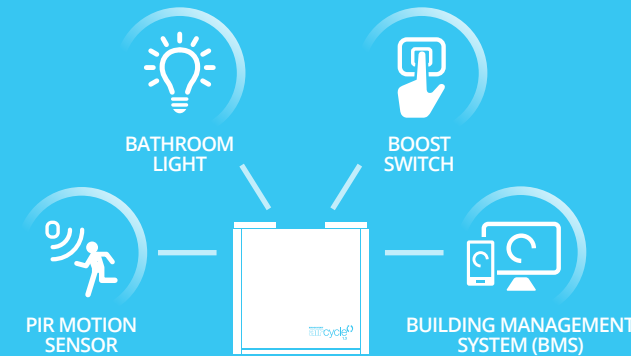


AIR QUALITY CONTROL

delivered by intelligent sensor technology

AUTO-BOOST Integration

The programmed boost (high) speed setting can be easily triggered via any 230v switched live signal (e.g. bathroom light, PIR motion sensor, boost switch, BMS) offering multiple means of intelligent, automatic control integration. This ensures pollutants are extracted immediately when created and at a much quicker rate.



Integral HUMIDISTAT

Continuously monitoring the humidity level (% RH) of the extract air from the property, the system's integral humidistat automatically operates the boost (high) setting of each fan to reduce indoor humidity levels to the preferred, adjustable RH comfort level.

Tempering SUMMER BYPASS

A variable, tempering summer bypass mechanism operates by gradually increasing the amount of air directed around the heat recovery core as the temperature of the supply air from outside rises. This automatic feature helps to ensure total user comfort during warmer summer months by reducing the amount of heat being added to the fresh, filtered supply air.

QUIET by Design

Streamlined airflow path design coupled with custom engineered fan scrolls help to ensure low internal air turbulence and guaranteed balanced fan operation, greatly minimising occurrences of in-duct noise transference.

A high density, expanded polypropylene casing further succeeds in limiting any potential break-out noise from the fan operation.

aircycle 1.3 Acoustic Performance													
Airflow l/s	Speed %		Frequency Hz								Lw dB	LwA dB	LwA dB @3m
			63	125	250	500	1 k	2 k	4 k	8 k			
20.6	30%	Inlet	30.1	30.8	33.3	30.3	22.1	7.8	7.2	17.8	37.5	30.3	20.5
		Outlet	16.0	24.7	25.3	22.8	10.8	7.5	7.4	17.6	29.8	23.4	13.6
		Breakout	23.3	22.6	26.6	22.3	11.2	5.5	6.9	17.6	30.4	23.4	8.8
34.5	50%	Inlet	27.8	30.4	33.2	30.7	24.9	7.6	7.2	17.8	37.3	31.0	21.2
		Outlet	18.4	29.2	28.3	23.0	14.7	9.6	8.6	18.0	32.8	24.9	15.2
		Breakout	20.0	21.7	26.4	22.3	10.5	5.7	7.1	17.7	29.7	23.3	8.8
48.7	70%	Inlet	26.5	30.3	31.3	35.9	26.0	7.7	7.2	17.8	38.6	34.1	24.3
		Outlet	15.3	24.2	23.5	20.2	13.6	7.2	7.4	17.6	28.6	22.3	12.5
		Breakout	21.3	22.4	25.7	22.8	11.3	5.6	6.9	17.6	29.8	23.4	8.8
62.8	90%	Inlet	36.2	40.3	45.6	48.5	37.1	21.1	12.9	18.2	51.1	46.5	36.7
		Outlet	23.1	36.0	39.3	37.4	26.4	20.5	17.9	21.5	42.8	36.7	27.0
		Breakout	25.2	28.7	39.6	36.4	23.8	13.4	8.3	17.6	41.7	35.7	21.1
69.4	100%	Inlet	35.3	41.3	48.6	49.6	40.1	28.1	14.2	18.4	52.8	48.2	38.4
		Outlet	27.1	42.6	43.5	39.8	27.6	21.5	18.4	22.1	47.1	39.6	29.8
		Breakout	24.4	28.1	40.1	36.5	23.1	13.3	8.6	17.6	42.0	35.9	21.3

