

W1G180-AB47-01

EC diagonal compact fan



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Nominal data

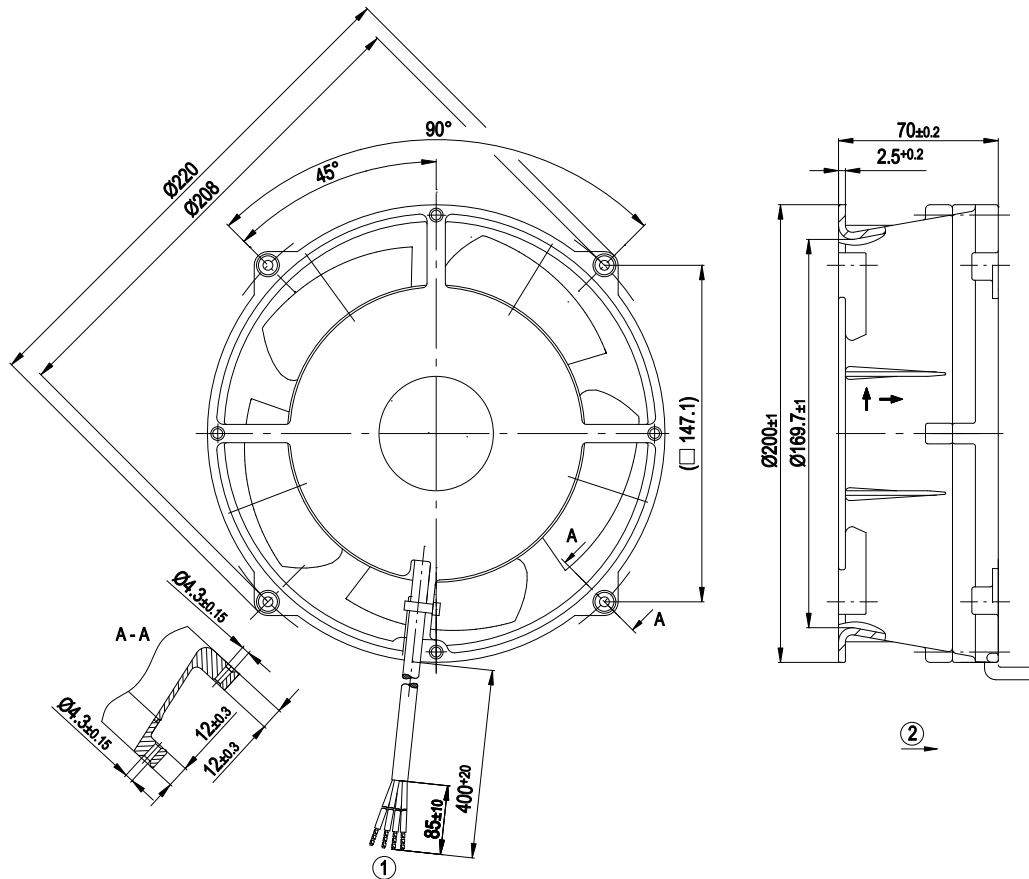
Type	W1G180-AB47-01	
Motor	M1G074-BF	
Nominal voltage	[VDC]	48
Nominal voltage range	[VDC]	36 .. 57
Frequency	[Hz]	-
Type of data definition		rfa
Speed	[min ⁻¹]	4600
Power input	[W]	100
Current draw	[A]	2.30
Min. ambient temperature	[°C]	- 25
Max. ambient temperature	[°C]	+60

ml = max. load · me = max. efficiency · rfa = running at free air · cs = customer specs · cu = customer unit
Subject to alterations

