

Subtype HPiH3228/32

Certificate Holder	Rinnai UK Ltd
Address	9 Christleton Ct
ZIP	WA7 1ST
City	Runcorn
Country	GB
Certification Body	ICIM S.p.A.
Subtype title	HPiH3228/32
Registration number	ICIM-PDC-000296
Heat Pump Type	Outdoor Air/Water
Refrigerant	R32
Mass of Refrigerant	5.1 kg
Certification Date	23.10.2024
Testing basis	V9

Model HPiH3228		
Model name	HPiH3228	
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	28.00 kW	27.30 kW
El input	6.35 kW	9.99 kW
COP	4.41	2.73
EN 14511-2 Cooling		
	+7°C/+12°C	+18°C/+23°C
El input	7.99 kW	
Cooling capacity	24.20	
EER	3.03	
EN 12102-1 Average Climate		
	Low temperature	Medium temperature
Sound power level outdoor	67 dB(A)	67 dB(A)
EN 14825 Average Climate		
	Low temperature	Medium temperature
ηs	169 %	126 %
Prated	25.00 kW	24.00 kW
SCOP	4.29	3.23
Tbiv	-7 °C	-7 °C
TOL	-20 °C	-10 °C

Pdh Tj = -7°C	21.70 kW	20.80 kW
COP Tj = -7°C	2.68	1.93
Cdh Tj = -7 °C	1.000	1.000
Pdh Tj = +2°C	13.20 kW	12.80 kW
COP Tj = +2°C	4.26	3.20
Cdh Tj = +2 °C	1.000	1.000
Pdh Tj = +7°C	11.90 kW	11.50 kW
COP Tj = +7°C	5.39	4.10
Cdh Tj = +7 °C	0.993	0.995
Pdh Tj = 12°C	13.70 kW	13.50 kW
COP Tj = 12°C	7.06	5.77
Cdh Tj = +12 °C	0.992	0.993
Pdh Tj = Tbiv	21.70 kW	20.80 kW
COP Tj = Tbiv	2.68	1.93
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	19.30 kW	18.80 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.41	1.73
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	1.000	1.000
WTOL	60 °C	60 °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	n/a	n/a
Supplementary Heater: PSUP	5.70 kW	5.20 kW
Annual energy consumption Qhe	11823 kWh	15056 kWh

EN 14825 | Cooling

	+7°C/+12°C	+18°C/+23°C
Pdesignc	24.20 kW	
SEER	4.76	
Pdc Tj = 35°C	24.20 kW	
EER Tj = 35°C	3.03	
Pdc Tj = 30°C	17.74 kW	
EER Tj = 30°C	4.12	
Cdc Tj = 30 °C	1.000	
Pdc Tj = 25°C	11.32 kW	
EER Tj = 25°C	5.38	
Cdc Tj = 25 °C	0.900	
Pdc Tj = 20°C	12.26 kW	
EER Tj = 20°C	6.47	
Cdc Tj = 20 °C	0.900	
Poff	22 W	
PTO	0 W	

PSB	28 W
PCK	0 W
Annual energy consumption Qce	3037 kWh

Model HPiH3232		
Model name	HPiH3232	
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	32.10 kW	31.80 kW
El input	7.84 kW	12.10 kW
COP	4.09	2.64
EN 14511-2 Cooling		
	+7°C/+12°C	+18°C/+23°C
El input	8.65 kW	
Cooling capacity	26.00	
EER	3.01	
EN 12102-1 Average Climate		
	Low temperature	Medium temperature
Sound power level outdoor	67 dB(A)	67 dB(A)
EN 14825 Average Climate		
	Low temperature	Medium temperature
ηs	158 %	122 %
Prated	24.00 kW	25.00 kW
SCOP	4.02	3.14
Tbiv	-7 °C	-7 °C
TOL	-20 °C	-10 °C

Pdh Tj = -7°C	21.30 kW	21.70 kW
COP Tj = -7°C	2.57	1.90
Cdh Tj = -7 °C	1.000	1.000
Pdh Tj = +2°C	13.00 kW	13.30 kW
COP Tj = +2°C	3.94	3.09
Cdh Tj = +2 °C	1.000	1.000
Pdh Tj = +7°C	11.60 kW	11.90 kW
COP Tj = +7°C	5.03	3.96
Cdh Tj = +7 °C	0.993	0.995
Pdh Tj = 12°C	13.50 kW	14.00 kW
COP Tj = 12°C	6.96	5.51
Cdh Tj = +12 °C	0.992	0.994
Pdh Tj = Tbiv	21.30 kW	21.70 kW
COP Tj = Tbiv	2.57	1.90
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	18.80 kW	19.50 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.29	1.70
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	1.000	1.000
WTOL	60 °C	60 °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	n/a	n/a
Supplementary Heater: PSUP	5.20 kW	5.50 kW
Annual energy consumption Qhe	12369 kWh	16150 kWh

EN 14825 | Cooling

	+7°C/+12°C	+18°C/+23°C
Pdesignc	26.00 kW	
SEER	4.81	
Pdc Tj = 35°C	26.00 kW	
EER Tj = 35°C	3.01	
Pdc Tj = 30°C	19.10 kW	
EER Tj = 30°C	4.15	
Cdc Tj = 30 °C	1.000	
Pdc Tj = 25°C	12.27 kW	
EER Tj = 25°C	5.35	
Cdc Tj = 25 °C	1.000	
Pdc Tj = 20°C	12.56 kW	
EER Tj = 20°C	6.63	
Cdc Tj = 20 °C	0.900	
Poff	22 W	
PTO	0 W	

PSB	28 W
PCK	0 W
Annual energy consumption Qce	3241 kWh