

## VORT QUADRO RANGE

### Centrifugal duct fans

Centrifugal fans for wall or ceiling installation, designed for the ventilation of residential and commercial premises whose layout requires ducting of the exhaust. The elegant front panel which hides the hole behind it reduces the aesthetic impact of the installed product.


#### Key features

- Closed front panel that confers a modern image to the product and facilitates its cleaning.
- Reduced exhaust sleeve depth, compatible with installation immediately upstream of a 90° bend.
- Decentralised exhaust which, with the 360° adjustable front panel, amplifies the range of possible installations
- 2 or 3-speed motors for the best balance between performance, consumption and sound emissions.
- High protection from water, suitable for use in Zone 1 bathroom installations and in the presence of high relative humidity.

#### Version

11 models, different in size, performance and supply, also available in versions with timer and relative humidity sensor.

#### Technical features

- White, shock-proof, plastic resin (ABS) casings prevent ageing caused by exposure to sunlight ("UV resistant").
- 3-speed fan motors, obtained from the combination of:
  - Heat protected motors with shafts mounted on ball bearings to guarantee long lasting continuous service (at least 30,000 h) at the maximum plate temperature. Speed adjustment using VORTICE accessory devices.
  - Forward-curved centrifugal impellers moulded in plastic resin, resistant to aggressive agents.
- 3-position speed selector, including ON/ OFF command, compatible with wall and recessed box installation as per standard UNI 503.
- Dishwasher-safe air filters in PU.
- Non-return valves integrated on the exhaust ducts to prevent unwanted inflows of air and bad odours when the appliance is switched off.
- T models equipped with electronic timer for automatic product switch-off after a pre-fixed period of time, which can be set in the installation phase, from 3'-20' (default setting 3').
- T-HCS models equipped with circuit board with relative humidity sensor (RH), adjustable to 4 predefined threshold levels (60%, 70%, 80%, 90 %), alternatively can be set during installation, which determines automatic fan activation. The board integrates an electronic timer for automatic shut-down of the product after return to a RH below the pre-set threshold. The duration of the timer can be set at installation within the interval 3'-20' (default setting 3').
- Class of electric isolation: II  (earthing not required).



Design: F. Trabucco & Associates





## RANGE

	BASIC	TIMER	TIMER HCS
MICRO 80	11638 MICRO 80	11648 MICRO 80 T	-
MICRO 100	11936 MICRO 100	11940 MICRO 100 T	11945 MICRO 100 THCS
MEDIO	11944 MEDIO	11946 MEDIO T	11975 MEDIO THCS
SUPER	11952 SUPER	11954 SUPER T	11989 SUPER THCS



## TECHNICAL DATA

MODELS	V~50HZ	W min/max	A min/max	RPM min/max	MAX AIRFLOW		MAX PRESSURE		Lp dB(A) 3m min/max	MAX °C	KG
					m <sup>3</sup> /h min/max	l/s min/max	mmH <sub>2</sub> O min/max	Pa min/max			
MICRO 80	220-240	19 27	0.10 0.13	1150 1580	60 85	17 24	22 27	216 265	28.7 37.0	50	1.79
MICRO 100	220-240	20 28	0.10 0.13	1180 1600	65 90	18 25	16 22	157 216	32.3 39.2	50	1.80
MEDIO	220-240	25 29	0.14 0.18	1150 1890	70 120	19 33	22 34	216 329	36.7 43.4	50	2.50
SUPER	220-240	50 105	0.36 0.50	1400 2200	140 280	38 77	23 50	226 490	41.9 48.6	50	3.77

