3. Specifications

3.1 WH-ADC0316M9E82 WH-WXG09ME8 R3

Item			Unit	Outdoor Unit		
Performance Test Condition				EN 14511		
				EN 14825		
Cooling Capacity			Condition (Ambient/Water)	A35W7		
			kW	9.00		
			BTU/h	30700		
Cooling EER			W/W	3.61		
Heating Capacity			Condition (Ambient/Water)	A7W35	A2W35	
			kW	9.00	9.00	
			BTU/h	30700	30700	
Heating COP			W/W	5.23	3.81	
Heating Erp	DHW			Warmer	Average	Colder
	Application		Climate			
	COP / nwh		(W/W) / %	3.30 / 132	3.00 / 123	2.20 / 88
	AEC		kWh	753	831	1141
Noise Level			dB (A) ***	Cooling: -	Heating: -	
			Power Level dB ****	Cooling: 60	Heating: 58	
			dB *****	-	Heating: 52	
Air Flow			m^3/min (ft^3/min)	Cooling: 97.0 (3426) Heating: 83.0 (2931)		
Refrigeration Control Device				Expansion Valve		
Refrigeration Oil			cm^3	PZ68S (1600)		
Refrigerant			kg (oz)	R290, 1.78 (62.8) (Pre-charged) (-) (Maximum)		
F-GAS		GWP		3		
		CO^2eq (ton) (Precharged / Maximum)		0.006 / -		
Dimension		Height	mm (inch)	1520 (59-27/32)		
		Width	mm (inch)	1200 (47-1/4)		
		Depth	mm (inch)	430 (16-59/64)		
Net Weight			kg (lbs)	163 (359)		
Pipe Diameter (Inner)			mm	25		
Standard Length			m (ft)	5.0 (16.4)		
Maximum Pipe Length			m (ft)	30.0 (98.4)		
I/D & O/D Height Difference			m (ft)	30.0 (98.4)		
Water Pipe Connector		Indoor	inch	1-1/4		
		Outdoor		1-1/4		
Compressor		Type		Hermetic Motor Compressor (Involute Scroll)		
		Motor Type		Synchronous Electric Motor (6-poles)		
		Rated Output	kW	3.10		
Fan		Type		Propeller Fan		
		Material		PP		
		Motor Type		DC (8-poles)		
		Input Power	kW	-		
		Output Power	W	120 × 2		
		Fan Speed	rpm	Cooling: 510 Heating: 400		

Item		Unit	Outdoor Unit		
Heat Exchanger	Fin material		Aluminium (Blue Coat)		
	Fin Type		Corrugated Fin		
	Row × Stage × FPI		2 × 58 × 19		
	Size (W × H × L)	mm	44 × 1473.2 × 868.2:902.7		
Hot Water Coil	Type		Brazed Plate		
	No. of Plates		36		
	Size (W × H × L)	mm	76.2 × 524 × 117		
	Water Flow Rate	l/min (m^3/h)	Cooling: 25.8 (1.5) Heating: 25.8 (1.5)		
Power Source (Phase, Voltage, Cycle)		Ø	Three		
		V	400		
		Hz	50		
Input Power		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		kW	Cooling: 2.49	Heating: 1.72	Heating: 2.36
Maximum Input Power For Heatpump System		kW	8.51		
Outdoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 12.8 / 8.51k		
Indoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 13.1 / 9.00k		
Power Supply 3 : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			- / - / -		
Starting Current		A	3.8		
Running Current		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		A	Cooling: 3.8	Heating: 2.6	Heating: 3.6
Maximum Current For Heatpump System		A	12.8		
Power Factor Power factor means total figure of compressor and outdoor fan motor.		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		%	Cooling: 95	Heating: 96	Heating: 95
Power Cord	Number of core		-		
	Length	m (ft)	-		
Thermostat			Electronic Control		
Protection Device			Electronic Control		
Pressure Relief Valve Water Circuit		kPa	Open: 400, Close: 280		
Operation Range	Outdoor Ambient	°C (min. / max.)	Cooling: 10 / 43 Heating (Tank): -28 / 43 Heating (Circuit): -28 / 35		
	Water Outlet	°C (min. / max.)	Cooling: 5 / 20 Heating (Tank): - / 65*3, Heating (Circuit): 25 / 55 (Below Ambient -25 °C) *4 Heating (Circuit): 25 / 75 (Above Ambient -15 °C) *4		
Internal Pressure Differential		kPa	Cooling: 22.0 Heating: 22.0		
Pump	Motor Type		Brushless DC Motor (Sensorless vector control system)		
	No. of Speed		Variable speed		
	Input Power	W	175		
Flow Sensor	Type		Vortex (Piezoelectric sensor)		
	Measuring range	l/min	5 ~ 60		

Item		Unit	Indoor Unit	
Performance Test Condition			EN 14511	
			EN 14825	
Noise Level		dB (A)	Cooling: 22***	Heating: 22***
		Power Level dB	Cooling: 35****	Heating: 35****
Dimension	Depth	mm (inch)	602 (23-45/64)	
	Width	mm (inch)	599 (23-37/64)	
	Height	mm (inch)	1642 (64-41/64)	
Net Weight		kg (lbs)	89 (196)	
Water Pipe Diameter	Room	mm (inch)	31 (1-1/4)	
	Shower	mm (inch)	19 (3/4)	
Water Drain Hose Inner Diameter		mm (inch)	17.00 (11/16)	
Pressure Release Valve		kPa	Open: 800, Close: 640	
Protection Device		A	Earth Leakage Circuit Breaker (40)	
Expansion Vessel	Volume	l	12	
	MWP	bar	10	
Capacity of Integrated Electric Heater / OLP TEMP		kW / °C	9.00 / 85	
Tank Volume (Spec / Nett)		L	200 / 185	
Max. Tank Water Set Temperature		°C	65	
Tank Coil Surface		m^2	1.8	
Maximum Working Pressure	Heat / Cool	Bar	4.0	
	Tank Circuit	Bar	10.0	
Operating Pressure	Tank Unit	Bar	3.5	
	Expansion Relief Valve	Bar	8.0	
Expansion Vessel Pre-charge Pressure (DHW Circuit)		Bar	3.5	
Pressure Reducing Valve Set Pressure (DHW Circuit)		Bar	3.5	