Technical features

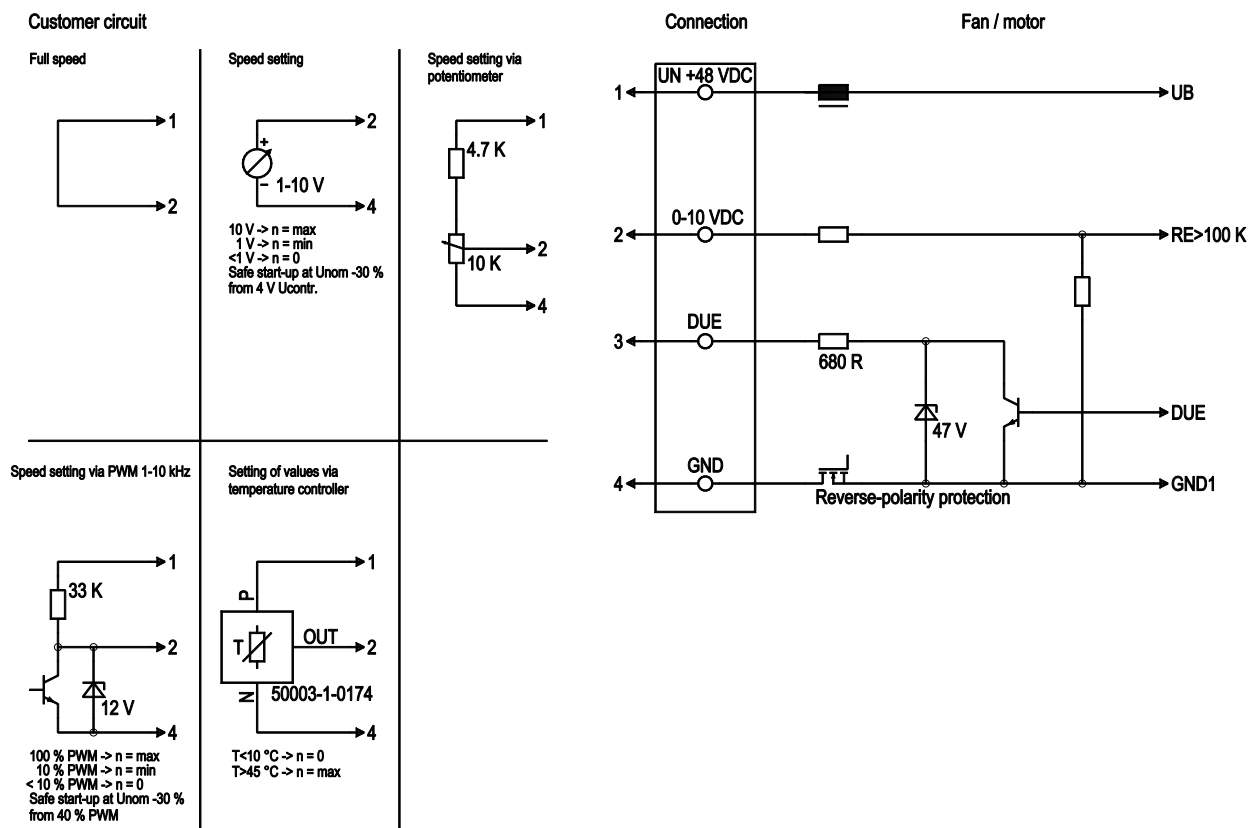
Size	180 mm
Operation mode	S1
Direction of rotation	Counter-clockwise, seen on rotor
Mounting position	Any
EMC interference emission	Acc. to EN 55022 (Class B)
EMC interference immunity	Acc. to EN 61000-6-2 (industrial environment)
Direction of air flow	"V"
Insulation class	"B"
Cable exit	Lateral
Condensate discharge holes	None
Bearing motor	Ball bearing
Mass	1.8 kg
Material of impeller	Plastic PA66, fibreglass-reinforced
Material of wall ring	Die-cast aluminium, coated in black
Motor protection	Reverse polarity and locked-rotor protection
Product conforming to standard	EN 60950-1
Surface of rotor	Galvanised
Number of blades	5
Type of protection	IP 20
Technical features	- Control input 0-10 VDC / PWM - Tach output - Motor current limit - Soft start
Max. permissible ambient motor temp. (transp./ storage)	+80 °C
Min. permissible ambient motor temp. (transp./storage)	-40 °C
Approval	CCC; CSA C22.2 Nr.113; UL 507

Product drawing



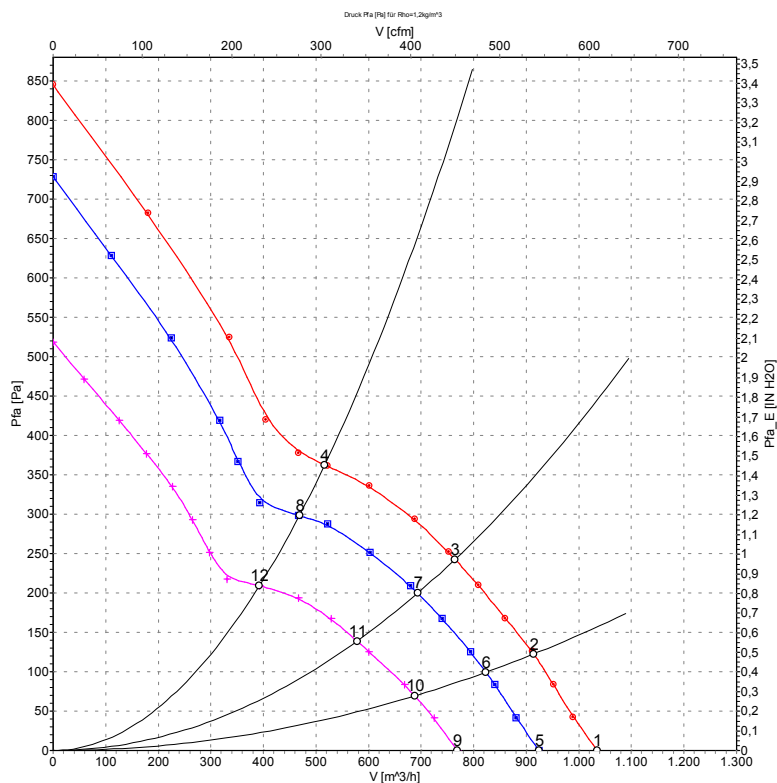
- | | |
|---|---|
| 1 | Connecting cable AWG 20, 4x brass lead tips crimped |
| 2 | Direction of air flow "V" |

Connection screen



Line	No.	Signal	Colour	Function / assignment
1	1	Un +48 VDC	red	Power supply 48 VDC, residual ripple 3.5 %
1	2	0-10 VDC	yellow	Control input Re > 100 K
1	3	DUE	white	Speed monitoring output, 3 pulses per rotation, Isink max = 10 mA
1	4	GND	blue	Reference mass

Charts: Air flow



Measurement: LU-50668
 Measurement: LU-50667
 Measurement: LU-50670

Measured values

	U	n	P ₁	I	$\dot{V}$	P _{fa}
	[V]	[min ⁻¹]	[W]	[A]	[m³/h]	[Pa]
1	57	5170	134	2.65	1035	0
2	57	4990	141	2.82	915	124
3	57	4815	146	2.95	765	243
4	57	4910	144	2.88	515	363
5	48	4600	100	2.30	925	0
6	48	4510	106	2.46	825	100
7	48	4380	112	2.61	695	200
8	48	4475	109	2.55	470	300
9	36	3900	60	1.89	770	0
10	36	3790	64	1.99	690	70
11	36	3690	67	2.10	580	139
12	36	3750	65	2.04	390	210