

# Gebwell GEMINI heat pump

– Heat pump for large residential, commercial and industrial properties

GEMINI is equipped with two compressors and advanced automation, which make it a reliable heating solution. Two-stage adjustment of compressors ensure better power control as well as longer long service life.

Automation sees to the shift operation of compressors ensuring that the operation hours stay similar. GEMINI can produce hot domestic water and heat the heating circuit simultaneously. Up to eight GEMINI heat pumps can be connected in cascade reaching a heating output of over 500 kW.

GEMINI heat pump can be connected to property control systems with the help of Modbus RTU interface, making ground source heat pumps a part of the control system. The automation of the heat pump enables different hybrid solutions. In addition to heat pump among other district heating, oil and electricity can be added as an additional heating source in hybrid solution.

Heat well collecting loop can also be used to cool the property. There is an in-built readiness for connecting cooling in GEMINI heat pump. For generating the cooling energy only an additional circulation water pump is required.

GEMINI heat pump comes in three power classes with heating output of 45, 61 and 69 kW. We also provide accessories to speed up the installation of GEMINI heat pump.

- Manufactured in Finland
- Versatile automation for different hybrid systems
- Modbus interface
- Up to 500 kW in cascade
- Energy efficient circulation pumps
- Low sound level



Gebwell Gemini		40	52	64
GTIN		6415853619950	6415853619967	6415853619974
<b>Power values:</b>				
Heating output (0°/35° and 0°/55°)	kW	45.0 / 40.6	61.0 / 54.6	69.2 / 61.8
Cooling capacity (0°/35° and 0°/55°)	kW	35.0 / 25.6	48.0 / 35.2	54.8 / 40.2
Input power (0°/35° and 0°/55°)	kW	10.0 / 15.0	13.0 / 19.4	14.4 / 21.6
COP (0°/35° and 0°/55°)		4.5 / 2.7	4.7 / 2.8	4.8 / 2.9
- Power values stated at temperatures 0°/35° and 0°/55° SFS-EN 14511				
System's energy efficiency class, intermediate climate, underfloor heating		<b>A+++</b>		
Heat collecting liquid		Denaturated ethanol 30 p-%		
Heat collecting liquid nominal flow	l/s	1.66	2.36	3,0
Maximum allowed external pressure loss at the heat collecting loop nominal flow	kPa	81	70	100
Heating system / heat collecting loop maximum operating pressure (consider network pressure)	bar	4 / 4		
Heating water maximum output temperature	°C	68		
Operational temperature, collecting loop	°C	-5..+20	-5..+20	-5..+20
Compressor		Scroll		
Number of compressors		2		
Compressor soft starter		yes		
Built-in heating pump		yes		
Source pump		included in delivery		
Electrical connection		400 VAC, 50 Hz, 3-phase		
Fuses (without resistors)	A	3x40	3x50	3x63
Contains fluorinated greenhouse gases		yes		
Hermetically sealed		yes		
Refrigerant		R410A		
GWP (Global Warming Potential)		2088		
Refrigerant amount	kg	2 x 3.8	2 x 3.4	2 x 3.4
CO <sub>2</sub> equivalence - tonnes CO <sub>2</sub> e		2 x 7.934	2 x 7.099	2 x 7.099
Sound power level	dB	42	42	43.5
<b>Dimensions:</b>				
Outside dimensions (depth x width x height)	mm	875 x 600 x 1895		
Weight	kg	400		

\* adjustment legs 20 - 40 mm