

Summary of	HPA-O 13 S Premium, HPA-O 13 CS Premium	Reg. No.	011-1W0231
Certificate Holder	-		
Name	STIEBEL ELTRON GmbH & Co KG		
Address	Dr. Stiebel Straße 33	Zip	37603
City	Holzminden	Country	Germany
Certification Body	DIN CERTCO Gesellschaft für Konformitätsbewertung mbH		
Name of testing laboratory	VDE Prüf- und Zertifizierungsinstitut GmbH		
Subtype title	HPA-O 13 S Premium, HPA-O 13 CS Premium		
Heat Pump Type	Outdoor Air/Water		
Refrigerant	Other		
Mass Of Refrigerant	4.7 kg		
Certification Date	08.01.2018		



# **Model: HPA-O 13 S Premium**

General Data	
Power supply	1x230V 50Hz

# Heating

EN 14511-2		
	Low temperature	Medium temperature
Heat output	8.00 kW	7.52 kW
El input	1.66 kW	2.33 kW
СОР	4.82	3.23
Indoor water flow rate	1.36 m³/h	0.81 m³/h

EN 14511-4	
Shutting off the heat transfer medium flow	passed
Complete power supply failure	passed
Starting and operating test	passed

### **Average Climate**

EN 12102-1		
	Low temperature	Medium temperature
Sound power level outdoor	54 dB(A)	54 dB(A)





#### EN 14825

	Low temperature	Medium temperature
$\eta_{s}$	173 %	136 %
Prated	15.00 kW	15.00 kW
SCOP	4.39	3.47
Tbiv	-5 °C	-5 °C
TOL	-20 °C	-20 °C
Pdh Tj = -7°C	13.00 kW	13.80 kW
COP Tj = -7°C	3.02	2.43
Cdh	0.90	0.90
Pdh Tj = +2°C	8.00 kW	7.70 kW
COP Tj = +2°C	4.40	3.37
Cdh	0.90	0.90
Pdh Tj = +7°C	8.10 kW	7.90 kW
COP Tj = +7°C	5.64	4.45
Cdh	0.90	0.90
Pdh Tj = 12°C	9.10 kW	9.00 kW
COP Tj = 12°C	8.11	6.66
Cdh	0.90	0.90
Pdh Tj = Tbiv	11.80 kW	12.40 kW
COP Tj = Tbiv	3.18	2.53





Pdh Tj = TOL	12.60 kW	13.40 kW
COP Tj = TOL	2.87	2.28
WTOL	65 °C	65 °C
Poff	16 W	16 W
РТО	16 W	16 W
PSB	16 W	16 W
PCK	43 W	43 W
Supplementary Heater: Type of energy input	electricity	electricity
Supplementary Heater: PSUP	0.00 kW	0.00 kW
Annual energy consumption Qhe	7055 kWh	8940 kWh

### Warmer Climate

EN 14825		
	Low temperature	Medium temperature
$\eta_{s}$	206 %	155 %
Prated	8.00 kW	7.00 kW
SCOP	5.21	3.95
Tbiv	2 °C	2 °C
TOL	2 °C	2 °C
Pdh Tj = +2°C	7.90 kW	7.40 kW
COP Tj = +2°C	3.89	2.59





Cdh	0.90	0.90
Pdh Tj = +7°C	8.10 kW	7.70 kW
$COP Tj = +7^{\circ}C$	5.10	3.60
Cdh	0.90	0.90
Pdh Tj = 12°C	9.10 kW	9.00 kW
COP Tj = 12°C	7.72	6.11
Cdh	0.90	0.90
Pdh Tj = Tbiv	7.90 kW	7.40 kW
COP Tj = Tbiv	3.89	2.59
Pdh Tj = TOL	17.60 kW	19.80 kW
COP Tj = TOL	2.72	2.29
WTOL	65 °C	65 °C
Poff	16 W	16 W
PTO	16 W	16 W
PSB	16 W	16 W
PCK	43 W	43 W
Supplementary Heater: Type of energy input	electricity	electricity
Supplementary Heater: PSUP	0.00 kW	0.00 kW
Annual energy consumption Qhe	2050 kWh	2367 kWh

### Colder Climate





#### EN 14825

	Low temperature	Medium temperature
$\eta_{s}$	153 %	126 %
Prated	21.00 kW	22.00 kW
SCOP	3.89	3.23
Tbiv	-7 °C	-7 °C
TOL	-20 °C	-20 °C
Pdh Tj = -7°C	12.80 kW	13.50 kW
COP Tj = -7°C	3.21	2.65
Cdh	0.90	0.90
Pdh Tj = +2°C	8.10 kW	7.90 kW
COP Tj = +2°C	4.75	3.75
Cdh	0.90	0.90
Pdh Tj = +7°C	8.20 kW	8.00 kW
COP Tj = +7°C	5.95	4.86
Cdh	0.90	0.90
Pdh Tj = 12°C	9.10 kW	9.00 kW
COP Tj = 12°C	8.11	6.95
Cdh	0.90	0.90
Pdh Tj = Tbiv	12.80 kW	13.50 kW
COP Tj = Tbiv	3.21	2.65



	·	
Pdh Tj = TOL	17.40 kW	19.30 kW
COP Tj = TOL	2.80	2.38
WTOL	65 °C	65 °C
Poff	16 W	16 W
РТО	16 W	16 W
PSB	16 W	16 W
PCK	43 W	43 W
Supplementary Heater: Type of energy input	electricity	electricity
Supplementary Heater: PSUP	21.17 kW	22.26 kW
Annual energy consumption Qhe	13312 kWh	16814 kWh
Pdh Tj = -15°C (if TOL<-20°C)	17.40	19.30
COP Tj = -15°C (if TOL<-20°C)	2.80	2.38
Cdh	0.90	0.90



