











CHARMO 19

Ductless Single Zone Heat Pump

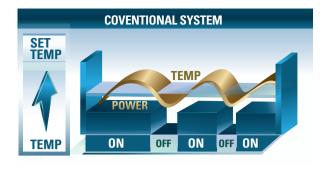


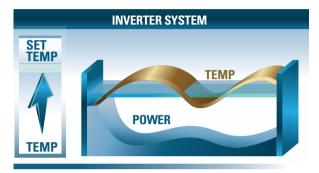
FEATURES

- Cooling, heating, dehumidifying, fan and auto.
- **9000**, 12000, 18000, 24000 BTU/hr.
- **230/208V, 60 Hz, 1-phase.**
- High wall installation, dual side connection.
- Plastic housing, standard white.
- 7-speed cross-flow fan (auto, turbo, high, medium-high, medium, low and very low).
- Washable filters.
- Variable speed rotary compressor (INVERTER), with overload protection.
- Electronic expansion valve for precise control of refrigerant flow.

- Condenser fins covered with a hydrophilic coating for improved corrosion resistance.
- ➤ Large diameter quiet axial-flow fan for more efficient heat exchange.
- Smart pan heater to prevent ice formation.
- Minimum piping length of 10 ft. (3 m).
- Flared connections.
- Wireless remote included.
- ▶ Wired wall controller available.
- Wi-Fi.
- ➤ Set temperature: 16 to 30 °C (61 to 86 °F).
- Temperature display format: °C or °F.

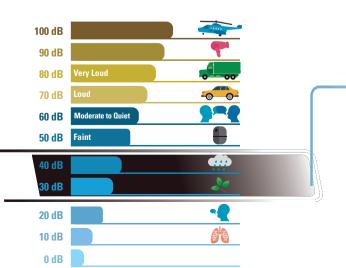






Saves up to 30% on your utility bill

Since mini-splits require no ducting, they forego those energy losses typically associated with conventional central systems. Ducts not properly sealed or unconditioned spaces such as attics, crawlspaces, or poorly insulated rooms can account for more than 30% of loss energy consumption, leading to a more expensive utility bill.



Why go Inverter?

The key difference between an inverter and non-inverter air conditioner is that an inverter system can regulate the speed of its compressor and motor. Once the room is cool, inverter technology reduces the speed of the motor and refrigerant used to cool the area, thus saving on energy.

In comparison, non-inverter motors only runs at full speed. The motor runs at full speed and turns off once room temperature drops to the desired level. This repeated on-off process can produce unnecessary noise and consume more energy.



With inverter technology, the indoor unit will continuously run at adjusted speeds, eliminating the loud start-up conventional air conditioning system require.

This comfort will allow a flexible installation in areas that will not interrupt day-to-day activities with unnecessary noise pollution.



Condenser Features

- Ultra heating capable of operating in outside temperature of -25°C (-13°F)
- · Ultra high efficiency up to 19 SEER2 cooling and 8.8 HSPF2 heating
- Advanced inverter compressor provides faster response to reaching comfort temperatures
- Low voltage startup helps operate system from 187V to 253, adapting to unstable power suppliers
- Saving energy by using Intelligent Defrost. Helps monitor the frost build up on coil surface
- Self-Diagnostic built-in computer which uses real-time diagnostics which helps prolong the unit's life and alerts users with simple error codes the system may be having.





Wall Mount Features

- Multiple fan speed options for better control of your comfort
- Ultra-Quiet indoor operations with inverter technology
- Wide angle air guides enable a full 180° swing up and down for superior air distribution
- Multiple modes such as Sleep, I-feel, Turbo and Dehumidification

Control Features

- Multi-functional wireless remote control with large LCD display
- "I FEEL" mode can sense the room temperature from the remote control, adjusting to your locations comfort
- Wifi Access to control your system away from your system's location. Compatible with Amazon Alexa and Google Home.
- Sleep Mode allows the unit to automatically adjust room's temperature at low sound levels
- Available displays in °F or °C







- *■***Ultra Heat Technology**
- **▶** Two-Stage Variable Speed
- **▶** Compressor Quiet Operation
- **►** Low Voltage Startup
- **►** Multiple fan speed
- **►** Adjustable LED display
- **▶** Precise Airflow Control
- **►** Eco-Friendly R410a Refrigerant







