

# A2W HEAT PUMP RANGE

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# WHAT IS AN AIR TO WATER HEAT PUMP?

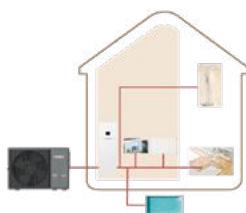
An air source heat pump also known as an Air-To-Water Heat Pump transfers heat from the outside air to water. This in turn heats the space via radiators or underfloor heating. It can also heat water stored in a hot water cylinder for hot water taps, baths and showers.

The Haier Air to Water Heat Pump range uses free renewable energy from the outside air as a heat source for space heating and providing domestic hot water. This energy efficient and environmentally friendly solution substantially reduces energy consumption, running cost and CO<sub>2</sub> emissions in heating compared to conventional oil and gas boilers.

The system draws energy from the outside air to create a high efficiency solution for your needs, with efficiencies of over 3:1 for power input

## How does an air source heat pump work?

Heat from the air is absorbed into a fluid. This fluid then passes through a heat exchanger into the heat pump, which raises the temperature and then transfers that heat to water.

	HYDRO ALL-IN-ONE	HYDRO SPLIT	SPLIT
Type	R290 A2W GT Series 	R290 A2W GT Series 	R32 A2W 
Advantages	Easier installation thanks to integrated water tank	Heat exchange is in the outdoor unit. Water connection indoor to outdoor	Refrigerant connection between indoor and outdoor
Max. Leaving Water Temperature (°C)	80	80	60
<b>HIGH EFFICIENCY</b>			
Refrigerant (GWP)	R290 (3)	R290 (3)	R32 (675)
Energy Class at 35°C/7°C	A+++	A+++	A+++
Energy Class at 55°C/7°C	A+++	A+++	A++
Min. Ambient Temp. at Heating (°C)	-25	-25	-25
Sound Power dB	55	55	58
<b>ULTIMATE COMFORT</b>			
2 Zone Control	●	●	●
Fast DHW	●	●	●
Quite Mode	●	●	●
Turbo Mode	●	●	●
Climate Curve	●	●	●
Sterilisation	●	●	●
Auto Mode	●	●	●
<b>HIGH RELIABILITY</b>			
Floor Drying	●	●	●
Anti-Freezing	●	●	●
Anti-rust and Corrosion of Water Pump	●	●	●
<b>INTELLIGENCE</b>			
Smart Grid	●	●	●
Modbus	●	●	●
Energy Monitoring	●	●	
WiFi	<b>hOn integrated</b>	<b>hOn integrated</b>	Optional
Holiday Mode	●	●	●
Scheduling Programs	●	●	●
DHW Tank Solar Thermal Control	●	●	●
Auxiliary Heating Source	●	●	●
Pool Heating	●	●	●
Bivalence Control	●	●	●
Cascade Control	●	●	●
<b>SUPER CONVENIENCE</b>			
Selection Software	Yes	Yes	No
Standardised indoor to outdoor wiring	Yes (P+Q)	Yes (P+Q)	No
SD Card Slot	Yes	Yes	No
Error History	●	●	●
Parameters Check	●	●	●

# HIGH EFFICIENCY



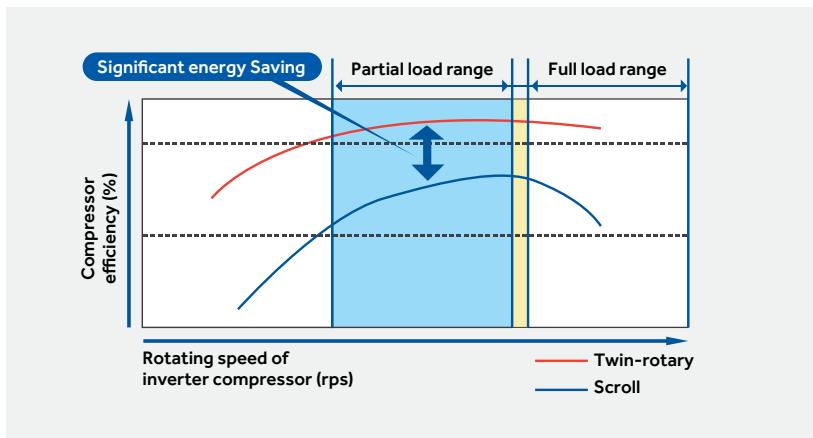
## EFFICIENCY R32

The Gen II A2W HP Monobloc has an impressive energy class of A+++. A SCOP of 4.97 and a COP of 5.06 can be reached when the leaving water temperature is 35°C.



## FULL DC INVERTER TECHNOLOGY R290 R32

Our heat pumps adopt a full DC inverter twin-rotary compressor which has a smaller size and higher efficiency compared with a scroll compressor. The minimal friction of the compressor and the reduction in running vibration enables us to delivery high efficiency and low noise coming from the compressor.



## A+ HOT WATER ERP CLASS R290

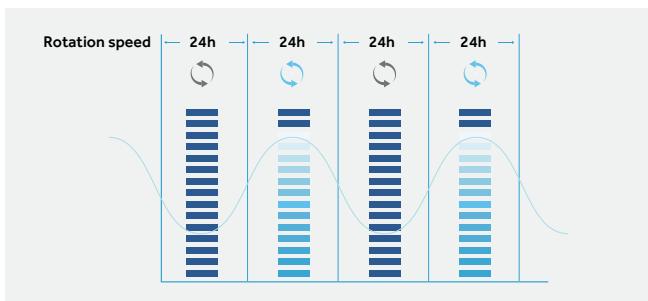


# HIGH RELIABILITY



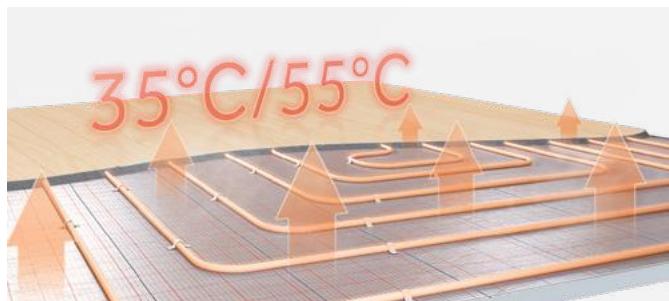
## ANTI-RUST AND CORROSION R290 R32

The HE and GT series heat pump has anti-corrosion function. The water pump will automatically run for 60s within 24h, as the following curve shows.



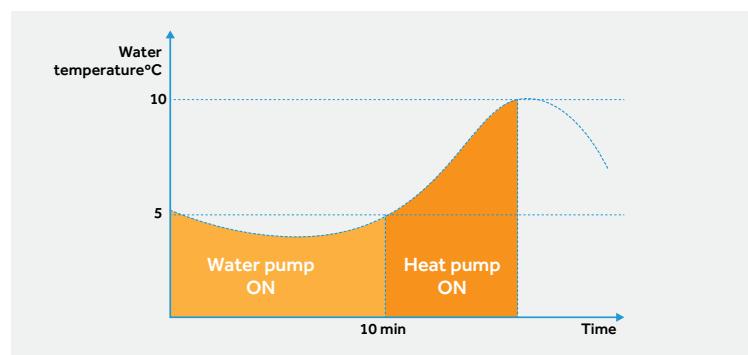
## FLOOR DRYING R290

With the Wi-Fi controller you can check the running state of heat and allows you to have flexibility and control of your heat pump, with access to multiple functions.



