 Hz
 > 208V/1PH → 240V/1PH (PB 2500-3000)
 > 480V/3PH → 208V/3PH (PB 3500-4000)
 > 600V/3PH → 208V/3PH (PB 3500-4000)
 > 208V/3PH → 480V/3PH (PB 5000)
 > 600V/3PH → 480V/3PH (PB 5000)
 Wireless Outdoor Sensor



Lochinvar, LLC
 300 Maddox Simpson Parkway
 Lebanon, Tennessee 37090
 P: 615.889.8900 | F: 615.547.1000
 f t in Lochinvar.com

