Subtype Buderus Logatherm WPS 54.2 HT

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 54.2 HT
Registration number	011-1W0164
Heat Pump Type	Brine/Water
Refrigerant	R410A
Mass of Refrigerant	9.5 kg
Certification Date	09.10.2017

Model Buderus Logatherm WPS 54.2 HT

Model name	Buderus Logatherm WPS 54.2 HT
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 14511-2 | Heating

	Low temperature	Medium temperature
Heat output	54.81 kW	57.25 kW
El input	11.97 kW	18.29 kW
COP	4.58	3.13

EN 12102-1 | Average Climate

	Low temperature	Medium temperature
Sound power level indoor	67 dB(A)	67 dB(A)

EN 14825 | Average Climate

	Low temperature	Medium temperature
ηs	203 %	155 %
Prated	54.81 kW	57.25 kW
SCOP	5.27	4.08
Tbiv	-10 °C	-10 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	48.49 kW	50.64 kW
COP Tj = -7°C	4.76	3.39
Cdh Tj = -7 °C	1.00	1.00
Pdh Tj = +2°C	28.75 kW	29.03 kW
COP Tj = +2°C	5.52	4.36
Cdh Tj = +2 °C	1.00	1.00
Pdh Tj = +7°C	28.70 kW	28.85 kW
COP Tj = +7°C	5.68	4.7

Cdh Tj = +7 °C	1.00	1.00
Pdh Tj = 12°C	28.66 kW	28.71 kW
COP Tj = 12°C	5.82	4.98
Cdh Tj = +12 °C	1.00	1.00
Pdh Tj = Tbiv	54.81 kW	57.25 kW
COP Tj = Tbiv	4.58	3.13
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	54.81 kW	57.25 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	4.58	3.13
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	1.00	1.00
WTOL	68 °C	68 °C
Poff	9 W	9 W
PTO	9 W	9 W
PSB	9 W	9 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	n/a	n/a
Supplementary Heater: PSUP	0 kW	0 kW
Annual energy consumption Qhe	21507 kWh	28973 kWh

EN 12102-1 | Colder Climate

	Low temperature	Medium temperature
Sound power level indoor	67 dB(A)	67 dB(A)

EN 14825 | Colder Climate

	Low temperature	Medium temperature
ηs	213 %	166 %
Prated	47.00 kW	48.00 kW
SCOP	5.54	4.35
Tbiv	-22 °C	-22 °C
TOL	-22 °C	-22 °C
Pdh Tj = -7°C	28.75 kW	29.13 kW
COP Tj = -7°C	5.52	4.17
Cdh Tj = -7 °C	1.00	1.00
Pdh Tj = +2°C	28.71 kW	28.93 kW
COP Tj = +2°C	5.64	4.54
Cdh Tj = +2 °C	1.00	1.00
Pdh Tj = +7°C	28.68 kW	28.77 kW
COP Tj = +7°C	5.75	4.86
Cdh Tj = +7 °C	1.00	1.00
Pdh Tj = 12°C	28.68 kW	28.66 kW
COP Tj = 12°C	5.74	5.16
Cdh Tj = +12 °C	1.00	1.00
Pdh Tj = Tbiv	47 kW	48 kW
COP Tj = Tbiv	4.68	3.2

Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	47 kW	48 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	4.68	3.2
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	1.00	1.00
WTOL	68 °C	68 °C
Poff	9 W	9 W
PTO	9 W	9 W
PSB	9 W	9 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	n/a	n/a
Supplementary Heater: PSUP	0.00 kW	0 kW
Annual energy consumption Qhe	20931 kWh	27186 kWh
Cdh Tj = -15 °C	1.00	1.00

EN 12102-1 | Warmer Climate

	Low temperature	Medium temperature
Sound power level indoor	67 dB(A)	67 dB(A)

EN 14825 | Warmer Climate

	Low temperature	Medium temperature
ηs	210 %	162 %
Prated	44.00 kW	45.00 kW
SCOP	5.45	4.25
Tbiv	2 °C	2 °C
TOL	2 °C	2 °C
Pdh Tj = +2°C	44.00 kW	45 kW
COP Tj = +2°C	4.72	3.23
Cdh Tj = +2 °C	1.00	1.00
Pdh Tj = +7°C	28.78 kW	29.25 kW
COP Tj = +7°C	5.4	3.98
Cdh Tj = +7 °C	1.00	1.00
Pdh Tj = 12°C	28.71 kW	28.85 kW
COP Tj = 12°C	5.66	4.7
Cdh Tj = +12 °C	1.00	1.00
Pdh Tj = Tbiv	44 kW	45.00 kW
COP Tj = Tbiv	4.72	3.23
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	44 kW	45 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	4.72	3.23
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	1.00	1.00
WTOL	68 °C	68 °C
Poff	9 W	9 W

PTO	9 W	9 W
PSB	9 W	9 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	n/a	n/a
Supplementary Heater: PSUP	0.00 kW	0 kW
Annual energy consumption Qhe	10786 kWh	14151 kWh