## ANTI-FREEZING R290 R32

The HE series adopts an anti-freezing logic: The water pump will turn on when the water temperature is below 5°C, when the water temperature is below 5°C for more than 10 minutes, the heat pump is turned on.



# SUPER CONVENIENCE



## CHECK ERROR INFORMATION R290 R32

If errors occur, the service engineer can not only check the current errors, but also the historical error records, which is convenient for fast troubleshooting.



## CHECK SYSTEM PARAMETERS R290 R32

Many important parameters about the system can be accessed through the 'System Status' function, including the system parameters, indoor and outdoor units parameters. These parameters are helpful to diagnose the system.



# ULTIMATE COMFORT



## 2-ZONE CONTROL R290 R32

When there are different room temperature requirements, two zone temperature control through separate heating or cooling circuits is possible. Adjust and maintain two different water temperatures to achieve intelligent control and saving energy.



## MAX.60/80°C HOT WATER R290 R32

High leaving water temperature of 60°C (R32) or 80°C (R290) is guaranteed without using a backup heater when the outdoor temperature is higher than -15°C.



## TURBO MODE R290 R32

Increase the working speed of the compressor and fan motor to reach chosen temperature faster.



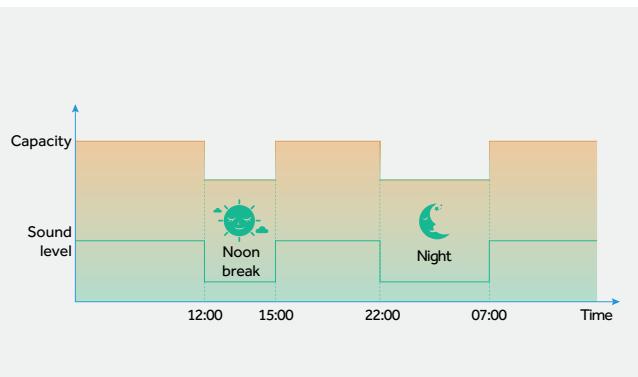
## FAST DHW R290 R32

When Fast DHW is activated, the backup heater or auxiliary heating source will be turned on at the same time, in combination with the heat pump. In order to reach DHW setting point as soon as possible, the outdoor ambient temperature and compressor running time will not affect this operation.



## QUIET MODE R290 R32

The Quiet Mode can work together with the timer function. To guarantee low sound levels during quiet periods such as night time.



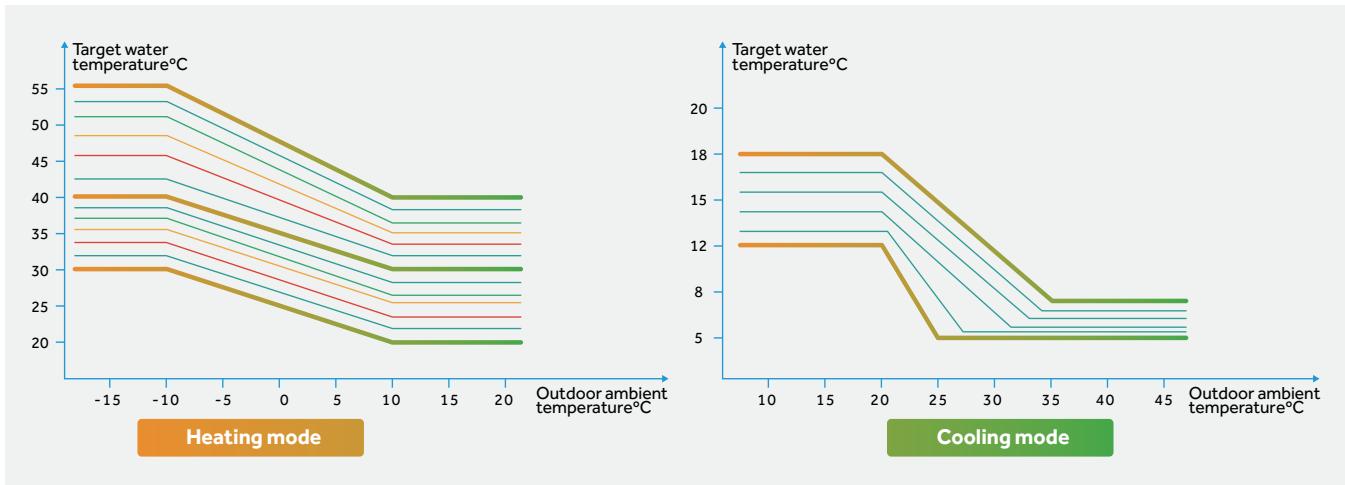
## AUTO MODE R290 R32

In Auto mode, the cooling and heating mode is automatically managed according to the outdoor ambient temperature. There is no need to manually set the heat pump operating mode, which is very convenient for the users.



## CLIMATE CURVES R290 R32

Both heating and cooling water temperatures are optimally configured when considering outdoor temperature, both in comfort and efficiency terms. The Climate curve configuration allows the system to adapt to outdoor temperature fluctuation with different temperature profiles tailored for each user's preferences.



## STERILISATION R290 ALL-IN-ONE ONLY

Users can directly turn on the sterilisation function, and set the date and time on the controller. The water of the domestic water tank can be automatically heated to 75°C to kill legionella at fixed periods. During the process of sterilisation, the controller screen will display the icon to remind users that the system is sterilisation mode.

Note: Only when the electric heater in the domestic water tank is controlled by Haier unit.

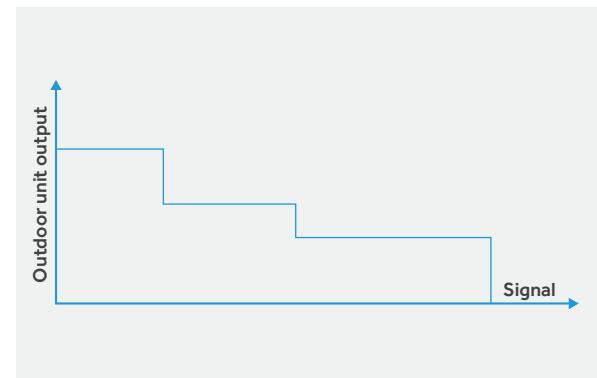


# INTELLIGENCE



## SMART GRID R290 R32

Based on the signal from power grid company, the outdoor unit will adjust the capacity output.



## BMS R290 R32

The unit integrates the MODBUS RTU communication protocol, it can be connected to 3rd party BMS or BAS directly, no additional Modbus gateway is needed.



## SCHEDULING PROGRAMS R290 R32

Users can create scheduled programs, including naming the programs, timer on/off operation, mode selection, leaving temperature setting and the frequency. Once the scheduled program is set, the system will run according the pre-set program automatically.

Scheduling Programs				
	0:00	8:00	17:30	24:00
Mon	ON		OFF	ON
Tues	ON		OFF	ON
Weds	ON		OFF	ON
Thurs	ON		OFF	ON
Fri	ON		OFF	ON
Sat			ON	
Sun			ON	

**hOn WIFI R290 R32**

With Haier's integrated hOn Wi-Fi, you can check the running state of heat pump allowing you to have complete flexibility and control.

**DHW TANK SOLAR R290 R32 THERMAL CONTROL**

Control the solar thermal function of the tank for heating domestic hot water.

