The World's Most Efficient Chiller Heat Pump

CX30 Chiller Heat Pump

2.5 Tons Heating / 2 Tons Cooling
IPLV Cooling COP 5.16 EER 17.59
NPLV Cooling COP 5.64 EER 19.27
Heating NPLV COP 5.97 EER 20.36

Multiple IDUs - Up to 7 Indoor Units Per CX30
Modular, supports up to 10 ODUs per system.

Ultra High Efficiency Heat Pump Chiller

The CX30 obtains it's ultra high efficiency using existing technologies in a new way. For example, we use a DC-Inverter compressor and a DC-Inverter water pump (both are variable speed) controlled together to achieve the best possible balance of water flow rate and compressor speed.

A special control algorithm looks at the temperature delta between the entering and exiting water temperatures of the chiller, and also compares the exiting water temperature to the system settings. A microcontroller constantly adjusts the pump and compressor speeds independently of each other to maintain the needed capacity at the lowest possible power draw, usually avoiding the need for a buffer tank. There is not a more efficient air source heat pump chiller made anywhere by anyone.

All air conditioning or heating systems must be sized to handle the extremes of the climate or conditioning load. A fixed capacity system must be sized so that it is able to handle the hottest (or coldest) day ever expected. That means that fixed capacity systems are much larger than they need to be almost all of the time.

The CX30 system capacity is fully dynamic and can operate between 25% and 100% of its rated capacity, as needed, and matches its actual capacity to the instantaneous heating or cooling load in real time. This means the system is always the right size for changing conditions and is never oversized.

The right size system is always more efficient than an oversized system. Added to variable capacity, the extremely high performance of this chiller means that you end up with an very high IPLV/NPLV COP and EER for an ultra efficient heating and cooling system.

Save More w/ DC Inverter Fan Motors

All of the thin-line (5.1" thin) wall, floor and ceiling fan coil units use high efficiency and nearly silent DC-Inverter fan motors, designed for 115v 50/60Hz power. 220v 50/60Hz standard FCUs are available for export customers.

Server Room Cooling

Our CX30-SE is the Server Room Edition and includes our DHC dynamic humidity control feature. The SE model also offers an optional Free Cooling add-on which allows EER 141+ & COP 41+ cooling performance during winter at low ambient temperatures. The DHC feature is also ideal for indoor agriculture / grow rooms where temperature and humidity must be tightly controlled. CX30-SE is also available in a N+1 redundant configuration.

Solar Ready

Perfect for solar PV operation with super low power draw and a 1 amp soft start that's easy on inverters and batteries. Also integrates directly with solar thermal hydronic heating & solar water heating systems.

Boiler & Hydronic Integration

Can serve as low-cost primary heat when used with an existing boiler heating system. Dramatically reduces heating costs for users of propane or oil fired boiler systems.

Modular – Stackable

The CX30 can be configured with up to 10 outdoor units to create systems up to 20 Tons Cooling/25 Tons Heating

Heating Performance

The CX30 provides high efficiency heating at outdoor temperatures to -14F (-25C) and still achieves a COP of 2.97.

*Estimated cooling IPLV EER per AHRI 550/590 preliminary test, IPLV capacity at A95 44LWT /19,448 BTU, NPLV A95 54LWT/23,054 BTU. Heating NPLV A43 95LWT /30,538 BTU. Official AHRI IPLV/NPLV test pending.

UL 1995 / CSA 22.2 / TUV

CX30 Chiller Heat Pump

2.5 Tons Heating / 2 Tons Cooling
IPLV Cooling COP 5.16 EER 17.59
NPLV Cooling COP 5.64 EER 19.27
Heating NPLV COP 5.97 EER 20.36

Best of Breed Components

At Chiltrix we used every trick in the book and then some to deliver the highest electrical efficiency possible. And we didn't stop there. The components we use to build our chillers are sourced from the world's top manufacturers and include heat exchangers from Sweden, German pumps, American valves, electronics from Japan, and a compressor from Toshiba.

No corner has been cut when it comes to making sure that the parts and materials used to manufacture the CX30 are the best available. Our chiller is designed for performance - to deliver the lowest kW usage per BTU of any chiller heat pump available, and to perform this task for a 20-year service life.

