

MW MONOBLOC R32

3-Phase

MCWSGS 1002 Z

Air-to-water heat pump

OUTDOOR UNITS



5.00 kW	6.00 kW	8.00 kW
1-Phase	1-Phase	1-Phase
MCWNGS 402 Z	MCWNGS 602 Z	MCWNGS 802 Z



10.20 kW	12.00 kW	14.20 kW	15.70 kW
1-Phase	1-Phase	1-Phase	1-Phase
MCWNGS 1002 Z	MCWNGS 1202 Z	MCWNGS 1402 Z	MCWNGS 1602 Z
10 20 kW	12 00 kW	14 20 kW	15 70 kW

MCWSGS 1402 Z

MCWSGS 1602 Z

MCWSGS 1202 Z

AIR-TO-WATER HEAT PUMP MW MONOBLOCCO R32

MW MONOBLOC by MULTIWARM is the reliable and advantageous solution for heating, cooling and producing DHW in micro-condominiums, single homes and apartments. The latest generation Full DC Inverter technology guarantees top-of-the-class performance and energy savings, with the added guarantee of the MULTIWARM brand.









SMART GRID Reading the trend of the electricity grid, energy savings guaranteed

Heating via radiant floors, fan coils, radiators

Thanks to MULTIWARM's MW MONOBLOC it is possible to heat all rooms, powering low-temperature hydronic terminals such as radiant floors, and medium-temperature ones, such as fan-coils and high-efficiency radiators.

Main operating modes

- > Cooling, heating, DHW production.
- Cooling + DHW production (with selectable priority).
- Heating + DHW production (with selectable priority).
- > DHW production.

Project climate zones for heating

Outside design temp.	Max delivery temp.	Climate zones
+10°C	65°C	
+5°C	62°C	WARMER
+2°C	60°C	
0°	59°C	
5°C		AVERAGE
-10°C	53°C	
-25°C	44°C	

MW MONOBLOC is the R32 heat pump that operates in the following modes:

COOLING MODE	DHW PRODUCTION	HEATING MODE
from -15° C to 48° C from 5° C to 25° C (delivery temp.)	from -25° C to 45° C	from -25° C to 35° C from 20° C to 65° C (delivery temp.)
48	60	65
25	45 40	35
5		
-15	-25	-25



MW MONOBLOC R32

Product benefits



SILENT MODE

Silent mode operation reduces the noise of the heat pump compressor and fan.



CONNECTION WITH OTHER HEAT SOURCES

If the outdoor temperature is lower than the set-point, the external heat source will start operating.



CLIMATE CURVE

Automatically adjusts the water flow temperature and the room temperature based on the outdoor temperature.



EMERGENCY MODE

In the event of a heat pump malfunction, the auxiliary electrical resistors are activated.



ANTI-LEGIONELLA CYCLES

Increase the water temperature up to 70°C using the electric resistance in the DHW storage tank, thus eliminating legionella bacteria and sterilizing the water.

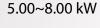
878 mm



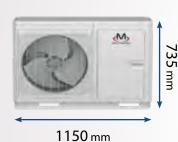
WEEKLY TIMER

Possibility to set up to three daily operating programs (both in heating and cooling).

Compact dimensions









1206 mm

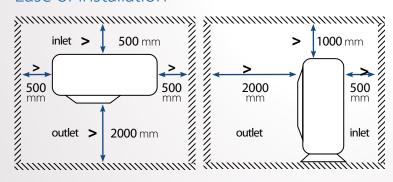
Aluminum fins with anti-corrosion coating (Gold Fin)



The fin coating lasts over time and ensures greater resistance to salt corrosion.

**** G 45 B

Ease of installation



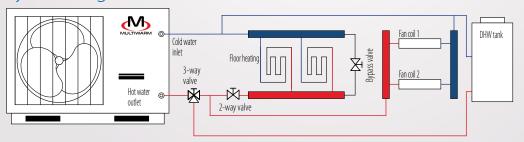
It is not necessary to make any connection to the refrigeration circuit, the hydraulic connections are sufficient.