aircycle 1.3+ Acoustic Performance													
Airflow l/s	Speed %		Frequency Hz								Lw dB	LwA dB	LwA dB @3m
			63	125	250	500	1 k	2 k	4 k	8 k			
24.6	30%	Inlet	28.1	30.3	34.1	33.0	23.6	7.6	7.0	17.6	38.2	32.1	22.4
		Outlet	18.1	27.8	28.0	23.3	12.9	8.6	7.7	17.6	32.1	24.6	14.8
		Breakout	20.4	23.3	28.0	30.6	13.5	5.8	6.9	17.6	33.4	28.6	11.1
41.3	50%	Inlet	27.5	30.8	33.8	33.2	23.7	7.2	7.0	17.6	38.2	32.2	22.4
		Outlet	17.4	31.8	30.0	23.7	14.6	9.7	8.4	17.6	34.6	25.8	16.1
		Breakout	20.3	22.7	27.7	30.6	12.6	5.9	7.2	17.7	33.3	28.6	11.0
57.6	70%	Inlet	28.0	29.7	31.6	42.1	29.9	12.4	7.2	17.6	43.1	39.6	29.8
		Outlet	15.4	20.1	21.0	18.5	14.0	7.1	7.4	17.6	26.3	21.4	11.6
		Breakout	21.2	24.0	27.9	31.1	13.4	6.5	6.9	17.6	33.8	29.0	11.4
74.1	90%	Inlet	36.7	40.2	49.4	45.7	38.0	22.9	14.5	18.4	51.7	45.7	35.9
		Outlet	24.6	39.3	41.6	37.6	28.2	22.6	20.1	22.9	44.8	37.9	28.1
		Breakout	27.0	30.1	40.0	38.9	26.9	15.2	9.2	17.5	43.0	37.6	20.0
82.4	100%	Inlet	35.8	39.6	45.4	46.8	38.7	24.1	15.3	18.5	50.2	45.6	35.8
		Outlet	22.7	38.4	42.8	37.6	29.2	23.0	20.5	24.0	45.2	38.5	28.7
		Breakout	26.5	28.9	40.6	38.6	27.1	15.3	9.8	17.6	43.1	37.6	20.0

Tested according to BS EN 13141-7:2010: Breakout quoted spherical. Supply and extract quoted hemispherical. For sound data at a specific airflow duty, please contact us directly for a bespoke acoustic schedule for your project. Further sound data at increasing pressure (Pa) levels is also available in the O&M manual.

aircycle 1.3 Range Specification

Weight: 11kg Guarantee Period: 5 Years

Materials:

- Main enclosure: High density, impact resistant EPP (Expanded Polypropylene)
- PCB & control panel enclosure: ABS FR
- Filters: Polyester media (G3)
- Filter cover: Rubber
- Mounting Bracket: Zinc Plated Steel
- Fan Scrolls: ABS
- Digital Control Enclosure: ABS

SmartFlow Controller Features:

