

EC axial fan - HyBlade

sickle-shaped blades (S series)

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Amtsgericht (court of registration) Stuttgart · HRB 590142

Nominal data

Type	A3G300-AK13-01	
Motor	M3G055-CF	
Phase		1~
Nominal voltage	VAC	230
Nominal voltage range	VAC	200 .. 240
Frequency	Hz	50/60
Method of obtaining data		ml
Speed (rpm)	min ⁻¹	1500
Power consumption	W	85
Current draw	A	0.8
Max. back pressure	Pa	85
Max. back pressure	in. wg	0.34
Min. ambient temperature	°C	-25
Max. ambient temperature	°C	60

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



Technical description

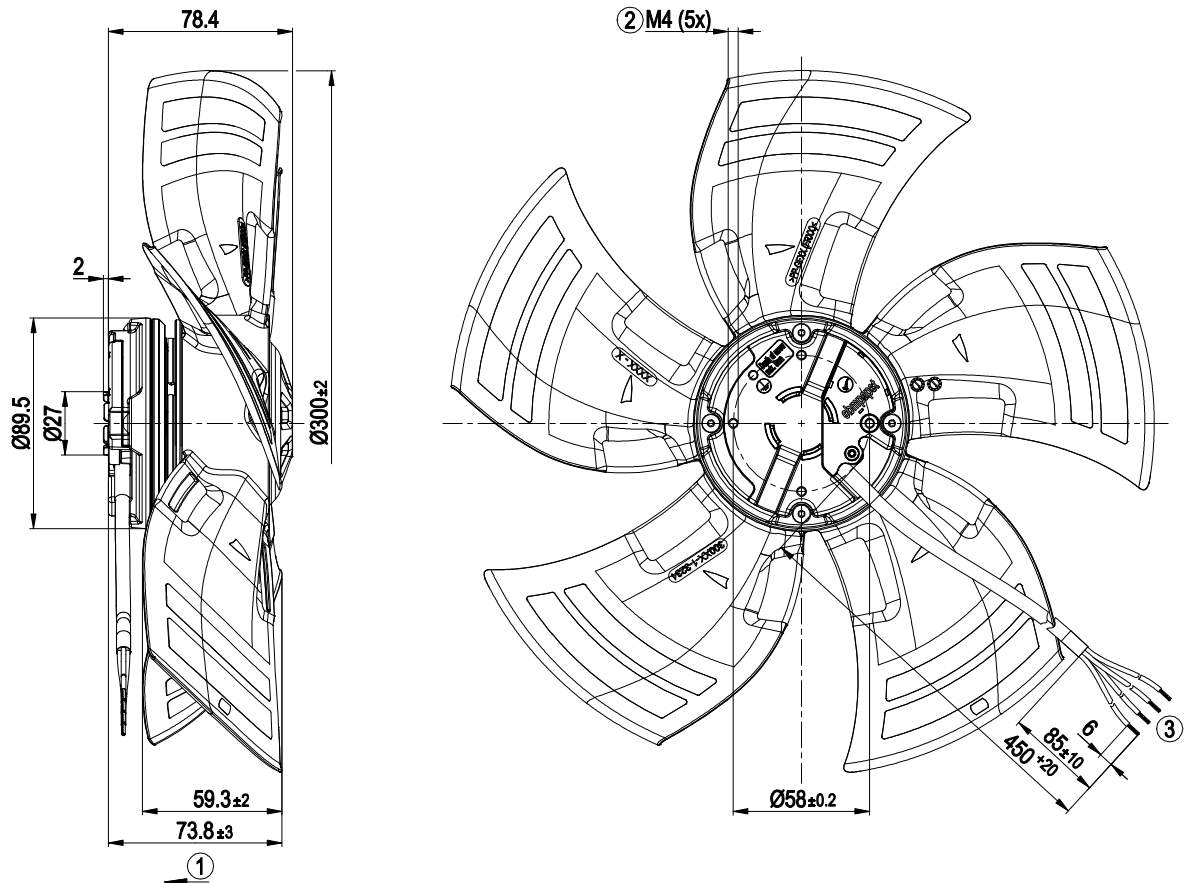
Weight	1.4 kg
Size	300 mm
Motor size	55
Rotor surface	Passivated
Electronics housing material	Die-cast aluminum
Blade material	Press-fitted sheet steel blank, sprayed with PP plastic
Number of blades	5
Airflow direction	V
Direction of rotation	Counterclockwise, viewed toward rotor
Degree of protection	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	Any
Condensation drainage holes	None, open rotor
Mode	S1
Motor bearing	Ball bearing
Technical features	- Speed setting input (230 V) - Power limiter - Motor current limitation - Soft start - Thermal overload protection for electronics/motor - Line undervoltage detection
Speed levels	2
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 61000-6-3 (household environment)
Touch current according to IEC 60990 (measuring circuit Fig. 4, TN system)	<= 3.5 mA
Motor protection	Electronic motor protection
With cable	Variable
Protection class	I (with customer connection of protective earth)
Conformity with standards	EN 60335-1; EN 60034-1; EN 60204-1; CE
Approval	CSA C22.2 No. 77 + CAN/CSA-E60730-1; CCC; EAC; UL 1004-7 + 60730-1