DMC-HP-Z control

Group control, connect up to four R32 Monobloc or Split Series units, even combined together. Main functions:

- > Silent mode;
- fast hot water;
- > Holiday mode;
- Climate;
- Child lock;
- anti-legionella programming via electrical resistance in the tank;
- Error reset;
- > Weekly timer.

System diagram





OUTDOOR UNITS



MCWNGS 402 - 602 - 802 Z 1-Phase

ENERGY CLASS

A+++
In heating mode with 35° Co

In heating mode with **35° C** delivery water temperature.

A++

In heating mode with **55° C** delivery water temperature.

Model				MCWNGS 402 Z	MCWNGS 602 Z	MCWNGS 802 Z		
	Rated power		1111	5.00	6.00	8.00		
Heating	Electrical absorption	A7//W35	kW	0.93	1.11	1.63		
	Performance coefficient		COP	5.40	5.40	4.90		
	Rated power			4.90	6.80	8.00		
	Electrical absorption	A7/W45	kW	1.17	1.66	2.11		
	Performance coefficient	עדוווןווו	COP	4.20	4.10	3.80		
	Rated power			5.00	6.50	8.00		
	Electrical absorption	A35//W18	kW	0.96	1.27	1.65		
	Energy efficiency	W	EER	5.20	5.10	4.85		
ooling	Rated power		LLN	4.90	5.70	7.20		
		A35//W7	kW	1.40	1.75	2.25		
	Electrical absorption	A35//W/	LLD					
	Energy efficiency		EER	3.50	3.25	3.20		
	Theoretical load (Pdesignh) @ -10°C		kW	5/5	6/5	7/7		
easonal heating	Seasonal energy efficiency (ηs)	35/55	%	192/137	199/137	184/145		
ata	Energy efficiency class		-	A+++/A++	A+++/A++	A+++/A++		
	Annual energy consumption		kWh/y	2306/2882	2386/2882	2979/3996		
		Heating	l		-25~35			
	Outdoor air temperature	Cooling				10~48		
Operating range		DHW		-25~45				
	Delivery water temperature	Heating	۰۷	20~65				
	, ,	Cooling	_		5~25			
	Refrigerant ¹		type (GWP)		R32 (675)			
efrigerant circuit			kg (t)	0.	95 (0.641)	1.23 (0.830)		
ata	Control system				Electronic expansion valve			
	Compressor type				Rotary – DC Inverter			
	U. A. a. A. a. a. a. a.	Type	,		With brazed stainless steel plates			
	Heat exchanger	Flow rate	m³/h	0.7	1.1	1.4		
	6 1	Brand			Shinhoo			
	Circulation pump	Static pressure	2 kPa	84	76	60		
ydraulic data		Type		Threaded				
,	Water connections	Dimension	Inch		1"F BSP			
	Operating pressure Min/Max		bar		0.5/2.5			
		Volume	1		2			
	Expansion vessel	Pre-load	bar		1			
	Power supply	TTC TOUG	Ph/V/Hz	1ph-230V-50Hz				
	11.7	Heating		11.00	11.00	17.00		
lectrical data	Maximum current	Cooling	A	8.00	8.00	10.60		
	Power cable (recommended)	Couling	type		x2.5 mm ²	3x4 mm ²		
	i ower capie (reconninencea)	Туре	q.ty		DC Inverter x 1	JAP IIIII		
	Fan	Air flow	m³/h		3200			
	Sound power level	All HOW	dB(A)		58	64		
an alican	<u> </u>	Heating	UD(A)		53	04 56		
roduct	Sound pressure level	Heating	dB(A)	Г1	53			
pecifications	<u> </u>	Cooling		51		55		
	Dimensions	WxDxH	mm		1150x365x735	0.5		
	Weight	Net	kg	90		95		
	Control (supplied)				Wired remote control			

^{1.} Refrigerant leakage contributes to climate change. Refrigerants with a lower global warming potential (GWP) contribute less to global warming when released into the atmosphere than those with a higher GWP. This appliance contains a refrigerant with a GWP of 675. Therefore, if 1 kg of this refrigerant were released into the atmosphere, the impact on global warming would be 675 times greater than 1 kg of CO2, over a period of 100 years. Under no circumstances should the user attempt to intervene on the refrigerant circuit or disassemble the product. If necessary, always contact qualified personnel. 2. Values net of exchanger pressure drops.

