

Zehnder ComfoAir 70

Single room heat recovery

Product data sheet

always the best climate



ComfoAir 70

The Zehnder ComfoAir 70 is a decentralised ventilation unit that stands out for its energy efficiency, flexibility, and intuitive operation. It features a unique enthalpy exchanger for optimal heat and humidity recovery, contributing to its energy efficiency. The unit's flexibility is demonstrated by its ability to integrate neighbouring rooms into the ventilation system, making it suitable for larger apartments. The ComfoAir 70 also boasts an intuitive and demand-oriented operation, with a capacitive touch button for easy operation, programmable fan levels, and a display for service requirements. These features make the ComfoAir 70 a versatile, energy-efficient, and user-friendly solution for ventilation needs.



Key Benefits

- Exceptionally good indoor climate, high energy efficiency and maximum cleanliness due to washable enthalpy exchanger
- Continuous supply air/extract air operation for continuous heat and humidity recovery and demand control using optional humidity and CO2 sensors
- Quiet operation due to high-quality radial fans and good insulation
- Great flexibility due to range of optional components such as adjoining room connection
- Simple and quick installation with minimal intrusion into the living space
- Attractive and discreet appearance: the outside wall panel can be painted over to match the colour of the wall.
- No condensate drain required due to the enthalpy exchanger
- Intuitive operating convenience due to integrated control panel and/or external control panel Zehnder ComfoLED

Article Numbers

Description	Product Code
Unit	
Zehnder ComfoAir 70, with stainless steel external wall panel	527 007 250
Zehnder ComfoAir 70, with plastic external wall panel and humidity sensor board	527 008 780
Zehnder ComfoAir 70, with plastic external wall panel and humidity / CO2 sensor board	527 008 010
Zehnder ComfoAir 70, with plastic external wall panel	527 007 240
Controls	
Controls, ComfoLED controller for Zehnder ComfoSpot 50 and ComfoAir 70	528 009 050
Controls, RFZ module for networking ComfoSpot 50 and ComfoAir 70	527 010 550
Humidity Sensor for Zehnder ComfoSpot 50 and ComfoAir 70	527 007 260
Humidity/CO2 Sensor for Zehnder ComfoSpot 50 and ComfoAir 70	527 007 280
Filters	
Filter for Zehnder ComfoAir 70, ISO Coarse (G4) , 2 Pieces	527 005 180
Filter for Zehnder ComfoAir 70, ISO Coarse / ISO ePM1 (G4/F7) , 2 Pieces	527 005 190
Filter for Zehnder ComfoAir 70, ISO Coarse (G4) , 10 Pieces	527 005 160
Filter for Zehnder ComfoAir 70, ISO Coarse / ISO ePM1 (G4/F7) , 10 Pieces	527 005 170
Filter for Zehnder ComfoAir 70, ISO Coarse / ISO ePM10 (G4/M5) , 2 Pieces	400 102 093
Wall mounting duct for Zehnder ComfoAir 70, L600mm	527 005 200
Wall mounting duct for Zehnder ComfoAir 70, L900mm	527 009 120
Extension set for Zehnder ComfoAir 70, L285mm	527 009 140

