

Subtype HPR290250

Certificate Holder	Rinnai UK Ltd
Address	9 Christleton Ct
ZIP	WA7 1ST
City	Runcorn
Country	GB
Certification Body	ICIM S.p.A.
Subtype title	HPR290250
Registration number	ICIM-PDC-000308
Heat Pump Type	Outdoor Air/Water
Refrigerant	R290
Mass of Refrigerant	3.5 kg
Certification Date	23.10.2024
Testing basis	V12

Model HPR290250		
Model name	HPR290250	
Application	Heating (medium temp)	
Units	Outdoor	
Climate zone (for heating)	n/a	
Reversibility	Yes	
Cooling mode application (optional)	+7°C/12°C	
Any additional heat sources	n/a	
General data		
Power supply	3x400V 50Hz	
Off-peak product	n/a	
Outdoor Air/Water		
EN 14511-4 Heating		
Shutting off the heat transfer medium flow	passed	
Complete power supply failure	passed	
Defrost test	passed	
Starting and operating test	passed	
EN 14511-2 Heating		
	Low temperature	Medium temperature
Heat output	50.00 kW	47.90 kW
El input	11.90 kW	16.50 kW
COP	4.20	2.90
EN 14511-2 Cooling		
	+7°C/+12°C	+18°C/+23°C
El input	10.98 kW	
Cooling capacity	34.10	
EER	3.11	
EN 12102-1 Average Climate		
	Low temperature	Medium temperature
Sound power level outdoor	75 dB(A)	75 dB(A)
EN 14825 Average Climate		
	Low temperature	Medium temperature
ηs	165 %	131 %
Prated	43.00 kW	44.00 kW
SCOP	4.20	3.34
Tbiv	-7 °C	-7 °C
TOL	-10 °C	-10 °C

Pdh Tj = -7°C	38.20 kW	39.10 kW
COP Tj = -7°C	2.53	1.94
Cdh Tj = -7 °C	1.000	1.000
Pdh Tj = +2°C	23.50 kW	23.80 kW
COP Tj = +2°C	3.88	3.15
Cdh Tj = +2 °C	1.000	1.000
Pdh Tj = +7°C	20.30 kW	19.40 kW
COP Tj = +7°C	6.30	4.84
Cdh Tj = +7 °C	1.000	1.000
Pdh Tj = 12°C	23.20 kW	22.40 kW
COP Tj = 12°C	7.31	6.20
Cdh Tj = +12 °C	1.000	1.000
Pdh Tj = Tbiv	38.20 kW	39.10 kW
COP Tj = Tbiv	2.53	1.94
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	34.70 kW	34.70 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.18	1.66
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	1.000	1.000
WTOL	78 °C	78 °C
Poff	22 W	22 W
PTO	22 W	22 W
PSB	22 W	22 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	8.30 kW	9.30 kW
Annual energy consumption Qhe	21240 kWh	27332 kWh

EN 14825 | Cooling

	+7°C/+12°C	+18°C/+23°C
Pdesignc	34.10 kW	
SEER	4.80	
Pdc Tj = 35°C	34.10 kW	
EER Tj = 35°C	3.11	
Cdc Tj = 35 °C	1.000	
Pdc Tj = 30°C	24.00 kW	
EER Tj = 30°C	4.12	
Cdc Tj = 30 °C	1.000	
Pdc Tj = 25°C	16.10 kW	
EER Tj = 25°C	5.24	
Cdc Tj = 25 °C	1.000	
Pdc Tj = 20°C	16.60 kW	
EER Tj = 20°C	6.05	
Cdc Tj = 20 °C	1.000	
Poff	22 W	

PTO	0 W
PSB	28 W
PCK	0 W
Annual energy consumption Qce	4259 kWh