

Description RD EC

Horizontal outlet EC roof fan with efficiency-optimised aluminium casing and newly developed high-performance centrifugal impeller.

Description VD EC

Vertical outlet EC roof fan with efficiency-optimised aluminium casing and newly developed high-performance centrifugal impeller.

Common features RD EC and VD EC

Casing
 Made of sea water-resistant aluminium with integrated tamper protection. Motor support plate and base plate with inlet nozzle made of galvanised steel. Base plate with threaded screws for attachment of inlet-side accessories (hole pattern according to DIN 24155).

Impeller
 High-performance centrifugal impeller with backward curved blades made of plastic. Dynamically balanced according to DIN ISO 21940-11 – quality grade 6.3.

Drive
 Energy-saving, speed-controllable EC external rotor motor with the highest level of efficiency. Maintenance-free and radio interference-free, ball bearing mounted.

Motor protection
 Integrated electronic temperature monitoring system for EC motor and electronics.

Electrical connection
 ND 180 – 250 to external terminal box in protection category IP65.

Protection grille
 On outlet side as standard according to DIN EN ISO 13857.

Power control
 Continuously variable speed control via internal (delivery) or external potentiometer or continuously variable speed control with universal control system.

Delivery

Units are ready-for-connection, fully pre-assembled in the shipping box /wooden crate.

Noise

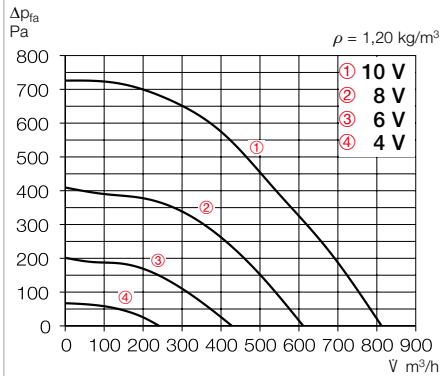
The total level and range are specified above the performance diagram for:

- Inlet side sound power
 - Outlet side sound power.
- The case-radiated noise as sound pressure at 4 m (free field conditions) is also specified in the type table and the table below the performance curve.

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Performance curves RDW EC 180

Frequency	Hz	Tot.	125	250	500	1k	2k	4k	8k
L _{WA} Inlet side		dB(A) 72	54	60	64	66	67	64	58
L _{WA} Outlet side		dB(A) 75	56	64	66	69	70	67	62

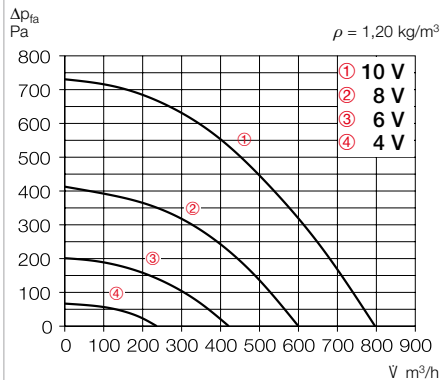


Free blowing						
Voltage V	n min ⁻¹	V m ³ /h	P W	I A	Lp dB(A)	SFP kW/m ³ /s
10	3962	812	138	1.19	60	0.61
8	2967	611	63	0.55	53	0.37
6	2077	428	25	0.22	43	0.21
4	1199	241	7	0.08	30	0.11

Type	Ref. no.	Speed	Flow rate Free blowing	Noise sound pressure	Power con- sumption	Current consump.		Wiring diagram	Max. air flow temp.		Wgt net	Speed potentiometer			
						at rated voltage	with control		at rated voltage	with control		Flush-mounted	Surf.-mounted		
		min ⁻¹	m ³ /h	dB(A) in 4 m	W	A	A	No.	°C	°C	kg	Type	Ref. no.	Type	Ref. no.
Single phase alternating current, 1~, 230 V, 50 Hz, EC motor, protection category IP44															
RDW EC 180	07125	3820	810	58	150	1.24	1.24	1149	50	–	4.9	PU 10	01734	PA 10	01735

Performance curves VDW EC 180

Frequency	Hz	Tot.	125	250	500	1k	2k	4k	8k
L _{WA} Inlet side		dB(A) 70	52	58	62	64	65	62	56
L _{WA} Outlet side		dB(A) 73	54	62	64	67	68	65	60



Free blowing						
Voltage V	n min ⁻¹	V m ³ /h	P W	I A	Lp dB(A)	SFP kW/m ³ /s
10	3952	797	139	1.17	58	0.62
8	2967	600	62	0.55	51	0.37
6	2077	421	24	0.22	41	0.21
4	1195	236	7	0.08	28	0.11

Type	Ref. no.	Speed	Flow rate Free blowing	Noise sound pressure	Power con- sumption	Current consump.		Wiring diagram	Max. air flow temp.		Wgt net	Speed potentiometer			
						at rated voltage	with control		at rated voltage	with control		Flush-mounted	Surf.-mounted		
		min ⁻¹	m ³ /h	dB(A) in 4 m	W	A	A	No.	°C	°C	kg	Type	Ref. no.	Type	Ref. no.
Single phase alternating current, 1~, 230 V, 50 Hz, EC motor, protection category IP44															
VDW EC 180	07123	3870	795	56	150	1.24	1.24	1149	50	–	5.2	PU 10	01734	PA 10	01735