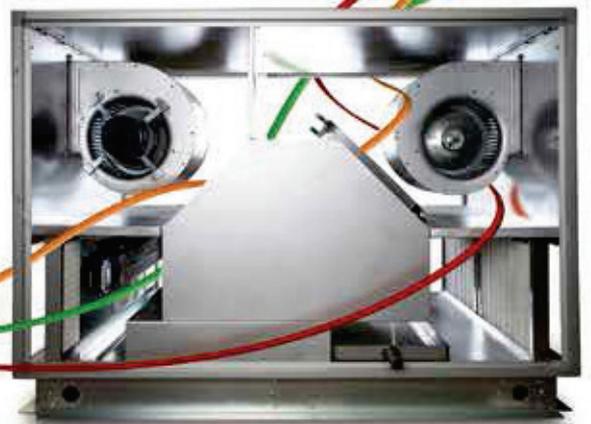


High efficiency ventilation units





High efficiency ventilation units

In view of the fact that we are insulating more and more and are filling the slightest opening or crack, indoor air is no longer renewed naturally. As a result, it may be more polluted than outdoor air. So proper ventilation is required... By using high efficiency counterflow units or rotating wheel units, the energy we save from insulating rooms better is not lost when the heated indoor air is evacuated...

P. LEMMENS HAS SINCE 1997 SPECIALISED IN DOUBLE FLOW HEAT RECOVERY VENTILATION UNITS. THE CHALLENGE THAT P. LEMMENS TAKES UP WITH ITS HIGH EFFICIENCY VENTILATION UNITS IS TO RECOVER CALORIE WATTS WITHOUT WASTING ELECTRICITY WATTS.

CHARACTERISTICS OF THE HIGH EFFICIENCY VENTILATION UNITS :

- The **high efficiency ventilation units** from P. Lemmens are equipped with energy efficient ECM motors and a rotating wheel or a counterflow exchanger in aluminium with an efficiency as high as 96%, in accordance with the Eurovent certification and the EN308 standard.
- The **High Efficiency range** comprises 4 series (**HR Total, HR Global, HR Flat, HR Mural**) and goes from **50m³/h to 15000 m³/h**.
- All the ventilation units are very **robust**. They are therefore suitable not only for the **residential market, but also for industry, the tertiary sector and the care sector**.
- All the units are **supplied plug & play**, with standard programming in the factory. It suffices to connect the unit and to adjust the settings (intuitively).
- The high efficiency units are equipped with **free cooling** : thanks to a by-pass, it is possible to use the outdoor fresh night air to cool the premises.
- The ventilation units **can be connected to an external management system**, through Modbus, KNX, BACNET or other protocols.
- To facilitate the control of the high efficiency units, they can be provided with **GRC (graphical user interface) that can be used to command several devices at the same time**.
- The units can supply a **constant pressure or constant flow rate**. Furthermore, the unit can be adjusted with a **0-10V signal** to guarantee an adjustable constant flow.
- Thanks to the sensors that measure air quality, the units can also supply this adjustable constant airflow rate depending on the quality in question.

Above all, discover

ALL THE ADVANTAGES OF TAC4 TECHNOLOGY



- **TAC4 commands both the basic unit as well as the options.**
- **TAC technology enables the system to maintain the required airflow directly.**
- **Air quality adjustment based on CO₂, air humidity, etc.**
- **The built-in clock can be used to work with several time schedules depending on the day of the week / season.**
- **TAC4 activates the 'free cooling' according to the indoor and outdoor temperature adjustable by the end user.**
- **TAC4 technology is also used to open or close the system, for exhaust or supply of air in case of fire, depending on the needs of the fire brigade (so as to be able to comply with all the requirements of the local fire brigade).**

PRACTICAL ADVANTAGES FOR THE END USER IN BRIEF :

- Low operating and maintenance cost.
- Low energy cost thanks to the use of high efficiency heat exchangers and direct current motors.
- The units can be commanded independently or via a network.
- The post-heating and cooling in the unit can maintain the incoming air at a pleasant temperature.

HR MURAL

VENTILATION UNITS

The Mural series has all the advantages of the P. Lemmens high efficiency ventilation units.

CHARACTERISTICS OF HR MURAL :

- Unit that can be **hung on the wall or placed on the ground.**
- Flow rate from **50 to 1.200 m³/h** with a counter flow heat exchanger.
- These units exist in an **interior and exterior version.**
- The HR Mural can be supplied in **left and right version.**
- The **air filters** are of **G4 and/or F7 class.**
- The 450 models can be supplied in '**up**' version : with a connection of the air vent facing up.
- The 600 and 800 models can be **hung vertically or horizontally.**
- Upon request, the units can be equipped with:
 - an external cooling or heating coil.



MODEL	CID	AIRFLOW-RATE RANGE (m ³ /h)
HR Mural 450	884200	50 - 450
HR Mural 450 VEX	884205	50 - 450
HR Mural Up 450	884204	50 - 450
HR Mural 600	884201	50 - 600
HR Mural 600 VEX	884206	50 - 600

MODEL	CID	AIRFLOW-RATE RANGE (m ³ /h)
HR Mural 800	884202	100 - 800
HR Mural 800 VEX	884207	100 - 800
HR Mural 1200	884203	100 - 1.200
HR Mural 1200 VEX	884208	100 - 1.200

The main winning assets of the Pierre Lemmens Company

- Pierre Lemmens Company is a **Belgian** development and production firm at the cutting edge of technology, which was **created in 1977**.
- P. Lemmens is the **'air movement company'** which for more than **35 years has specialised** in air movement **for heating, air-conditioning and ventilation applications**.
- P. Lemmens **makes** :
 - **single flow ventilation units**;
 - **double flow heat recovery ventilation units**;
 - **centrifugal unit heaters**;
 - **air curtains**;
 - **adjustable air handling units**.
- P. Lemmens manages the entire **production**. It has been organised so that we can always guarantee very short lead times – a major advantage!
- P. Lemmens makes its own **direct drive centrifugal fans** for its finished products. These fans are also marketed.
- P. Lemmens is more than an assembling company. Our **research and development team** is constantly looking for new innovations to be used in the fans and complete units.
- Our research and development team has always been a strong link of P. Lemmens – whence the investment **in a superbly equipped laboratory** here all the new developments are tested down to the minutest detail.
- One of the most remarkable conceptions of P. Lemmens is **Total Airflow Control (TAC) technology**. Developed since 1993, it is now in its fifth generation.
- Equipped with TAC technology, all our products have been **ErP2015 compliant** since 1996.



- TAC technology lies at the heart of the strong growth of P. Lemmens in recent years. It has since been distributed throughout Europe, making P. Lemmens a **European player on this specialised market**.
- The entire P. Lemmens company draws inspiration from the **ISO 9001** without neglecting the flexibility expected by our clients.
- With our competent and motivated employees, we are constantly in search of quality. That is why P. Lemmens is synonymous with **superior quality products**.