There is no other chiller like the CX30 available on the market at any price. Contact us to learn more about designing a chiller system for your home, commercial location, or server room. We can also help you integrate our system with an existing system, retrofit replacement, or integration with solar or to an existing boiler or hydronic heating system.

Up to 7 Indoor Units

You can use up to 7 indoor fan coil units of any type including high-wall (mini-split type), low wall, ceiling, floor standing, etc. You can also use in-duct fan coil units for creating a small central heating & air conditioning system.

The system is also compatible with solar hydronic heating, or can be connected to a boiler system to provide a low cost primary heating source.

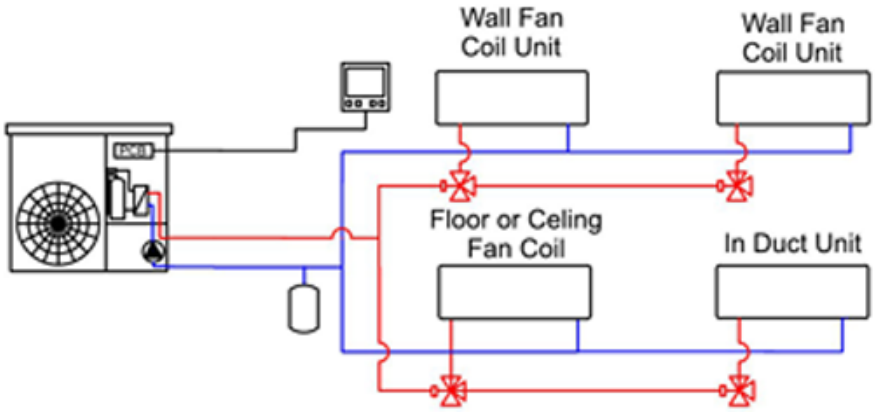
All of the slim-line (5.1" thin) wall, ceiling, and floor units use DC Inverter fan motors for energy savings, providing a long lasting and quiet solution.

*Estimated cooling IPLV EER per AHRI 550/590 preliminary test, IPLV capacity at A95 44LWT /19,448 BTU, NPLV A95 54LWT/23,054 BTU. Heating NPLV A43 95LWT /30,538 BTU. Official AHRI IPLV/NPLV test pending.

The CX30 is Stackable to 10+ Systems
Use up to 7 Indoor Units per System.

UL 1995 / CSA C22.2 / TUV

Model CX30-ODU Per IEC Test Standard		Ambient air temp/outlet water temp (°F)	Capacity BTU
Heating Capacity		at A43°/W95	30,538
		at A32°/W95	26,273
		at A17°/W95	20,321
Cooling Capacity		at A95°/W64	27,793
		at A95°/W54	24,105
		at A95°/W44	20,165
Max. Current (A)			12
Power - Variable (kW)			.258 to 1.86
Electric Supply			208-240v 50/60HZ
Max. Water Temperature (°F)			131
Running Temperature Range- Heating (°F)			-13 to 100
Running Temperature Range- Cooling (°F)			-4 to 126
Refrigerant Circuit	Refrigerant		R410A 2kg
	Compressor		Twin Rotary GMCC Toshiba DC Inverter
	Heat Exchanger		Copper & Aluminum
	Electronic Expansion Valve		Emerson
	Air Flow (CFM)		1412
Water Circuit	Heat Exchanger		SWEP BPHE
	Inlet/Outlet Connections		NPT 1"
	Water flow (GPM)		Variable .2 to 6
	Max/Min Pressure PSI		44/15
	Internal Water Pump		WILO VSD Variable Speed
Unit dimensions W x H x D (Inch)			43*31*16
Package Dimensions W x H x D (Inch)			46*38*19
Net Weight (Lbs.)			210
Gross Weight (Lbs.)			232
Noise Level (dB(A))			49



Distributed By:

hotspot energy

HotSpot Energy Inc.
2133 Smith Ave.
Chesapeake VA 23320
www.hotspotenergy.com

info@hotspotenergy.com
1-800-916-2067