

99.TWFRESH

## TWIN FRESH

- ⓘ Decentralised ventilation unit with heat recovery using a heat exchanger.

The unit is placed against the exterior wall and provides direct fresh air to the room in which the unit is located.



### ⚙️ Options & Accessoires

- Model with white interior grille (art. code: [99.TWFRESHWHITE](#))
- Model with black interior grille (art. code: [99.TWFRESHBLACK](#))
- Filter set (art. code: [99.TWFRESHFILSET](#))

### ✓ Features

- Built-in LED sensor to adjust brightness to night mode
- Noiseless operation ideal for living spaces
- Low energy consumption for continuous ventilation
- Remote control or control via smartphone (optional)
- Very easy installation without having to use additional air ducts
- High efficiency up to 88%
- On/off switch
- 3 adjustable speeds
- Party mode: temporary high setting for 3 or 4 hours
- Night mode: low setting possible for nighttime
- Humidity controlled mode possible
- Filter change indicator
- Communication master/slave between 4 ventilation units possible

## Operation

### Ventilation Mode

The fan runs either in exhaust air mode or supply air mode at a set speed. In this mode, some fans in the network operate in supply air mode and others in exhaust air mode, depending on the position of DIP switch No. 3 (see "Setting fan operating modes with DIP switches").

### Boost mode

When relative humidity is exceeded or the NO-contact of the external relay sensor is closed, the fan switches to third speed until the sensors switch to their default speed and the Boost-off timer expires.

### Regenerative mode

The fan runs in two cycles of 70 seconds each with regeneration of heat and humidity.



#### Cycle I.

Warm stale air is drawn from the room and flows through the ceramic exchanger, which gradually absorbs heat and humidity. After 70 seconds, when the ceramic exchanger heats up, the fan switches to air supply mode.

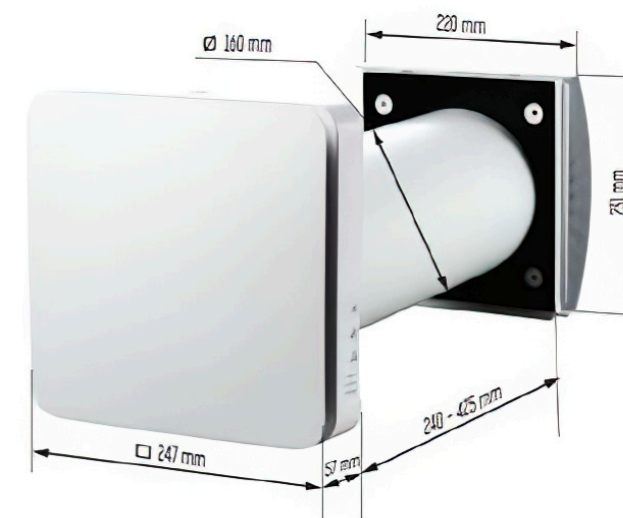
#### Cycle II.

Fresh outdoor air flows through the ceramic regenerator, absorbs accumulated moisture and is heated to room temperature. After 70 seconds, when the ceramic exchanger has cooled, the fan switches to exhaust air mode and the cycle resumes. The start interval of a specific fan depends on the position of the DIP switch No. 3. If two fans - an even number are installed, they must be set to operate in opposite directions of rotation. While one fan supplies air, the other extracts air.

**Additional:** In case of simultaneous activation of different operating modes that are mutually exclusive, the fan selects the mode according to the following priority:

1. Timer night mode or timer partymode
2. Standby
3. Boost
4. Default operating mode

## Measurements



## Technical information

Model	TwinFresh Atmo			
	I	II	III	
Speed				
Voltage [V/40 (60) Hz]	100-240 / 50-60			
Power [Watt]	1.7	3.0	4.3	
Max current [A]	0.03	0.04	0.05	
Air flow in ventilation mode [m³/h]	15	35	50	
Air flow in regenerative mode [m³/h]	8	15	25	
SFP [W//s]	0.82	0.72	0.62	
Filter	ISO Coarse >50% (G3) (ISO Coarse >60% (G4), ISO ePM1 60% (F7) optional)			
Operating temperature [°C]	-20°C up to 40°C			
Sound pressure level at 1m distance [dBA]	20	30	36	
Sound pressure level at 3m distance [dBA]	11	21	27	
Sound pressure damping outdoors according to DIN EN 20140 [dBA]	40/44			
Heat recovery efficiency	Up to 88%			
Protection class	IP24			
Specific energy consumption [SEC] [kWh/(m².a)]	Cold		Medium	
	-78.2	A+	-38	A
	Warm			
	-15	E		
Ventilation type	Bidirectional			
Control type	3 speeds			
Heat recovery type	Regenerative			
Thermal efficiency heat recovery	74%			
Air flow [m³/h]	35			
Specific fan power [SFP]	0.063			