GENERAL NOTE

The above data refers to the following standards: EN 14511:2018; EN 14825:2019; EN50564:2011; EN12102-1:2018; EN12102-2:2019; (EU)No:811:2013; (EU)No:811:2013; (EU)No:813:2013; OJ 2014/C 207/02:2014.



OUTDOOR UNITS





MCWNGS 1002 - 1202 - 1402 - 1602 Z 1-Phase

ENERGY CLASS

A+++

In heating mode with **35° C** delivery water temperature.

A+++

In heating mode with **55° C** delivery water temperature.

10.20 kW model

A++

In heating mode with **55° C** delivery water temperature.

12.00-15.70 kW models

Model				MCWNGS 1002 Z	MCWNGS 1202 Z	MCWNGS 1402 Z	MCWNGS 1602 Z	
	Rated power		kW	10.20	12.00	14.20	15.70	
Heating	Electrical absorption	A7//W35	KVV	2.02	2.43	2.99	3.45	
	Performance coefficient		COP	5.05	4.94	4.75	4.55	
	Rated power		kW	10.20	13.00	14.20	16.20	
	Electrical absorption	A7/W45	KW	2.50	3.45	3.84	4.49	
	Performance coefficient		COP	4.08	3.77	3.70	3.61	
	Rated power	A35//W18	kW	10.20	12.00	13.70	15.50	
	Electrical absorption			2.00	2.45	3.00	3.60	
ooling	Energy efficiency		EER	5.10	4.90	4.57	4.31	
oomig	Rated power		kW -	9.00	11.10	13.30	13.80	
	Electrical absorption	A35//W7		2.65	3.58	4.75	5.09	
	Energy efficiency		EER	3.40	3.10	2.80	2.71	
	Theoretical load (Pdesignh) @ -10°C		kW	9/10	12/12	13/13	14/14	
easonal heating	Seasonal energy efficiency (ηs)	35/55	%	176/152	188/149	185/147	184/146	
ata	Energy efficiency class	ננוננ	-	A+++/A+++	A+++/A++	A+++/A++	A+++/A++	
	Annual energy consumption		kWh/y	4163/5486	5194/6388	5682/7352	6072/7675	
Operating range	Outdoor air temperature	Heating		-25~35				
		Cooling	°C	-15~48				
		DHW		-25~45				
	Delivery water temperature	Heating	% -	20~65				
		Cooling	_		5~			
	Refrigerant ¹ type (GWP)		R32 (675)					
	Quantity (tons CO2) kg (t)			1.6 (1.080) 2.2 (1.485)				
ata	Control system			Electronic expansion valve				
	Compressor type			Rotary - DC Inverter				
	Heat exchanger	Туре		With brazed stainless steel plates				
	ricut exchanger	Flow rate	m³/h	1.7	2.1	2.4	2.8	
	Circulation pump	Brand			Shir			
	Circulation partip	Static pressure ²	kPa	57	50	36	20	
ydraulic data	Water connections	Туре				readed		
		Dimension	Inch		1"F BSP			
	Operating pressure Min/Max		bar L	0.5/2.5				
	Expansion vessel	Expansion vessel Volume Pre-load		2 3				
	'	bar	1					
	Power supply		Ph/V/Hz	1ph-230V-50Hz				
oad	Maximum current	Heating	A -	25.00	29.00	30.00	30.00	
		Cooling		17.50	17.00	21.00	23.00	
	Power cable (recommended)	-	tipo	3x6 mm ²				
	Fan	Туре	q.ty	DC Inverter x 1				
	Air flow m		m³/h	5800 5015				
			dB(A)	68				
roduct	Sound pressure level	Heating	dB(A)		6	58	59	
pecifications	<u>'</u>	Cooling	- ' / -	5	4	55	56	
	Dimensions	WxDxH	mm	***	1206x4	45x878		
	Weight	Net	kg	114 132				
	Control (supplied)			Wired remote control				

^{1.} Refrigerant leakage contributes to climate change. Refrigerants with a lower global warming potential (GWP) contribute less to global warming when released into the atmosphere than those with a higher GWP. This appliance contains a refrigerant with a GWP of 675. Therefore, if 1 kg of this refrigerant were released into the atmosphere, the impact on global warming would be 675 times greater than 1 kg of CO2, over a period of 100 years. Under no circumstances should the user attempt to intervene on the refrigerant circuit or disassemble the product. If necessary, always contact qualified personnel. 2. Values net of exchanger pressure drops.