**AUXILIARY HEATING SOURCE R290 R32**

Control the solar thermal function of the tank for heating domestic hot water.

**POOL HEATING R290 R32**

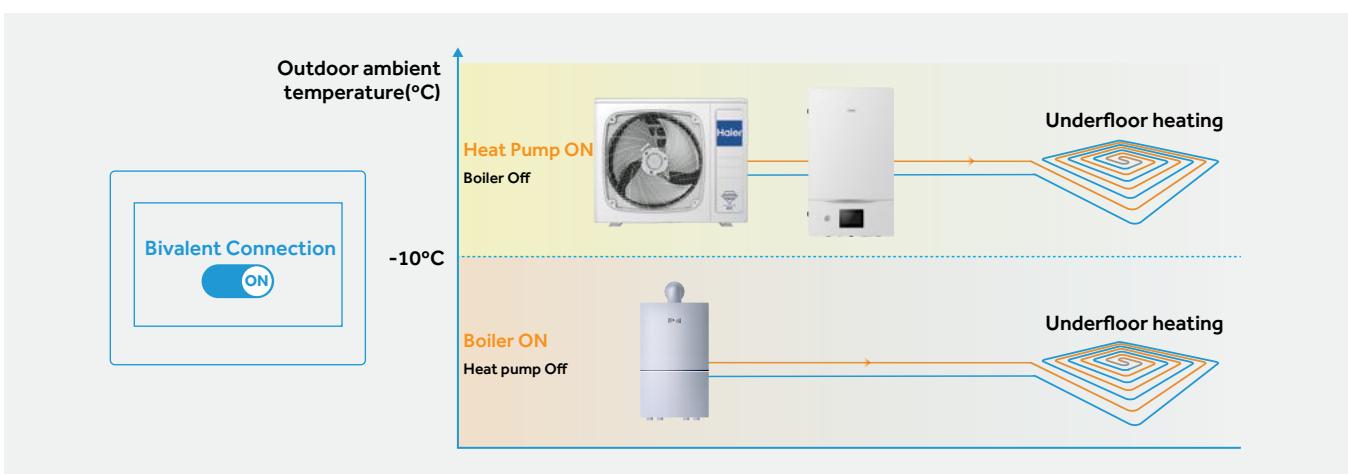
Provides control to manage the temperature of the pool water.

**SMART VACATION R290 R32**

In smart vacation mode, the heat pump will work at its minimal requirement to save energy and costs while you are away.

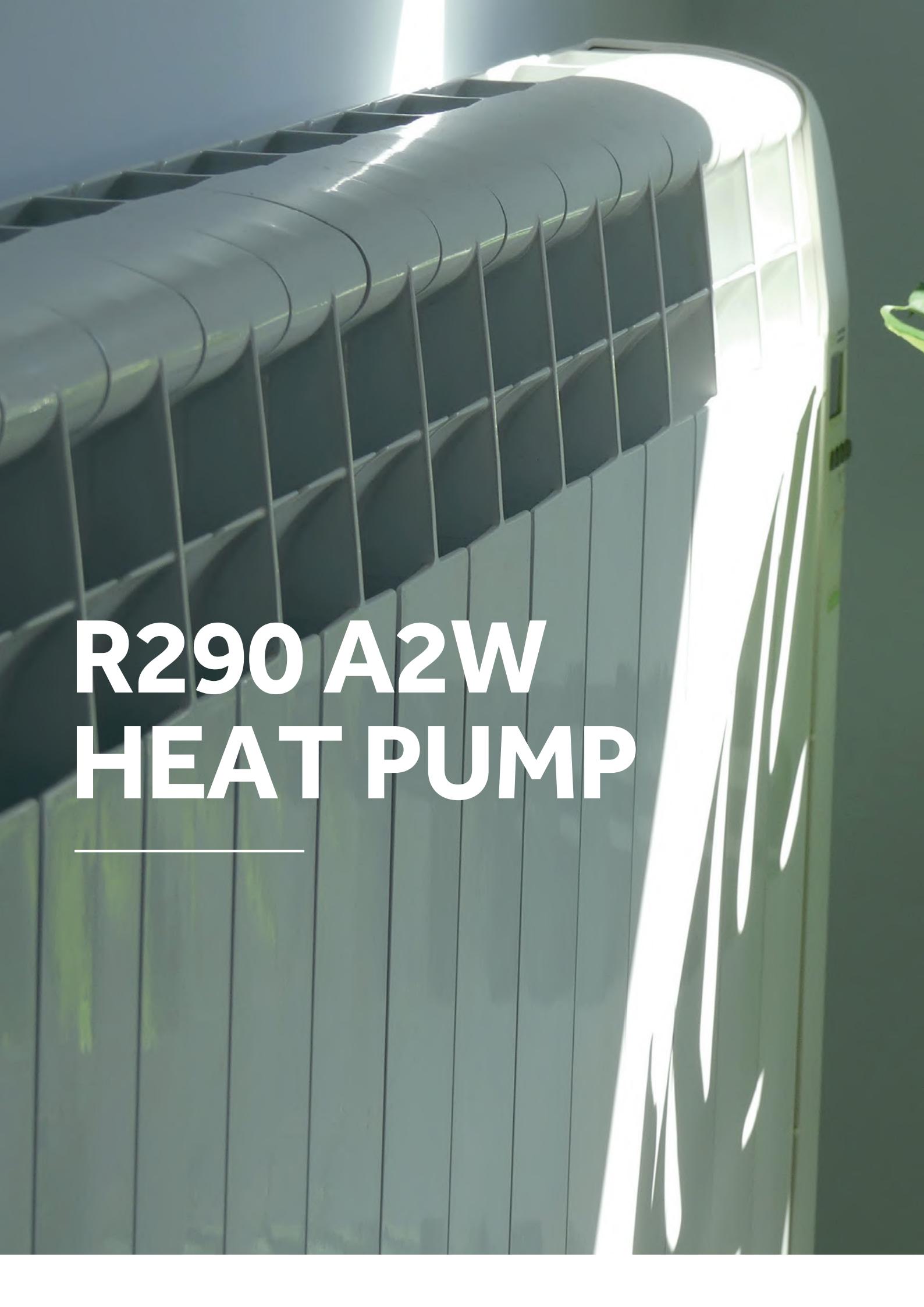
**BIVALENT CONTROL R290 R32**

When the system is combined with a boiler, the 'bivalent connection' can be set by the controller. When bivalent connection is turned on, the heat pump will have full control of all aspects of the system and will run the boiler when required, depending on system design and settings. When bivalent connection is turned off, both boiler and heat pump conduct automatic control.

**CASCADE CONTROL R290 R32**

Max 8 units & can be combined in one system to suitable for larger capacity demands.