Item		Unit	Indoor Unit
Pressure Vessel	Material		EN14511
	Volume	L	185
	Design Pressure	Bar	10
Heat Exchanger	Material		EN-1.4521
	Diameter	mm	22
	Thickness	mm	0.8
	Surface Area	m^2	1.8
	Total Length	m	25
DHW Tank	Total Corrosion ion (Chloride + Sulphate + Nitric)	mg/L	< 150
	Conductivity @ Water Tank Water Temperature < 60ºC	µS/cm	< 1250
	Conductivity @ Water Tank Water Temperature < 65ºC	µS/cm	< 1200
	Saturation Index (LSI) @ 20ºC		> -4.0 / < 0.4
	PH		6.5 - 8.5

Note:

- In case it is necessary to indicate the air flow volume in (l/s), the value in (m^3/min.) shall be multiplied by 16.7 and rounded down the decimal point.
- If the EUROVENT Certified models can be operated under the “extra-low” temperature condition, -7°C DB and -8°C WB temperature with rated voltage 230V shall be used.
- Capacity is measured at outdoor temperature 7°C DB and 6°C WB with controlled water inlet 30°C and water outlet 35°C (EN 14511-2)
- Flowrate indicated are based on nominal capacity adjustment of leaving water temperature (LWT) 35°C and ΔT=5°C.
- EER and COP classification is at 230V only in occordance with EU directive 2003/32/EC.
- *** The sound pressure level is measured with distance 1.0m from the unit and height at 1.5m. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- ***** The sound power level is measured with accordance to EN12102 under conditions of the EN14825. (Test carry out for heating at ambient 7°C DB / 6°C WB and water out 55°C)
- **** The sound power level is measured with accordance to EN12102 under full load conditions. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- *3 When outdoor ambient is under -15°C, only the backup heater operate above 55°C. (Outdoor unit don’t have backup heater.)
- *4 Between outdoor ambient -15°C and -25°C, the water outlet temperature gradually decreases from 75°C to 55°C.

3.2 WH-ADC0316M9E82 WH-WXG12ME8 R3

Item			Unit	Outdoor Unit		
Performance Test Condition				EN 14511		
				EN 14825		
Cooling Capacity			Condition (Ambient/Water)	A35W7		
			kW	9.00		
			BTU/h	30700		
Cooling EER			W/W	3.61		
Heating Capacity			Condition (Ambient/Water)	A7W35	A2W35	
			kW	12.00	12.00	
			BTU/h	40900	40900	
Heating COP			W/W	5.06	3.54	
Heating Erp	DHW			Warmer	Average	Colder
	Application		Climate			
	COP / nwh		(W/W) / %	3.30 / 132	3.00 / 123	2.20 / 88
	AEC		kWh	753	831	1141
Noise Level			dB (A) ***	Cooling: -	Heating: -	
			Power Level dB ****	Cooling: 60	Heating: 59	
			dB *****	-	Heating: 53	
Air Flow			m^3/min (ft^3/min)	Cooling: 97.0 (3426) Heating: 92.0 (3249)		
Refrigeration Control Device				Expansion Valve		
Refrigeration Oil			cm^3	PZ68S (1600)		
Refrigerant			kg (oz)	R290, 1.78 (62.8) (Pre-charged) (-) (Maximum)		
F-GAS	GWP			3		
	CO^2eq (ton) (Precharged / Maximum)			0.006 / -		
Dimension	Height		mm (inch)	1520 (59-27/32)		
	Width		mm (inch)	1200 (47-1/4)		
	Depth		mm (inch)	430 (16-59/64)		
Net Weight			kg (lbs)	163 (359)		
Pipe Diameter (Inner)			mm	32		
Standard Length			m (ft)	5.0 (16.4)		
Maximum Pipe Length			m (ft)	30.0 (98.4)		
I/D & O/D Height Difference			m (ft)	30.0 (98.4)		
Water Pipe Connector	Indoor		inch	1-1/4		
	Outdoor			1-1/4		
Compressor	Type			Hermetic Motor Compressor (Involute Scroll)		
	Motor Type			Synchronous Electric Motor (6-poles)		
	Rated Output		kW	3.10		
Fan	Type			Propeller Fan		
	Material			PP		
	Motor Type			DC (8-poles)		
	Input Power		kW	-		
	Output Power		W	120 × 2		
	Fan Speed		rpm	Cooling: 510 Heating: 420		

Item		Unit	Outdoor Unit		
Heat Exchanger	Fin material		Aluminium (Blue Coat)		
	Fin Type		Corrugated Fin		
	Row × Stage × FPI		2 × 58 × 19		
	Size (W × H × L)	mm	44 × 1473.2 × 868.2:902.7		
Hot Water Coil	Type		Brazed Plate		
	No. of Plates		36		
	Size (W × H × L)	mm	76.2 × 524 × 117		
	Water Flow Rate	l/min (m^3/h)	Cooling: 25.8 (1.5) Heating: 34.4 (2.1)		
Power Source (Phase, Voltage, Cycle)		Ø	Three		
		V	400		
		Hz	50		
Input Power		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		kW	Cooling: 2.49	Heating: 2.37	Heating: 3.39
Maximum Input Power For Heatpump System		kW	9.84		
Outdoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 14.8 / 9.84k		
Indoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 13.1 / 9.00k		
Power Supply 3 : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			- / - / -		
Starting Current		A	3.8		
Running Current		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		A	Cooling: 3.8	Heating: 3.6	Heating: 5.2
Maximum Current For Heatpump System		A	14.8		
Power Factor Power factor means total figure of compressor and outdoor fan motor.		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		%	Cooling: 95	Heating: 96	Heating: 95
Power Cord	Number of core		-		
	Length	m (ft)	-		
Thermostat			Electronic Control		
Protection Device			Electronic Control		
Pressure Relief Valve Water Circuit		kPa	Open: 400, Close: 280		
Operation Range	Outdoor Ambient	°C (min. / max.)	Cooling: 10 / 43 Heating (Tank): -28 / 43 Heating (Circuit): -28 / 35		
	Water Outlet	°C (min. / max.)	Cooling: 5 / 20 Heating (Tank): - / 65*[3], Heating (Circuit): 25 / 55 (Below Ambient -25 °C) *[4] Heating (Circuit): 25 / 75 (Above Ambient -15 °C) *[4]		
Internal Pressure Differential		kPa	Cooling: 22.0 Heating: 39.0		
Pump	Motor Type		Brushless DC Motor (Sensorless vector control system)		
	No. of Speed		Variable Speed		
	Input Power	W	175		
Flow Sensor	Type		Vortex (Piezoelectric sensor)		
	Measuring range	l/min	5 ~ 60		