SEC Class



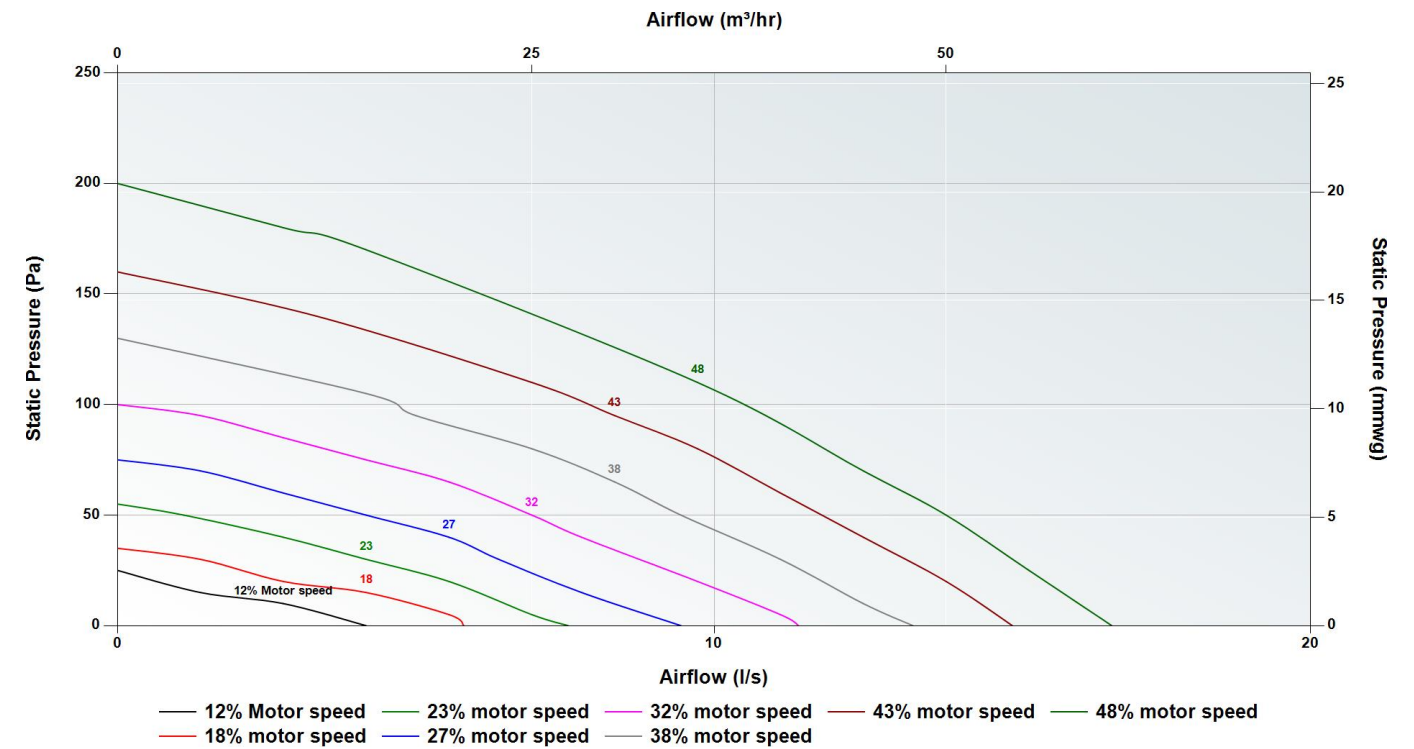
Based on average climate with local demand control

Passive House Certification

	Enthalpy heat exchanger
Air flow range	20–40 m ³ /h
Heat recovery rate	HR = 85%
Specific electric power	Pel,spec = 0.24 Wh/m ³
Humidity recovery	x = 64%



Pressure Curve



Sound Data

Setting	Test area	Octave Band (Hz) Sound Power Level, dB							dB(A) @ 3 m
		125	250	500	1000	2000	4000	8000	
15 m ³ /hr	Casing	26.0	28.3	25.1	11.0	12.0	14.2	19.2	8.4
25 m ³ /hr	Casing	31.4	37.2	31.0	18.2	13.7	14.3	19.2	14.4
40 m ³ /hr	Casing	41.3	52.0	41.7	27.5	22.8	15.6	19.2	27.3
65 m ³ /hr	Casing	45.4	61.1	50.4	38.9	32.6	24.6	19.5	36.3

