



## Description

**GE Energy 2 is a heat recovery ventilation unit equipped with a counter flow heat exchanger with a recovery rate up to 95%. The ventilation unit has supply air and extract air fans with energy saving EC motors and backward curved fan blades.**

**The unit is delivered with F7 filter on the fresh air and G4 filter on the exhaust air side (F8 is an option). GE Energy 2 is delivered with an Optima 250 control.**

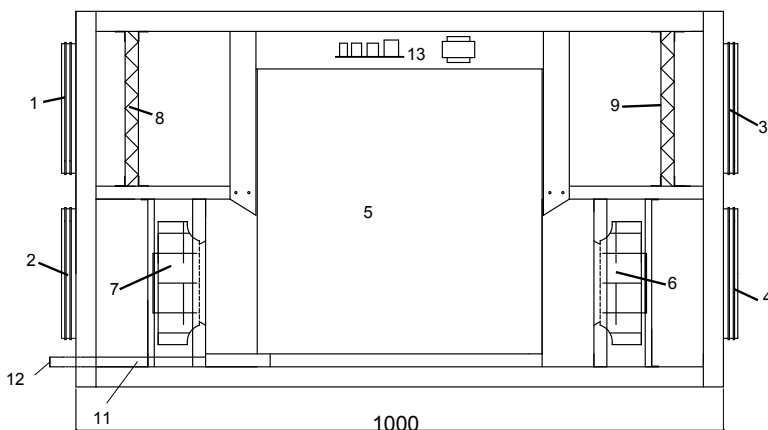
**GE Energy 2 can be delivered with the following options:**

- Filter F8
- Modulating bypass
- Water or electrical heating element for duct mounting Ø200
- Water frost sensor
- Motor valve for water heating element
- Fan guard and filter guard
- Fresh air and exhaust air, motor driven duct mounting Ø200
- Hygrostat for need based ventilation

## Dimensions

GE Energy 2 (right)

Dimensions in mm



Minimum distance above unit for electrical connection 300 mm

- |                |                                |                       |                                    |
|----------------|--------------------------------|-----------------------|------------------------------------|
| 1: Fresh air   | 4: Supply air                  | 7: Extract air fan    | 11: Condensation tub               |
| 2: Exhaust air | 5: Counter flow heat exchanger | 8: Fresh air filter   | 12: Condensation connection Ø15 mm |
| 3: Extract air | 6: Supply air fan              | 9: Extract air filter | 13: Electrical box                 |

## Suitability

GE Energy 2 is used for ventilation systems in the domestic area, when high temperature efficiency and a low energy consumption are requested. This means that new demands for low energy consumption can be held.

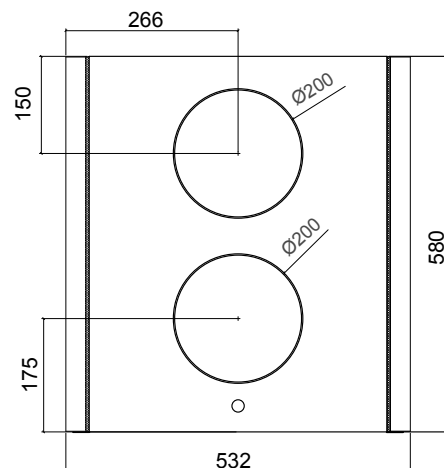
GE Energy 2 is normally used in homes with an area up to 555 square metres (at an average room height at 2.4 m and an air exchange rate of 0,3 1/h).

Air exchange/h	Max. capacity m <sup>3</sup> /h	Living area m <sup>2</sup> *
0.3	400	555
0.4	400	417
0.5	400	333

\* The power consumption is not included when calculating the living area

## Types

GE Energy 2 can be delivered either as a right hand or a left hand version, by switching the front and the back hatch (not when bypass is mounted).



**Bypass:**  
With bypass mounted the width expands with 100 mm to 632 mm.



## Technical data

### Electrical connection

1 x 230 V + N + PE, 10 A, 50 Hz

### Fans

R3G 190

### Motor

EC motor with integrated electronic

### Isolation class

B

### Class

IP 44

### Motor capacity (Max. per motor):

3320 Rpm

### Current input (Max. per motor):

71 W

### Power consumption (Max. per motor):

0.50 A

## Construction

### Size:

(h x l x d) excl. connections  
580 x 1000 x 532 mm

### Cabinet:

Double plated galvanized steel plate with 30 mm Isolation

### Duct connection:

Ø200 mm with double rubber ring seal

### Front:

To parts with quick locks for filter service

### Back plate:

Mounted with 6 mm bolts

### Heat exchanger:

See water resistant aluminium

### Condensation tub:

Stainless steel

### Condensating drain:

Ø15 mm stainless steel

### Filters:

F7 + G4 filters (Standard)

### Weight:

68 kg

## Automatics

GE Energy 2 is delivered with Optima 250 automatics. Optima 250 DESIGN is delivered with factory setting which means that the unit can be started without setting up the menu. The factory settings are standard settings that can be changed to specific needs and demands of your living area.

## Control panel



### Speed (1)

Use this function to set the fan speed to levels 0-1-2-3-4.



### Extended operation (2)

Use this function to set the timer to forced operation from 0 to 9 hours



### After-heat (3)

Use this function to turn on or off the supplementary after-heat.