**VORT QUADRO RANGE**  
CENTRIFUGAL DUCT FANS

**VORT QUADRO RANGE | TECHNICAL DATA FOR REGULATION N° 1254/2014/UE**

	UNIT OF MEASURE	MICRO 80	MICRO 100	MEDIO
Supplier's name or trade mark	-	VORTICE	VORTICE	VORTICE
Specific Energy Consumption class SEC in average climate zone	-	NA	NA	NA
Specific Energy Consumption class SEC average	-	-0,5	0.0	0
Specific Energy Consumption class SEC cold	kWh/m <sup>2</sup> year	-13.9	-13.3	-14
Specific Energy Consumption class SEC warm	-	7,2	7,7	7
Declared typology	-	RVU-U**	RVU-U**	RVU-U**
Type of drive	-	NA	NA	VSD****
Type of heat recovery system HRS	-	none	none	none
Thermal efficiency of heat recovery at reference air flow	%	NA	NA	NA
Maximum flow rate	m <sup>3</sup> /h	95	92	103
Electric power input of the fan drive, including any motor control equipment, at maximum flow rate	W	28.7	28.1	29,4
Sound power level LWA	LWA [DB(A)]	58	60	64
Reference flow rate	m <sup>3</sup> /s	0.0185	0.0179	0.0286
Reference pressure difference	Pa	148	196	141
SPI	W/(m <sup>3</sup> /h)	0.39098	0.40683	0.398
Control factor CTRL	-	1	1	1
Control typology	-	manual	manual	manual
Maximum internal leakage rates	%	NA	NA	NA
Maximum external leakage rates	%	NA	NA	NA
Mixing rate	-	NA	NA	NA
Position and description of visual filter warning	-	NA	NA	NA
Airflow sensitivity to pressure variations at + 20 Pa and – 20 Pa	-	NA	NA	0,10
Indoor/outdoor air tightness	m <sup>3</sup> /h	NA	NA	NA
Annual electricity consumption (AEC)	kWh electricity/year	539	561	549
AHS average Annual heating saved	-	1397	1397	1397
AHS cold Annual heating saved	kWh primary energy/year	2732	2732	2732
AHS warm Annual heating saved	-	632	632	632

\* RVU-U: Unit Ventilation Residential - Unidirectional - \*\*NRVU-U: Unit Ventilation Non Residential - Unidirectional - \*\*\*MSD: Multi-Speed Drive - \*\*\*\*VSD: Variable-Speed Drive - NA: Not applicable