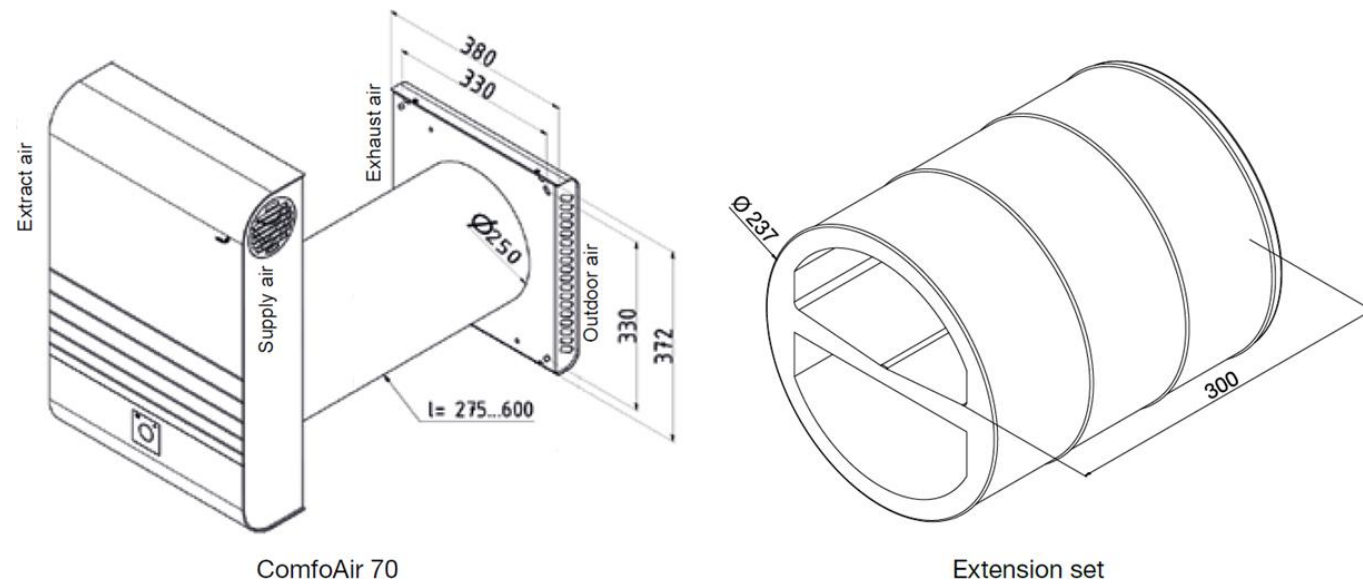
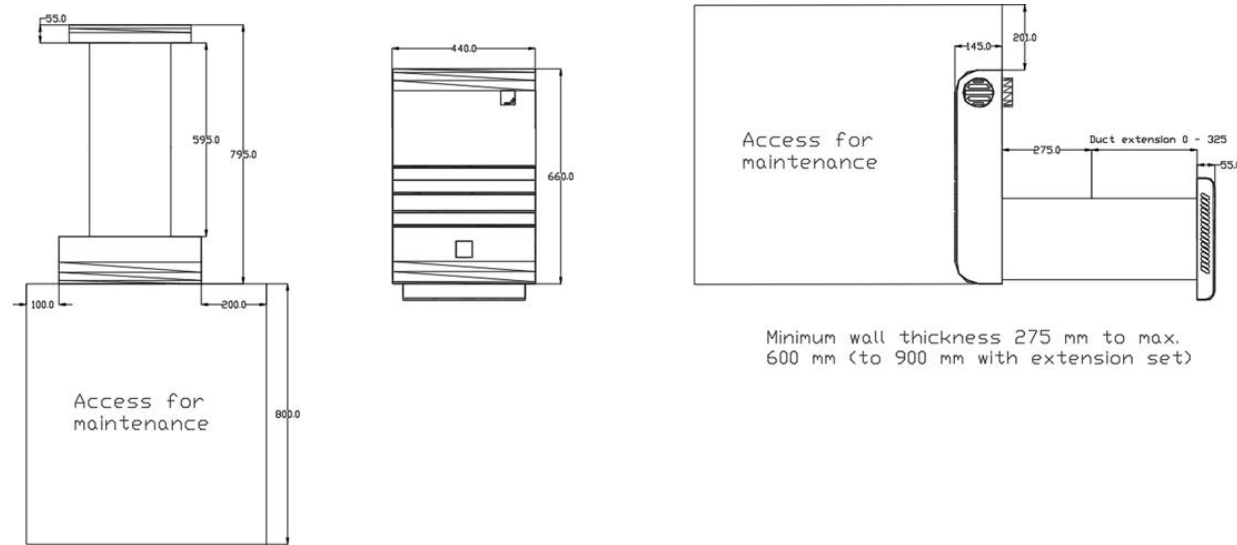
Casing tested according to ISO 3743-1. Environment dB(A) @ 3m given as hemispherical.

