

R1G225-AF11-21

EC centrifugal fan

backward-curved, single-intake



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Nominal data

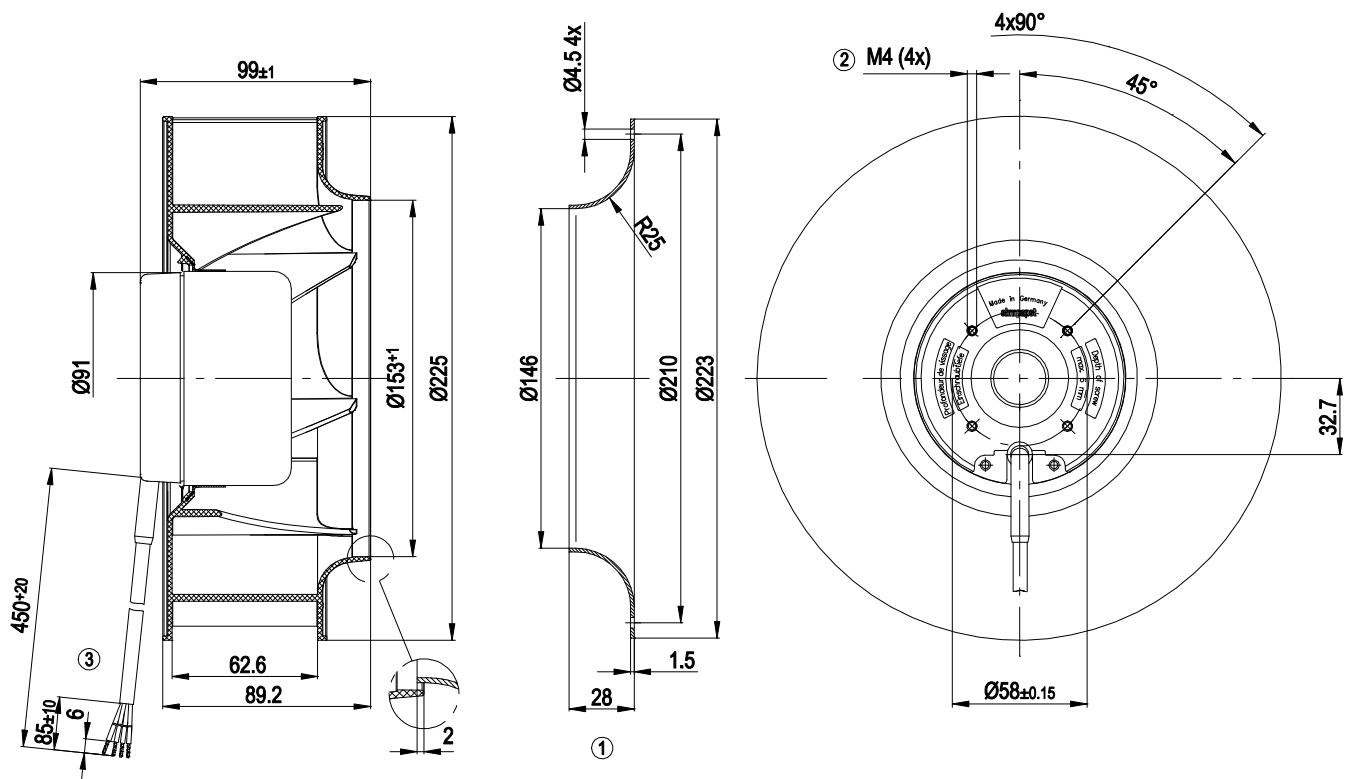
Type	R1G225-AF11-21	
Motor	M1G074-BF	
Nominal voltage	VDC	48
Nominal voltage range	VDC	36 .. 57
Method of obtaining data		fa
Speed (rpm)	min ⁻¹	2700
Power consumption	W	95
Current draw	A	2.2
Min. ambient temperature	°C	-25
Max. ambient temperature	°C	60