Item		Unit	Indoor Unit	
Performance Test Condition			EN 14511	
			EN 14825	
Noise Level		dB (A)	Cooling: 22***	Heating: 22***
		Power Level dB	Cooling: 35****	Heating: 35****
Dimension	Depth	mm (inch)	602 (23-45/64)	
	Width	mm (inch)	599 (23-37/64)	
	Height	mm (inch)	1642 (64-41/64)	
Net Weight		kg (lbs)	89 (196)	
Water Pipe Diameter	Room	mm (inch)	31 (1-1/4)	
	Shower	mm (inch)	19 (3/4)	
Water Drain Hose Inner Diameter		mm (inch)	17.00 (11/16)	
Pressure Release Valve		kPa	Open: 800, Close: 640	
Protection Device		A	Earth Leakage Circuit Breaker (40)	
Expansion Vessel	Volume	l	12	
	MWP	bar	10	
Capacity of Integrated Electric Heater / OLP TEMP		kW / °C	9.00 / 85	
Tank Volume (Spec / Nett)		L	200 / 185	
Max. Tank Water Set Temperature		°C	65	
Tank Coil Surface		m^2	1.8	
Maximum Working Pressure	Heat / Cool	Bar	4.0	
	Tank Circuit	Bar	10.0	
Operating Pressure	Tank Unit	Bar	3.5	
	Expansion Relief Valve	Bar	8.0	
Expansion Vessel Pre-charge Pressure (DHW Circuit)		Bar	3.5	
Pressure Reducing Valve Set Pressure (DHW Circuit)		Bar	3.5	

Item		Unit	Indoor Unit
Pressure Vessel	Material		EN14511
	Volume	L	185
	Design Pressure	Bar	10
Heat Exchanger	Material		EN-1.4521
	Diameter	mm	22
	Thickness	mm	0.8
	Surface Area	m^2	1.8
	Total Length	m	25
DHW Tank	Total Corrosion ion (Chloride + Sulphate + Nitric)	mg/L	< 150
	Conductivity @ Water Tank Water Temperature < 60ºC	µS/cm	< 1250
	Conductivity @ Water Tank Water Temperature < 65ºC	µS/cm	< 1200
	Saturation Index (LSI) @ 20ºC		> -4.0 / < 0.4
	PH		6.5 - 8.5

Note:

- In case it is necessary to indicate the air flow volume in (l/s), the value in (m^3/min.) shall be multiplied by 16.7 and rounded down the decimal point.
- If the EUROVENT Certified models can be operated under the “extra-low” temperature condition, -7°C DB and -8°C WB temperature with rated voltage 230V shall be used.
- Capacity is measured at outdoor temperature 7°C DB and 6°C WB with controlled water inlet 30°C and water outlet 35°C (EN 14511-2)
- Flowrate indicated are based on nominal capacity adjustment of leaving water temperature (LWT) 35°C and ΔT=5°C.
- EER and COP classification is at 230V only in occordance with EU directive 2003/32/EC.
- *** The sound pressure level is measured with distance 1.0m from the unit and height at 1.5m. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- ***** The sound power level is measured with accordance to EN12102 under conditions of the EN14825. (Test carry out for heating at ambient 7°C DB / 6°C WB and water out 55°C)
- **** The sound power level is measured with accordance to EN12102 under full load conditions. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- *3 When outdoor ambient is under -15°C, only the backup heater operate above 55°C. (Outdoor unit don’t have backup heater.)
- *4 Between outdoor ambient -15°C and -25°C, the water outlet temperature gradually decreases from 75°C to 55°C.

3.3 WH-ADC0316M9E82 WH-WXG16ME8 R3

Item			Unit	Outdoor Unit		
Performance Test Condition				EN 14511		
				EN 14825		
Cooling Capacity			Condition (Ambient/Water)	A35W7		
			kW	9.00		
			BTU/h	30700		
Cooling EER			W/W	3.61		
Heating Capacity			Condition (Ambient/Water)	A7W35	A2W35	
			kW	16.00	16.00	
			BTU/h	54600	54600	
Heating COP			W/W	4.89	3.30	
Heating Erp	DHW			Warmer	Average	Colder
	Application		Climate			
	COP / nwh		(W/W) / %	3.20 / 128	2.85 / 117	2.10 / 84
	AEC		kWh	778	876	1196
Noise Level			dB (A) ***	Cooling: -	Heating: -	
			Power Level dB ****	Cooling: 60	Heating: 62	
			dB *****	-	Heating: 57	
Air Flow			m^3/min (ft^3/min)	Cooling: 97.0 (3426) Heating: 108.0 (3814)		
Refrigeration Control Device				Expansion Valve		
Refrigeration Oil			cm^3	PZ68S (1600)		
Refrigerant			kg (oz)	R290, 1.77 (62.4) (Pre-charged) (-) (Maximum)		
F-GAS	GWP			3		
	CO^2eq (ton) (Precharged / Maximum)			0.006 / -		
Dimension	Height		mm (inch)	1520 (59-27/32)		
	Width		mm (inch)	1200 (47-1/4)		
	Depth		mm (inch)	430 (16-59/64)		
Net Weight			kg (lbs)	165 (364)		
Pipe Diameter (Inner)			mm	32		
Standard Length			m (ft)	5.0 (16.4)		
Maximum Pipe Length			m (ft)	30.0 (98.4)		
I/D & O/D Height Difference			m (ft)	30.0 (98.4)		
Water Pipe Connector	Indoor		inch	1-1/4		
	Outdoor			1-1/4		
Compressor	Type			Hermetic Motor Compressor (Involute Scroll)		
	Motor Type			Synchronous Electric Motor (6-poles)		
	Rated Output		kW	3.10		
Fan	Type			Propeller Fan		
	Material			PP		
	Motor Type			DC (8-poles)		
	Input Power		kW	-		
	Output Power		W	120 × 2		
	Fan Speed		rpm	Cooling: 510 Heating: 480		

