

The UltraTech™ Home Series Year One Report: Emerson Climate Technologies™ Delivers on the Promise for New Levels of Residential HVAC System Performance

When the UltraTech™ Home Series launched at the 2003 AHR Expo last January, Emerson Climate Technologies™ positioned these best-in-class products as the HVAC industry's most advanced, energy-efficient heating and cooling technologies. First-to-market products that reduce energy consumption, improve comfort, raise system performance to a new level and deliver real value to OEMs, contractors and homeowners alike. A new concept in home heating and cooling with products that could stand alone as an individual application, or be combined for a complete OEM system solution.

Since then, Emerson Climate has continued to move the UltraTech heating and cooling solution forward, with the addition of new products. Today – just one year later – the UltraTech Home Series is delivering advanced technologies that work even better together, with new, integrated product benefits that protect the compressor, support the contractor and service technician and bring a new dimension of comfort and control to homeowners. And equipment manufacturers and contractors are realizing this value for their own customers and businesses.

UltraTech Ignites Business for OEMs and Contractors

Emerson Climate Technologies business leader Tom Bettcher underscored the value of the UltraTech Home Series to OEMs and contractors at last year's AHR Expo launch. "In residential heating and cooling," he said then, "UltraTech delivers the best technologies from Emerson to support new system innovations for OEMs and to give contractors a way to build their business."

Emerson Climate worked closely with the industry and contractors to ensure that each product in the Series met customer criteria for best-in-class performance. The end result is a premium technology offering that materially improves the performance of high-efficiency air conditioning units and gas furnaces, and gives contractors a selling advantage. A premium technology offering that OEMs and contractors are embracing.

- In March 2003, **Lennox Industries, Inc.**, a subsidiary of Lennox International Inc., announced the incorporation of two UltraTech Home Series products into its new premium air conditioning system, introduced later that spring. The Lennox HSX19 series of central air conditioners and heat pumps – the top offering within the Dave Lennox Signature™ collection of premium systems – carried both the **Copeland Scroll™ UltraTech** two-stage compressors and **Comfort Alert™ Diagnostics** technology. In making the announcement, Lennox Industries, cited the unprecedented 19.2 SEER (Seasonal Energy Efficiency Ratio) the new Lennox cooling system carries with the use of the environmentally-friendly R-410A refrigerant. "With the help of Emerson Climate Technologies, the



Emerson Climate Technologies continues to move the UltraTech heating and cooling solutions forward, with advanced technologies that work even better together.

Lennox HSX19 series creates a new benchmark for residential cooling, as the most quiet and energy-efficient central air conditioners and heat pumps owners can buy,” he said. Nearly a year later, the company and Lennox dealers around the country remain excited about the capabilities and sales opportunities of the new system, projecting significant sales growth over the next five years.

- In August 2003, **NORDYNE** announced the selection of Emerson Climate Technologies as the key technology provider for a new line of ultra-high efficiency central air conditioners and heat pumps, using the chlorine-free R-410A refrigerant, and sold under the Maytag, Frigidaire, Tappan and Westinghouse brand names. To achieve 16 SEER ratings, NORDYNE chose the **Copeland Scroll UltraTech** compressor to ensure not only energy efficiency but reliability and improved indoor comfort. These systems also include **Comfort Alert Diagnostics** to monitor compressor performance and pinpoint problems for faster customer service and improved service accuracy. In making the announcement, NORDYNE President and CEO Dave LaGrand, commented on the value these UltraTech Home Series products deliver for their customers and end-users. “Our customers continue to demand higher energy efficiency and alternative refrigerants in their HVAC systems, and our new systems offer both. Our philosophy is to use proven technology in innovative ways. By using Emerson’s Copeland Scroll UltraTech compressor and Comfort Alert, we are able to offer the quality and dependability that customers have come to expect from NORDYNE and its name brand systems.”
- **Amana**, one of the Maytag family of brands, introduced the Amana RSG Ultron air conditioner, a new 16 SEER system using the environmentally friendly refrigerant R-410A, powered by the **Copeland Scroll UltraTech** compressor. Amana is positioning the RSG Ultron as “designed for the consumer who desires the ultimate in comfort, quiet and environmentally friendly performance.
- In September 2003, FHP Manufacturing launched the first super high efficiency line of geothermal heat pumps, the ES Series, utilizing **Copeland Scroll UltraTech compressors, Emerson Climate Technologies Flow Controls thermostatic expansion valves and filter driers**. The ES Series also includes **Comfort Alert Diagnostics** as an optional feature.
- In the **Aftermarket**, the introduction of Comfort Alert Diagnostics with Active Protection at the 2004 AHR Expo will provide contractors with an exciting new way to deliver additional value to their customers, enhancing their reputations and building their businesses. The innovative combination of **Comfort Alert Diagnostics** with the new **Active Protection thermostat from White-Rodgers** delivers a new level of communication for enhanced system intelligence, reliability and protection for residential air conditioning systems. Comfort Alert communicates directly with the Active Protection thermostat to alert homeowners when a problem occurs within their air conditioning system. When combined with the diagnostics technology and a Copeland Scroll Compressor, the thermostat can automatically shut down the compressor when severe compressor damaging faults occur. This new UltraTech Home Series product, available through Emerson Climate Technologies wholesalers, will further entrench Comfort Alert with contractors who indicated strong interest and perceived value for the diagnostics tool. In a recent survey, 98% of contractors expressed interest in Comfort Alert and 77% agree the can offer additional value to the homeowner by selling systems equipped with Comfort Alert.