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

Technical description

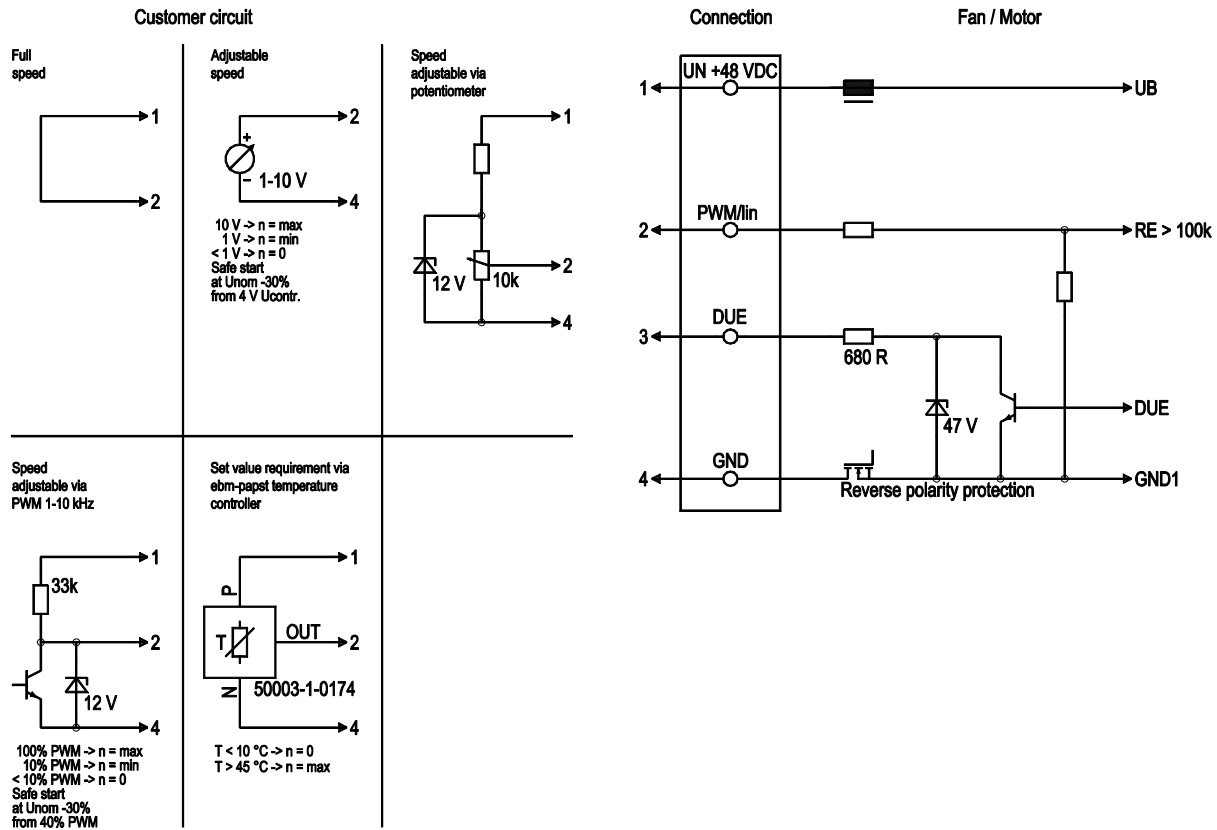
Weight	1.6 kg
Size	225 mm
Motor size	74
Rotor surface	Painted black
Impeller material	PA66 plastic, glass-fiber reinforced, sheet-metal plate painted black
Number of blades	7
Strength	Salt fog resistant per TELCORDIA GR-487-CORE, release no. 2, March 2000
Direction of rotation	Clockwise, viewed toward rotor
Degree of protection	IP44
Insulation class	"B"
Moisture (F) / Environmental (H) protection class	H2+
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
Mode	S1
Motor bearing	Ball bearing
Technical features	- Tach output - Motor current limitation - Soft start - Control input 0-10 VDC / PWM - Reverse polarity protection
EMC immunity to interference	According to EN 61000-6-2
EMC interference emission	According to EN 61000-6-3
With cable	Variable
Protection class assignment	III; Supply with safety extra-low voltage SELV. The built-in component has several local protection class assignments. The final protection class is determined by the intended installation.
Conformity with standards	EN 62368-1
Comment on CE	Ecodesign Directive 2009/125/EC + Fan Directive (EC) No. 327/2011 does not apply, as power consumption <125W.
Approval	CCC; UL 1004-1; CSA C22.2 No. 77