**R290 A2W  
HEAT PUMP**

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# HYDRO ALL-IN-ONE R290 NEW 2024



AW042HUGH  
AW062HUGH  
AW082HUGH  
AW102HUGH  
AW10NHUGH



HU102F20AHYA  
HU162F20AHYA  
HU102F20AHYAE3  
HU162F20AHYAE3

Model			Hydro All in one 4kW-1Ph	Hydro All in one 6kW-1Ph	Hydro All in one 8kW-1Ph	Hydro All in one 10kW-1Ph	Hydro All in one 10kW-3Ph
Heating (LWT 35°C / OAT 7°C)	Capacity	kW	4.00	6.00	8.00	10.00	10.00
	Power input	kW	0.73	1.12	1.50	1.96	1.96
	COP	W/W	5.50	5.35	5.35	5.10	5.10
Heating (LWT 55°C / OAT 7°C)	Capacity	kW	4.00	6.00	8.00	10.00	10.00
	Power input	kW	1.19	1.82	2.35	3.13	3.13
	COP	W/W	3.35	3.30	3.40	3.20	3.20
Space heating Average climate water outlet 35°C	SCOP	-	5.10	5.10	5.20	5.10	5.10
	ns	%	201	201	205	201	201
	Energy class	-	A+++	A+++	A+++	A+++	A+++
Space heating Average climate water outlet 55°C	SCOP	-	3.85	3.83	3.85	3.83	3.83
	ns	%	151	150	151	150	150
	Energy class	-	A+++	A+++	A+++	A+++	A+++
Cooling (LWT 18°C / OAT 35°C)	Capacity	kW	4.00	6.00	7.50	9.50	9.50
	Power input	kW	0.79	1.20	1.58	2.21	2.21
	EER	-	5.05	5.00	4.75	4.30	4.30
Cooling (LWT 7°C / OAT 35°C)	Capacity	kW	3.50	5.00	6.80	8.50	8.50
	Power input	kW	0.95	1.37	1.97	2.62	2.62
	EER	-	3.70	3.65	3.45	3.25	3.25
Indoor Unit			HU102F20AHYA	HU102F20AHYA	HU102F20AHYA	HU102F20AHYA	HU102F20AHYAE3
Leaving water temperature range	Heating	°C	20~80	20~80	20~80	20~80	20~80
	Cooling	°C	5~25	5~25	5~25	5~25	5~25
Storage temperature range (Tank)	DHW	°C	25~75	25~75	25~75	25~75	25~75
Water piping Connection	Inlet/Outlet (except for DHW)	inch	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1
	Inlet/Outlet (DHW)	inch	R 3/4	R 3/4	R 3/4	R 3/4	R 3/4
Expansion Tank	L		8	8	8	8	8
Primary circuit	Pressure relief valve	bar	3	3	3	3	3
Power supply	V/ph/Hz	220-240/1/50	220-240/1/50	220-240/1/50	220-240/1/50	220-240/1/50	220-240/1/50
Max running current*(1)	A	14.1	14.1	14.1	14.1	14.1	14.1
Recommended circuit breaker	A	20.0	20.0	20.0	20.0	20.0	20.0
DHW Tank	Type	-		2205 duplex stainless steel			
	Tank Volume	L	200	200	200	200	200
	Maximum water pressure limit	bar	7	7	7	7	7
	Tank heater	kW	3	3	3	3	3
Delcared load profile	-	L	L	L	L	L	L
COP*(2)	-	3.5	3.5	3.5	3.5	3.5	3.5
Water heating energy efficiency class	-	A+	A+	A+	A+	A+	A+
Backup electric heater	Power supply	V/ph/Hz	220-240/1/50	220-240/1/50	220-240/1/50	220-240/1/50	380-415/3/50
	Capacity	kW	1+2	1+2	1+2	1+2	1+2
	Steps	-	2	2	2	2	2
	Max Running current	A	14.0	14.0	14.0	14.0	5.0
Recommended circuit breaker	A	20.0	20.0	20.0	20.0	20.0	10.0
Sound power level	dB	40	40	40	40	40	40
Net Dimension (HxWxD)	mm	1780 x 590 x 590	1780 x 590 x 590	1780 x 590 x 590	1780 x 590 x 590	1780 x 590 x 590	1780 x 590 x 590
Packaging dimension (HxWxD)	mm	2060 x 695 x 695	2060 x 695 x 695	2060 x 695 x 695	2060 x 695 x 695	2060 x 695 x 695	2060 x 695 x 695
Net / Gross weight	kg	115 / 131	115 / 131	115 / 131	115 / 131	115 / 131	115.5 / 131.5
Outdoor Unit			AW042HUGH	AW062HUGH	AW082HUGH	AW102HUGH	AW10NHUGH
Outdoor operating temperature range	Heating	°C	-25~35	-25~35	-25~35	-25~35	-25~35
	Cooling	°C	10~48	10~48	10~48	10~48	10~48
	DHW	°C	-25~43	-25~43	-25~43	-25~43	-25~43
Water piping connection	Inlet/Outlet	inch	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1
Compressor	Quantity	-	1	1	1	1	1
	Type	-		DC inverter twin rotary			
Refrigerant	Type	-		R290			
	Charge/CO2 Eq.	kg/T	0.8/2.4	0.8/2.4	0.9/2.7	0.9/2.7	0.9/2.7
Sound pressure level *(3)	dB(A)	44	47	48	49	49	49
Sound power level *(3)	dB	55	58	59	60	60	60
Net Dimension (HxWxD)	mm	790 x 1250 x 380	790 x 1250 x 380	790 x 1250 x 380	790 x 1250 x 380	790 x 1250 x 380	790 x 1250 x 380
Packaging dimension (HxWxD)	mm	1022 x 1395 x 550	1022 x 1395 x 550	1022 x 1395 x 550	1022 x 1395 x 550	1022 x 1395 x 550	1022 x 1395 x 550
Net / Gross weight	kg	86/109	86/109	98/121	98/121	98/121	113/136
Power supply	V/ph/Hz	220-240/1/50	220-240/1/50	220-240/1/50	220-240/1/50	220-240/1/50	380-415/3/50
Max running current	A	13.5	13.5	18.6	18.6	18.6	6.2
Recommended circuit breaker	A	16.0	16.0	20.0	20.0	20.0	16.0

\*(1)Max running current does not include backup electric heater, which is individually powered on.

\*(2)The testing conditions refer to EN16147 average climate

\*(3)The testing conditions refer to EN14511-2018 and the testing method refers to EN12102-2017 (A7/W35)

The data in this catalogue is purely indicative as the data may vary. Please be advised to check the accuracy of the data with the supplier before purchasing products.



