

EC axial fan

sickle-shaped blades (S series)
with guard grille for short nozzle

S1G250-AI79-49 ebmpapst Datasheet
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Nominal data

Type	S1G250-AI79-49	
Motor	M1G074-BF	
Nominal voltage	VDC	12
Nominal voltage range	VDC	8 .. 14
Method of obtaining data		fa
Speed (rpm)	min ⁻¹	2400
Power consumption	W	72
Current draw	A	6.3
Max. back pressure	Pa	110
Max. back pressure	inH ₂ O	0.44
Min. ambient temperature	°C	-25
Max. ambient temperature	°C	45

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



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Technical description

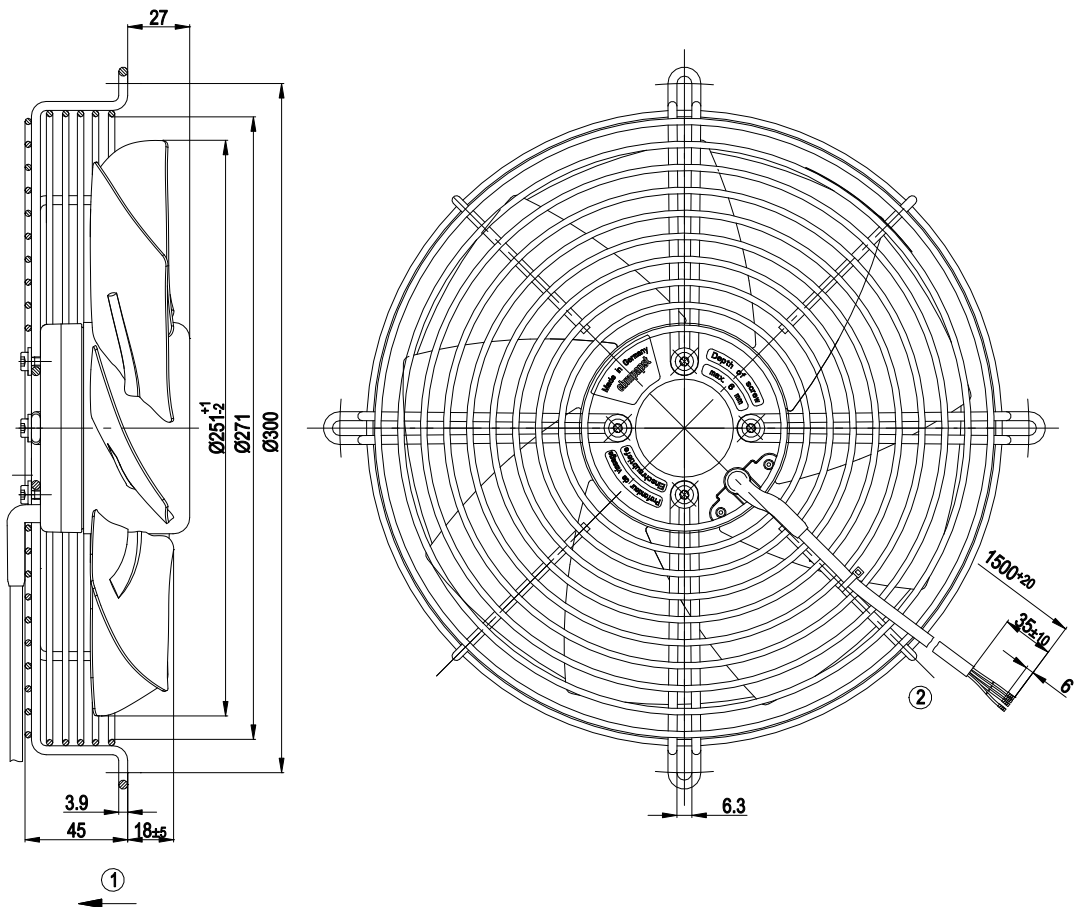
Weight	2.3 kg
Fan size	250 mm
Rotor surface	Painted black
Blade material	Sheet steel, painted black
Guard grille material	Steel, coated with black plastic (RAL 9005)
Number of blades	7
Airflow direction	"A"
Direction of rotation	Counterclockwise, viewed toward rotor
Degree of protection	IP42
Insulation class	"B"
Moisture (F) / Environmental (H) protection class	F3-1
Max. permitted ambient temp. for motor (transport/storage)	+ 80 °C
Min. permitted ambient temp. for motor (transport/storage)	- 40 °C
Installation position	Shaft horizontal or rotor on bottom; rotor on top on request
Condensation drainage holes	On rotor side
Mode	S1
Motor bearing	Ball bearing
Technical features	- Tach output - Motor current limitation - Soft start - Control input 0-10 VDC / PWM
Motor protection	Reverse polarity and locked-rotor protection
With cable	Lateral
Protection class	I (with customer connection of protective earth)
Approval	CSA C22.2 No. 77; UL 1004-1



