G3G225-EE19-06

EC centrifugal fan

backward-curved, single-intake

with housing (without flange)

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Nominal data

Type	**G3G225-EE19-06**	
Motor	**M3G055-CF**	
Phase		1~
Nominal voltage	VAC	230
Frequency	Hz	50/60
Method of obtaining data		ml
Status		prelim.
Speed (rpm)	min^{-1}	2560
Power consumption	W	120
Current draw	A	0.9
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

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Technical description

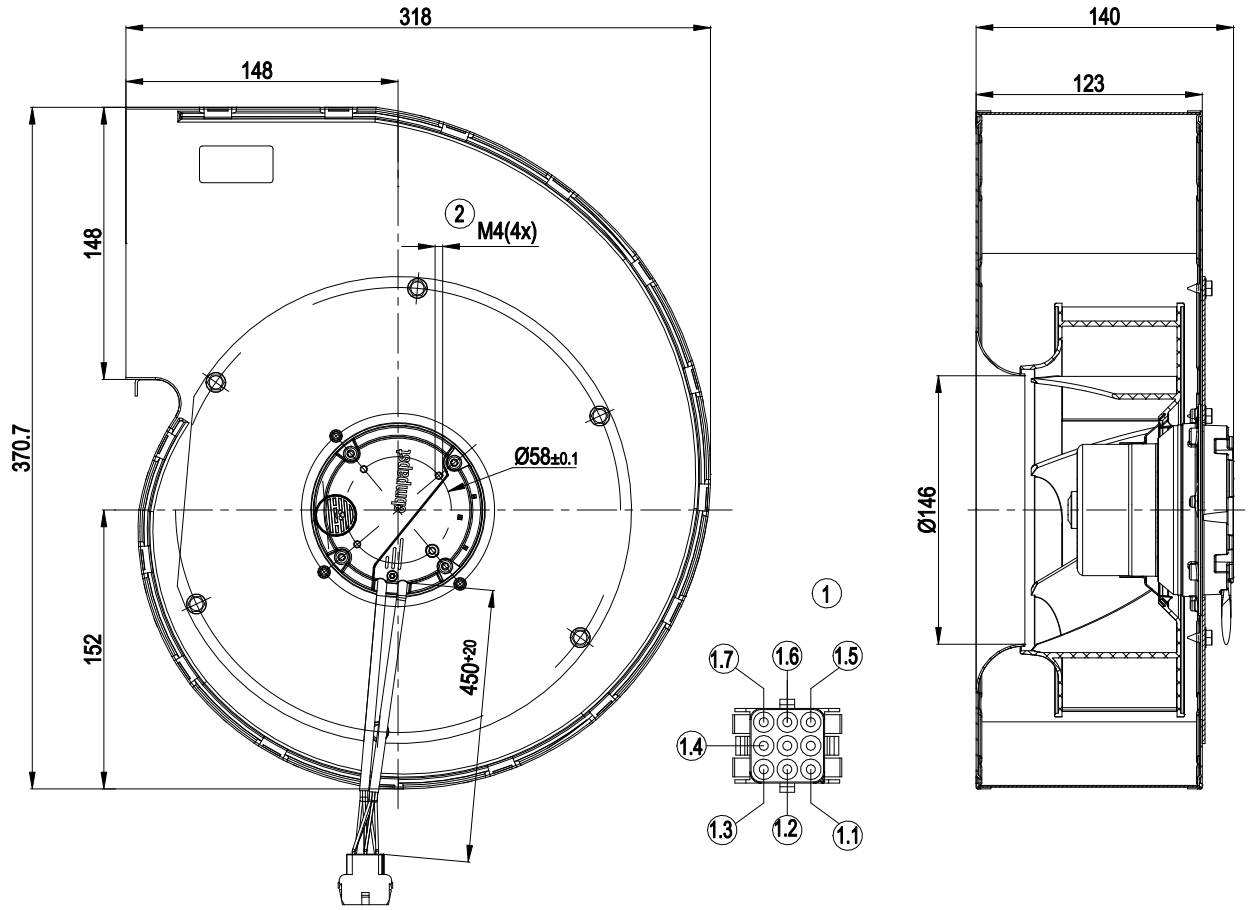
Fan size	225 mm
Impeller material	PA66 plastic, glass-fiber reinforced
Number of blades	7
Direction of rotation	Clockwise, viewed toward rotor
Degree of protection	IP44
Insulation class	"B"
Moisture (F) / Environmental (H) protection class	F3-1
Max. permitted ambient temp. for motor (transport/storage)	+ 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
Cooling hole/opening	On rotor side
Mode	S1
Motor bearing	Ball bearing
Technical features	- Control input 0-10 VDC / PWM - Output 10 VDC, max. 1.1 mA - Tach output - Thermal overload protection for motor - Motor current limitation - Soft start
EMC immunity to interference	According to EN 61000-6-2
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
Electrical hookup	With plug
Motor protection	Thermal overload protector (TOP) internally connected
With cable	Variable
Protection class	I (with customer connection of protective earth)

