**Commercial and Industrial Applications**

*7 COP with Simultaneous Heating and Cooling Loads*

**Multiaqua Solar Powered Heat Recovery Chiller for Commercial and Industrial Applications with Simultaneous Heating and Cooling Loads**

Industrial processes often generate large amounts of heat which is traditionally rejected while heating needs are met with other energy sources. Commercial buildings often require heating and cooling at the same time in different parts of the building. The Multiaqua Heat Recovery Chiller System recovers waste energy with chilled or heated water.

For example, a mixed use building may have a retail grocery and office spaces on the ground level, condos above and laundry facilities in the basement. Here, cooling the grocery and office space creates waste heat that can be used for laundry, showers, and space heating throughout the building.

Recovering waste energy can result in 30% to 50% savings in operating costs. When paired with solar PV and thermal storage, the Multiaqua system can reduce energy consumption by as much as 100%.

**APPLICATIONS**

- Mixed-use buildings
- Condos
- Office Buildings
- Lodging
- Fitness Centers
- Indoor Pools
- Laundromats
- Cold Storage
- Grocery Stores

**KEY FEATURES & BENEFITS**

- **Recover Waste Heat and Cooling.** Patented simultaneous heating and cooling heat recovery technology captures and utilizes waste heat from cooling loads and waste cooling from heating loads.

- **Use power directly from solar PV, the grid, or both** with the onboard Pika Islanding Inverter™.

- **Ultra-high efficiency:** 7 COP in simultaneous operation.

- **Less maintenance and downtime.** A water and glycol based distribution system means simpler, more common components that are readily available resulting in quicker, less costly maintenance.

- **Designed for ducted or ductless forced air applications, radiant heating and radiant cooling.**

- **Easily Zoned**

- **Store cheap or free energy.** Produce and store ice from solar or cheap off peak electricity and use it when the sun isn’t out or grid power is most expensive.

- **Inverter Driven Copeland Scroll™ compressor** provides exceptional seasonal performance of 20% higher than fixed speed scroll compressors.

www.Multiaqua.com