Item		Unit	Outdoor Unit		
Heat Exchanger	Fin material		Aluminium (Blue Coat)		
	Fin Type		Corrugated Fin		
	Row × Stage × FPI		2 × 58 × 19		
	Size (W × H × L)	mm	44 × 1473.2 × 868.2:902.7		
Hot Water Coil	Type		Brazed Plate		
	No. of Plates		44		
	Size (W × H × L)	mm	72.0 × 535 × 120.5		
	Water Flow Rate	l/min (m^3/h)	Cooling: 25.8 (1.5) Heating: 45.9 (2.8)		
Power Source (Phase, Voltage, Cycle)		Ø	Three		
		V	400		
		Hz	50		
Input Power		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		kW	Cooling: 2.49	Heating: 3.27	Heating: 4.85
Maximum Input Power For Heatpump System		kW	12.80		
Outdoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 19.0 / 12.8k		
Indoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 13.1 / 9.00k		
Power Supply 3 : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			- / - / -		
Starting Current		A	4.9		
Running Current		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		A	Cooling: 3.8	Heating: 4.9	Heating: 7.3
Maximum Current For Heatpump System		A	19.0		
Power Factor Power factor means total figure of compressor and outdoor fan motor.		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		%	Cooling: 95	Heating: 97	Heating: 96
Power Cord	Number of core		-		
	Length	m (ft)	-		
Thermostat			Electronic Control		
Protection Device			Electronic Control		
Pressure Relief Valve Water Circuit		kPa	Open: 400, Close: 280		
Operation Range	Outdoor Ambient	°C (min. / max.)	Cooling: 10 / 43 Heating (Tank): -28 / 43 Heating (Circuit): -28 / 35		
	Water Outlet	°C (min. / max.)	Cooling: 5 / 20 Heating (Tank): - / 65*[3], Heating (Circuit): 25 / 55 (Below Ambient -25 °C) *[4] Heating (Circuit): 25 / 75 (Above Ambient -15 °C) *[4]		
Internal Pressure Differential		kPa	Cooling: 22.0 Heating: 63.0		
Pump	Motor Type		Brushless DC Motor (Sensorless vector control system)		
	No. of Speed		Variable Speed		
	Input Power	W	175		
Flow Sensor	Type		Vortex (Piezoelectric sensor)		
	Measuring range	l/min	5 ~ 60		

Item		Unit	Indoor Unit	
Performance Test Condition			EN 14511	
			EN 14825	
Noise Level		dB (A)	Cooling: 22***	Heating: 22***
		Power Level dB	Cooling: 35****	Heating: 35****
Dimension	Depth	mm (inch)	602 (23-45/64)	
	Width	mm (inch)	599 (23-37/64)	
	Height	mm (inch)	1642 (64-41/64)	
Net Weight		kg (lbs)	89 (196)	
Water Pipe Diameter	Room	mm (inch)	31 (1-1/4)	
	Shower	mm (inch)	19 (3/4)	
Water Drain Hose Inner Diameter		mm (inch)	17.00 (11/16)	
Pressure Release Valve		kPa	Open: 800, Close: 640	
Protection Device		A	Earth Leakage Circuit Breaker (40)	
Expansion Vessel	Volume	l	12	
	MWP	bar	10	
Capacity of Integrated Electric Heater / OLP TEMP		kW / °C	9.00 / 85	
Tank Volume (Spec / Nett)		L	200 / 185	
Max. Tank Water Set Temperature		°C	65	
Tank Coil Surface		m^2	1.8	
Maximum Working Pressure	Heat / Cool	Bar	4.0	
	Tank Circuit	Bar	10.0	
Operating Pressure	Tank Unit	Bar	3.5	
	Expansion Relief Valve	Bar	8.0	
Expansion Vessel Pre-charge Pressure (DHW Circuit)		Bar	3.5	
Pressure Reducing Valve Set Pressure (DHW Circuit)		Bar	3.5	

Item		Unit	Indoor Unit
Pressure Vessel	Material		EN14511
	Volume	L	185
	Design Pressure	Bar	10
Heat Exchanger	Material		EN-1.4521
	Diameter	mm	22
	Thickness	mm	0.8
	Surface Area	m^2	1.8
	Total Length	m	25
DHW Tank	Total Corrosion ion (Chloride + Sulphate + Nitric)	mg/L	< 150
	Conductivity @ Water Tank Water Temperature < 60ºC	µS/cm	< 1250
	Conductivity @ Water Tank Water Temperature < 65ºC	µS/cm	< 1200
	Saturation Index (LSI) @ 20ºC		> -4.0 / < 0.4
	PH		6.5 - 8.5

Note:

- In case it is necessary to indicate the air flow volume in (l/s), the value in (m^3/min.) shall be multiplied by 16.7 and rounded down the decimal point.
- If the EUROVENT Certified models can be operated under the “extra-low” temperature condition, -7°C DB and -8°C WB temperature with rated voltage 230V shall be used.
- Capacity is measured at outdoor temperature 7°C DB and 6°C WB with controlled water inlet 30°C and water outlet 35°C (EN 14511-2)
- Flowrate indicated are based on nominal capacity adjustment of leaving water temperature (LWT) 35°C and ΔT=5°C.
- EER and COP classification is at 230V only in occordance with EU directive 2003/32/EC.
- *** The sound pressure level is measured with distance 1.0m from the unit and height at 1.5m. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- ***** The sound power level is measured with accordance to EN12102 under conditions of the EN14825. (Test carry out for heating at ambient 7°C DB / 6°C WB and water out 55°C)
- **** The sound power level is measured with accordance to EN12102 under full load conditions. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- *3 When outdoor ambient is under -15°C, only the backup heater operate above 55°C. (Outdoor unit don’t have backup heater.)
- *4 Between outdoor ambient -15°C and -25°C, the water outlet temperature gradually decreases from 75°C to 55°C.