R290



A++/A+++



Max. 80°C hot water



Climate Curve



2 Zone Control



Auto Mode



Smart Grid



BMS Modbus



DHW Tank Solar Control



Pool Heating



Anti-freezing

# HYDRO ALL-IN-ONE R290 NEW 2024



AW122HVGHA  
AW142HVGHA  
AW162HVGHA

AW12NHSVGH  
AW14NHSVGH  
AW16NHSVGH



HU102F20AHYHA  
HU162F20AHYHA

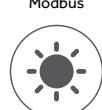
HU102F20AHYAE3  
HU162F20AHYAE3

Model		Hydro All in one 12kW-1Ph	Hydro All in one 14kW-1Ph	Hydro All in one 16kW-1Ph	Hydro All in one 12kW-3Ph	Hydro All in one 14kW-3Ph	Hydro All in one 16kW-3Ph
Heating (LWT 35°C / OAT 7°C)	Capacity	kW	12.00	14.00	16.00	12.00	14.00
	Power input	kW	2.35	2.83	3.23	2.35	2.83
	COP	W/W	5.10	4.95	4.95	5.10	4.95
Heating (LWT 55°C / OAT 7°C)	Capacity	kW	11.50	13.50	15.50	11.50	13.50
	Power input	kW	3.48	4.22	5.08	3.48	4.22
	COP	W/W	3.30	3.20	3.05	3.30	3.05
Space heating Average climate water outlet 35°C	SCOP	-	4.82	4.80	4.80	4.82	4.80
	ns	%	190	189	189	190	189
	Energy class	-	A+++	A+++	A+++	A+++	A+++
Space heating Average climate water outlet 55°C	SCOP	-	3.85	3.83	3.85	3.85	3.83
	ns	%	151	150	151	151	151
	Energy class	-	A+++	A+++	A+++	A+++	A+++
Cooling (LWT 18°C / OAT 35°C)	Capacity	kW	11.50	13.50	15.50	11.50	13.50
	Power input	kW	2.56	3.14	3.88	2.56	3.14
	EER	-	4.50	4.30	4.00	4.50	4.30
Cooling (LWT 7°C / OAT 35°C)	Capacity	kW	10.00	12.00	14.00	10.00	12.00
	Power input	kW	2.99	3.75	4.52	2.99	3.75
	EER	-	3.35	3.20	3.10	3.35	3.20
<b>Indoor Unit</b>		HU162F20AHYHA	HU162F20AHYHA	HU162F20AHYHA	HU162F20AHYAE3	HU162F20AHYAE3	HU162F20AHYAE3
Leaving water temperature range	Heating	°C	20~80	20~80	20~80	20~80	20~80
Cooling		°C	5~25	5~25	5~25	5~25	5~25
Storage temperature range (Tank)	DHW	°C	25~75	25~75	25~75	25~75	25~75
Water piping Connection	Inlet/Outlet (except for DHW)	inch	R 1/R 1				
	Inlet/Outlet (DHW)	inch	R 3/4				
Expansion Tank		L	8	8	8	8	8
Primary circuit	Pressure relief valve	bar	3	3	3	3	3
Power supply	V/ph/Hz	220~240/1/50	220~240/1/50	220~240/1/50	220~240/1/50	220~240/1/50	220~240/1/50
Max running current*(1)	A	15.0	15.0	15.0	15.0	15.0	15.0
Recommended circuit breaker	A	20.0	20.0	20.0	20.0	20.0	20.0
DHW Tank	Type	-		2205 duplex stainless steel			
	Tank Volume	L	200	200	200	200	200
	Maximum water pressure limit	bar	7	7	7	7	7
	Tank heater	kW	3	3	3	3	3
Declared load profile	-	L	L	L	L	L	L
COP*(2)	-	3.5	3.5	3.5	3.3	3.3	3.3
Water heating energy efficiency class	-	A+	A+	A+	A+	A+	A+
Backup electric heater	Power supply	V/ph/Hz	220~240/1/50	220~240/1/50	220~240/1/50	380~415/3/50	380~415/3/50
	Capacity	kW	2+4	2+4	2+4	2+4	2+4
	Steps	-	2	2	2	2	2
	Max Running current	A	27.5	27.5	27.5	9.5	9.5
	Recommended circuit breaker	A	40.0	40.0	40.0	16.0	16.0
Sound power level	dB	42	42	42	42	42	42
Net Dimension	(HxWxD)	mm	1780 × 590 × 590	1780 × 590 × 590	1780 × 590 × 590	1780 × 590 × 590	1780 × 590 × 590
Packaging dimension	(HxWxD)	mm	2060 × 695 × 695	2060 × 695 × 695	2060 × 695 × 695	2060 × 695 × 695	2060 × 695 × 695
Net / Gross weight	kg	116.5 / 132.5	116.5 / 132.5	116.5 / 132.5	117 / 133	117 / 133	117 / 133
<b>Outdoor Unit</b>		AW122HVGHA	AW142HVGHA	AW162HVGHA	AW12NHSVGH	AW14NHSVGH	AW16NHSVGH
Outdoor operating temperature range	Heating	°C	-25~35	-25~35	-25~35	-25~35	-25~35
	Cooling	°C	10~48	10~48	10~48	10~48	10~48
	DHW	°C	-25~43	-25~43	-25~43	-25~43	-25~43
Water piping connection	Inlet/Outlet	inch	R 1/R 1				
Compressor	Quantity	-	1	1	1	1	1
	Type	-		DC inverter twin rotary			
Refrigerant	Type	-		R290			
	Charge/CO2 Eq.	kg/T	1.05/3.15	1.05/3.15	1.25/3.75	1.05/3.15	1.25/3.75
Sound pressure level *(3)	dB(A)	52	53	55	52	53	55
Sound power level *(3)	dB	63	64	66	63	64	66
Net Dimension	(HxWxD)	mm	880 × 1250 × 460	880 × 1250 × 460	880 × 1250 × 460	880 × 1250 × 460	880 × 1250 × 460
Packaging dimension	(HxWxD)	mm	1112 × 1396 × 630	1112 × 1396 × 630	1112 × 1396 × 630	1112 × 1396 × 630	1112 × 1396 × 630
Net / Gross weight	kg	114/140	114/140	123/149	129/155	129/155	138/164
Power supply	V/ph/Hz	220~240/1/50	220~240/1/50	220~240/1/50	380~415/3/50	380~415/3/50	380~415/3/50
Max running current	A	30.6	30.6	34.8	10.2	10.2	11.6
Recommended circuit breaker	A	32.0	32.0	40.0	16.0	16.0	16.0

\*(1)Max running current does not include backup electric heater, which is individually powered on.

\*(2)The testing conditions refer to EN16147 average climate

\*(3)The testing method refers to EN14511-2018 and the testing method refers to EN12102-2017 (A7/W35)



# HYDRO ALL-IN-ONE R290 NEW 2024

## HYDRO ALL-IN-ONE

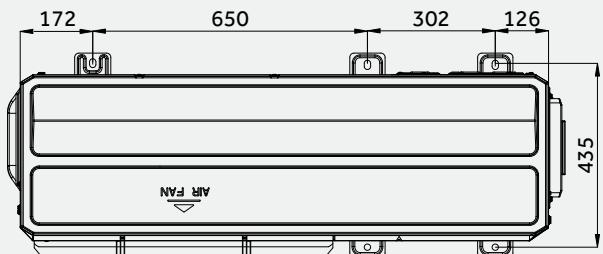
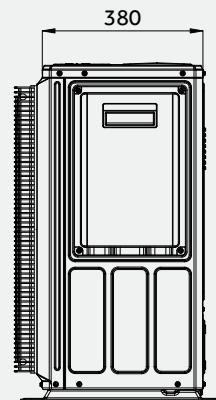
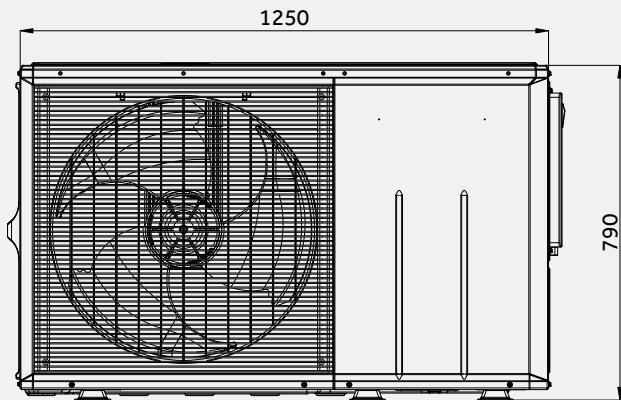
AW042HUGHA

