

Subtype Buderus Logatherm WPS 13-1

Certificate Holder	Bosch Thermotechnik GmbH (Buderus)
Address	Sophienstraße 30-32
ZIP	35576
City	Wetzlar
Country	DE
Certification Body	DIN CERTCO Gesellschaft für Konformitätsbewertung mbH
Subtype title	Buderus Logatherm WPS 13-1
Registration number	011-1W0183
Heat Pump Type	Brine/Water
Refrigerant	R410A
Mass of Refrigerant	2.65 kg
Certification Date	17.11.2017

Model Buderus Logatherm WPS 13-1

Model name	Buderus Logatherm WPS 13-1
Application	Heating (medium temp)
Units	Indoor
Climate zone (for heating)	n/a
Cooling mode application (optional)	n/a
Any additional heat sources	n/a

General data

Power supply	3x400V 50Hz
Off-peak product	No

Brine/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 12102-1 | Average Climate

	Low temperature	Medium temperature
Sound power level indoor	49 dB(A)	49 dB(A)

EN 14825 | Average Climate

	Low temperature	Medium temperature
η_s	187 %	140 %
Prated	14 kW	13 kW
SCOP	4.88	3.69
Tbiv	-8 °C	-7 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	12.95 kW	11.99 kW
COP Tj = -7°C	4.61	3.15
Cdh Tj = -7 °C	1.00	1.00
Pdh Tj = +2°C	13.05 kW	12.35 kW
COP Tj = +2°C	4.86	3.66
Cdh Tj = +2 °C	1.00	1.00
Pdh Tj = +7°C	13.15 kW	12.57 kW
COP Tj = +7°C	5.1	4.04
Cdh Tj = +7 °C	1.00	1.00
Pdh Tj = 12°C	13.24 kW	12.78 kW
COP Tj = 12°C	5.36	4.49
Cdh Tj = +12 °C	1.00	1.00
Pdh Tj = Tbiv	12.95 kW	11.99 kW
COP Tj = Tbiv	4.6	3.15

Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	12.92 kW	11.84 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	4.53	2.98
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	1.00	1.00
WTOL	62 °C	62 °C
Poff	6 W	6 W
PTO	6 W	6 W
PSB	6 W	6 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	1.08 kW	1.16 kW
Annual energy consumption Qhe	5924 kWh	7269 kWh

EN 12102-1 | Colder Climate

	Low temperature	Medium temperature
Sound power level indoor	49 dB(A)	49 dB(A)

EN 14825 | Colder Climate

	Low temperature	Medium temperature
η_s	192 %	143 %
Prated	14.00 kW	13.00 kW
SCOP	5	3.78
Tbiv	-19 °C	-18 °C
TOL	-22 °C	-22 °C
Pdh Tj = -7°C	13.07 kW	12.28 kW
COP Tj = -7°C	4.9	3.54
Cdh Tj = -7 °C	1.00	1.00
Pdh Tj = +2°C	13.15 kW	12.53 kW
COP Tj = +2°C	5.12	3.97
Cdh Tj = +2 °C	1.00	1.00
Pdh Tj = +7°C	13.22 kW	12.72 kW
COP Tj = +7°C	5.29	4.35
Cdh Tj = +7 °C	1.00	1.00
Pdh Tj = 12°C	13.23 kW	12.85 kW
COP Tj = 12°C	5.33	4.67
Cdh Tj = +12 °C	1.00	1.00
Pdh Tj = Tbiv	12.96 kW	11.99 kW
COP Tj = Tbiv	4.64	3.15
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	12.92 kW	11.84 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	4.53	2.98
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	1.00	1.00

WTOL	62 °C	62 °C
Poff	6 W	6 W
PTO	6 W	6 W
PSB	6 W	6 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	1.08 kW	1.16 kW
Annual energy consumption Q _{he}	6904 kWh	8477 kWh
C _{dh} T _j = -15 °C	1.00	1.00

EN 12102-1 | Warmer Climate

	Low temperature	Medium temperature
Sound power level indoor	49 dB(A)	49 dB(A)

EN 14825 | Warmer Climate

	Low temperature	Medium temperature
η _s	189 %	140 %
Prated	14.00 kW	13.00 kW
SCOP	4.92	3.71
T _{biv}	4 °C	4 °C
TOL	2 °C	2 °C
P _{dh} T _j = +2°C	12.92 kW	11.84 kW
COP T _j = +2°C	4.53	2.98
C _{dh} T _j = +2 °C	1.00	1.00
P _{dh} T _j = +7°C	13.03 kW	12.19 kW
COP T _j = +7°C	4.81	3.41
C _{dh} T _j = +7 °C	1.00	1.00
P _{dh} T _j = 12°C	13.18 kW	12.64 kW
COP T _j = 12°C	5.19	4.19
C _{dh} T _j = +12 °C	1.00	1.00
P _{dh} T _j = T _{biv}	12.98 kW	12.01 kW
COP T _j = T _{biv}	4.67	3.17
P _{dh} T _j = TOL or P _{dh} T _j = T _{designh} if TOL < T _{designh}	12.92 kW	11.84 kW
COP T _j = TOL or COP T _j = T _{designh} if TOL < T _{designh}	4.53	2.98
C _{dh} T _j = TOL or P _{dh} T _j = T _{designh} if TOL < T _{designh}	1.00	1.00
WTOL	62 °C	62 °C
Poff	6 W	6 W
PTO	6 W	6 W
PSB	6 W	6 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	1.08 kW	1.16 kW

Annual energy consumption Q_{he}

3801 kWh

4680 kWh