3.4 WH-ADC0316M9E8AN2 WH-WXG09ME8 R3

Item			Unit	Outdoor Unit		
Performance Test Condition				EN 14511		
				EN 14825		
Cooling Capacity			Condition (Ambient/Water)	A35W7		
			kW	9.00		
			BTU/h	30700		
Cooling EER			W/W	3.61		
Heating Capacity			Condition (Ambient/Water)	A7W35	A2W35	
			kW	9.00	9.00	
			BTU/h	30700	30700	
Heating COP			W/W	5.23	3.81	
Heating Erp	DHW			Warmer	Average	Colder
	Application		Climate			
	COP / nwh		(W/W) / %	3.30 / 132	3.00 / 123	2.20 / 88
	AEC		kWh	753	831	1141
Noise Level			dB (A) ***	Cooling: -	Heating: -	
			Power Level dB ****	Cooling: 60	Heating: 58	
			dB *****	-	Heating: 52	
Air Flow			m^3/min (ft^3/min)	Cooling: 97.0 (3426) Heating: 83.0 (2931)		
Refrigeration Control Device				Expansion Valve		
Refrigeration Oil			cm^3	PZ68S (1600)		
Refrigerant			kg (oz)	R290, 1.78 (62.8) (Pre-charged) (-) (Maximum)		
F-GAS	GWP			3		
	CO^2eq (ton) (Precharged / Maximum)			0.006 / -		
Dimension	Height		mm (inch)	1520 (59-27/32)		
	Width		mm (inch)	1200 (47-1/4)		
	Depth		mm (inch)	430 (16-59/64)		
Net Weight			kg (lbs)	163 (359)		
Pipe Diameter (Inner)			mm	25		
Standard Length			m (ft)	5.0 (16.4)		
Maximum Pipe Length			m (ft)	30.0 (98.4)		
I/D & O/D Height Difference			m (ft)	30.0 (98.4)		
Water Pipe Connector	Indoor		inch	1-1/4		
	Outdoor			1-1/4		
Compressor	Type			Hermetic Motor Compressor (Involute Scroll)		
	Motor Type			Synchronous Electric Motor (6-poles)		
	Rated Output		kW	3.10		
Fan	Type			Propeller Fan		
	Material			PP		
	Motor Type			DC (8-poles)		
	Input Power		kW	-		
	Output Power		W	120 × 2		
	Fan Speed		rpm	Cooling: 510 Heating: 400		

Item		Unit	Outdoor Unit		
Heat Exchanger	Fin material		Aluminium (Blue Coat)		
	Fin Type		Corrugated Fin		
	Row × Stage × FPI		2 × 58 × 19		
	Size (W × H × L)	mm	44 × 1473.2 × 868.2:902.7		
Hot Water Coil	Type		Brazed Plate		
	No. of Plates		36		
	Size (W × H × L)	mm	76.2 × 524 × 117		
	Water Flow Rate	l/min (m^3/h)	Cooling: 25.8 (1.5) Heating: 25.8 (1.5)		
Power Source (Phase, Voltage, Cycle)		Ø	Three		
		V	400		
		Hz	50		
Input Power		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		kW	Cooling: 2.49	Heating: 1.72	Heating: 2.36
Maximum Input Power For Heatpump System		kW	8.51		
Outdoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 12.8 / 8.51k		
Indoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 13.1 / 9.00k		
Power Supply 3 : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			- / - / -		
Starting Current		A	3.8		
Running Current		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		A	Cooling: 3.8	Heating: 2.6	Heating: 3.6
Maximum Current For Heatpump System		A	12.8		
Power Factor Power factor means total figure of compressor and outdoor fan motor.		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		%	Cooling: 95	Heating: 96	Heating: 95
Power Cord	Number of core		-		
	Length	m (ft)	-		
Thermostat			Electronic Control		
Protection Device			Electronic Control		
Pressure Relief Valve Water Circuit		kPa	Open: 400, Close: 280		
Operation Range	Outdoor Ambient	°C (min. / max.)	Cooling: 10 / 43 Heating (Tank): -28 / 43 Heating (Circuit): -28 / 35		
	Water Outlet	°C (min. / max.)	Cooling: 5 / 20 Heating (Tank): - / 65*3, Heating (Circuit): 25 / 55 (Below Ambient -25 °C) *4 Heating (Circuit): 25 / 75 (Above Ambient -15 °C) *4		
Internal Pressure Differential		kPa	Cooling: 22.0 Heating: 22.0		
Pump	Motor Type		Brushless DC Motor (Sensorless vector control system)		
	No. of Speed		Variable speed		
	Input Power	W	175		
Flow Sensor	Type		Vortex (Piezoelectric sensor)		
	Measuring range	l/min	5 ~ 60		

Item		Unit	Indoor Unit	
Performance Test Condition			EN 14511	
			EN 14825	
Noise Level		dB (A)	Cooling: 22***	Heating: 22***
		Power Level dB	Cooling: 35****	Heating: 35****
Dimension	Depth	mm (inch)	602 (23-45/64)	
	Width	mm (inch)	599 (23-37/64)	
	Height	mm (inch)	1642 (64-41/64)	
Net Weight		kg (lbs)	89 (196)	
Water Pipe Diameter	Room	mm (inch)	31 (1-1/4)	
	Shower	mm (inch)	19 (3/4)	
Water Drain Hose Inner Diameter		mm (inch)	17.00 (11/16)	
Pressure Release Valve		kPa	Open: 800, Close: 640	
Protection Device		A	Earth Leakage Circuit Breaker (40)	
Expansion Vessel	Volume	l	12	
	MWP	bar	10	
Capacity of Integrated Electric Heater / OLP TEMP		kW / °C	9.00 / 85	
Tank Volume (Spec / Nett)		L	200 / 185	
Max. Tank Water Set Temperature		°C	65	
Tank Coil Surface		m^2	1.8	
Maximum Working Pressure	Heat / Cool	Bar	4.0	
	Tank Circuit	Bar	10.0	
Operating Pressure	Tank Unit	Bar	3.5	
	Expansion Relief Valve	Bar	8.0	
Expansion Vessel Pre-charge Pressure (DHW Circuit)		Bar	3.5	
Pressure Reducing Valve Set Pressure (DHW Circuit)		Bar	3.5	

