

D3G283-AB32-11

EC centrifugal fan

forward-curved, dual-intake
with housing (large flange)



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Amtsgericht (court of registration) Stuttgart · HRB 590142

Nominal data

Type	D3G283-AB32-11	
Motor	M3G112-GA	
Phase		1~
Nominal voltage	VAC	230
Nominal voltage range	VAC	200 .. 277
Frequency	Hz	50/60
Method of obtaining data		ml
Status		prelim.
Speed (rpm)	min ⁻¹	1030
Power consumption	W	750
Current draw	A	3.4
Min. back pressure	Pa	150
Min. back pressure	in. wg	0.6
Min. ambient temperature	°C	-25
Max. ambient temperature	°C	40

ml = Max. load · me = Max. efficiency · fa = Free air · cs = Customer specification · ce = Customer equipment
Subject to change

Data according to Commission Regulation (EU) 327/2011 (EN 17166)

		Actual	Req. 2015			
01 Overall efficiency η_{es}	%	53.8	33.9	09 Power consumption P_{ed}	kW	0.24
02 Measurement category		A		09 Air flow q_v	m ³ /h	1205
03 Efficiency category		Static		09 Pressure increase p_{fs}	Pa	355
04 Efficiency grade N		63.9	44	10 Speed (rpm) n	min ⁻¹	1190
05 Variable speed drive		Yes		11 Specific ratio*		1.00

Data obtained at optimum efficiency level.

* Specific ratio = $1 + p_{fs} / 100\,000\text{ Pa}$

LU-107476

The efficiency values displayed for achieving conformity with the Ecodesign Regulation EU 327/2011 has been reached with defined air duct components (e.g. inlet rings).
The dimensions must be requested from ebm-papst. If other air conduction geometries are used on the installation side, the ebm-papst evaluation loses its validity/the conformity must be confirmed again.
The product does not fall within the scope of Regulation (EU) 2019/1781 due to the exception specified in Article 2 (2a) (motors completely integrated into a product).



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Technical description

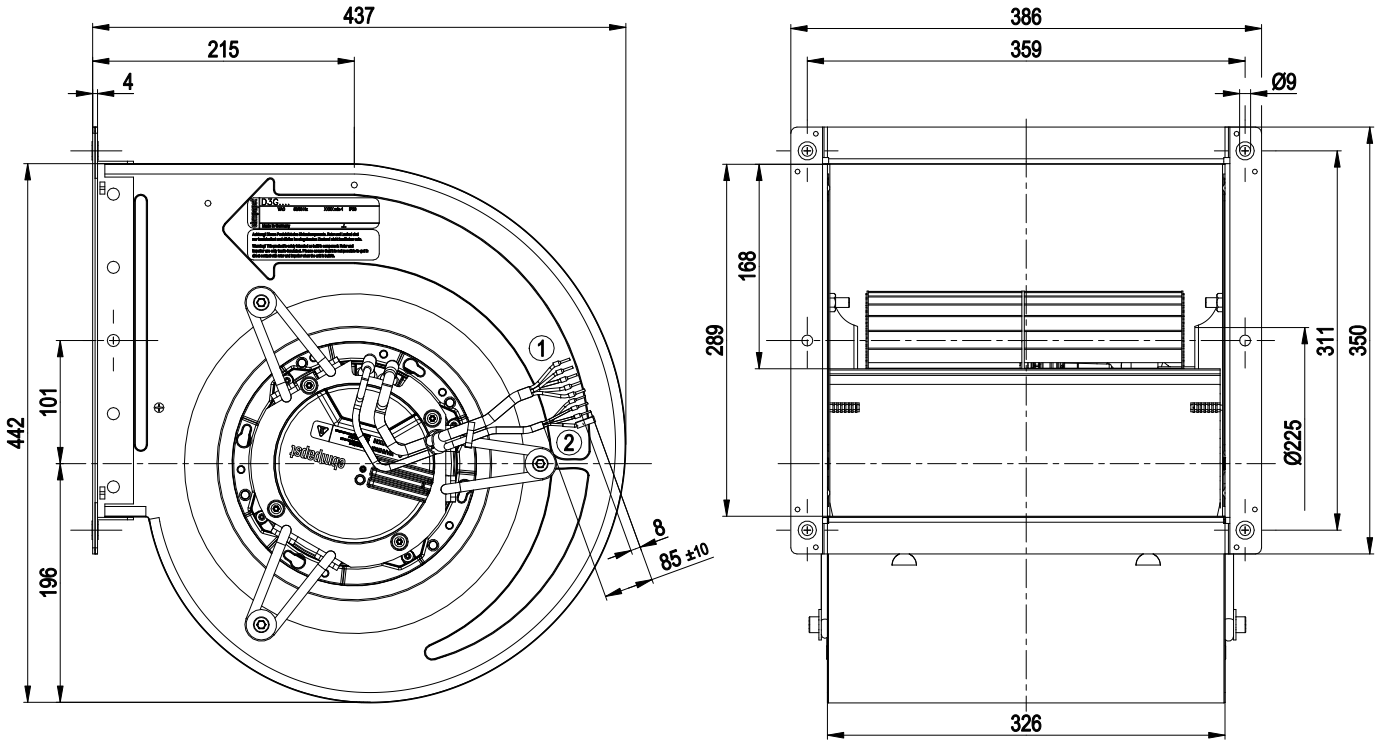
Weight	18.7 kg
Size	283 mm
Motor size	112
Rotor surface	Painted black
Electronics housing material	Die-cast aluminum
Impeller material	Sheet steel, galvanized
Housing material	Sheet steel, galvanized
Motor suspension	Motor mounted on brackets for one-sided vibration damping
Direction of rotation	Clockwise, viewed toward rotor
Degree of protection	IP54
Insulation class	"B"
Moisture (F) / Environmental (H) protection class	H1
Max. permitted ambient temp. for motor (transport/storage)	+80 °C
Min. permitted ambient temp. for motor (transport/storage)	-40 °C
Installation position	Shaft horizontal
Condensation drainage holes	None
Mode	S1
Motor bearing	Ball bearing
Technical features	<ul style="list-style-type: none"> - Output 10 VDC max. 10 mA - Alarm relay - Motor current limitation - PFC, active - Soft start - Control input 0-10 VDC - Control interface with SELV potential safely disconnected from supply - Thermal overload protection for electronics/motor - Undervoltage / phase failure detection
EMC immunity to interference	According to EN 61000-6-2 (industrial environment)
EMC circuit feedback	According to EN 61000-3-2/3
EMC interference emission	According to EN 61000-6-4 (industrial environment)
Touch current according to IEC 60990 (measuring circuit Fig. 4, TN system)	<= 3.5 mA
Motor protection	Thermal overload protector (TOP) internally connected
With cable	Variable
Protection class	I (with customer connection of protective earth)
Conformity with standards	UKCA; CE
Approval	EAC