# **Model: HPA-O 13 CS Premium**

General Data	
Power supply	1x230V 50Hz

# Heating

EN 14511-2			
	Low temperature	Medium temperature	
Heat output	8.00 kW	7.52 kW	
El input	1.66 kW	2.33 kW	
СОР	4.82	3.23	
Indoor water flow rate	1.36 m³/h	0.81 m³/h	

EN 14511-4	
Shutting off the heat transfer medium flow	passed
Complete power supply failure	passed
Starting and operating test	passed

### **Average Climate**

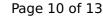
EN 12102-1		
	Low temperature	Medium temperature
Sound power level outdoor	54 dB(A)	54 dB(A)





#### EN 14825

	Low temperature	Medium temperature
$\eta_{s}$	178 %	139 %
Prated	15.00 kW	15.00 kW
SCOP	4.53	3.55
Tbiv	-5 °C	-5 °C
TOL	-20 °C	-20 °C
Pdh Tj = -7°C	13.00 kW	13.80 kW
COP Tj = -7°C	3.02	2.43
Cdh	0.90	0.90
Pdh Tj = +2°C	8.00 kW	7.70 kW
COP Tj = +2°C	4.40	3.37
Cdh	0.90	0.90
Pdh Tj = +7°C	8.10 kW	7.90 kW
COP Tj = +7°C	5.64	4.45
Cdh	0.90	0.90
Pdh Tj = 12°C	9.10 kW	9.00 kW
COP Tj = 12°C	8.11	6.66
Cdh	0.90	0.90
Pdh Tj = Tbiv	11.80 kW	12.40 kW
COP Tj = Tbiv	3.18	2.53

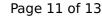




Pdh Tj = TOL	12.60 kW	13.40 kW
COP Tj = TOL	2.87	2.28
WTOL	65 °C	65 °C
Poff	16 W	16 W
РТО	16 W	16 W
PSB	16 W	16 W
PCK	43 W	43 W
Supplementary Heater: Type of energy input	electricity	electricity
Supplementary Heater: PSUP	0.00 kW	0.00 kW
Annual energy consumption Qhe	6839 kWh	8723 kWh

### Warmer Climate

EN 14825		
	Low temperature	Medium temperature
$\eta_{s}$	236 %	174 %
Prated	8.00 kW	7.00 kW
SCOP	5.97	4.44
Tbiv	2 °C	2 °C
TOL	2 °C	2 °C
Pdh Tj = +2°C	7.90 kW	7.40 kW
COP Tj = +2°C	3.89	2.59





	·	
Cdh	0.90	0.90
Pdh Tj = +7°C	8.10 kW	7.70 kW
$COP Tj = +7^{\circ}C$	5.10	3.60
Cdh	0.90	0.90
Pdh Tj = 12°C	9.10 kW	9.00 kW
COP Tj = 12°C	7.72	6.11
Cdh	0.90	0.90
Pdh Tj = Tbiv	7.90 kW	7.40 kW
COP Tj = Tbiv	3.89	2.59
Pdh Tj = TOL	17.60 kW	19.80 kW
COP Tj = TOL	2.72	2.29
WTOL	65 °C	65 °C
Poff	16 W	16 W
РТО	16 W	16 W
PSB	16 W	16 W
PCK	43 W	43 W
Supplementary Heater: Type of energy input	electricity	electricity
Supplementary Heater: PSUP	0.00 kW	0.00 kW
Annual energy consumption Qhe	1789 kWh	2107 kWh
·		

# Colder Climate





#### EN 14825

	Low temperature	Medium temperature
$\eta_{s}$	154 %	137 %
Prated	21.00 kW	22.00 kW
SCOP	3.93	3.25
Tbiv	-7 °C	-7 °C
TOL	-20 °C	-20 °C
Pdh Tj = -7°C	12.80 kW	13.50 kW
COP Tj = -7°C	3.21	2.65
Cdh	0.90	0.90
Pdh Tj = +2°C	8.10 kW	7.90 kW
COP Tj = +2°C	4.75	3.75
Cdh	0.90	0.90
Pdh Tj = +7°C	8.20 kW	8.00 kW
COP Tj = +7°C	5.95	4.86
Cdh	0.90	0.90
Pdh Tj = 12°C	9.10 kW	9.00 kW
COP Tj = 12°C	8.11	6.95
Cdh	0.90	0.90
Pdh Tj = Tbiv	12.80 kW	13.50 kW
COP Tj = Tbiv	3.21	2.65



# $$\operatorname{\textit{Page}}\ 13$$ of 13 This information was generated by the HP KEYMARK database on 17 Dec 2020

Pdh Tj = TOL	17.40 kW	19.30 kW
COP Tj = TOL	2.80	2.38
WTOL	65 °C	65 °C
Poff	16 W	16 W
РТО	16 W	16 W
PSB	16 W	16 W
PCK	43 W	43 W
Supplementary Heater: Type of energy input	electricity	electricity
Supplementary Heater: PSUP	21.17 kW	22.26 kW
Annual energy consumption Qhe	13182 kWh	16684 kWh
Pdh Tj = -15°C (if TOL<-20°C)	17.40	19.30
COP Tj = -15°C (if TOL<-20°C)	2.80	2.38
Cdh	0.90	0.90