Additionally, several new OEM systems are in an active design phase, utilizing the UltraTech Home Series, with product launches planned for 2004, according to John Schneider, manager of the UltraTech Home Series.

The UltraTech Home Series will continue to expand in the future as Emerson Climate Technologies introduces new, best-in-class technologies. And if progress in year one is any indication, the UltraTech Home Series will also continue to define residential air conditioning and heating as the Series anticipates and responds to marketplace demands.

The UltraTech Home Series Defined

The UltraTech Home Series currently includes the seven products from Emerson Climate Technologies business divisions, including two recent additions for 2004.

- The new **UltraTech Thermostat**, designed by White-Rodgers,[®] elevates the UltraTech Home Series to an even higher level of performance. When integrated with the Copeland Scroll UltraTech compressor and Comfort Alert™ Diagnostics, the thermostat delivers superior temperature and humidity control, the industry’s highest efficiency and enhanced compressor reliability, even alerting the homeowner to system problems and shutting down the system automatically when severe compressor damaging faults occur.

- The new **Emerson Climate Technologies EK Filter Drier** – a state-of-the-art, industry-leading technology ideal for systems using higher pressure, environmentally friendly refrigerants such as R-410A – delivers more reliable, longer-lasting protection that helps maintain the system and keep it running at peak efficiency and performance.

Other UltraTech Home Series products include:

- **Copeland Scroll UltraTech™**, the first modulated scroll compressor available for the U.S. residential market, building on proven Copeland Scroll performance and reliability. Copeland Scroll UltraTech enables home air conditioning systems to operate more efficiently than any other single-compressor containing system, while providing precise humidity control and temperature levels, operating up to four times quieter than reciprocating compressors and saving homeowners up to 60 percent on energy costs.
- **Comfort Alert™ Diagnostics** – a revolutionary product that won a 2003 AHR Expo Innovation Award – improves technician service accuracy and speed of service. By gathering and analyzing data on system performance and immediately identifying electrical problems and system-related faults, Comfort Alert Diagnostics is helping service technicians increase diagnostic accuracy by 60% and make one or two additional service calls per day.
- **White-Rodgers® Intell-Ignition™ Nitride System** is the most durable, intelligent gas furnace ignition system in the industry, lasting years longer than the 25-year service life of conventional carbide ignitors. The smart control allows systems to continuously adapt, adjust and the optimum ignition temperature, which provides not only better home heating system performance but longer system life.
- **White-Rodgers® Gemini™ Two-Stage Gas Valve** provides homeowners with the highest level of heating comfort, reliability and efficiency through a special two-stage operation and a compact, multi-function design.
- **PerfectSpeed™ Motors**, in two configurations – a fan motor designed for air conditioning units and a blower motor with electric control designed for furnaces -- feature a low-speed, continuous circulation mode to provide optimal comfort.