Item		Unit	Indoor Unit
Pressure Vessel	Material		EN14511
	Volume	L	185
	Design Pressure	Bar	10
Heat Exchanger	Material		EN-1.4521
	Diameter	mm	22
	Thickness	mm	0.8
	Surface Area	m^2	1.8
	Total Length	m	25
DHW Tank	Total Corrosion ion (Chloride)	mg/L	< 250
	Conductivity @ Water Tank Water Temperature < 60ºC	µS/cm	< 2500 @ 20°C
	Saturation Index (LSI) @ 20ºC		> -4.0 / < 0.4
	PH		6.5 - 9.5

Note:

- In case it is necessary to indicate the air flow volume in (l/s), the value in (m^3/min.) shall be multiplied by 16.7 and rounded down the decimal point.
- If the EUROVENT Certified models can be operated under the “extra-low” temperature condition, -7°C DB and -8°C WB temperature with rated voltage 230V shall be used.
- Capacity is measured at outdoor temperature 7°C DB and 6°C WB with controlled water inlet 30°C and water outlet 35°C (EN 14511-2)
- Flowrate indicated are based on nominal capacity adjustment of leaving water temperature (LWT) 35°C and ΔT=5°C.
- EER and COP classification is at 230V only in occordance with EU directive 2003/32/EC.
- *** The sound pressure level is measured with distance 1.0m from the unit and height at 1.5m. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- ***** The sound power level is measured with accordance to EN12102 under conditions of the EN14825. (Test carry out for heating at ambient 7°C DB / 6°C WB and water out 55°C)
- **** The sound power level is measured with accordance to EN12102 under full load conditions. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- *3 When outdoor ambient is under -15°C, only the backup heater operate above 55°C. (Outdoor unit don’t have backup heater.)
- *4 Between outdoor ambient -15°C and -25°C, the water outlet temperature gradually decreases from 75°C to 55°C.

3.5 WH-ADC0316M9E8AN2 WH-WXG12ME8 R3

Item			Unit	Outdoor Unit		
Performance Test Condition				EN 14511		
				EN 14825		
Cooling Capacity			Condition (Ambient/Water)	A35W7		
			kW	9.00		
			BTU/h	30700		
Cooling EER			W/W	3.61		
Heating Capacity			Condition (Ambient/Water)	A7W35	A2W35	
			kW	12.00	12.00	
			BTU/h	40900	40900	
Heating COP			W/W	5.06	3.54	
Heating Erp	DHW			Warmer	Average	Colder
	Application		Climate			
	COP / nwh		(W/W) / %	3.30 / 132	3.00 / 123	2.20 / 88
	AEC		kWh	753	831	1141
Noise Level			dB (A) ***	Cooling: -	Heating: -	
			Power Level dB ****	Cooling: 60	Heating: 59	
			dB *****	-	Heating: 53	
Air Flow			m^3/min (ft^3/min)	Cooling: 97.0 (3426) Heating: 92.0 (3249)		
Refrigeration Control Device				Expansion Valve		
Refrigeration Oil			cm^3	PZ68S (1600)		
Refrigerant			kg (oz)	R290, 1.78 (62.8) (Pre-charged) (-) (Maximum)		
F-GAS	GWP			3		
	CO^2eq (ton) (Precharged / Maximum)			0.006 / -		
Dimension	Height		mm (inch)	1520 (59-27/32)		
	Width		mm (inch)	1200 (47-1/4)		
	Depth		mm (inch)	430 (16-59/64)		
Net Weight			kg (lbs)	163 (359)		
Pipe Diameter (Inner)			mm	32		
Standard Length			m (ft)	5.0 (16.4)		
Maximum Pipe Length			m (ft)	30.0 (98.4)		
I/D & O/D Height Difference			m (ft)	30.0 (98.4)		
Water Pipe Connector	Indoor		inch	1-1/4		
	Outdoor			1-1/4		
Compressor	Type			Hermetic Motor Compressor (Involute Scroll)		
	Motor Type			Synchronous Electric Motor (6-poles)		
	Rated Output		kW	3.10		
Fan	Type			Propeller Fan		
	Material			PP		
	Motor Type			DC (8-poles)		
	Input Power		kW	-		
	Output Power		W	120 × 2		
	Fan Speed		rpm	Cooling: 510 Heating: 420		

Item		Unit	Outdoor Unit		
Heat Exchanger	Fin material		Aluminium (Blue Coat)		
	Fin Type		Corrugated Fin		
	Row × Stage × FPI		2 × 58 × 19		
	Size (W × H × L)	mm	44 × 1473.2 × 868.2:902.7		
Hot Water Coil	Type		Brazed Plate		
	No. of Plates		36		
	Size (W × H × L)	mm	76.2 × 524 × 117		
	Water Flow Rate	l/min (m^3/h)	Cooling: 25.8 (1.5) Heating: 34.4 (2.1)		
Power Source (Phase, Voltage, Cycle)		Ø	Three		
		V	400		
		Hz	50		
Input Power		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		kW	Cooling: 2.49	Heating: 2.37	Heating: 3.39
Maximum Input Power For Heatpump System		kW	9.84		
Outdoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 14.8 / 9.84k		
Indoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 13.1 / 9.00k		
Power Supply 3 : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			- / - / -		
Starting Current		A	3.8		
Running Current		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		A	Cooling: 3.8	Heating: 3.6	Heating: 5.2
Maximum Current For Heatpump System		A	14.8		
Power Factor Power factor means total figure of compressor and outdoor fan motor.		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		%	Cooling: 95	Heating: 96	Heating: 95
Power Cord	Number of core		-		
	Length	m (ft)	-		
Thermostat			Electronic Control		
Protection Device			Electronic Control		
Pressure Relief Valve Water Circuit		kPa	Open: 400, Close: 280		
Operation Range	Outdoor Ambient	°C (min. / max.)	Cooling: 10 / 43 Heating (Tank): -28 / 43 Heating (Circuit): -28 / 35		
	Water Outlet	°C (min. / max.)	Cooling: 5 / 20 Heating (Tank): - / 65*[3], Heating (Circuit): 25 / 55 (Below Ambient -25 °C) *[4] Heating (Circuit): 25 / 75 (Above Ambient -15 °C) *[4]		
Internal Pressure Differential		kPa	Cooling: 22.0 Heating: 39.0		
Pump	Motor Type		Brushless DC Motor (Sensorless vector control system)		
	No. of Speed		Variable Speed		
	Input Power	W	175		
Flow Sensor	Type		Vortex (Piezoelectric sensor)		
	Measuring range	l/min	5 ~ 60		

