

# Technical Data Sheet

CODE 12101

## VORT HR 450 AVEL D

Wall-mounting residential heat recovery unit



### Certifications

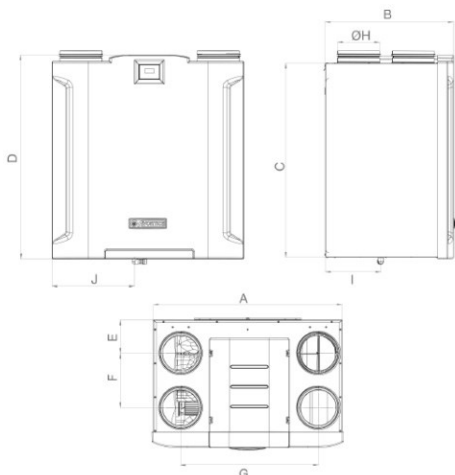


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### TECHNICAL AND PERFORMANCE DATA

Absorbed Current max (A)	2,75	Voltage (V)	220-240
Absorbed Power max (W)	350	Weight (Kg)	40
Filter class for extract air	G4	Delivery max (l/s)	110
Filter class for supply air	G4	Delivery max (m <sup>3</sup> /h)	400
Frequency (Hz)	50-60	Maximum thermal efficiency (%)	90,4
Insulation Class	I°	Pressure max (mmH2O)	69
IP	X2	Pressure max (Pa)	680
Max ambient temperature for continuous operation (°C)	25	Sound power level - radiated Lw [dB(A)]	47,2
Max Temperature of Exhaust Air (Continuous Operation)	40	Sound power level exhaust inlet Lw [dB(A)]	45,7
Min ambient temperature for continuous operation (°C)	5	Sound power level supply outlet Lw [dB(A)]	61,5
Nominal Current (A)	1,80	Sound pressure level air extraction Lp [dB (A)] 3m - max speed	25,2
Nominal Diameter (mm)	160	Sound pressure level air supply Lp [dB (A)] 3m - max speed	41,0
Nominal Power (W)	230	Sound pressure level radiated Lp [dB (A)] 3m - max speed	26,7

### DIMENSIONS



Size A (mm)	708
Size B (mm)	480
Size C (mm)	730
Size D (mm)	766
Size E (mm)	125
Size F (mm)	205
Size G (mm)	516
Size H (mm)	∅
	158
Size I (mm)	207
Size J (mm)	308

#### PER INFORMAZIONI:

Servizio al Cliente: tel +39 02 90699395 premendo 1 dopo messaggio registrato (consulenza su prodotti e impianti)

Pre & Post Vendita: fax +39 02 90699302

Email prevendita: prevendita@vortice-italy.com

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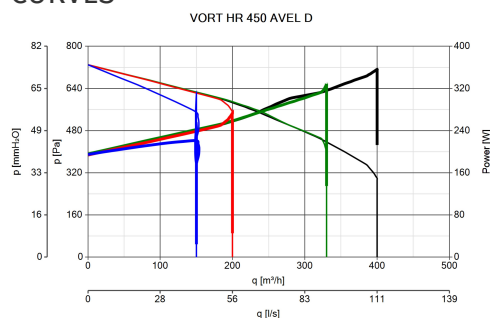
Wall-mounting residential heat recovery unit



### DESCRIPTION

- Galvanized and painted sheet steel enclosure.
- Aesthetic front panel made of plastic resin (ABS).
- Internal components made of EPP.
- Round duct connection ports, nominal diameter 160 mm.
- 2 EC (brushless) motors, external rotor, controlled at constant airflow, with shaft turning in ball bearings to grant a "maintenance free" functioning, each coupled to a forward curved centrifugal impeller; 4 speeds, independently adjustable at the installation.
- High efficiency counter-flow heat exchanger in PS resin.
- Automatic, 100% filtered, mechanic by-pass, granting people comfort in the rooms in mid-season or when the outside temperature does not require the action of the heat exchanger.
- Automatic frost-protection to prevent icing on the heat exchanger.
- 3 x ISO Coarse 90% (G4) filters, respectively on extraction, supply ports and for the by-pass. ePM10 50% (M5) and ePM1 55% (F7) filters available as optional per the supply port and for by-pass.
- Condense water tray with discharge pipes.
- Wired control panel with LCD display, which allows:
  - to switch on / off the unit;
  - the first set-up;
  - to set the speed;
  - to set the weekly timer;
  - to monitor the correct product operation (any faults are shown on the display);
  - to show the product functioning (speed set, by-pass status, defrosting activation, pre and/or post heaters activation if installed);
  - to show the filters status.
- Brackets for wall-mounted installation supplied as standard.
- Possibility of connection to environmental external sensors (available as optional), for automatic functioning control.
- Possibility of integration in home automation environment through ModBus protocol.

### CURVES



### ACCESSORIES



#### C SMOKE

Code 12993



#### C HCS

Code 12994



#### ELECTRIC HEATER 1200

Code 21622



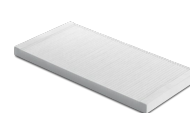
#### ELECTRIC HEATER 2400



#### FTR ISO COARSE 90%



#### FTR ISO COARSE 90%



#### FTR EPM1 55% (F7)

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8X184X21

le 21624

Code 21628



**FTR EPM10  
50% (M5)  
398X184X21**  
Code 21625



**FTR EPM1 55%  
(F7) 418X44X21**  
Code 21626



**FTR EPM10  
50% (M5)  
418X44X21**  
Code 21627



**NA 160 PHI**  
Code 21643



**CB LCD D**  
Code 21381