

DV280, DV380 and DV580 Adroit Pro

Premium Top Entry MVHR Unit



KEY FEATURES

- For use in dwellings up to 250 m²*
- 3 models (top entry) up to 565 m³/h at 100Pa
- Plastic counterflow heat exchanger
- Up to 95% thermal efficiency and low SFP
- A+ energy rating
- Sandwich casing construction with 30 mm thermal insulation
- Up to 95% thermal efficiency
- Automatic, 100% summer bypass
- Versatile design (automatic switch between right / left configurations)
- Two types of control systems available
- Optional constant flow/pressure function
- Optional pre or post-heater
- Complies with Building Regulations and ErP standards
- 5 year warranty+

DV280, DV380 and DV580 Adroit Pro

The DV280, DV380 and DV580 Adroit Pro are highly efficient top entry Mechanical Ventilation with Heat Recovery (MVHR) units that can ventilate up to 565 m³/h. They are wall mounted units and are delivered complete with a full condensate drain kit.

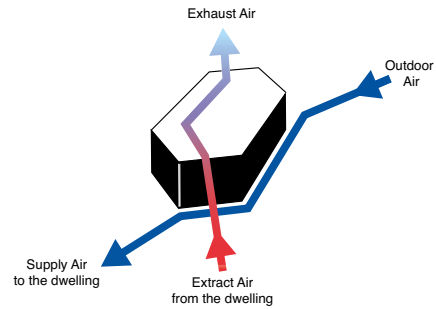
The Adroit Pro is made with galvanised steel, double skin casing with 30 mm thick insulation to eliminate thermal bridging and minimise noise levels.

These Adroit Pro units include an easily removable, plastic heat exchanger that can recover up to 95% of otherwise wasted heat. This recovered heat is transferred to the incoming supply air before it is filtered and supplied to the dwelling, which can reduce ongoing heating bills of the property. At no point do the airstreams mix.



100% AUTOMATIC BYPASS

The unit is equipped with an automatic, 100% bypass which totally isolates the heat exchanger so that no air passes through it. This prevents overheating the dwelling in the summer season.