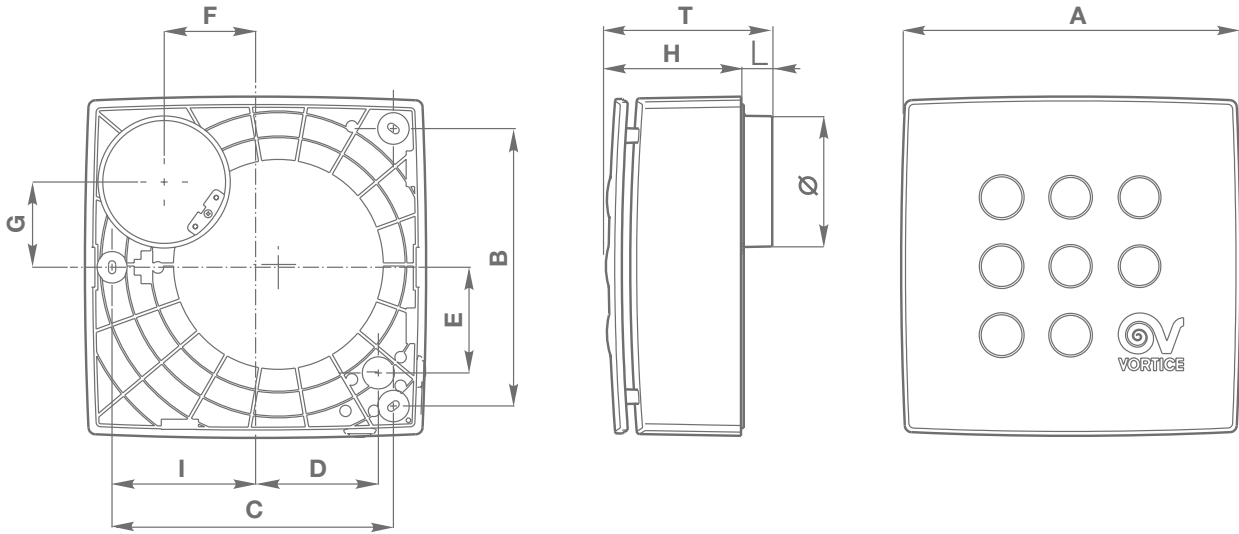
**VORT QUADRO RANGE | TECHNICAL DATA FOR REGULATION N° 1254/2014/UE**

	UNIT OF MEASURE	SUPER
Supplier's name or trade mark	-	VORTICE
Declared typology	-	NRVU-U**
Type of drive	-	VSD***
Type of heat recovery system HRS	-	None
Thermal efficiency of heat recovery	-	NA
Nominal NRVU flow rate	m <sup>3</sup> /s	0,05556
Effective electric power input	kW	0,090
SFPint	W/(m <sup>3</sup> /h)	NA
Face velocity at design flow rate	m/s	7,528
Nominal external pressure (Δps,int)	Pa	200
Internal pressure drop of ventilation components (Δps,int)	Pa	245
Internal pressure drop of non-ventilation components (Δps,int)	Pa	0
Static efficiency of fans used in accordance with Regulation (EU) N. 3272011	%	27,5
Declared maximum internal leakage rate of the casing of ventilation units	%	NA
Declared maximum external leakage rate of the casing of ventilation units	%	4,2
Energy performance energy or classification of the filters	-	NA
Description of visual filter warning	%	NA
Casing sound power level (LWA)	dB(A)	69

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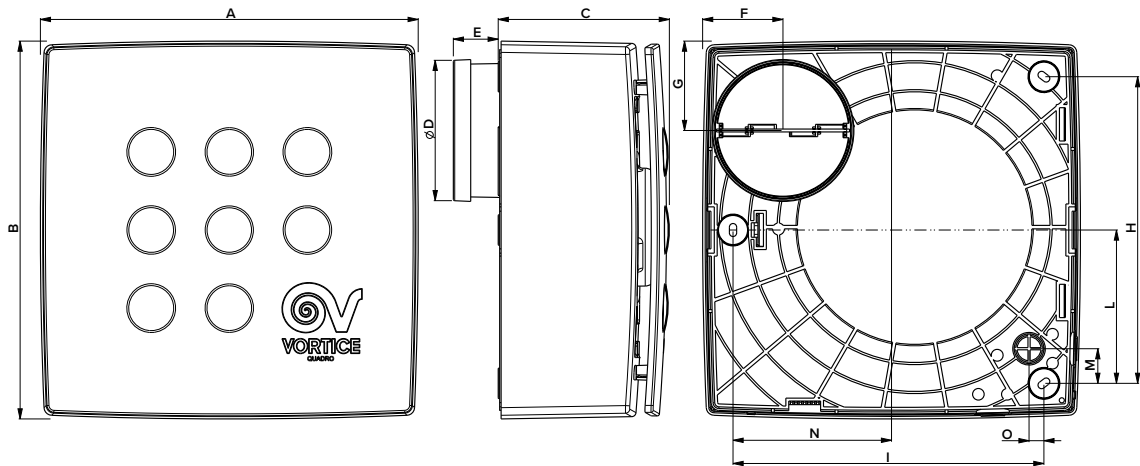


## DIMENSIONS



MODELS	□ A	B	C	D	E	F	G	H	I	L	T	Ø
MICRO 80	239	195	197	85	74	64	60	97	100	20	117	73.5
MICRO 100	239	195	197	85	74	64	60	97	100	20	117	92.5/97

Dimensions (mm)