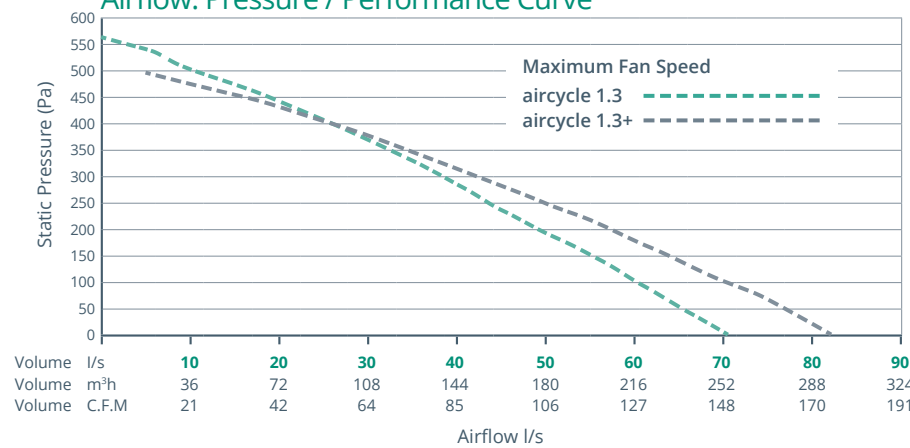
- Three independent power levels for intake and output fans (Trickle, Boost and Purge)
- Manually activated and timed Purge mode
- Quiet night mode
- Overheat mode
- Automatically reduced internal temperature
- Adjustable power boost by a humidity sensor
- Ventilation power boost by an external signal with a timer (motion sensor, light switch, etc.)
- Automatic algorithmic bypass control
- Heat exchanger frost protection
- Temperature and humidity display
- Time until filter replacement and filter replacement reminder
- Fan fault warning
- Firmware upgrade via USB
- Import/export of settings
- Compatible with building management systems via RS485
- Online monitoring and control
- External preheater control

Standards: Fully complies with Building Regulations for UK & Ireland
SAP Appendix Q Listed | DEAP Listed | Energy Savings Trust Best Practice | CE

SAP Appendix Q: Listed Results

Configuration	aircycle 1.3				aircycle 1.3+			
	Specific Fan Power (W/l/s)		Heat Exchange Efficiency (%)		Specific Fan Power (W/l/s)		Heat Exchange Efficiency (%)	
	SAP 2009	SAP 2012	SAP 2009	SAP 2012	SAP 2009	SAP 2012	SAP 2009	SAP 2012
Kitchen + 1 Wet Room	0.51	0.57	92	90	0.42	0.45	88	87
Kitchen + 2 Wet Rooms	0.54	0.68	90	87	0.43	0.54	87	84
Kitchen + 3 Wet Rooms	0.63	0.85	88	85	0.5	0.67	85	83
Kitchen + 4 Wet Rooms	0.75	1.1	86	84	0.6	0.87	84	81
Kitchen + 5 Wet Rooms	0.91	-	85	-	0.72	-	83	-
Kitchen + 6 Wet Rooms	1.08	-	84	-	0.85	-	81	-

Airflow: Pressure / Performance Curve

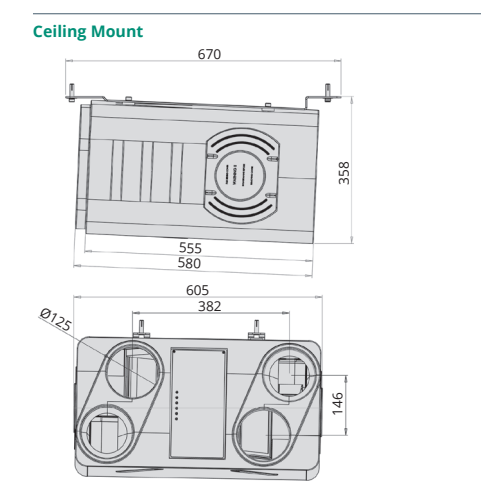
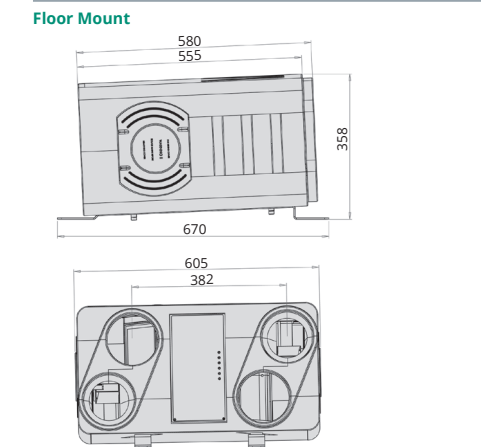
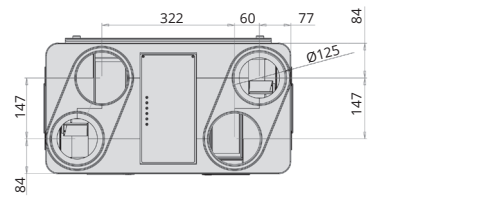
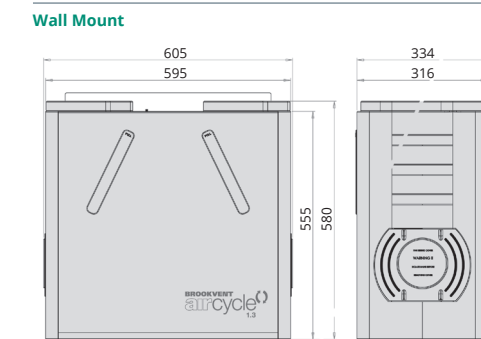
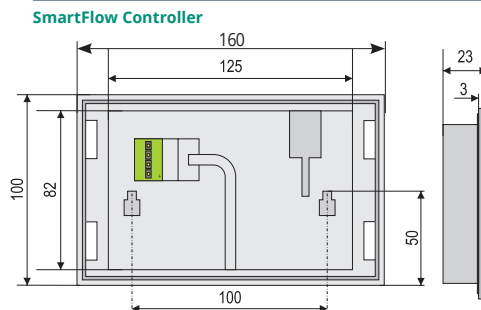