Item		Unit	Indoor Unit	
Performance Test Condition			EN 14511	
			EN 14825	
Noise Level		dB (A)	Cooling: 22***	Heating: 22***
		Power Level dB	Cooling: 35****	Heating: 35****
Dimension	Depth	mm (inch)	602 (23-45/64)	
	Width	mm (inch)	599 (23-37/64)	
	Height	mm (inch)	1642 (64-41/64)	
Net Weight		kg (lbs)	89 (196)	
Water Pipe Diameter	Room	mm (inch)	31 (1-1/4)	
	Shower	mm (inch)	19 (3/4)	
Water Drain Hose Inner Diameter		mm (inch)	17.00 (11/16)	
Pressure Release Valve		kPa	Open: 800, Close: 640	
Protection Device		A	Earth Leakage Circuit Breaker (40)	
Expansion Vessel	Volume	l	12	
	MWP	bar	10	
Capacity of Integrated Electric Heater / OLP TEMP		kW / °C	9.00 / 85	
Tank Volume (Spec / Nett)		L	200 / 185	
Max. Tank Water Set Temperature		°C	65	
Tank Coil Surface		m^2	1.8	
Maximum Working Pressure	Heat / Cool	Bar	4.0	
	Tank Circuit	Bar	10.0	
Operating Pressure	Tank Unit	Bar	3.5	
	Expansion Relief Valve	Bar	8.0	
Expansion Vessel Pre-charge Pressure (DHW Circuit)		Bar	3.5	
Pressure Reducing Valve Set Pressure (DHW Circuit)		Bar	3.5	

Item		Unit	Indoor Unit
Pressure Vessel	Material		EN14511
	Volume	L	185
	Design Pressure	Bar	10
Heat Exchanger	Material		EN-1.4521
	Diameter	mm	22
	Thickness	mm	0.8
	Surface Area	m^2	1.8
	Total Length	m	25
DHW Tank	Total Corrosion ion (Chloride)	mg/L	< 250
	Conductivity @ Water Tank Water Temperature < 60ºC	µS/cm	< 2500 @ 20°C
	Saturation Index (LSI) @ 20ºC		> -4.0 / < 0.4
	PH		6.5 - 9.5

Note:

- In case it is necessary to indicate the air flow volume in (l/s), the value in (m^3/min.) shall be multiplied by 16.7 and rounded down the decimal point.
- If the EUROVENT Certified models can be operated under the “extra-low” temperature condition, -7°C DB and -8°C WB temperature with rated voltage 230V shall be used.
- Capacity is measured at outdoor temperature 7°C DB and 6°C WB with controlled water inlet 30°C and water outlet 35°C (EN 14511-2)
- Flowrate indicated are based on nominal capacity adjustment of leaving water temperature (LWT) 35°C and ΔT=5°C.
- EER and COP classification is at 230V only in occordance with EU directive 2003/32/EC.
- *** The sound pressure level is measured with distance 1.0m from the unit and height at 1.5m. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- ***** The sound power level is measured with accordance to EN12102 under conditions of the EN14825. (Test carry out for heating at ambient 7°C DB / 6°C WB and water out 55°C)
- **** The sound power level is measured with accordance to EN12102 under full load conditions. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- *3 When outdoor ambient is under -15°C, only the backup heater operate above 55°C. (Outdoor unit don’t have backup heater.)
- *4 Between outdoor ambient -15°C and -25°C, the water outlet temperature gradually decreases from 75°C to 55°C.

3.6 WH-ADC0316M9E8AN2 WH-WXG16ME8 R3

Item			Unit	Outdoor Unit		
Performance Test Condition				EN 14511		
				EN 14825		
Cooling Capacity			Condition (Ambient/Water)	A35W7		
			kW	9.00		
			BTU/h	30700		
Cooling EER			W/W	3.61		
Heating Capacity			Condition (Ambient/Water)	A7W35	A2W35	
			kW	16.00	16.00	
			BTU/h	54600	54600	
Heating COP			W/W	4.89	3.30	
Heating Erp	DHW			Warmer	Average	Colder
	Application		Climate			
	COP / nwh		(W/W) / %	3.20 / 128	2.85 / 117	2.10 / 84
	AEC		kWh	778	876	1196
Noise Level			dB (A) ***	Cooling: -	Heating: -	
			Power Level dB ****	Cooling: 60	Heating: 62	
			dB *****	-	Heating: 57	
Air Flow			m^3/min (ft^3/min)	Cooling: 97.0 (3426) Heating: 108.0 (3814)		
Refrigeration Control Device				Expansion Valve		
Refrigeration Oil			cm^3	PZ68S (1600)		
Refrigerant			kg (oz)	R290, 1.77 (62.4) (Pre-charged) (-) (Maximum)		
F-GAS	GWP			3		
	CO^2eq (ton) (Precharged / Maximum)			0.006 / -		
Dimension	Height		mm (inch)	1520 (59-27/32)		
	Width		mm (inch)	1200 (47-1/4)		
	Depth		mm (inch)	430 (16-59/64)		
Net Weight			kg (lbs)	165 (364)		
Pipe Diameter (Inner)			mm	32		
Standard Length			m (ft)	5.0 (16.4)		
Maximum Pipe Length			m (ft)	30.0 (98.4)		
I/D & O/D Height Difference			m (ft)	30.0 (98.4)		
Water Pipe Connector	Indoor		inch	1-1/4		
	Outdoor			1-1/4		
Compressor	Type			Hermetic Motor Compressor (Involute Scroll)		
	Motor Type			Synchronous Electric Motor (6-poles)		
	Rated Output		kW	3.10		
Fan	Type			Propeller Fan		
	Material			PP		
	Motor Type			DC (8-poles)		
	Input Power		kW	-		
	Output Power		W	120 × 2		
	Fan Speed		rpm	Cooling: 510 Heating: 480		