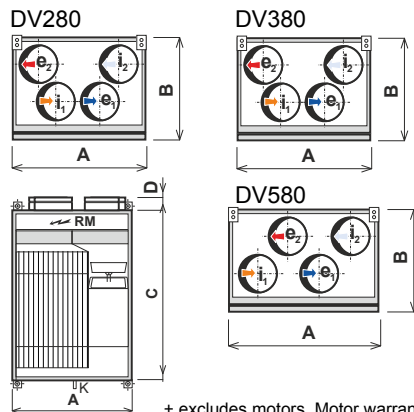


TECHNICAL DATA

Specification	DV280 Adroit Pro	DV380 Adroit Pro	DV580 Adroit Pro
Suitable for dwellings up to (m ²)	100	170	250
Max air flow (m ³ /h) / (l/s) at 100Pa.	285 / 79	365 / 101	565 / 157
Thermal efficiency (%)	94	95	94
Heat exchanger	Counterflow (Plastic)	Counterflow (Plastic)	Counterflow (Plastic)
Fans	EC	EC	EC
Summer bypass damper	100% automatic	100% automatic	100% automatic
Frost protection	Reducing supply air	Reducing supply air	Reducing supply air
Controllers	Touch or Rotary	Touch or Rotary	Touch or Rotary
Connection to BMS*	Modbus (TCP/IP)	Modbus (TCP/IP)	Modbus (TCP/IP)
Mounting	Wall	Wall	Wall
Sound Power Level (dB(A))	35	36	42
Duct Diameter (mm)	160 (4 ports)	160 (4 ports)	200 (4 ports)
Condensate discharge (mm)	16	16	16
Electrical supply	230 V / 1 ph / 50 Hz	230 V / 1 ph / 50 Hz	230 V / 1 ph / 50 Hz
Max. Power Consumption (W)	118	192	345
Filter Class**	2x Coarse 60% (G4) [optional ePM1 55% (F7)]	2x Coarse 60% (G4) [optional ePM1 55% (F7)]	2x Coarse 60% (G4) [optional ePM1 55% (F7)]
Built-in Electric pre-heater (optional) (W)	650	990	1300
Ducted Electric pre-heater (optional) (W)	900 / 1500	1500	2100 / 3000
Built-in Electric post-heater (optional) (W)	250	500	500
Ducted Electric post-heater (optional) (W)	900 / 1500	1500	2100 / 3000
Protection class	IP34	IP34	IP34
Casing insulation (mm)	30	30	30
Weight (kg)	59	59	75
Dimensions (L x D x H) (mm)	617 x 490 x 1000	617 x 490 x 1000	928 x 509 x 1080
Duct Entry	Top Entry	Top Entry	Top Entry
Versions available			
Adroit Pro Web with Touch controller	90000635	90000636	90000637
Adroit Pro Web with Rotary controller	90000673	90000676	90000678
Adroit Pro Basic with Touch controller	90000674	90000665	90000679
Adroit Pro Basic with Rotary controller	90000675	90000677	90000680

*Only for units with Adroit Pro Web control system
**Complies with ISO 16890

DIMENSIONS



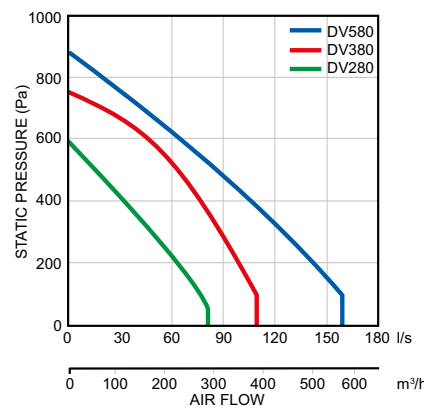
Duct Connections

1. Exhaust air outside
 2. Outdoor air to the unit
 3. Supply air to rooms
 4. Extract air to the unit
- K. Condensate drain

+ excludes motors. Motor warranty one year from date of purchase.

Model	A	B	C	D
DV280 Adroit Pro (mm)	617	490	1000	60
DV380 Adroit Pro (mm)	617	490	1000	60
DV580 Adroit Pro (mm)	928	509	1080	60

PERFORMANCE



* Guidance only. Dependant upon system pressure.

ACCESSORIES

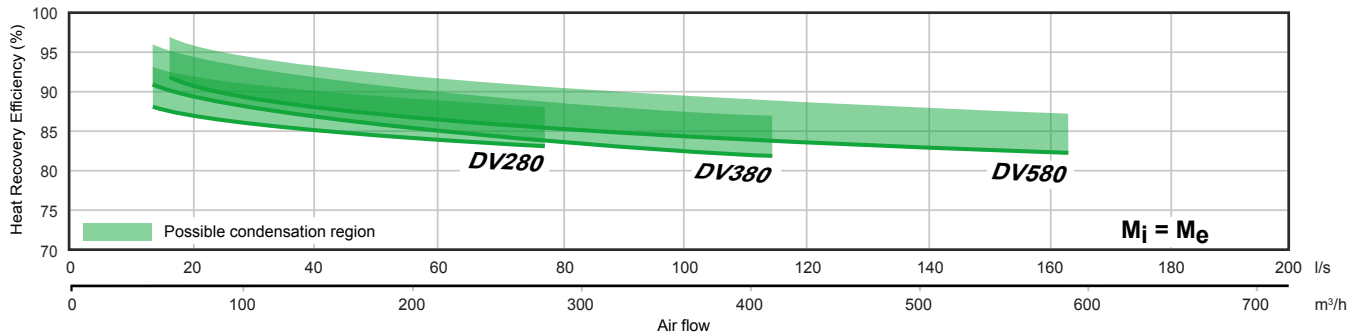
See Duplexvent accessories for more details.