Product drawing



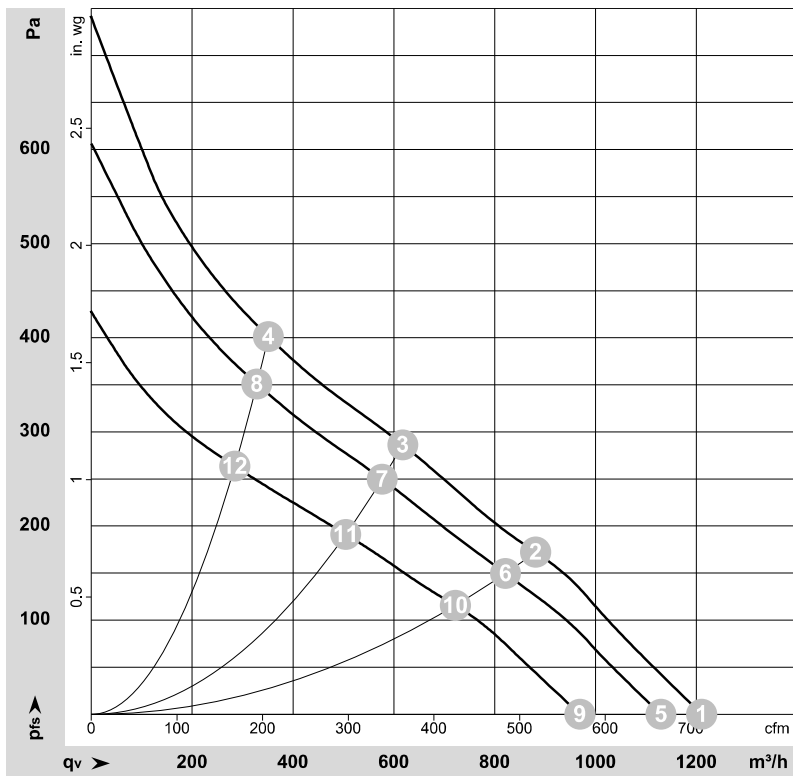
1	Cable AWG20, 4x crimped splices
2	Accessory part: inlet ring 96358-2-4013 not included in scope of delivery
3	Max. clearance for screw 6 mm

Connection diagram



No.	Conn.	Designation	Color	Function/assignment
1	1	Un +48 VDC	red	Power supply 48 VDC, maximum ripple 3.5%
1	2	0-10 VDC	yellow	Control input Re > 100k
1	3	Tach	white	Tach output, 3 pulses per revolution, Isink max = 10 mA
1	4	GND	blue	Reference ground

Curves: Air performance



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

Measurement: LU-53006-1

Date: 2002-02-21

Nozzle: 96358-2-4013

Measurement: LU-53007-1

Date: 2002-02-21

Nozzle: 96358-2-4013

Measurement: LU-53005-1

Date: 2002-02-21

Nozzle: 96358-2-4013

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	q _v	p _{fs}	q _v	p _{fs}
	V	min ⁻¹	W	A	m ³ /h	Pa	cfm	in. wg
1	57	2780	112	2.39	1210	0	715	0.00
2	57	2615	116	2.54	880	172	520	0.69
3	57	2580	117	2.58	620	287	365	1.15
4	57	2710	114	2.46	350	400	205	1.61
5	48	2600	91	2.20	1130	0	665	0.00
6	48	2455	94	2.30	820	150	485	0.60
7	48	2410	95	2.33	575	250	340	1.00
8	48	2535	92	2.23	330	350	195	1.41
9	36	2235	59	1.84	970	0	570	0.00
10	36	2135	64	1.98	720	116	425	0.47
11	36	2115	64	2.00	505	191	295	0.77
12	36	2205	61	1.88	285	263	170	1.06

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