Subtype ecoAIR 3-12 PRO	
Certificate Holder	Ecoforest Geotermia S.L.
Address	Rúa das Pontes, 25
ZIP	36350
City	Nigrán (Pontevedra)
Country	ES
Certification Body	DIN CERTCO Gesellschaft für Konformitätsbewertung mbH
Subtype title	ecoAIR 3-12 PRO
Registration number	011-1W0428
Heat Pump Type	Outdoor Air/Water
Refrigerant	R290
Mass of Refrigerant	0.85 kg
Certification Date	17.11.2020
Testing basis	HP KEYMARK certification scheme rules rev. 7

This information was generated by the HP KEYMARK database on 09.09.2024

Model ECOAIR T 3-12 PRO		
Model name	ECOAIR T 3-12 PRO	
Application	Heating (medium temp)	
Units	Outdoor	
Climate zone (for heating)	Warmer Climate, Colder Climate	
Reversibility	Yes	
Cooling mode application (optional)	n/a	
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	5.30 kW	4.60 kW
El input	1.11 kW	1.60 kW
COP	4.80	2.90
EN 12102-1 | Average Climate		
	Low temperature	Medium temperature
Sound power level outdoor	57 dB(A)	57 dB(A)
EN 14825 | Average Climate		
	Low temperature	Medium temperature
ηs	154 %	125 %
Prated	6.50 kW	6.50 kW
SCOP	3.93	3.21
Tbiv	-7 °C	-7 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	5.76 kW	5.76 kW
COP Tj = -7°C	2.72	2.02
Cdh Tj = -7 °C	1.000	1.000
Pdh Tj = +2°C	3.55 kW	3.56 kW
COP Tj = +2°C	4.25	3.20
Cdh Tj = +2 °C	0.990	0.990
Pdh Tj = +7°C	2.31 kW	2.31 kW

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COP Tj = +7°C	4.53	4.24
Cdh Tj = +7 °C	0.980	0.980
Pdh Tj = 12°C	2.52 kW	2.56 kW
COP Tj = 12°C	4.26	4.50
Cdh Tj = +12 °C	0.980	0.980
Pdh Tj = Tbiv	5.76 kW	5.76 kW
COP Tj = Tbiv	2.72	2.02
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	5.68 kW	5.65 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.58	1.90
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh		
WTOL	70 °C	70 °C
Poff	0 W	0 W
PTO	10 W	10 W
PSB	8 W	8 W
PCK	10 W	10 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	0.82 kW	0.85 kW
Annual energy consumption Qhe	3418 kWh	4190 kWh

EN 12102-1 | Colder Climate		
	Low temperature	Medium temperature
Sound power level outdoor	57 dB(A)	57 dB(A)

EN 14825 | Colder Climate		
	Low temperature	Medium temperature
ηs	136 %	113 %
Prated	6.60 kW	6.60 kW
SCOP	3.47	2.89
Tbiv	-12 °C	-12 °C
TOL	-15 °C	-15 °C
Pdh Tj = -7°C	4.06 kW	4.05 kW
COP Tj = -7°C	3.52	2.55
Cdh Tj = -7 °C	0.990	0.990
Pdh Tj = +2°C	2.47 kW	2.41 kW
COP Tj = +2°C	4.48	3.70
Cdh Tj = +2 °C	0.980	0.990
Pdh Tj = +7°C	2.32 kW	2.32 kW
COP Tj = +7°C	4.50	4.46
Cdh Tj = +7 °C	0.980	0.980
Pdh Tj = 12°C	2.54 kW	2.57 kW
COP Tj = 12°C	4.28	4.48
Cdh Tj = +12 °C	0.980	0.980
Pdh Tj = Tbiv	4.86 kW	4.86 kW

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COP Tj = Tbiv	2.74	2.09
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	5.04 kW	4.98 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.64	2.04
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh		
WTOL	70 °C	70 °C
Poff	0 W	0 W
PTO	10 W	10 W
PSB	8 W	8 W
PCK	10 W	10 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	6.60 kW	6.60 kW
Annual energy consumption Qhe	4692 kWh	5628 kWh
Pdh Tj = -15°C (if TOL	5.04	4.98
COP Tj = -15°C (if TOL	2.64	2.04
Cdh Tj = -15 °C	1.000	1.000

EN 12102-1 | Warmer Climate

	Low temperature	Medium temperature
Sound power level outdoor	57 dB(A)	57 dB(A)

EN 14825 | Warmer Climate

	Low temperature	Medium temperature
ηs	175 %	150 %
Prated	6.30 kW	6.10 kW
SCOP	4.45	3.82
Tbiv	2 °C	2 °C
TOL	2 °C	2 °C
Pdh Tj = +2°C	6.32 kW	6.13 kW
COP Tj = +2°C	2.62	1.90
Cdh Tj = +2 °C	1.00	1.00
Pdh Tj = +7°C	4.37 kW	4.03 kW
COP Tj = +7°C	5.34	3.80
Cdh Tj = +7 °C	0.99	0.99
Pdh Tj = 12°C	2.57 kW	2.61 kW
COP Tj = 12°C	4.41	4.51
Cdh Tj = +12 °C	0.98	0.98
Pdh Tj = Tbiv	6.32 kW	6.13 kW
COP Tj = Tbiv	2.62	1.90
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	6.32 kW	6.13 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.62	1.90
WTOL	70 °C	70 °C

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Poff	0 W	0 W
PTO	10 W	10 W
PSB	8 W	8 W
PCK	10 W	10 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	0.00 kW	0.00 kW
Annual energy consumption Qhe	1890 kWh	2133 kWh

Model ECOAIR 3-12 PRO		
Model name	ECOAIR 3-12 PRO	
Application	Heating (medium temp)	
Units	Outdoor	
Climate zone (for heating)	Warmer Climate, Colder Climate	
Reversibility	Yes	
Cooling mode application (optional)	n/a	
Any additional heat sources	n/a	
General data		
Power supply	1x230V 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	5.30 kW	4.60 kW
El input	1.11 kW	1.60 kW
COP	4.80	2.90
EN 12102-1 | Average Climate		
	Low temperature	Medium temperature
Sound power level outdoor	57 dB(A)	57 dB(A)
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Tbiv	-7 °C	-7 °C
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WTOL	70 °C	70 °C
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Prated	6.60 kW	6.60 kW
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COP Tj = +2°C	4.48	3.70
Cdh Tj = +2 °C	0.980	0.990
Pdh Tj = +7°C	2.32 kW	2.32 kW
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SCOP	4.45	3.82
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COP Tj = 12°C	4.41	4.51
Cdh Tj = +12 °C	0.98	0.98
Pdh Tj = Tbiv	6.32 kW	6.13 kW
COP Tj = Tbiv	2.62	1.90
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	6.32 kW	6.13 kW
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PCK	10 W	10 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	0.00 kW	0.00 kW
Annual energy consumption Qhe	1890 kWh	2133 kWh

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