Product Description	AirCycle 1.3 Product Code	AirCycle 1.3+ Product Code
Wall Mount - c/w Integral Humidistat & Bypass	AS 90-0103-WDS-01	AS 90-0103P-WDS-01
Floor Mount - c/w Integral Humidistat & Bypass	AS 90-0103-FDS-01	AS 90-0103P-FDS-01
Ceiling Mount - c/w Integral Humidistat & Bypass	AS 90-0103-CDS-01	AS 90-0103P-CDS-01

Product codes shown refer to 'standard' duct configuration. Add 'V' to the end of each product code for an 'inverted' duct configuration.

Product Description	MVHR Unit + SmartFlow Controller code
SmartFlow Controller Kit AC 1.3	AR 90-01-294

Product Dimensions (mm)



BROOKVENT aircycle 1.3 DIGITAL RANGE

QUIET, EFFICIENT AND HIGHLY VERSATILE

Heat Recovery Ventilation



Domestic HVAC Product of the Year



Range down to **0.42 W/l/s** SPECIFIC FAN POWER

Range up to **92%** HEAT RECOVERY EFFICIENCY

Suitable for Small to Medium Dwellings and Apartments

BROOKVENT
aircycle
1.3

5 Year
Manufacturers
Guarantee

ENGINEERED FOR RELIABILITY

in a range of options to meet your project demands



The **aircycle 1.3** range operates by efficiently recovering heat from the air extracted from wet rooms (bathroom, kitchen etc.) that would normally be expelled to the atmosphere.

This heat is then transferred to the fresh air being drawn into the system, which is then filtered and distributed throughout the habitable rooms (living room, bedroom etc.).

The **aircycle 1.3** range can significantly reduce the space heating demand of a property whilst also delivering a healthier and more comfortable indoor environment for the occupier.

Core Features

- Up to 92% heat recovery efficiency
- Down to 0.42 W/l/s specific fan power
- 4 Airflow modes (100% variable): Night, General, Boost, Purge
- Programmable 25%+ boost setting
- Remote digital control (SmartFlow Controller)
- Status & airflow mode Indication
- Filter maintenance alert
- Fault alert
- Hours run meter
- 230V Auto-boost compatible
- Integral humidistat
- Automated frost protection
- Automatic Summer bypass, 100% filtered
- Variable boost over-run timer