Item		Unit	Outdoor Unit		
Heat Exchanger	Fin material		Aluminium (Blue Coat)		
	Fin Type		Corrugated Fin		
	Row × Stage × FPI		2 × 58 × 19		
	Size (W × H × L)	mm	44 × 1473.2 × 868.2:902.7		
Hot Water Coil	Type		Brazed Plate		
	No. of Plates		44		
	Size (W × H × L)	mm	72.0 × 535 × 120.5		
	Water Flow Rate	l/min (m^3/h)	Cooling: 25.8 (1.5) Heating: 45.9 (2.8)		
Power Source (Phase, Voltage, Cycle)		Ø	Three		
		V	400		
		Hz	50		
Input Power		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		kW	Cooling: 2.49	Heating: 3.27	Heating: 4.85
Maximum Input Power For Heatpump System		kW	12.80		
Outdoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 19.0 / 12.8k		
Indoor Power Supply : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			3Ø / 13.1 / 9.00k		
Power Supply 3 : Phase (Ø) / Max. Current (A) / Max. Input Power (W)			- / - / -		
Starting Current		A	4.9		
Running Current		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		A	Cooling: 3.8	Heating: 4.9	Heating: 7.3
Maximum Current For Heatpump System		A	19.0		
Power Factor Power factor means total figure of compressor and outdoor fan motor.		Condition (Ambient/Water)	A35W7	A7W35	A2W35
		%	Cooling: 95	Heating: 97	Heating: 96
Power Cord	Number of core		-		
	Length	m (ft)	-		
Thermostat			Electronic Control		
Protection Device			Electronic Control		
Pressure Relief Valve Water Circuit		kPa	Open: 400, Close: 280		
Operation Range	Outdoor Ambient	°C (min. / max.)	Cooling: 10 / 43 Heating (Tank): -28 / 43 Heating (Circuit): -28 / 35		
	Water Outlet	°C (min. / max.)	Cooling: 5 / 20 Heating (Tank): - / 65*[3], Heating (Circuit): 25 / 55 (Below Ambient -25 °C) *[4] Heating (Circuit): 25 / 75 (Above Ambient -15 °C) *[4]		
Internal Pressure Differential		kPa	Cooling: 22.0 Heating: 63.0		
Pump	Motor Type		Brushless DC Motor (Sensorless vector control system)		
	No. of Speed		Variable Speed		
	Input Power	W	175		
Flow Sensor	Type		Vortex (Piezoelectric sensor)		
	Measuring range	l/min	5 ~ 60		

Item		Unit	Indoor Unit	
Performance Test Condition			EN 14511	
			EN 14825	
Noise Level		dB (A)	Cooling: 22***	Heating: 22***
		Power Level dB	Cooling: 35****	Heating: 35****
Dimension	Depth	mm (inch)	602 (23-45/64)	
	Width	mm (inch)	599 (23-37/64)	
	Height	mm (inch)	1642 (64-41/64)	
Net Weight		kg (lbs)	89 (196)	
Water Pipe Diameter	Room	mm (inch)	31 (1-1/4)	
	Shower	mm (inch)	19 (3/4)	
Water Drain Hose Inner Diameter		mm (inch)	17.00 (11/16)	
Pressure Release Valve		kPa	Open: 800, Close: 640	
Protection Device		A	Earth Leakage Circuit Breaker (40)	
Expansion Vessel	Volume	l	12	
	MWP	bar	10	
Capacity of Integrated Electric Heater / OLP TEMP		kW / °C	9.00 / 85	
Tank Volume (Spec / Nett)		L	200 / 185	
Max. Tank Water Set Temperature		°C	65	
Tank Coil Surface		m^2	1.8	
Maximum Working Pressure	Heat / Cool	Bar	4.0	
	Tank Circuit	Bar	10.0	
Operating Pressure	Tank Unit	Bar	3.5	
	Expansion Relief Valve	Bar	8.0	
Expansion Vessel Pre-charge Pressure (DHW Circuit)		Bar	3.5	
Pressure Reducing Valve Set Pressure (DHW Circuit)		Bar	3.5	

Item		Unit	Indoor Unit
Pressure Vessel	Material		EN14511
	Volume	L	185
	Design Pressure	Bar	10
Heat Exchanger	Material		EN-1.4521
	Diameter	mm	22
	Thickness	mm	0.8
	Surface Area	m^2	1.8
	Total Length	m	25
DHW Tank	Total Corrosion ion (Chloride)	mg/L	< 250
	Conductivity @ Water Tank Water Temperature < 60ºC	µS/cm	< 2500 @ 20°C
	Saturation Index (LSI) @ 20ºC		> -4.0 / < 0.4
	PH		6.5 - 9.5

Note:

- In case it is necessary to indicate the air flow volume in (l/s), the value in (m^3/min.) shall be multiplied by 16.7 and rounded down the decimal point.
- If the EUROVENT Certified models can be operated under the “extra-low” temperature condition, -7°C DB and -8°C WB temperature with rated voltage 230V shall be used.
- Capacity is measured at outdoor temperature 7°C DB and 6°C WB with controlled water inlet 30°C and water outlet 35°C (EN 14511-2)
- Flowrate indicated are based on nominal capacity adjustment of leaving water temperature (LWT) 35°C and ΔT=5°C.
- EER and COP classification is at 230V only in occordance with EU directive 2003/32/EC.
- *** The sound pressure level is measured with distance 1.0m from the unit and height at 1.5m. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- ***** The sound power level is measured with accordance to EN12102 under conditions of the EN14825. (Test carry out for heating at ambient 7°C DB / 6°C WB and water out 55°C)
- **** The sound power level is measured with accordance to EN12102 under full load conditions. (Test carry out for cooling at ambient 35°C DB and Water Out 7°C, heating at ambient 7°C DB / 6°C WB and water out 55°C)
- *3 When outdoor ambient is under -15°C, only the backup heater operate above 55°C. (Outdoor unit don’t have backup heater.)
- *4 Between outdoor ambient -15°C and -25°C, the water outlet temperature gradually decreases from 75°C to 55°C.