AW062HUGHA

AW082HUGHA

AW102HUGHA

AW10NHUGHA



## HYDRO ALL-IN-ONE

AW122HVGHA

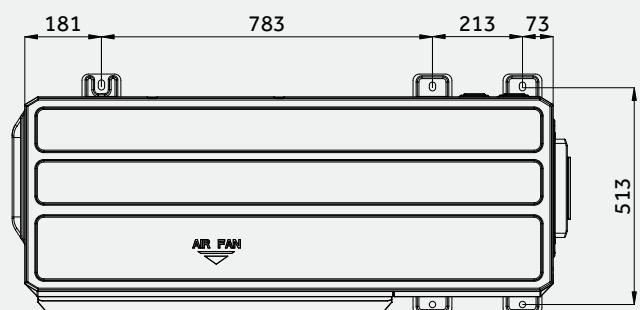
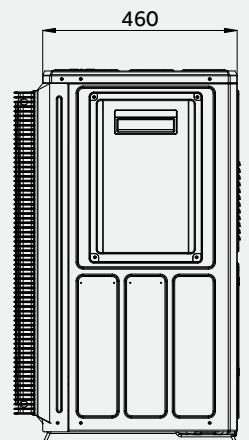
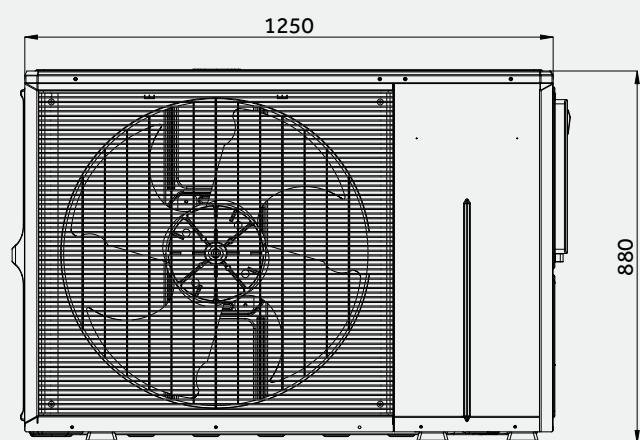
AW142HVGHA

AW162HVGHA

AW12NHVGHA

AW14NHVGHA

AW16NHVGHA



# HYDRO ALL-IN-ONE R290 NEW 2024

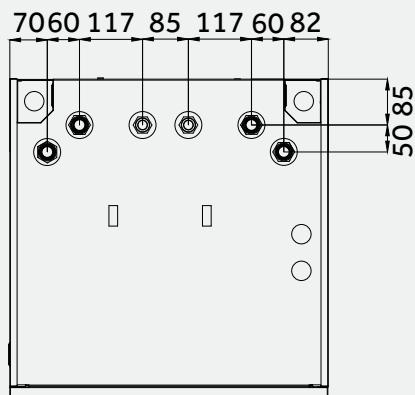
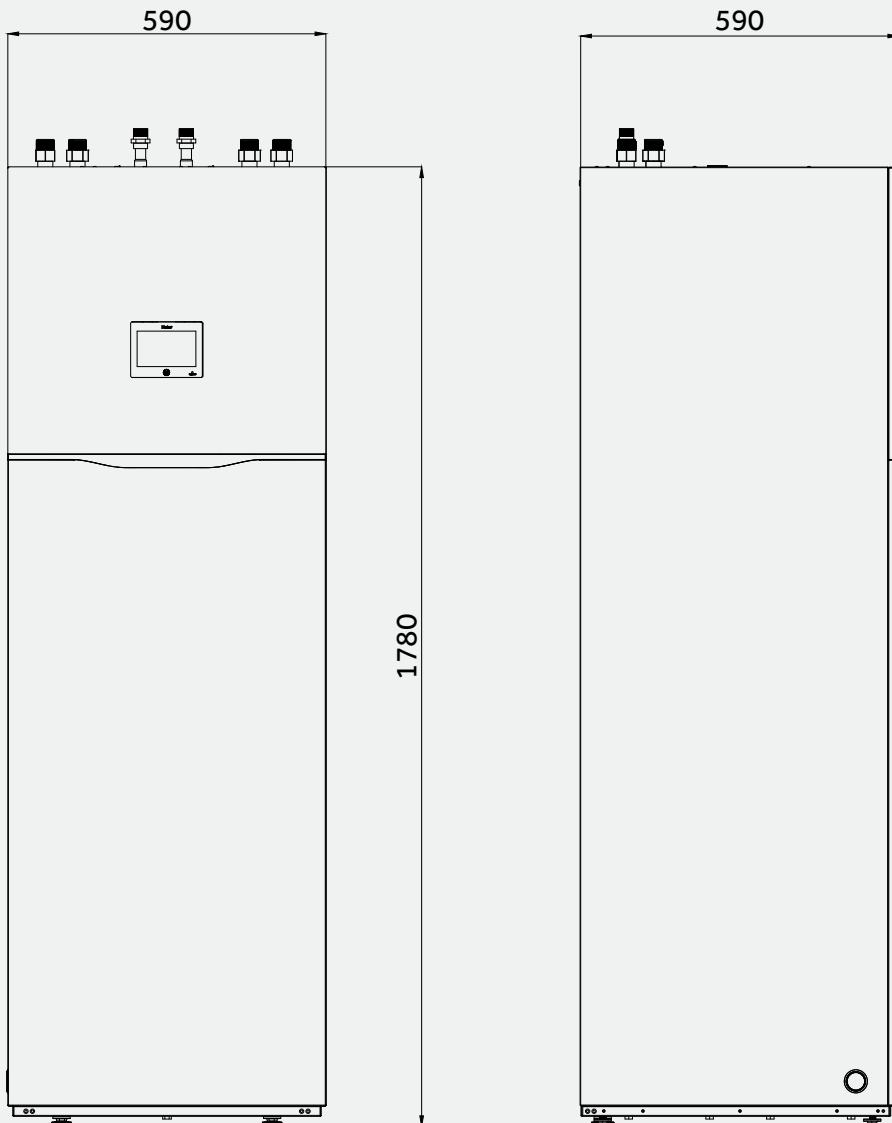
**HYDRO ALL-IN-ONE**