DV280, DV380 and DV580 Adroit Pro

Premium Top Entry MVHR Unit

PERFORMANCE



CONTROLS

There are two types of control systems available for Adroit Pro units:

- Adroit Pro Web control system, which is internet and BMS capable solution to meet requirements of the most advanced systems.
- Adroit Pro Basic control system, which is simpler solution for controlling the basic functions of the unit.

Adroit Pro Web control system

Main features:

- Two types of controllers available: Touch or Rotary controller
- Internet connectivity which enables unit control and monitoring from a remote location via laptop, tablet or smart phone
- BMS connection
- Daily / Weekly programme setting
- Automatic boost function with timer delay (via volt-free contact or 0-10V sensor output)
- Automatic frost protection reduces the supply ventilation rate for a certain period to prevent ice build-up within the heat recovery cell depending on the outside air temperature
- Automatic, 100% summer bypass prevents overheating the dwelling in summer season.
- Demand ventilation via CO₂, humidity and air quality sensors
- Versatile design (automatic switch between right / left configurations)
- Zonal ventilation control
- Constant flow / pressure control
- Heater control for pre or post-heater
- Filter monitoring and alert via pressure sensors



WB1 Touch controller



WB2 Rotary controller



Adroit Pro Basic control system

Main features:

- Two types of controllers available: Touch or Rotary controller
- Automatic or manual mode
- Analogue signal 0-10V (RH%, air quality sensors)
- Automatic frost protection reduces the supply ventilation rate for a certain period to prevent ice build-up within



BC1 Touch controller



BC2 Rotary controller

the heat recovery cell depending on the outside air temperature

- Automatic, 100% summer bypass prevents overheating the dwelling in summer season
- Heater control for pre or post-heater
- Filter change reminder

INTERNET CONNECTION*

Adroit Pro units incorporate an Internet server to provide a connection between the ventilation unit and the internet via a standard plug and play Ethernet cable.

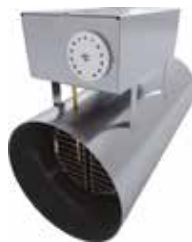
This allows you to monitor and control the unit from a laptop, tablet or smartphone via internet or local area network. The unit can be also monitored remotely by technical service which saves time and cost on service processes.

*Only for units with Adroit Pro Web control system



HEATERS

The new generation PTC (Positive Temperature Coefficient) electric heater incorporates a power adjustment facility which automatically increases/decreases the power based on the air volume going through the heater hence shortens the heating response.



Also the heater has two protection thermostats and a perforated metal filter which can easily be maintained via the inspection door. This significantly increases its life span especially when the heater is installed on the outdoor air side for frost protection purposes. Alternatively it can be used as post-heater to achieve the required indoor air temperature.

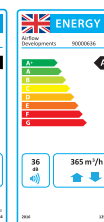
CERTIFICATION

All Adroit Pro units meet the requirements set out by the Energy Related Products (ErP) Directive 2016, achieving an A+ rating. You can find out more about the ErP Directive at: www.airflow.com

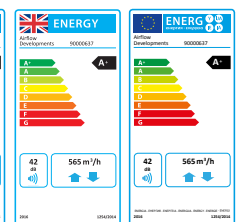
DV280



DV380



DV580



Call: 01494 525252

Visit: airflow.com



Airflow Developments Limited
Aidelle House, Lancaster Road,
Cressex Business Park,
High Wycombe, Buckinghamshire,
United Kingdom, HP12 3QP

E-mail: info@airflow.com
Telephone: +44 (0) 1494 525252

airflow.com

© Airflow Developments Limited. Airflow Developments Limited reserve the right, in the interests of continuous development, to alter specifications without prior notice. All orders are accepted subject to our conditions of sale which are available on request



80000520 Issue 2 - 05/21