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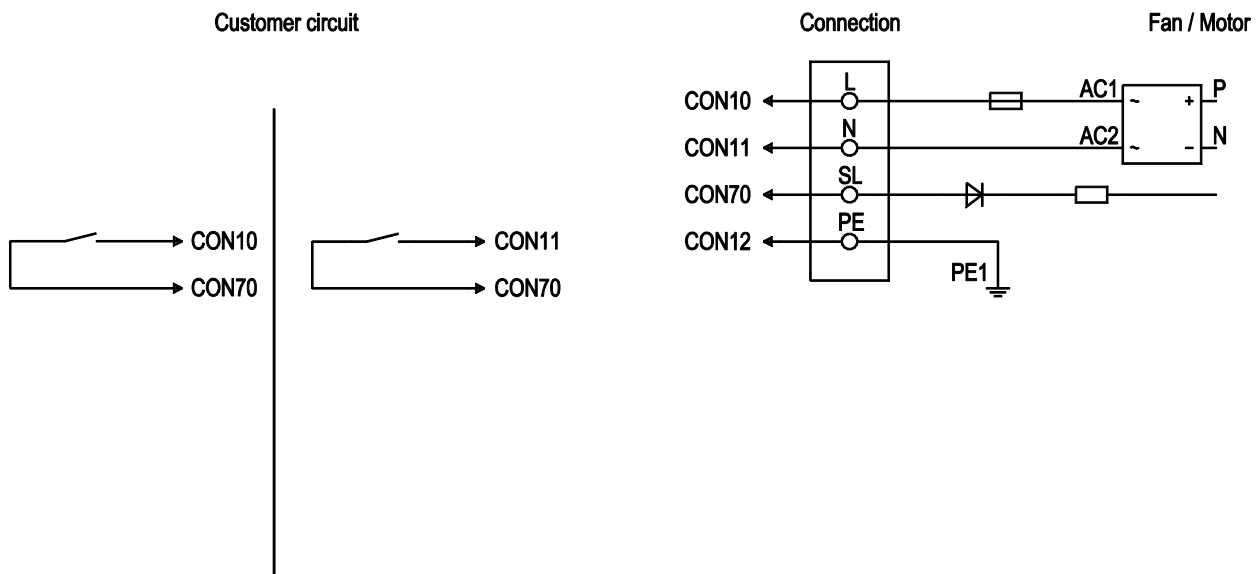
Product drawing



1	Airflow direction "V"
2	Max. clearance for screw 5 mm
3	Cable PVC 4G 0.5 mm ²
	4x splice

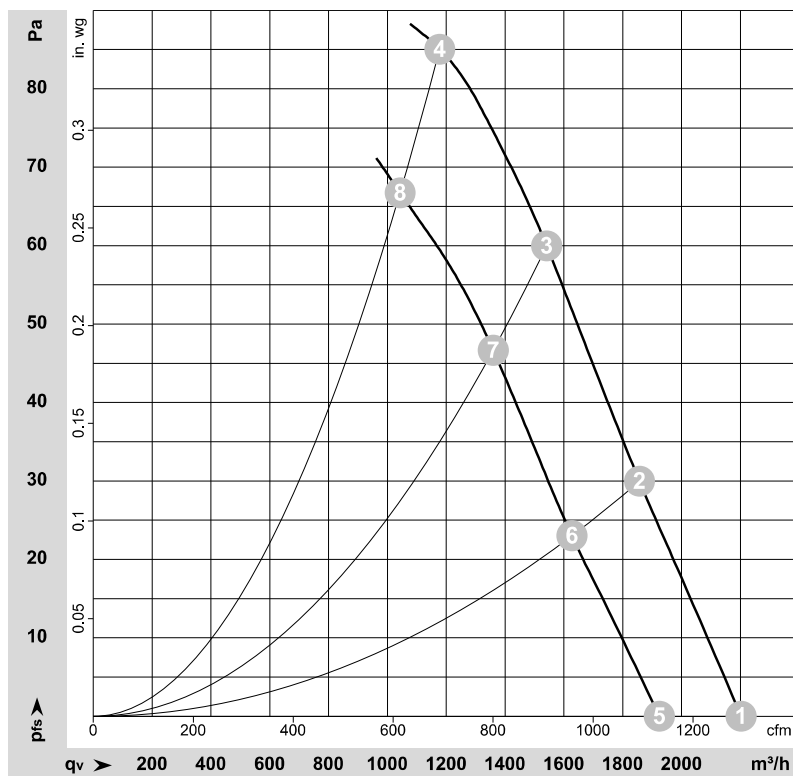


Connection diagram



No.	Conn.	Designation	Color	Function/assignment
	CON 10	L	black	Power supply 230 VAC, 50-60 Hz, see nameplate for voltage range
	CON 11	N	blue	Neutral conductor
	CON 12	PE	green/yellow	Protective earth
	CON 70	SL	brown	Speed selection: switch open speed 1; switch closed speed 2

Curves: Air performance 50 Hz



$$\rho = 1.15 \text{ kg/m}^3 \pm 2 \%$$

Measurement: LU-201146-1
Measurement: LU-201153-1

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

	Stage	Wired	U	f	n	P _{ed}	I	LpA _{in}	LwA _{in}	q _v	p _{rs}	q _v	p _{rs}
			V	Hz	min ⁻¹	W	A	dB(A)	dB(A)	m³/h	Pa	cfm	in. wg
1	1	1~	230	50	1640	69	0.62	56	63	2205	0	1295	0.00
2	1	1~	230	50	1600	76	0.67	56	63	1855	30	1095	0.12
3	1	1~	230	50	1570	80	0.70	56	64	1540	60	910	0.24
4	1	1~	230	50	1500	85	0.80	59	66	1180	85	695	0.34
5	2	1~	230	50	1435	47	0.45	53	60	1925	0	1135	0.00
6	2	1~	230	50	1405	52	0.49	53	60	1625	23	960	0.09
7	2	1~	230	50	1390	55	0.51	53	60	1360	47	800	0.19
8	2	1~	230	50	1360	59	0.54	55	62	1045	67	615	0.27

Wired = Wiring · 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
q_v = Air flow · p_{rs} = Pressure increase