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Product drawing



Cable length measured from electronics housing: 800+20 mm

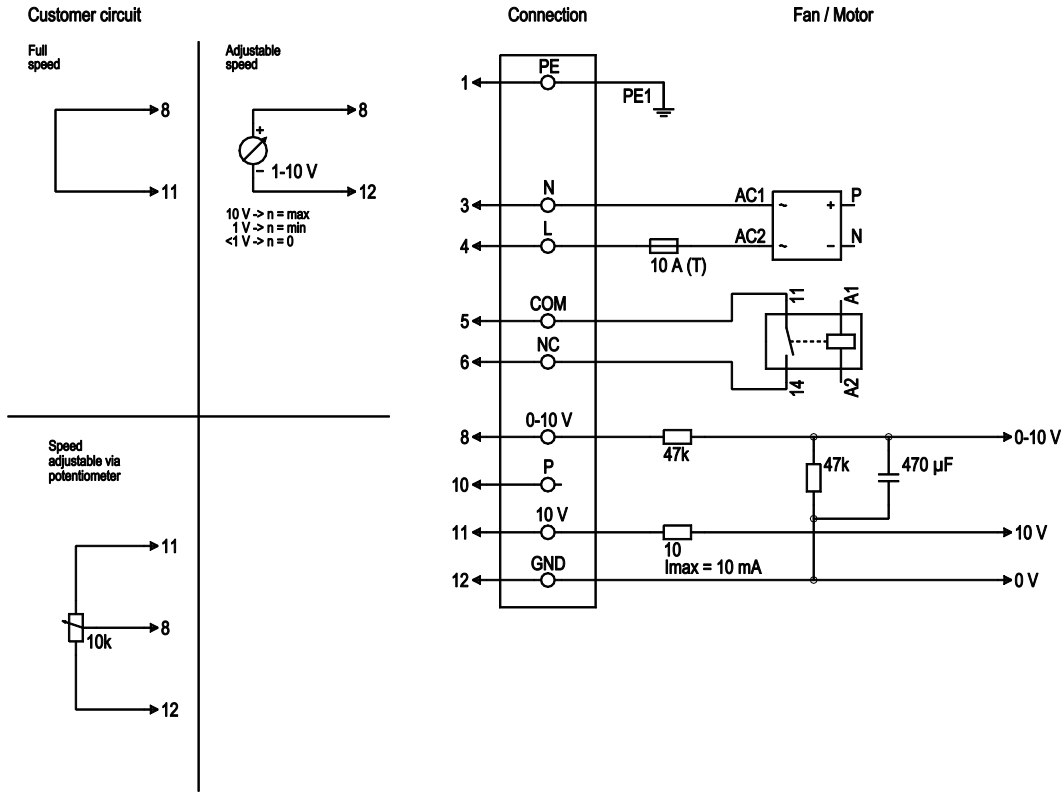
1	Cable PVC AWG18, 5x crimped ferrules
2	Cable PVC AWG22, 3x crimped ferrules



