

Modulating and condensing Gas Unit Heaters G Series are the newest solution to heat up commercial and industrial premises efficiently. More than 190,000 Robur gas unit heaters have been installed in Europe throughout the years.

G Gas Unit Heaters

Robur condensing gas unit heaters guarantee up to 25% energy savings. Thanks to the condensing technology, they allow to obtain thermal efficiencies even over 105%.

They are independent and suitable for modular installation, in order to heat only when and where needed. Tests, carried out at the Robur research and development center and at installations all over Europe, have shown that with a modular Robur installation, even the

largest spaces are warmed within 30 minutes. The ideal applications for these units are:

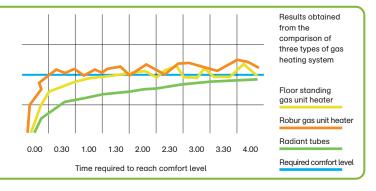
- workshops and factories;
- commercial buildings and show rooms;
- sports halls and fitness centres:
- thanks to their modularity, they are particularly suited for locations where the modification or expansion of the existing plants are foreseen

Efficiencies up to

Energy savings up to

25%

minutes to be warmed!





Find more on http://www.robur.com/products/heaters-line/a-series/description.htm

Robur 2011

The winning features of the Robur heating systems

The Robur Ground Effect: energy savings guaranteed.

The patented Robur Heat
Exchanger in aluminium
special alloy splits the air flow
into different layers having
different temperatures: lower
temperature in the higher
levels and higher
temperatures in the lower
levels. So the hot air is being
kept down by the cooler higher
air, dramatically reducing the
thermal stratification in the
environment.



"Robur ground effect" termography

Uniform temperatures, comfort and savings.

Tests conducted at Robur's Research and Development Centre upon various gasbased heating systems have shown that for systems with floor standing warm air heaters and with radiant tubes the difference in air temperature, between 1 metre and 6 metres from the ground, is approximately 9 °C, whereas with Robur gas unit heaters the temperature difference is only 1.5 °C.

The resulting ambient comfort guarantees a homogeneous temperature in a short time and ensures that the air is already perfectly mixed at just 4 metres from the appliance, maintaining these properties unchanged even at a great distance from the heater.

No central heating plant, and lower installation costs.

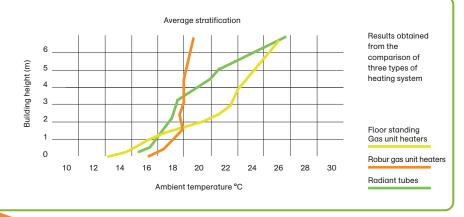
Robur heaters are installed directly in the room to be heated and do not require a central heating plant or any other additional building costs. Also given the suspended nature of the installation, precious floor area is kept free.

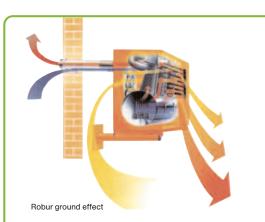
• Easy to install.

Installation time and costs are kept very low. Three simple steps are enough: a hole in the wall for the inlet air supply and outlet of exhausted gas, connection to the gas supply and to the electricity supply.

Total safety in operation and reliability.

All Robur heaters are certified for type C installations: the combustion circuit is completely room sealed, and all products of combustion are exhausted outdoors. A high level of reliability is achieved due to the long experience and the use of the highest quality components.





Robur 2011

Inside the technology of the Gas Unit Heaters G Series

 High thermal efficiency and respect of the new norms about the heating installation system.

The choice of condensation for Gas Unit Heaters allows to obtain thermal efficiencies over 105%. The remarkable advantage of G Series in comparison to the best condensing boilers is that the water distribution system is not required, thus obtaining a better global efficiency of the system.

• High quality, lower cost.

Thanks to high efficient and energy-saving performances, the G gas unit heaters can qualify for tax relief or financial benefits programs in several European Countries.

• Full modulation for comfort.

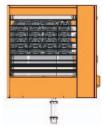
Compared to traditional ON-OFF heating systems, G gas unit heaters can offer better comfort in the environment, thanks to the continuous modulating and regulation system of the heating output and airflow which is set through the digital chronothermostat control. The modulation of heating output from 100% up to 30% of nominal rate allows to obtain very high combustion efficiency, and by just modifying the electronic control you can set G heaters working with modulation of the heating output and 100% of air flow.

• Almost nil NOx emissions.

Thanks to the premix stainless steel burner, the G condensing units grant the best gas/air ratio in all operational conditions, consequently granting virtually nil CO and low NOx emissions.

• Equipped with:

Digital remote control, wall template, LPG kit, condensate siphon to be installed under the unit.





Main features of the Digital Remote Control:

- 4 operational settings: full modulation (burner and ventilation), flame modulation with max ventilation, fixed 3 levels heat power and ventilation, ventilation only;
- Winter operation in 3 selectable modes: automatic, manual or freeze protection;
- Programmable timer for 3 temperature levels (comfort, reduced or freeze protection);
- Daily-weekly hourly scheduling;
- Operational and fault diagnostics, with warning signals and alarm reset;
- Possibility of starting the heaters with external signal.



			G30	G45	G60	G100
Heat input	nominal	kW	30.0	45.0	58.0	93.0
	min	kW	15.0	15.0	19.3	31.7
Nominal heat output	nominal	kW	29.2	43.3	56.2	90.2
	min	kW	15.6	15.6	20.2	33.5
Efficiency	nominal	%	97.3	96.3	97.0	97.0
	min	%	105.3	104.3	104.6	105.7
Gas consumption (1)	natural gas	m³/h	3.17	4.76	6.14	9.84
	LPG	kg/h	2.33	3.50	4.53	7.26
Airflow rate (2)	max	m³/h	2,700	4,000	5,350	8,250
	min	m³/h	2,300	2,340	3,310	5,200
Temperature rise	at maximum speed	K	31.1	31.8	30.8	32.1
	at minimum speed (3)	K	16.3	19.6	17.9	18.9
Gas connection		"M	3/4			
Air inlet pipe diameter		mm	80			
Exhaust flue pipe diameter		mm	80			
Electrical supply		230 V 1N - 50 Hz				
Installed wattage		W	350	450	750	900
Air throw at maximum speed in free field (4)		m	10	25	31	40
Recommended height of installation		m	2.5	2.5/3	3/3.5	3/4
Operating temperature range (5)		°C	0/35			
Sound pressure level at the max speed at 6 meters distance	in open field	dB(A)	47	48	50	54
	in typical installation	dB(A)	59	60	61.5	65.5
Sound pressure level at the min speed at 6 meters distance	in open field	dB(A)	42	43	45	49
	in typical installation	dB(A)	54	55	56	60.5
Size	width	mm	656	706	796	1,296
	depth	mm	570	570	570	570
	height	mm	800	800	800	800
Weight		kg	55	66	76	122

 $^{^{(1)}\,\}text{At}\ 15\ ^{\circ}\text{C}$ - 1013 mbar.

⁽²⁾ At 20 °C - 1013 mbar.

⁽³⁾ Temperature rise of the air which permits to maintain the outlet air flow at a higher temperature than the one of the human body for a better comfort.

⁽⁴⁾ Throw for guidance only. Throw depends on height of building, mounting height to heater, room temperature and louvre setting.

 $^{^{(5)}}$ Indoor temperature of the installation location 0 °C/35 °C; the unit's internal components have been tested from 0°C to 60°C.