

## Subtype HPMO2-16/23

Certificate Holder	Kospel spółka z o.o.
Address	ul. Olchowa 1,
ZIP	75-136
City	Koszalin
Country	PL
Certification Body	BRE Global Limited
Subtype title	HPMO2-16/23
Registration number	041-K050-03
Heat Pump Type	Outdoor Air/Water
Refrigerant	R32
Mass of Refrigerant	2 kg
Certification Date	03.05.2023
Testing basis	Heat Pump Keymark Scheme Rules Rev 11
Testing laboratory	TÜV SÜD Certification and Testing Co., Ltd. Guangzhou Branch, CN

## Model HPMO2-16/23

Model name	HPMO2-16/23
Application	Heating (medium temp)
Units	Outdoor
Climate zone (for heating)	n/a
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	17.17 kW	15.05 kW
El input	3.55 kW	5.36 kW
COP	4.83	2.81

### EN 12102-1 | Average Climate

	Low temperature	Medium temperature
Sound power level outdoor	63 dB(A)	64 dB(A)

### EN 14825 | Average Climate

	Low temperature	Medium temperature
$\eta_s$	182 %	135 %
Prated	13.09 kW	14.42 kW
SCOP	4.62	3.46
Tbiv	-7 °C	-7 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	11.58 kW	12.75 kW
COP Tj = -7°C	3.27	2.18
Cdh Tj = -7 °C	0.900	0.900
Pdh Tj = +2°C	7.32 kW	7.77 kW
COP Tj = +2°C	4.38	3.28
Cdh Tj = +2 °C	0.900	0.900
Pdh Tj = +7°C	7.27 kW	7.27 kW

COP Tj = +7°C	5.66	4.56
Cdh Tj = +7 °C	0.990	0.990
Pdh Tj = 12°C	7.71 kW	6.87 kW
COP Tj = 12°C	8.24	6.70
Cdh Tj = +12 °C	0.990	0.990
Pdh Tj = Tbiv	11.58 kW	12.75 kW
COP Tj = Tbiv	3.27	2.18
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	12.87 kW	13.98 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.93	1.83
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.900	0.900
WTOL	51 °C	51 °C
Poff	24 W	24 W
PTO	24 W	24 W
PSB	24 W	24 W
PCK	40 W	40 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	0.22 kW	0.44 kW
Annual energy consumption Qhe	5850 kWh	8613 kWh