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Connection diagram



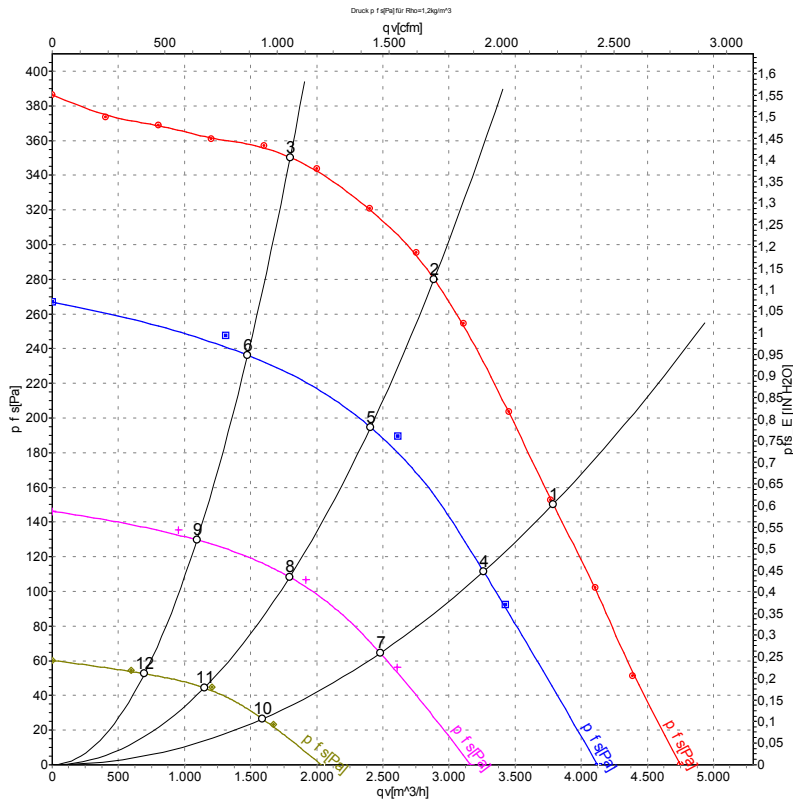
No.	Conn.	Designation	Color	Function/assignment
1	1	PE	green/yellow	Protective earth
1	3	N	blue	Power supply, neutral conductor, 50/60 Hz
1	4	L	black	Power supply, phase, 50/60 Hz
1	5	COM	white 1	Floating status contact, break for failure (2 A, max. 250 VAC, min. 10 mA, AC1)
1	6	NC	white 2	Floating status contact, break for failure
2	8	0-10 V	yellow	Control input, set value 0-10 VDC, impedance 100 kΩ, SELV
2	10	P	orange	not used
2	11	10 VDC	red	Voltage output 10 VDC (±3%), max. 10 mA, power supply for external devices (e.g. potentiometer), SELV
2	12	GND	blue	Reference ground for control interface, SELV



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Curves: Air performance 50 Hz



Measurement: LU-107476-1
Measurement: LU-107597-1
Measurement: LU-107598-1
Measurement: LU-107599-1

Air performance measured according to ISO 5801 installation category A. For detailed information on the measurement setup, contact ebm-papst. Intake sound level: Sound power level according to ISO 13347 / sound pressure level measured at 1 m distance from fan axis. The values given are valid under the specified measuring conditions and may vary due to conditions of installation. For deviations from the standard configuration, the parameters have to be checked on the installed unit.

Measured values

	U	f	n	P _{ed}	I	LpA _{in}	LwA _{in}	LwA _{out}	q _v	P _{fs}	q _v	P _{fs}
	V	Hz	min ⁻¹	W	A	dB(A)	dB(A)	dB(A)	m ³ /h	Pa	cfm	in. wg
1	230	50	1030	750	3.40	72	82	85	3785	150	2230	0.60
2	230	50	1100	574	2.61	68	78	83	2885	280	1700	1.12
3	230	50	1160	378	1.76	64	74	80	1800	350	1060	1.41
4	230	50	880	458	2.11	68	78	80	3260	112	1920	0.45
5	230	50	925	326	1.57	63	74	75	2405	199	1415	0.80
6	230	50	955	209	1.22	59	69	71	1475	240	870	0.96
7	230	50	675	209	0.99	61	71	74	2480	66	1460	0.26
8	230	50	695	150	0.74	57	67	70	1795	111	1055	0.45
9	230	50	715	102	0.57	51	61	64	1095	131	645	0.53
10	230	50	435	68	0.41	48	59	60	1590	27	935	0.11
11	230	50	445	52	0.32	43	53	54	1150	46	675	0.18
12	230	50	460	40	0.24	40	50	50	695	53	410	0.21

U = Voltage · f = Frequency · n = Speed (rpm) · P_{ed} = Power consumption · I = Current draw · LpA_{in} = Sound pressure level intake side · LwA_{in} = Sound power level intake side
LwA_{out} = Sound power level outlet side · q_v = Air flow · p_{fs} = Pressure increase