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Product drawing



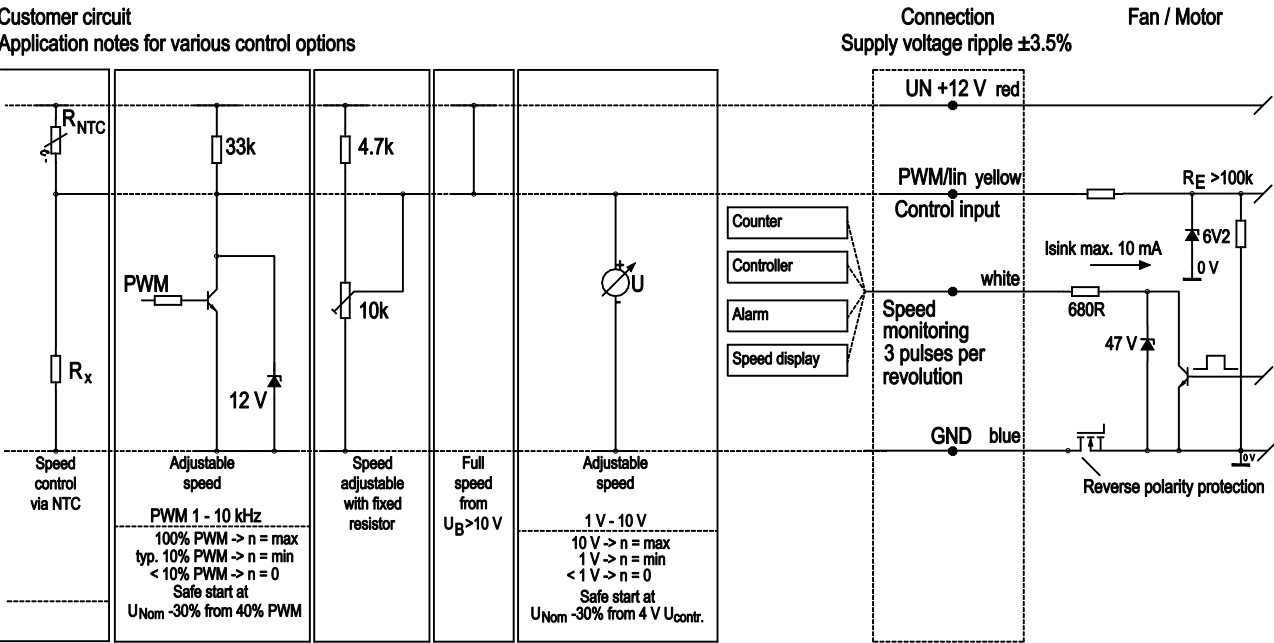
- | | |
|---|----------------------------------|
| 1 | Airflow direction "A" |
| 2 | Cable AWG 20, 4x crimped splices |



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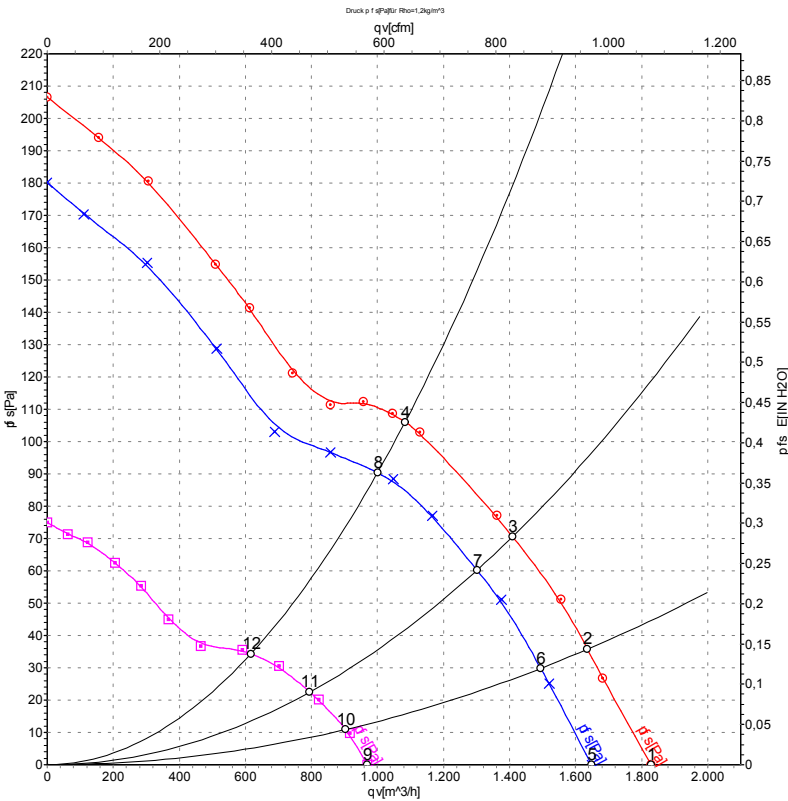
Connection diagram



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Curves: Air performance



Measurement: LU-53768-1
Measurement: LU-53767-1
Measurement: LU-53769-1

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	n	P _{ed}	I	qv	p _{fs}	qv	p _{fs}
	V	min ⁻¹	W	A	m ³ /h	Pa	CFM	inH ₂ O
1	14	2610	94	7.09	1830	0	1075	0.00
2	14	2515	98	7.46	1635	36	965	0.14
3	14	2410	101	7.73	1410	71	830	0.29
4	14	2335	103	7.95	1085	106	640	0.43
5	12	2400	72	6.30	1650	0	970	0.00
6	12	2300	75	6.65	1495	30	880	0.12
7	12	2230	78	6.94	1300	60	765	0.24
8	12	2170	82	7.25	1000	90	590	0.36
9	8	1440	17	2.54	970	0	570	0.00
10	8	1415	18	2.66	905	11	530	0.04
11	8	1380	18	2.81	795	22	470	0.09
12	8	1350	19	2.98	615	34	365	0.14

U = Power supply · n = Speed (rpm) · P_{ed} = Power consumption · I = Current draw · qv = Air flow · p_{fs} = Pressure increase

