

WAB/WCB Indirect-fired Tubular Unit Heater

HOW IT WORKS

An indirect-fired warm air heater is a self-contained device used for space heating. It uses natural gas or propane as fuel. Typically, this equipment includes a combustion system, a heat exchanger, and a heat exchange fan. The heat exchange fan blows room air over the heat exchanger to provide heating. The heat exchange fan can be either an axial flow fan or a centrifugal fan. In the case of a separated indirect-fired warm air heater, the combustion chamber uses outside air, and the flue is exhausted externally. This type of heater can also be used in situations where the combustion chamber uses indoor air.

Features

- Flameout protection, fan failure, overheat protection
- 12V low-voltage control system, 24V low-voltage gas combination valve, safe and reliable
- Inshot combustion for more complete burning
- Serpentine tube heat exchanger with large heating area and high heat exchange efficiency
- IR remote control
- Instantaneous heating, quick temperature rise, no need for preheating.

Advantages/Benefits

- Dispersed or directional heating
- Simple installation
- Wide power range: from 15kW to 117kW
- Quickly addresses heating needs for large spaces, warehouses, and garages
- No need for a heat distribution system
- Simple control with a thermostat
- Simple maintenance



Indoor Model WAB



WAB Technical Parameter

Model	WAB50	WAB80	WAB150	WAB200	WAB300	WAB400
Input Heat kW	15	23	44	58	88	117
Output Heat kW	12.4	19.1	36.5	48.6	73.0	97.3
Thermal Efficiency	83%	83%	83%	83%	83%	83%
Gas Consumption	m ³ /h NG	1.45	2.22	4.25	5.60	8.50
	kg/h LPG	1.17	1.79	3.44	4.53	6.88
Air Flow m ³ /h	1,700	2,200	4,800	5,380	9,600	11,500
Temperature Rise °C	26	26	26	26	26	26
Power Supply*	220V/50Hz	220V/50Hz	220V/50Hz	220V/50Hz	220V/50Hz	380V/50Hz
Power Consumption kW	0.2	0.21	0.35	0.35	0.98	1.9
Flue Diameter mm	100	100	150	150	150	150
Fan Diameter mm	300	350	550	550	710	800
Gas Connection inch	1/2	1/2	1/2	3/4	3/4	3/4
Equipment Net Weight kg	38	44	110	121	218	252
Exterior Dimensions LxWxH mm	770x625x440	770x625x440	1,010x855x685	1,010x855x765	1,380x940x1,025	1,380x980x1,165

*All heat exchange fans are 1 phase 220V/50Hz except WAB400 is 3 phase 380V/50Hz.
All inducer blowers are 1 phase 220V/50Hz

Features

- Five Standard Models: 23/44/58/88/117kW
- Safety Features: Flame out protection, fan failure detection, overheat protection
- Low-Voltage Control System: 12V low-voltage control, 24V low-voltage gas combination valve for enhanced safety and reliability
- **Outdoor Installation: Designed to withstand outdoor temperatures as low as -30°C**

Advantages/Benefits

- Dispersed or directional heating
- Simple installation
- Quickly addresses heating needs for large spaces, warehouses, and garages
- No need for a heat distribution system
- Simple control with a thermostat
- Simple maintenance

Installations

(indoor and outdoor model applied)

- Follow the manufacturer's requirements to meet the minimum installation height
- Do not install in areas with chlorides, volatile solvents, and explosive dust particles
- If the room is under negative pressure, it's preferable to use outside air for combustion (balanced type)
- Unless there are specific requirements, flue should be discharged outdoors
- Follow the manufacturer's installation manual for detailed guidance.



Outdoor Model WCB



WCB Technical Parameter

Model			WCB80	WCB150	WCB200	WCB300	WCB400
Input Heat kW			23	44	58	88	117
Output Heat kW			19.1	36.5	48.6	73.0	97.3
Thermal Efficiency			83%	83%	83%	83%	83%
Gas Consumption	m³/h	NG	2.22	4.25	5.60	8.50	11.2
	kg/h	LPG	1.79	3.44	4.53	6.88	9.06
Air Flow m³/h			2,200	4,800	5,380	9,600	11,500
Temperature Rise °C			26	26	26	26	26
Power Supply*			220V/50Hz	220V/50Hz	220V/50Hz	220V/50Hz	220V/50Hz
Power Consumption kW			0.21	0.5	0.6	0.8	1.1
Flue Diameter mm			100	150	150	150	150
Fan Diameter mm			350	400	450	2*400	2*450
Gas Connection inch			1/2	1/2	3/4	3/4	3/4
Equipment Net Weight kg			90	150	180	250	330
Exterior Dimensions LxWxH mm			1,070x870x565	1,300x1,150x732	1,300x1,150x888	1,300x1,150x1,200	1,300x1,150x1,510

User Cases