UNRIVALLED PERFORMANCE

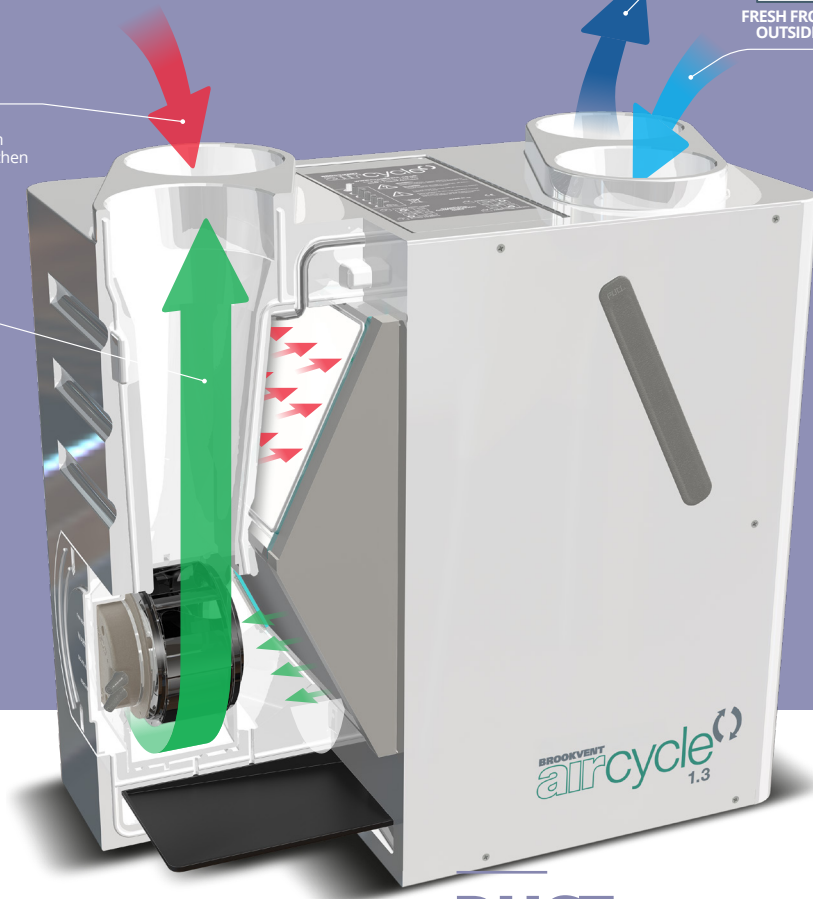
delivered by true innovation



Warm, moisture-laden, polluted air extracted from wet rooms (bathroom, kitchen etc.)



Warm, filtered, fresh air supplied to the habitable rooms (living room, bedroom etc.)



Range down to 0.42 W/l/s Specific Fan Power

Streamlined, low-turbulence airflow path design coupled with state of the art EC fan technology ensures the **aircycle 1.3** range has one of the lowest power consumption (W) per volume of air (l/s) outputs in its class, minimising running costs and setting a new standard in HRV system efficiency.

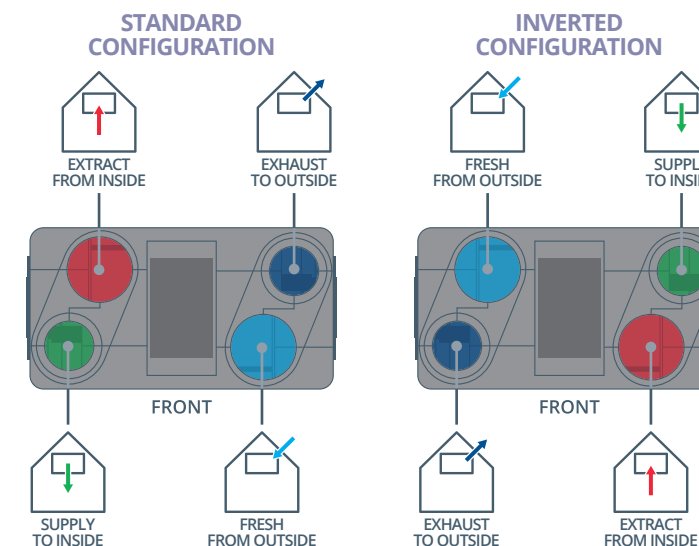
Range up to 92% Heat Recovery Efficiency

Incorporating the market leading Recair™ counter-flow, air-to-air heat exchanger, the **aircycle 1.3** range succeeds in transferring up to 92% of the heat from the extract air being taken from the wet rooms to that of the fresh air supply stream.