OUTDOOR UNIT

Product #1	duct #1 Indoor Unit Outdoor Unit		GWH09ATCXB-D3DNA4A/I GWH09ATCXB-D3DNA1A/O	GWH12ATCXB-D3DNA4C/I GWH12ATCXB-D3DNA1C/O	GWH18ATDXD-D3DNA4A/I GWH18ATDXD-D3DNA1A/O	GWH24ATEXF-D3DNA4E/I GWH24QEXF-D3DNC4C/O
Technical Performa	nce					
Voltage		Volts	230/208	230/208	230/208	230/208
Cooling capacity	Nominal	W (BTU/hr)	2667 (9100)	3517 (12000)	5159 (17600)	6450 (22000)
	Min. – max.	W (BTU/hr)	820 - 3018	700 - 3700	1100 - 5850	2000 - 7400
		<u> </u>	(2800 - 10300)	(2388 - 13307)	(3753 - 19960)	(6824 - 25249)
Heating capacity	Nominal	W (BTU/hr)	2931 (10000) 655 - 3575	3517 (12000) 700 - 4400	5598 (19100) 800 - 6600	7040 (24000) 1750 - 8000
	Min. – max.	W (BTU/hr)	(2200 - 12200)	(2388 - 15013)	(2730 - 22519)	(5971 - 27296)
Used cooling power input	Nominal	W	805	1334	1750	1896
	Min. – max.	W	180 - 1350	180 - 1500	200 - 2300	340 - 2350
Used heating power	Nominal	W	781	1004	1750	2051
input	Min. – max.	W	150 -1450	260 - 1650	260 - 2300	370 - 2400
Used rated input		W	1450	1650	2300	2400
Rated current		А	6.5	6.7	9.5	12
MCA		А	9	11	14	15
Max. over-current protection (MOCP)		Α	15	15	20	20
SEER2 (SEER)		-	19.5 (19.5)	17.5 (17.5)	17.5 (17.5)	18 (18)
HSPF2 (HSPF)		-	8.8 (10)	8.5 (10)	8.5 (9)	8.5 (10)
EER		W/W	3.30	2.64	2.95	3.40
COP		W/W	3.75	3.50	3.20	3.43
AHRI number		-	209271943	209276088	209424849	209248932
ENERGY STAR		-	-	-	-	-
ndoor Unit						
Dehumidification		pt/hr (l/hr)	1.69 (0.80)	2.96 (1.40)	3.8 (1.80)	5.28 (2.50)
Air flow volume		cfm	353 / 282.5 / 264.8 / 229.5 /	424 / 353 / 324 / 277 /	618 / 512 / 471 / 436 /	677 / 588 / 559 / 500 /
			211.86 / 194.2 / 158.8 51 / 47 / 44 / 42 /	247 / 224 / 182 57 / 49 / 48 / 45 /	395 / 336 / 283 60 / 56 / 54 / 52 /	471 / 441 / 412 61 / 57 / 55 / 52 /
Sound level		dB (A)	41 / 38 / 36	43 / 42 / 37	50 / 46 / 42	50 / 48 / 46
Fan motor power output Fan motor RLA		W A	20 0.30	15 0.40	45 0.70	60 0.45
		W	1.5	1.5	2.5	2.5
Deflector stepper motor power output Net weight		lb (kg)	19.8 (9)	-	28.7 (13)	33 (18)
Outdoor Unit		ib (kg)	19.6 (9)	19.8 (9)	20.7 (13)	33 (16)
Air flow volume		m³/hr	1950	1950	2520	3200
Sound level		dB (A)	51	52	57	57
		W W				
Compressor power input Compressor LRA		A	756 -	857	1295 25	1330 35
Compressor RLA		A	5.20	7.30	9.35	10.45
Fan motor power output		W	30	30	30	60
Fan motor RLA		A	0.4	0.6	0.9	0.6
Refrigerant volume (R410A)			-			
<u> </u>	+10A)	oz (g)	24.7 (700)	27.5 (750)	44.1 (1150)	52.9 (1500)
Net weight Operating	poling	lb (kg)	56.22 (25.5)	57.33 (26)	71.70 (32.5)	97 (44)
ambient		°C (°F)	-18 to 46 (0 to 115) -25 to 24 (-4 to 75)			
temperature		°C (°F)		-25 to 24	+ (-4 10 /5)	
Connection Piping/	Refrigerant					
Pre-charge length		ft. (m)	25 (7.5)	25 (7.5)	25 (7.5)	25 (7.5)
Additional refrigerant charge		oz/ft. (g/m)	0.2 (20)	0.2 (20)	0.2 (20)	0.5 (50)
Liquid pipe outer diameter		in.	1/4	1/4	1/4	1/4
Gas pipe outer diameter		in.	3/8	3/8	1/2	5/8
Maximum height difference		ft. (m)	40 (12.19)	40 (12.19)	82 (25)	82 (25)
Maximum total length		ft. (m)	66 (20)	66 (20)	131 (40)	131 (40)

 $^{^{1}}$ 1 indoor unit and 1 outdoor unit. Note that each unit is individually packaged.

Gree products are subject to continuous improvements. Dettson reserves the right to modify product design, specifications and information without notice and without incurring obligations.