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Product drawing



1	Coded plug system: 9-pole connector housing tyco 927231-5, 7x plug pin tyco 926886-1
1.1	GRD (blue)
1.2	Tach (white)
1.3	PWM / 0-10V (yellow)
1.4	+10V (red)
1.5	L (brown)
1.6	N (blue)
1.7	PE (green/yellow)
2	Max. clearance for screw 6mm

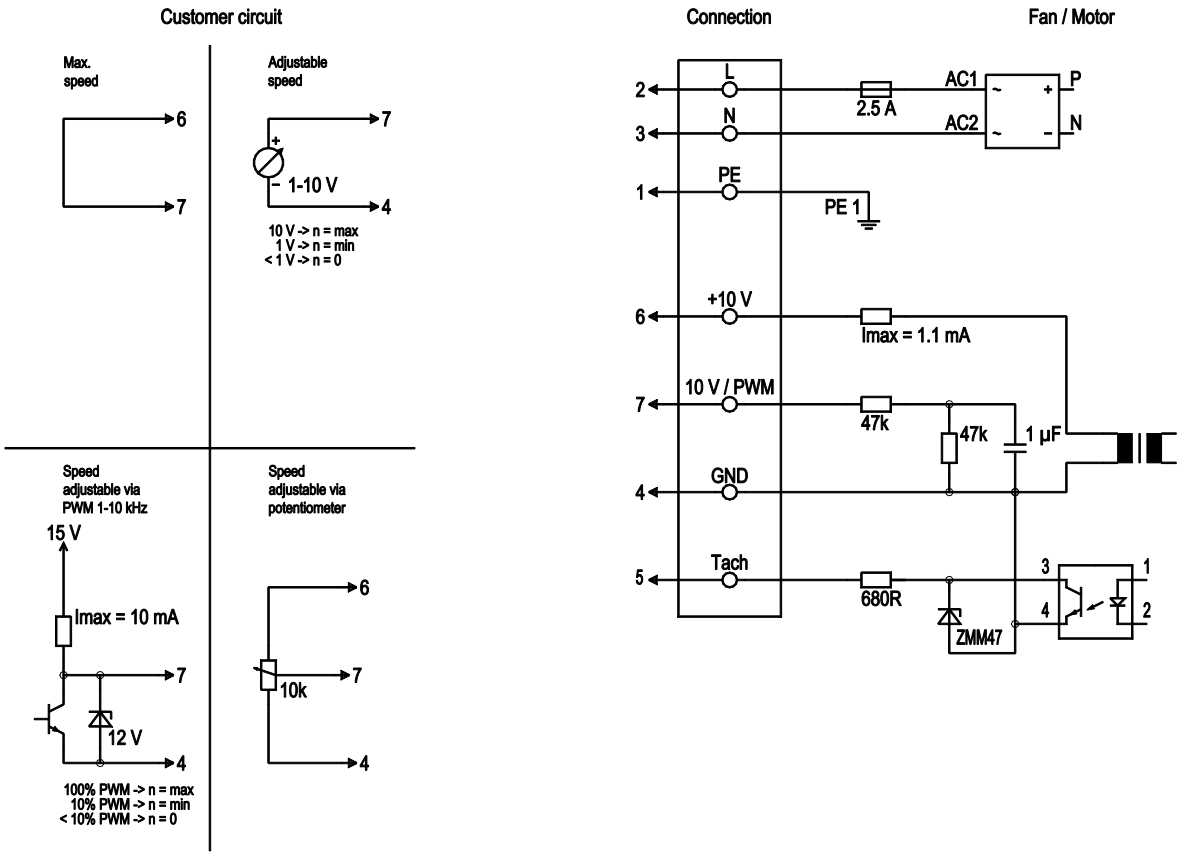
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Connection diagram



