Rinnai INFINITY HD56kWe specification



Description

Designed and made in Japan, the Rinnai INFINITY HD56kWe is an external continuous flow gas hot water heater with inbuilt frost protection and status monitor. It has electronic ignition and requires electricity to operate.

The INFINITY HD56kWe is factory preset to 55 °C, but can be set to deliver higher temperatures, up to 85 °C, making it ideal for commercial applications.

Scope of use

Primarily designed for commercial applications, but can be used for larger hot water capacity residential projects. To be externally mounted on an outside wall and located as close as possible to the most frequently used hot water outlets to reduce the delay for hot water delivery.

Codes

INFHD56N - Natural Gas INFHD56L - LPG It is not suitable as a spa or swimming pool heater, or for hydronic applications.

Hard or acidic water will need to be treated to use this product.

REU number	REU-AM3237WC-ZK	
Colour	Silver	
Input	20.1-245 MJ/h (LPG), 20.1-250 MJ/h (NG)	
Output	56.4 kW (LPG), 56.8 kW (NG)	
Thermal efficiency	82%	
Capacity	Hot water capacity 1.5-37 l/min Nominal water capacity 32 l/min at a 25° rise (1920 l/h)	
Exhaust system	Forced flue	
Ignition system	Ignition system	
Line pressures	NG 1.13-3.0 kPa, LPG 2.75-3.0 kPa	
Line pressure maximum	3.5 kPa (max. standing pressure under abnormal intermittent conditions is 5.0 kPa). In the case of commercial metering (i.e. 35-37 kPa coming in), there may be a requirement to regulate the incoming line pressure down.	
Ingress protection rating	IPX5	
Power consumption	Normal - 87 W Standby - 2 W Frost protection - 88 W	
Noise level (1 m away)	55 dB(A)	
NOx af	40 ppm	
Safety devices	Flame failure, boil-dry protection, overheat protection (OHS), fusible link, pressure relief valve, and combustion fan rpm check.	
Water supply	Nominal operating pressure: 200-1000 kPa Minimum water flow: 1.5 litres per minute	
Weight	23 kg	

Rinnai INFINITY HD56kWe dimensions





	A dimension
Gas	37.4 mm
Cold	49.2 mm
Hot	40.2 mm
Cable access (remote controller)	28.2 mm

Rinnai INFINITY HD56kWe accessories

CONTROLLERS			
The maximum number of controllers that can be fitted is four. The HD56 is compatible with all of our existing controllers			
Part number	Description		
MC601A	Compact controller		
BC100V1Z	Bathroom Deluxe controller		
MC100V1Z	Kitchen Deluxe controller		
PIPE COVER			
R1418	Rinnai INF pipe cover HD56 (made in Japan)		
RECESS BOX			
No recess box is available.			
Due to the unit's increased depth and flue outlet position, the HD56kWe is not suitable for the current R1407 metal recess box.			
SECURITY BRACKET			
ACC1395	Rinnai INFINITY security bracket		
FLUE DIVERTERS			
FDS56	Flue diverter side HD56 (no image available)		
There is no upwards flue diverter available for this model			
CONNECTING C	CABLES		
REUCSAC1	N56 / HD56 cascades cable		
REUMSBM	HD internal primary manifold		
REUMSBMB	HD external primary manifold		
REUMSBC1	HD manifold secondary cable		
REUMSBC2	HD manifold joiner		
ERROR INDICA	TION SWITCH		
REUOPU3	Error indication switch		

Positioning: General flue terminal clearances

The following has been adapted for Rinnai INFINITY water heaters from AS/NZS 5601:2022 6.9.3 Location of flue terminals around the perimeter of a building of structure. Always reference the latest version of the standard for the most up-to-date information.



Ref.	Item	Minimum clearances - fan assisted (mm)	
а	Below eaves, balconies and other projections	300	
b	From the ground, above a balcony or other surface ¹ Please note : Rinnai recommend 1500 mm to give enough clearance for the pipe work, and to safely expel flue gases	300	
С	From a return wall or external corner ¹	300	
d	From a gas meter (M) ²	1000	
	(see Clause 5.11.5.9 for vent terminal location of regulator)		
	(see Table 6.9.6 for New Zealand requirements)		
е	From an electricity meter or fuse box (P) ^{2,3}	500	
f	From a drain pipe or soil pipe	75	
g	Horizontally from any building ¹ structure or obstruction facing a <i>flue terminal</i>	500	
h	From any other flue terminal, flue cowl, or combustion air intake1	300	
j	Horizontally from an openable window, door, non-mechanical air inlet, or any other opening into a building with the exception of sub-floor ventilation:		
	Appliances over 200 MJ/h input up to 250 MJ/h ¹	500	
	All fan-assisted appliances, in the direction of discharge	1500	
k	From a mechanical air inlet, including a spa blower	1000	
п	Vertically below an openable window, non-mechanical air inlet, sub-floor ventilation, or any other opening into a building with the exception of weep holes:		
	For appliances over 150 MJ/h input	1500	
¹ Unless ² Minimu ³ Prohibit	appliance is certified for closer installations. m clearances <i>d</i> and <i>e</i> also apply to any combustion air intake openings of <i>appliances</i> .		

NOTE 1: Where dimensions c, j or k cannot be achieved, an equivalent horizontal distance, measured diagonally from the nearest discharge point of the terminal to the opening, may be deemed by the Technical Regulator to comply.

NOTE 2: See Clause 6.9.4 for restrictions on a flue terminal under a covered area.

NOTE 3: A flue terminal is considered to be a source of ignition. AS/NZS 1596:2014 specifies the minimum clearances required from a flue terminal to an LP Gas Cylinder (see Figure 1.5(A), Appendix I).

NOTE 4: For minimum clearances not addressed above, acceptance should be obtained from the Technical Regulator.

NOTE 5: Contact the appliance manufacturer if in doubt that the minimum clearances will provide adequate thermal protection of surfaces adjacent to the flue terminal. Additional measures may be required.