Technical Specification

Weight	14 Kg
Filter grade	Standard - ISO Coarse (G4) Optional - ISO ePM10 (F7)
Materials	EPP / Aluminium
External wall panel options	Stainless steel / plastic (RAL 9016)
Supply voltage	230 V / single-phase / 50Hz
Maximum power consumption	17 W
Current draw	0.15 A
Fuse rating	3 amp
Maximum cable size \varnothing	1.5 mm ²
Energy Recovery Efficiency	Up to 90% heat recovery Up to 84% humidity recovery
IP Rating	IP20
Mounting	Wall

Dimensions

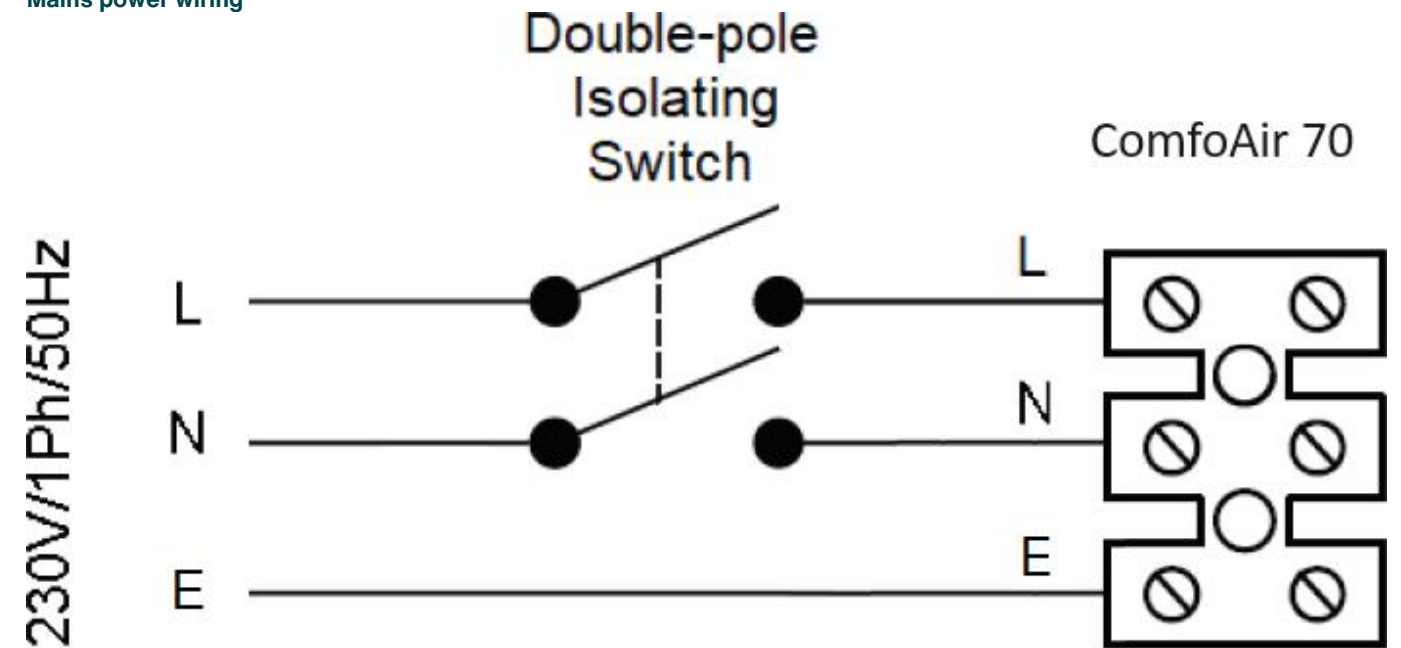
Height	660 mm
Width	440 mm
Depth	145 mm
Duct diameter \varnothing	250 mm
Duct length	600 mm (optional 900 mm)
Core drill diameter \varnothing	270 mm



Wiring

Electrical connections should be carried out in accordance to [IEE regulations](#) by a qualified electrician. The unit is supplied with a flying lead for connection to the mains supply.