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OUTDOOR UNITS





MCWSGS 1002 - 1202 - 1402 - 1602 Z 3-Phase

ENERGY CLASS

A+++

In heating mode with **35° C** delivery water temperature.



In heating mode with **55° C** delivery water temperature.

12.00-15.70 kW models



In heating mode with **55° C** delivery water temperature.

10.20 kW model

Model				MCWSGS 1002 Z	MCWSGS 1202 Z	MCWSGS 1402 Z	MCWSGS 1602 Z		
	Rated power		1111	10,20	12.00	14.20	15.70		
Heating	Electrical absorption	A7//W35	kW -	2.06	2.49	3.09	3.57		
	Performance coefficient		COP	4.95	4.82	4.60	4.40		
	Rated power		1111	10.20	13.00	14.20	16.20		
	Electrical absorption	A7/W45	kW -	2.60	3.45	3.84	4.49		
	Performance coefficient		COP	3.92	3.77	3.70	3.61		
	Rated power		1111	10.20	12.00	13.90	15.40		
	Electrical absorption	A35//W18	kW -	2.13	2.61	3.32	4.05		
D	Energy efficiency		EER	4.79	4.60	4.19	3.80		
ooling	Rated power		1144	9.10	11.10	13.30	13.80		
	Electrical absorption	A35//W7	kW -	2.80	3.58	4.75	5.09		
	Energy efficiency		EER	3.25	3.10	2.80	2.71		
	Theoretical load (Pdesignh) @ -10°C		kW	9/10	12/12	13/13	13/14		
easonal heating	Seasonal energy efficiency (ηs)		%	189/140	180/150	179/150	179/150		
ata	Energy efficiency class	35/55	-	A+++/A++	A+++/A+++	A+++/A+++	A+++/A+++		
	Annual energy consumption	1	kWh/y	4069/5907	5517/6391	5927/7176	5927/7404		
	2, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2	Heating	,	-25~35					
Operating range	Outdoor air temperature	Cooling	1 ℃			~48			
		DHW	1 `	-15~46 -25~45					
		Heating				~65			
	Delivery water temperature	Cooling	°C						
	Refrigerant1	type (GWP)		R32 (675)					
efrigerant circuit	Quantity (tons CO2)	kg (t)		1.6 (1.080) 2.2 (1.485)					
ata	Control system			1.0 (1.000)	Flectronic ex	pansion valve			
atu	ompressor type			Rotary - DC Inverter					
		Type	Турс	With brazed stainless steel plates					
	Heat exchanger	Flow rate	m³/h	1.7	2.1	2.4	2.8		
		Brand	/	1.7		nhoo	2.0		
	Circulation pump	Static pressure	2 kPa	57	50	36	20		
lydraulic data		Type	I I I	Threaded					
y draume data	Water connections	Dimension	Inch	1"FBSP					
	Operating pressure Min/Max	Difficilision	bar	0.5/2.5					
		Volume	J			3			
	Expansion vessel	Pre-load	bar						
	Power supply	i i i i i i i i i i i i i i i i i i i	Ph/V/Hz		3nh-40	0V-50Hz			
		Heating		9.00	11.50	12.00	12.50		
lectrical data	Maximum current	Cooling	A	6.00	5.00	8.00	8.50		
	Power cable (recommended)	Cooming	type	0.00		5 mm ²	0.50		
	,	Туре	q.ty	DC Inverter x 1					
	Fan	Air flow	m³/h	5800	DCIIIV	5015			
	Sound power level	7.01 11011	dB(A)	5000	· · · · · · · · · · · · · · · · · · ·	58			
roduct	<u> </u>	Heating	· · · ·	ξ.	56	58	59		
pecifications	Sound pressure level	Cooling	dB(A)		54	55	56		
ocenicutions.	Dimensions	WxDxH	mm		1206x445x878				
				42.4	1200%	138			
	Weight	Net	kg	124		138			

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