HU102F20AHYA

HU162F20AHYA

HU102F20AHYAE3

HU162F20AHYAE3



# HYDRO SPLIT R290 NEW 2024



AW042HUGH  
AW062HUGH  
AW082HUGH  
AW102HUGH  
AW10NHUGH



HU102WAHYA  
HU162WAHYA  
HU10NWAHYAE3  
HU16NWAHYAE3

Product Data			Hydro Split 4kW-1Ph	Hydro Split 6kW-1Ph	Hydro Split 8kW-1Ph	Hydro Split 10kW-1Ph	Hydro Split 10kW-3Ph
Heating (LWT 35°C / OAT 7°C)	Capacity	kW	4.00	6.00	8.00	10.00	10.00
	Power input	kW	0.73	1.12	1.50	1.96	1.96
	COP	W/W	5.50	5.35	5.35	5.10	5.10
Heating (LWT 55°C / OAT 7°C)	Capacity	kW	4.00	6.00	8.00	10.00	10.00
	Power input	kW	1.19	1.82	2.35	3.13	3.13
	COP	W/W	3.35	3.30	3.40	3.20	3.20
Space heating Average climate water outlet 35°C	SCOP	-	5.10	5.10	5.20	5.10	5.10
	ns	%	201	201	205	201	201
	Energy class	-	A+++	A+++	A+++	A+++	A+++
Space heating Average climate water outlet 55°C	SCOP	-	3.85	3.83	3.85	3.83	3.83
	ns	%	151	150	151	150	150
	Energy class	-	A+++	A+++	A+++	A+++	A+++
Cooling (LWT 18°C / OAT 35°C)	Capacity	kW	4.00	6.00	7.50	9.50	9.50
	Power input	kW	0.79	1.20	1.58	2.21	2.21
	EER	-	5.05	5.00	4.75	4.30	4.30
Cooling (LWT 7°C / OAT 35°C)	Capacity	kW	3.50	5.00	6.80	8.50	8.50
	Power input	kW	0.95	1.37	1.97	2.62	2.62
	EER	-	3.70	3.65	3.45	3.25	3.25
Indoor Unit			HU102WAHYA	HU102WAHYA	HU102WAHYA	HU102WAHYA	HU10NWAHYAE3
Leaving water temperature range	Heating	°C	20~80	20~80	20~80	20~80	20~80
Cooling	°C	5~25	5~25	5~25	5~25	5~25	5~25
Storage temperature range (Tank)	DHW	°C	25~75	25~75	25~75	25~75	25~75
Water piping Connection	Inlet/Outlet	inch	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1
Expansion Tank	L		8	8	8	8	8
Backup electric heater	Capacity	kW	1+2	1+2	1+2	1+2	1+2
Power supply	V/ph/Hz	220-240/1/50	220-240/1/50	220-240/1/50	220-240/1/50	380-415/3/50	380-415/3/50
Max running current	A	14.1	14.1	14.1	14.1	14.1	5.0
Recommended circuit breaker	A	20.0	20.0	20.0	20.0	20.0	10.0
Sound power level	dB	40	40	40	40	40	40
Net Dimension	(HxWxD)	mm	850 × 480 × 310	850 × 480 × 310	850 × 480 × 310	850 × 480 × 310	850 × 480 × 310
Packaging dimension	(HxWxD)	mm	1020 × 580 × 460	1020 × 580 × 460	1020 × 580 × 460	1020 × 580 × 460	1020 × 580 × 460
Net / Gross weight	HU1*2WAHYA**	kg	35.5 / 49	35.5 / 49	35.5 / 49	35.5 / 49	36 / 49.5
	HU1*2WAHYB**	kg	32.5/46	32.5/46	32.5/46	32.5/46	/
Outdoor Unit			AW042HUGH	AW062HUGH	AW082HUGH	AW102HUGH	AW10NHUGH
Outdoor operating temperature range	Heating	°C	-25~35	-25~35	-25~35	-25~35	-25~35
	Cooling	°C	10~48	10~48	10~48	10~48	10~48
	DHW	°C	-25~43	-25~43	-25~43	-25~43	-25~43
Water piping connection	Inlet/Outlet	inch	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1
Compressor	Quantity	-	1	1	1	1	1
	Type	-			DC inverter twin rotary		
Refrigerant	Type	-			R290		
	Charge/CO2 Eq.	kg/T	0.8/2.4	0.8/2.4	0.9/2.7	0.9/2.7	0.9/2.7
Sound pressure level *(1)		dB(A)	44	47	48	49	49
Sound power level *(1)		dB	55	58	59	60	60
Net Dimension	(HxWxD)	mm	790 × 1250 × 380	790 × 1250 × 380	790 × 1250 × 380	790 × 1250 × 380	790 × 1250 × 380
Packaging dimension	(HxWxD)	mm	1022 × 1395 × 550	1022 × 1395 × 550	1022 × 1395 × 550	1022 × 1395 × 550	1022 × 1395 × 550
Net / Gross weight	kg	86/109	86/109	98/121	98/121	98/121	113/136
Power supply	V/ph/Hz	220-240/1/50	220-240/1/50	220-240/1/50	220-240/1/50	380-415/3/50	380-415/3/50
Max running current	A	13.5	13.5	18.6	18.6	18.6	6.2
Recommended circuit breaker	A	16.0	16.0	20.0	20.0	20.0	16.0

\* (1)The testing conditions refer to EN14511-2018 and the testing method refers to EN12102-2017 (A7/W35)