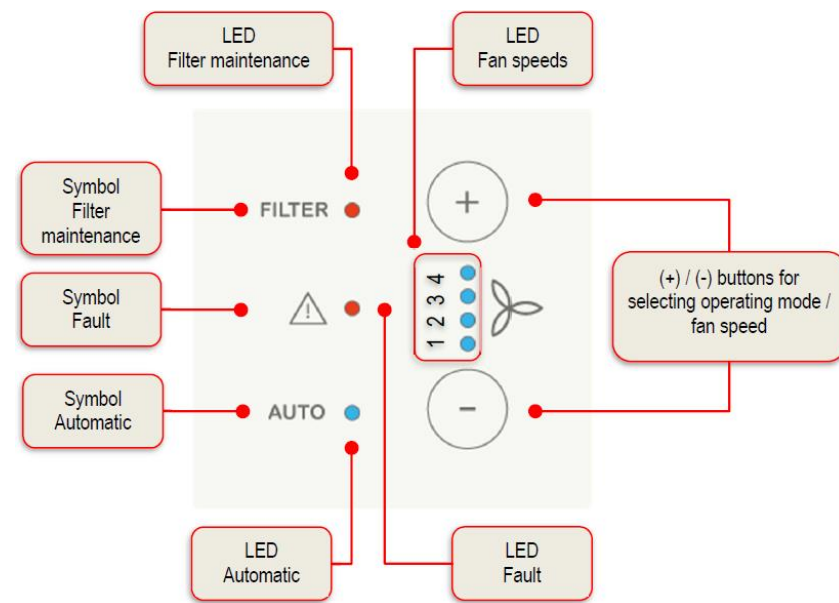
Mains power wiring



Intuitive and Demand-Oriented Operation

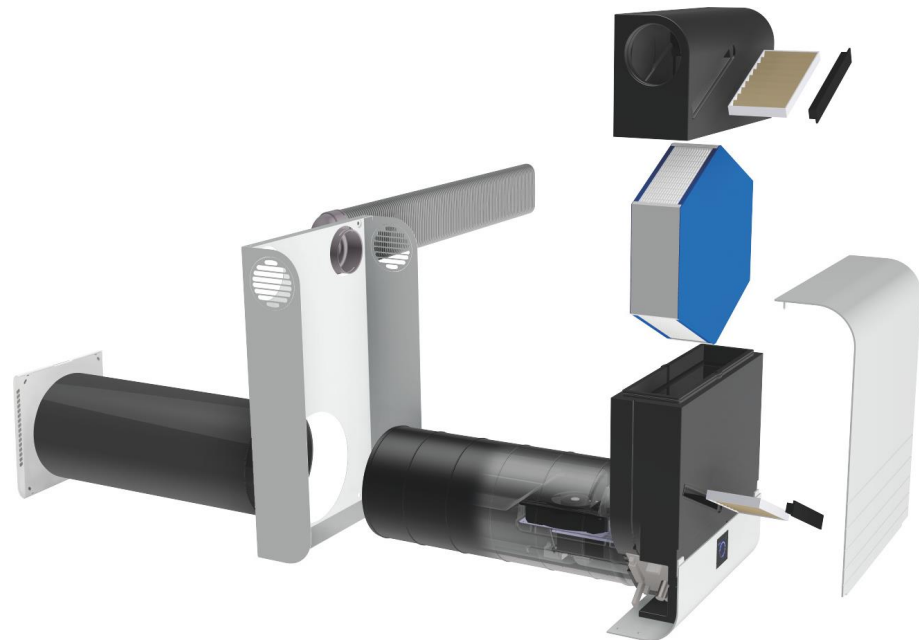
The ComfoAir 70 features a simple and user friendly display.

- **Capacitive Touch:** The ComfoAir 70 features a capacitive touch display for easy operation. This allows users to control the unit with a simple touch, making it very user-friendly.
- **Programmable Fan Levels:** The unit has four programmable fan levels. This means you can adjust the ventilation to suit your specific needs at any given time.
- **Energy saving mode:** The display will automatically switch off to save energy after 10 seconds.
- **Service Requirements:** The unit displays when the filter needs to be replaced and if there are any service requirements. This makes maintenance easier by letting you know exactly when and what service is required.



The Unique Internal Elements of the Zehnder ComfoAir 70 Ventilation Unit

The Zehnder ComfoAir 70 is a unique ventilation unit that stands out due to its internal elements. It features a large enthalpy exchanger for optimal heat and humidity recovery, which is washable for maximum hygiene and prevents the formation of mould and bacteria. The system includes an energy-efficient DC radial fan for quiet operation. The interior lining is made of expanded polypropylene (EPP) for heat and sound insulation. An optional twin-room connection provides flexibility for larger apartments. Lastly, an integrated control panel displays maintenance needs, making the ComfoAir 70 a highly efficient and user-friendly ventilation unit.



Controls

ComfoLED

Product code: 528 009 050



The Zehnder ComfoLED is a four position switch designed to enable the user to manually select the desired ventilation flow rate and provide system notification.