No.	Conn.	Designation	Color	Function/assignment
	2	L	brown	Power supply 230 VAC, 50-60 Hz, see nameplate for voltage range
	3	N	blue	Neutral conductor
	1	PE	green/yellow	Protective earth
	7	0-10 V PWM	yellow	Control input 0-10 V or PWM, electrically isolated
	5	Tach	white	Tach output: open collector, 1 pulse per revolution, electrically isolated
	6	10V / max. 1.1 mA	red	Voltage output 10 V / 1.1 mA, electrically isolated, not short-circuit-proof
	4	GND	blue	GND connection for control interface

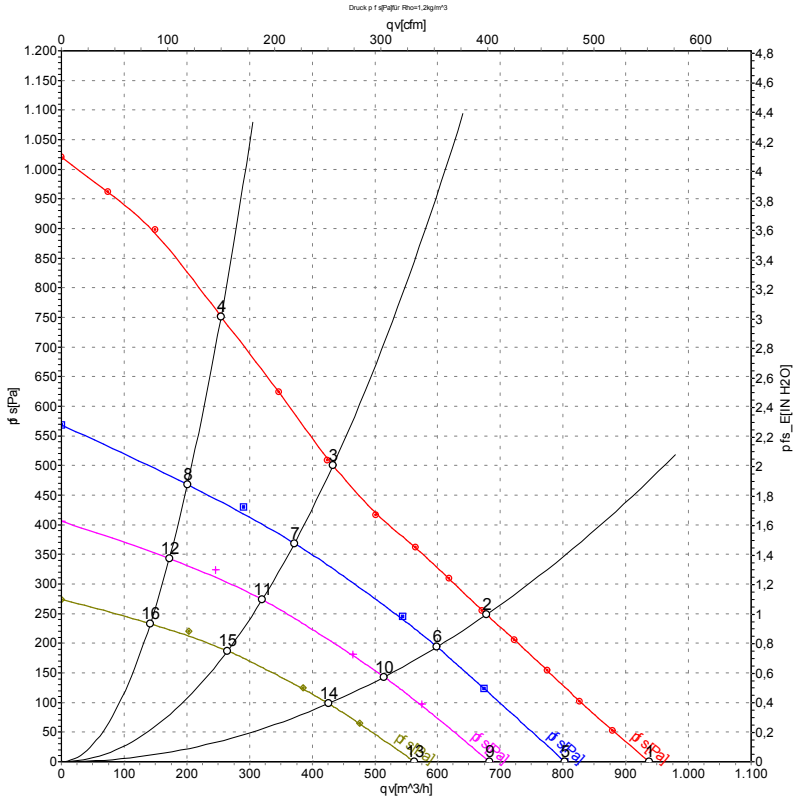
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Curves: Air performance 50 Hz



Measurement: LU-125195-1
Measurement: LU-125853-1
Measurement: LU-125854-1
Measurement: LU-125855-1

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}	qv	p_{fs}	qv	p_{fs}
	V	Hz	min^{-1}	W	A	dB(A)	dB(A)	m^3/h	Pa	CFM	inH2O
1	230	50	2670	120	0.87	72	78	940	0	550	0.00
2	230	50	2560	120	0.90	69	74	680	250	400	1.00
3	230	50	2705	120	0.87	70	76	435	500	255	2.01
4	230	50	3000	120	0.89	71	78	255	750	150	3.01
5	230	50	2295	73	0.57	71	76	805	0	475	0.00
6	230	50	2285	78	0.61	68	72	600	194	355	0.78
7	230	50	2345	73	0.57	69	73	370	370	220	1.49
8	230	50	2405	61	0.48	71	75	200	473	120	1.90
9	230	50	1955	47	0.37	66	72	685	0	400	0.00
10	230	50	1955	51	0.40	64	69	515	143	305	0.57
11	230	50	2010	46	0.37	62	67	320	275	190	1.10
12	230	50	2050	38	0.32	63	68	170	348	100	1.40
13	230	50	1620	28	0.24	59	66	565	0	330	0.00
14	230	50	1625	30	0.25	56	63	425	98	250	0.39
15	230	50	1655	28	0.24	54	61	265	188	155	0.75
16	230	50	1685	23	0.20	55	62	140	237	85	0.95

U = Power supply · 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
qv = Air flow · p_{fs} = Pressure increase

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