### Main menu (4)

Use this function to enter the main menu and access the sub-items date, calendar, user menu, display, information menu and service menu.



### Filter (5)

Use this function to un-set the filter alarm.



### Information (6)

Use this function to get a good overview of the device's current operating condition, e.g. temperature, fan setting, relay status/functions, alarm, timer etc.



### Temperature (7)

Use this function to set the room temperature.

## Sound data

Measuring point	1 m in front of the unit			Extraction duct			Supply duct			
	Airflow	1	2	3	1	2	3	1	2	3
		Lo dB			Lwu dB			Lwi dB		
63 Hz	50	56	56	48	60	56	26	32	36	
125 Hz	57	63	67	52	64	61	49	55	59	
250 Hz	55	68	72	45	57	61	54	67	71	
500 Hz	50	59	63	39	51	56	50	63	67	
1000 Hz	40	52	56	38	50	55	43	55	59	
2000 Hz	36	47	51	39	51	56	40	51	55	
4000 Hz	31	38	47	28	40	48	35	42	51	
8000 Hz	26	33	37	19	31	37	27	34	38	
Average		Lo dB(A)			Lwu dB(A)			Lwi dB(A)		
	51	62	66	45	57	61	56	68	72	

- 1: Measured at 40% and an airflow of 75 m³/h
- 2: Measured at 80% and an airflow of 330 m³/h
- 3: Measured at 100% and an airflow of 400 m³/h



## Capacity

The capacity lines are based on an average of the supply and extract air volume in a unit with filters.

### Max. Capacity:

At 100 Pa the max. capacity is: 400 m<sup>3</sup>/h.

With an average room height of 2.4 m, the living area is calculated as follows:

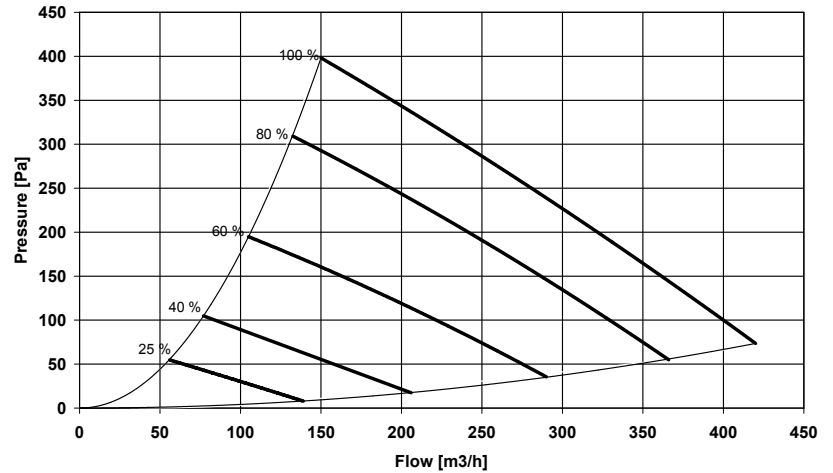
Living area (m<sup>2</sup>) x Room height (m) x Air exchange/h  
= Max. capacity

$$\text{Living area (m}^2\text{)} = \frac{\text{Max. capacity (m}^3\text{/h)}}{\text{Room height (m)} \times \text{Air exchange (h}^{-1}\text{)}}$$

### Example:

$$\text{Living area (m}^2\text{)} = \frac{400 \text{ m}^3\text{/h}}{2.4 \times 0.5 \text{ h}^{-1}} = 333 \text{ m}^2 *$$

\* The power consumption is not included when calculating the living area

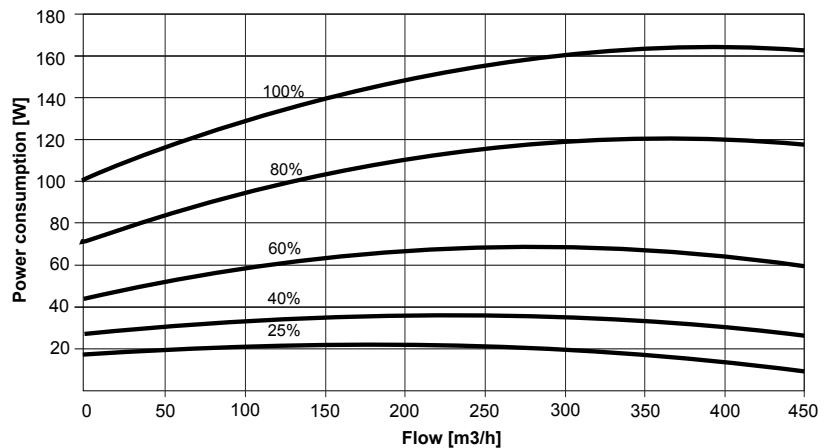


At a max. air volume the available pressure is 30 Pa higher with G4 (25 mm), than the displayed curves

## Total power consumption:

For both fans and control.

- 1 = 100 %
- 2 = 80 %
- 3 = 60 %
- 4 = 40 %
- 5 = 25 %



## Heat recovery rate

Heat recovery rate, flow  $m_{in} = m_{out}$   
Icing of the heat exchanger at low outdoor temperatures has been left out of account.

- 1 = Temp.: -12 °C  
RF.: 50%
- 2 = Temp.: 4 °C  
RF.: 50%