Key Benefits

- 4 separate ventilation flow rate options to select in 1 controller
- Temporary high speed activation setting
- Service and Maintenance alert

Technical Specification

Mounting options	Recessed
Supply voltage	Low voltage direct from the SRHR units plug-in connector
IP rating	IP30
Recommended cable	4 core cable, 1 mm Max. (up to 25 metres)
RAL colour	9010

Dimensions (recessed)

Height	80 mm
Width	80 mm
Depth	10 mm

RFZ module

Product code: 527 010 550



The Zehnder RFZ module enables to connect a network of units together into zones.

Key Benefits

- Create ventilation zones by connecting multiple ComfoSpot 50 or ComfoAir 70 units to work in parallel
- Paired unit will communicate with one another to ensure function synchronisation
- The units can still be adjusted using the internal or external control units
- Up to 32 units can be set per zones

Technical Specification

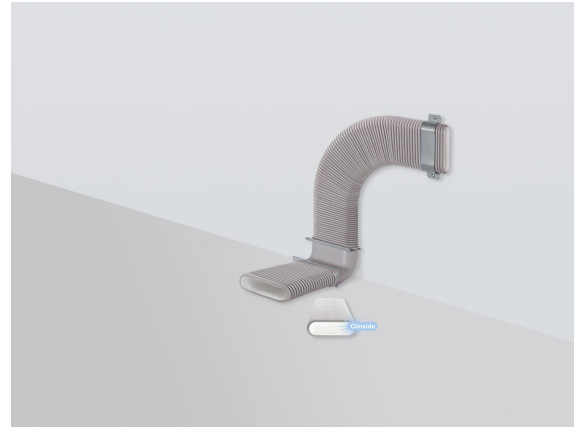
Mounting options	Directly to unit
Supply voltage	Low voltage direct from the SRHR units plug-in connector
IP rating	IP11
RAL colour	9016
Maximum number per unit	1

Dimensions (surface mounted)

Height	42 mm
Width	42 mm
Depth	22.5 mm

For use with

The ComfoAir 70 can be used with our zero leakage Flat 51 semi-rigid ductwork to speed up installation and reduce running cost and noise levels.



[TO VIEW OUR FLAT 51 INFORMATION](#)

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BIM/CAD Components

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Our Informational Videos



Watch our video on the functionality, features and how to install the ComfoAir 70

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Consultant Specification

Specification

The unit shall consist of a body manufactured in plastic. The unit shall be fully insulated using high quality EPP to maintain excellent thermal characteristics and prevent shrinkage over time. It shall have maintenance free EC motors. The fans impellers should be low pressure centrifugal type with backward curved blades within ABS scroll housing. The enthalpy exchanger shall be a multi-plate, counter flow design constructed from Polystyrene with laser welded joints and shall retain up to 90% of the temperature differential of outgoing air for sensible heat transfer plus up to 84% latent transfer of humidity, negating the need for a condensate drain. The unit shall function at temperatures as low as -5°C without the need for a preheater or frost protection.

The unit shall contain filters manufactured from material which has been tested to a minimum of [ISO Coarse](#) (G4) standard with the option to upgrade to [ISO ePM1](#) (F7). The filters shall be pleated to reduce the pressure drop and required cleaning time. The unit shall have a 250 mm duct connection, and be suitable for wall mounting.

The unit shall be constructed to have a removable cover to allow full maintenance access. The removable cover shall enable access to the heat exchanger and access to EPP section with integrated power supply unit, control board and fans. The unit shall have spare parts available for a minimum of 10 years even after ceasing manufacture of the unit.

The unit shall have the option for an adjoining room connection, enabling either supply or extract air to be ducted.

The unit shall conform to LVD and EMC standards and be CE Marked. The unit shall be manufactured by Zehnder.

Operation

The fresh filtered air from outside shall be supplied into the area the unit is located whilst synchronously being pre-heated by the warm extract air, via the plastic counter flow heat exchanger. The unit shall vary its speed of the EC motors automatically when it receives a signal from one of the inbuilt sensors or via external switches.

The unit shall have the ability to adjust the flow rate via the front mounted in-built interface.

Controls

All ComfoAir 70 units shall contain the following functions:

- 100% variable motor control
- Heat exchanger frost protection
- Integral service, fault and operation indicators
- Tool free filter access
- Humidity sensor option to operate the unit in a stepped response to high humidity levels
- CO2 sensor option to operate the unit in a stepped response to high CO2 levels
- Remote activation utilising the optional wired ComfoLED controller
- RFZ module option to enable networking