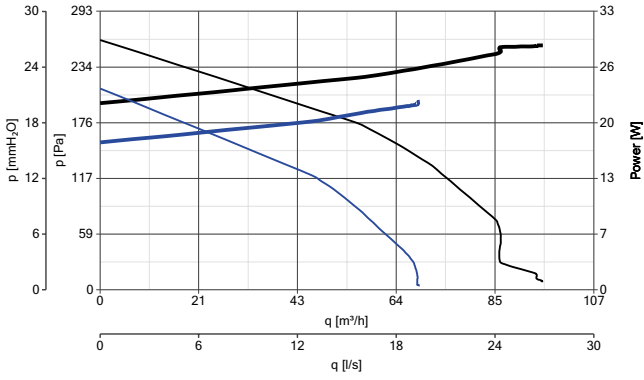
MODELS	□ A	B	C	D	E	F	G	H	I	L	M	N	O
MEDIO	261	261	119	97	31	55,5	62	212	215	106	24	110	10
SUPER	290	290	144	97	31	58	64	236	239	118	26	125	6,5

Dimensions (mm)

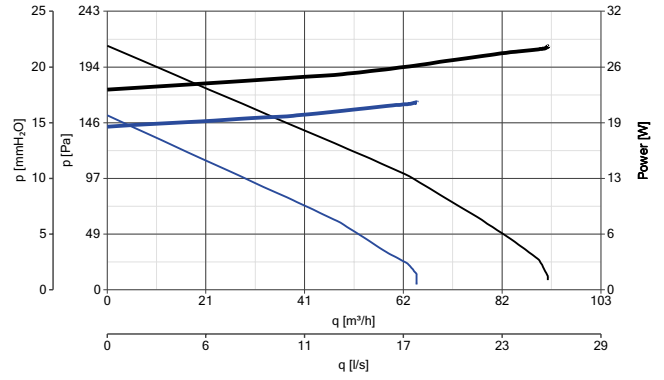
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PERFORMANCE CURVES

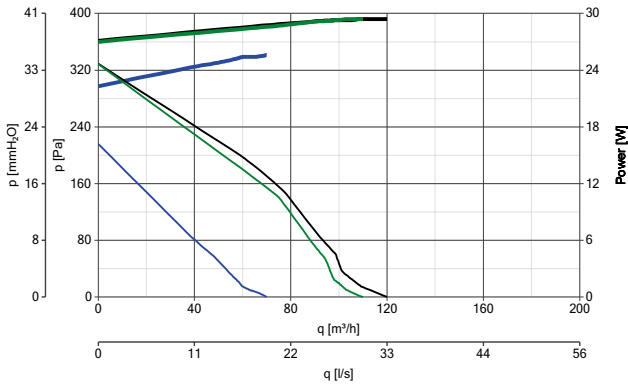
MICRO 80



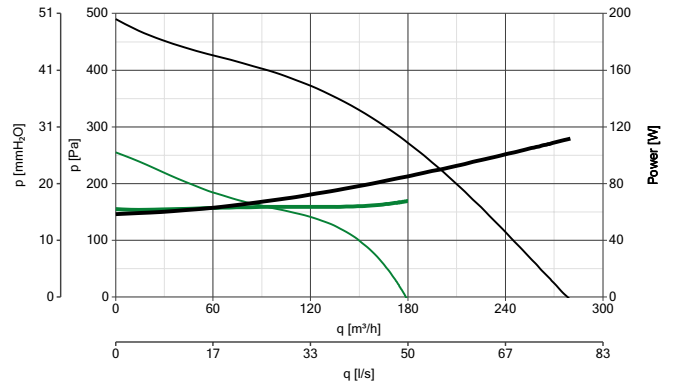
MICRO 100



MEDIO



SUPER



PERFORMANCE CURVES  
 — Speed 1  
 — Speed 2  
 — Speed 3

POWER CONSUMPTION  
 — Speed 1  
 — Speed 2  
 — Speed 3

PERFORMANCE CURVES  
 — min  
 — max

POWER CONSUMPTION  
 — min  
 — max