\* HU1\*2WAHYA\*\* stands for the unit without 3-way valve, with expansion tank

\* HU1\*2WAHYB\*\* stands for the unit with 3-way valve, without expansion tank



R290



A++/A+++



Max. 80°C hot water



Climate Curve



2 Zone Control



Auto Mode



Smart Grid



Modbus



DHW Tank Solar Control



Pool Heating



Anti-freezing

# HYDRO SPLIT R290 NEW 2024



AW122HVGHA  
AW142HVGHA  
AW162HVGHA  
  
AW12NHVGHA  
AW14NHVGHA  
AW16NHVGHA



HU102WAHYA  
HU162WAHYA  
  
HU10NWAHYAE3  
HU16NWAHYAE3

Product Data			Hydro Split 12kW-1Ph	Hydro Split 14kW-1Ph	Hydro Split 16kW-1Ph	Hydro Split 12kW-3Ph	Hydro Split 14kW-3Ph	Hydro Split 16kW-3Ph
Heating (LWT 35°C / OAT 7°C)	Capacity	kW	12.00	14.00	16.00	12.00	14.00	16.00
	Power input	kW	2.35	2.83	3.23	2.35	2.83	3.23
	COP	W/W	5.10	4.95	4.95	5.10	4.95	4.95
Heating (LWT 55°C / OAT 7°C)	Capacity	kW	11.50	13.50	15.50	11.50	13.50	15.50
	Power input	kW	3.48	4.22	5.08	3.48	4.22	5.08
	COP	W/W	3.30	3.20	3.05	3.30	3.20	3.05
Space heating Average climate water outlet 35°C	SCOP	-	4.82	4.80	4.80	4.82	4.80	4.80
	ns	%	190	189	189	190	189	189
	Energy class	-	A+++	A+++	A+++	A+++	A+++	A+++
Space heating Average climate water outlet 55°C	SCOP	-	3.85	3.83	3.85	3.85	3.83	3.85
	ns	%	151	150	151	151	150	151
	Energy class	-	A+++	A+++	A+++	A+++	A+++	A+++
Cooling (LWT 18°C / OAT 35°C)	Capacity	kW	11.50	13.50	15.50	11.50	13.50	15.50
	Power input	kW	2.56	3.14	3.88	2.56	3.14	3.88
	EER	-	4.50	4.30	4.00	4.50	4.30	4.00
Cooling (LWT 7°C / OAT 35°C)	Capacity	kW	10.00	12.00	14.00	10.00	12.00	14.00
	Power input	kW	2.99	3.75	4.52	2.99	3.75	4.52
	EER	-	3.35	3.20	3.10	3.35	3.20	3.10
Indoor Unit			HU162WAHYA	HU162WAHYA	HU162WAHYA	HU16NWAHYAE3	HU16NWAHYAE3	HU16NWAHYAE3
Leaving water temperature range	Heating	°C	20~80	20~80	20~80	20~80	20~80	20~80
Storage temperature range (Tank)	Cooling	°C	5~25	5~25	5~25	5~25	5~25	5~25
Water piping connection	DHW	°C	25~75	25~75	25~75	25~75	25~75	25~75
Expansion tank	Inlet/Outlet	inch	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1
Backup electric heater	Capacity	kW	2+4	2+4	2+4	2+4	2+4	2+4
Power supply	V/ph/Hz	220~240/1/50	220~240/1/50	220~240/1/50	380~415/3/50	380~415/3/50	380~415/3/50	380~415/3/50
Max running current	A	28.2	28.2	28.2	9.5	9.5	9.5	9.5
Recommended circuit breaker	A	40.0	40.0	40.0	16.0	16.0	16.0	16.0
Sound power level	dB	42	42	42	42	42	42	42
Net dimension	HxWxD	mm	850 × 480 × 310	850 × 480 × 310	850 × 480 × 310	850 × 480 × 310	850 × 480 × 310	850 × 480 × 310
Packaging dimension	HxWxD	mm	1020 × 580 × 460	1020 × 580 × 460	1020 × 580 × 460	1020 × 580 × 460	1020 × 580 × 460	1020 × 580 × 460
Net / Gross weight	HU1*2WAHYA**	kg	37/50.5	37/50.5	37/50.5	37.5/51	37.5/51	37.5/51
	HU1*2WAHYB**	kg	34/47.5	34/47.5	34/47.5	34.5/48	34.5/48	34.5/48
Outdoor Unit			AW122HVGHA	AW142HVGHA	AW162HVGHA	AW12NHVGHA	AW14NHVGHA	AW16NHVGHA
Outdoor operating temperature range	Heating	°C	-25~35	-25~35	-25~35	-25~35	-25~35	-25~35
	Cooling	°C	10~48	10~48	10~48	10~48	10~48	10~48
	DHW	°C	-25~43	-25~43	-25~43	-25~43	-25~43	-25~43
Water piping connection	Inlet/Outlet	inch	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1	R 1/R 1
Compressor	Quantity	-	1	1	1	1	1	1
Type	-				DC inverter twin rotary			
Refrigerant	Type	-				R290		
	Charge/CO2 Eq.	kg/T	1.05/3.15	1.05/3.15	1.25/3.75	1.05/3.15	1.05/3.15	1.25/3.75
Sound pressure level *(1)	dB(A)	52	53	55	52	53	55	
Sound power level *(1)	dB	63	64	66	63	64	66	
Net dimension	HxWxD	mm	880 × 1250 × 460	880 × 1250 × 460	880 × 1250 × 460	880 × 1250 × 460	880 × 1250 × 460	880 × 1250 × 460
Packaging dimension	HxWxD	mm	1112 × 1396 × 630	1112 × 1396 × 630	1112 × 1396 × 630	1112 × 1396 × 630	1112 × 1396 × 630	1112 × 1396 × 630
Net / Gross weight	kg	114/140	114/140	123/149	129/155	129/155	138/164	
Power supply	V/ph/Hz	220~240/1/50	220~240/1/50	220~240/1/50	380~415/3/50	380~415/3/50	380~415/3/50	
Max running current	A	30.6	30.6	34.8	10.2	10.2	11.6	
Recommended circuit breaker	A	32.0	32.0	40.0	16.0	16.0	16.0	

\* (1)The testing conditions refer to EN14511-2018 and the testing method refers to EN12102-2017 (A7/W35)

\* HU1\*2WAHYA\*\* stands for the unit without 3-way valve, with expansion tank

\* HU1\*2WAHYB\*\* stands for the unit with 3-way valve, without expansion tank



# HYDRO SPLIT R290 NEW 2024

**HYDRO SPLIT**

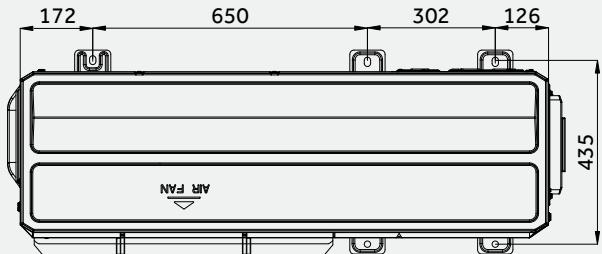
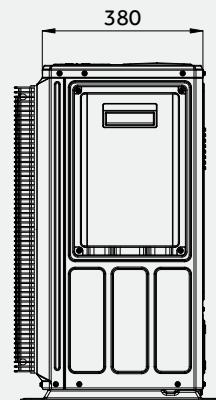
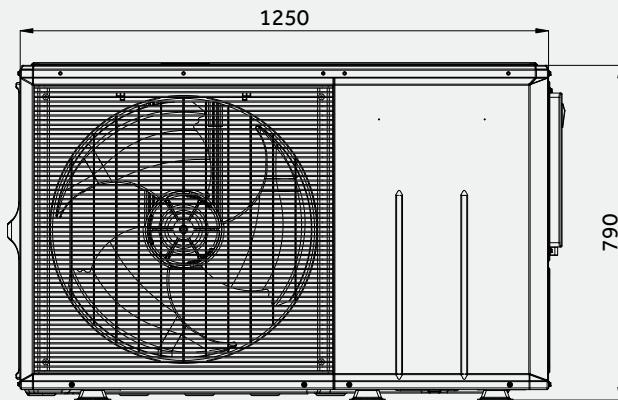
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AW062HUGH

AW082HUGH

AW102HUGH

AW10NHUGH

**HYDRO SPLIT**

AW122HVGHA

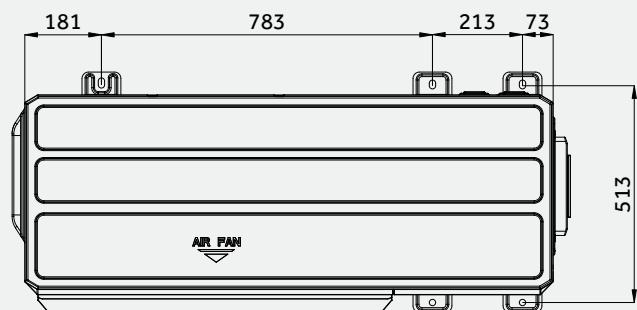
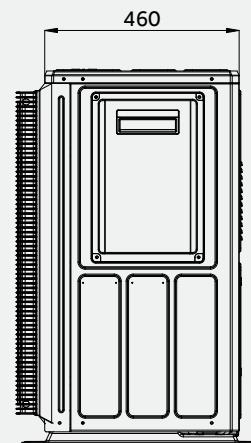
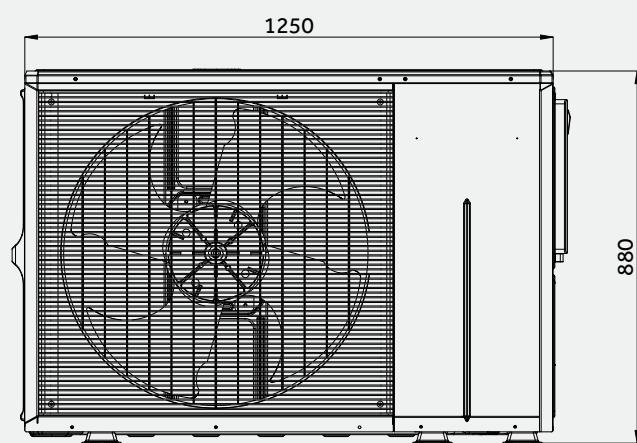
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AW162HVGHA

AW12NHVGHA

AW14NHVGHA

AW16NHVGHA



# HYDRO SPLIT R290 NEW 2024

**HYDRO SPLIT**

HU102WAHYA

HU162WAHYA

HU10NWAHYAE3

HU16NWAHYAE3