This ensures high levels of indoor air quality can be maintained while greatly minimising heat loss.

DUCT CONFIGURATION Set-up

The ducting configuration of **aircycle 1.3** range is factory set and supplied to order, changing the external duct connections from the right to the left of the system as required for specific property types thus minimising ducting runs, system pressure and installation time.



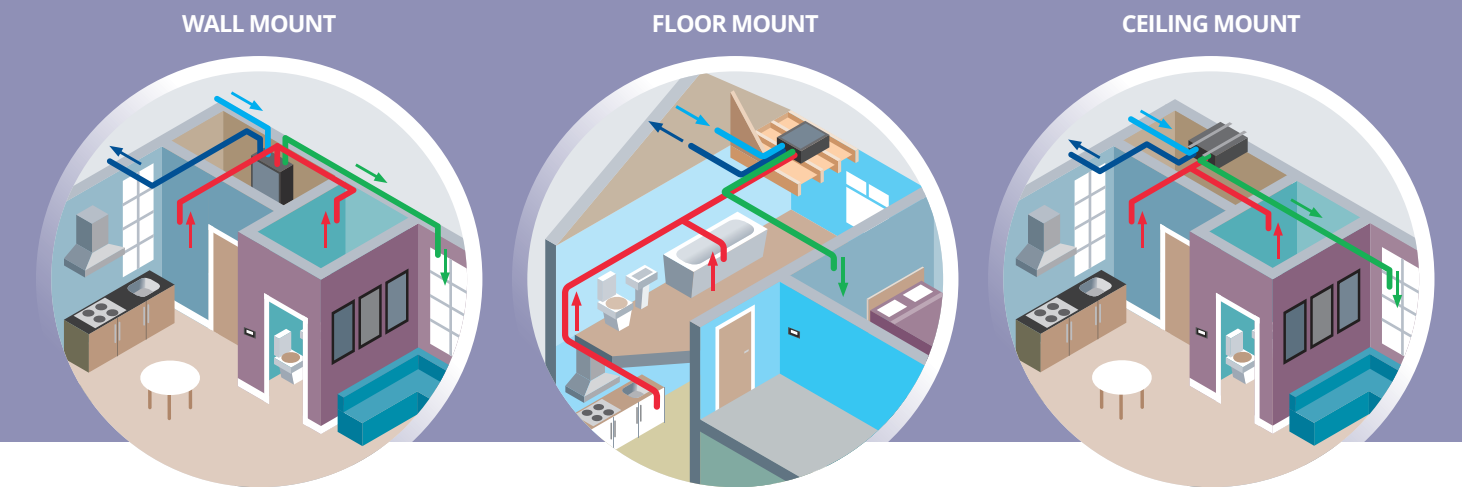
VERSATILE INSTALLATION

options for a quick and easy fit

Suitable for
Small to Medium
Dwellings and
Apartments

WALL, FLOOR or CEILING Mount

Three different mounting types to suit your project requirements. One performance standard. Zero compromise. Unlike competitor products, the intelligent design of the **aircycle 1.3** range allows it to be supplied in wall, floor or ceiling mount while retaining the same high efficiency, low specific fan power and airflow performance.



REMOTE DIGITAL CONTROL (SmartFlow Controller)

The **SmartFlow Controller** is an advanced ventilation management system designed for efficiency, comfort, and reliability. It offers four customizable fan speed modes — **Trickle, Boost, Purge** and **Night** — allowing precise control of supply and exhaust airflow. The **Purge mode** can also be activated manually for quick air exchange.



For quiet operation during the night, SmartFlow includes a **Night Mode**, while automatic **overheat protection** helps maintain a comfortable indoor temperature (**Overheat Mode**).

Ventilation performance can automatically increase based on **humidity sensor**, or external signals such as a **motion detector** or **light switch**.