

D2E146-CD51-23

AC centrifugal fan

forward curved, dual inlet
with housing (without flange)

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General partner: Elektrobau Mulfingen GmbH · Headquarters Mulfingen

County court Stuttgart · HRB 590142



Nominal data

Type	D2E146-CD51-23		
Motor	M2E068-DF		
Phase		1~	1~
Nominal voltage	VAC	230	230
Frequency	Hz	50	60
Type of data definition		ml	ml
Valid for approval / standard		CE	CE
Speed	min ⁻¹	1850	2100
Power input	W	230	250
Current draw	A	1.01	1.09
Motor capacitor	µF	4	4
Capacitor voltage	VDB	450	450
Capacitor standard		P2 (CE)	P2 (CE)
Min. back pressure	Pa	200	300
Max. ambient temperature	°C	50	50

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

Data according to ErP directive

Installation category	A
Efficiency category	Static
Closed-loop speed control	No
Specific ratio*	1,00

* Specific ratio = $1 + p_{sf} / 100\,000$

	Actual	Request 2013	Request 2015
Overall efficiency η_e	26,3	26,1	33,1
Efficiency grade N	37,2	37	44
Power input P_e	kW	0,19	
Air flow q_v	m ³ /h	520	
Pressure increase Total p_{sf}	Pa	350	
Speed n	min ⁻¹	2270	

Data established at point of optimum efficiency



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Technical features

Mass	3.9 kg
Size	146 mm
Surface of rotor	Uncoated
Material of impeller	Sheet steel, sendzimir galvanised
Housing material	Sheet steel, hot-dip galvanised
Direction of rotation	Counter-clockwise, seen on rotor
Type of protection	IP 44
Insulation class	"F"
Humidity class	F0
Max. permissible ambient motor temp. (transp./ storage)	+ 80 °C
Min. permissible ambient motor temp. (transp./storage)	- 40 °C
Mounting position	Any
Condensate discharge holes	None
Operation mode	S1
Motor bearing	Ball bearing
Leakage current	< 0.75 mA
Motor protection	Thermal overload protector (TOP) wired internally
Cable exit	Axial
Protection class	I (if protective earth is connected by customer)
Product conforming to standard	EN 60335-1; CE

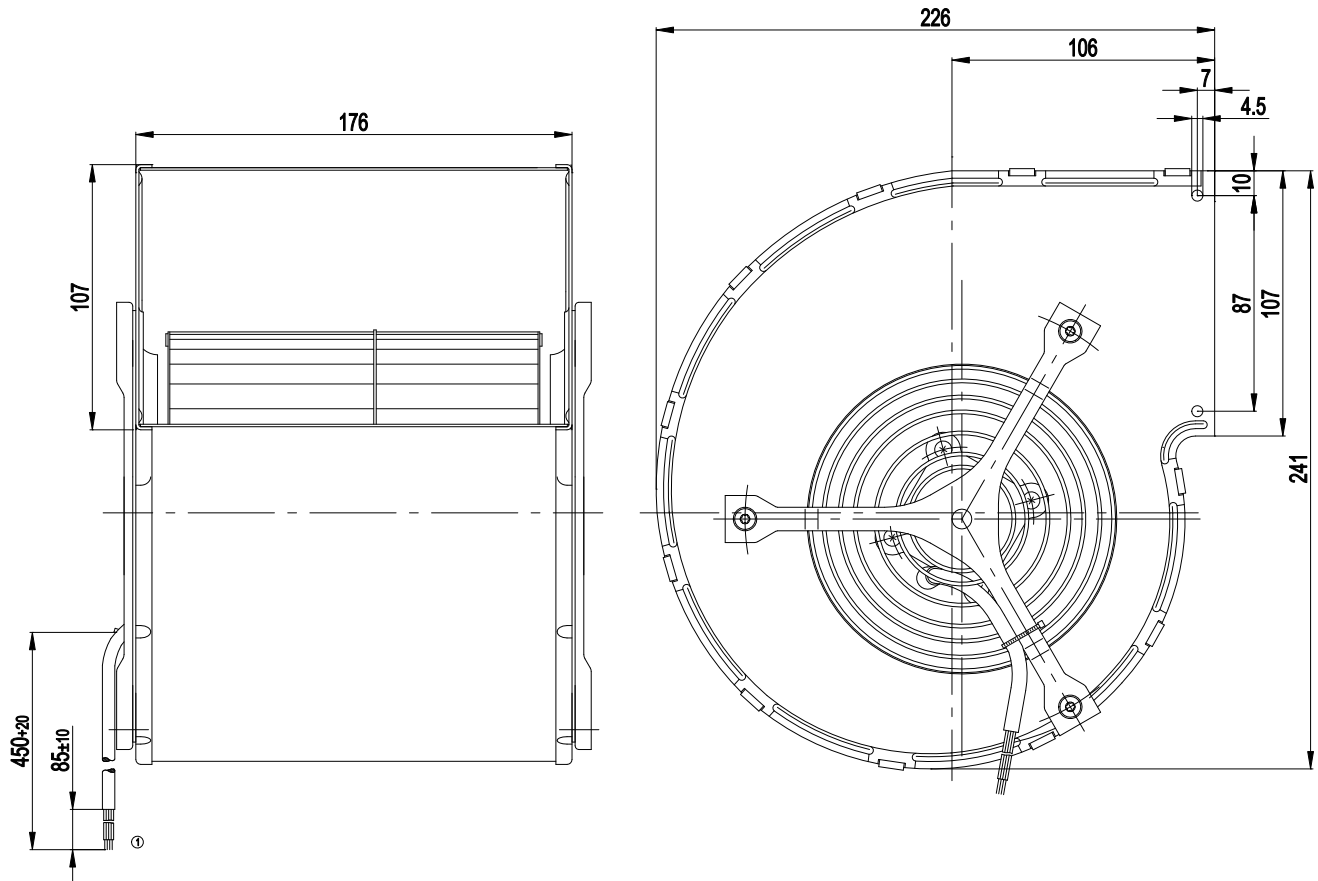


D2E146-CD51-23

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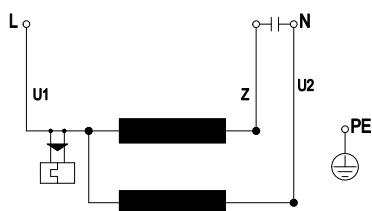
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Product drawing



1 Connection line PVC, 4x brass lead tips crimped

Connection screen



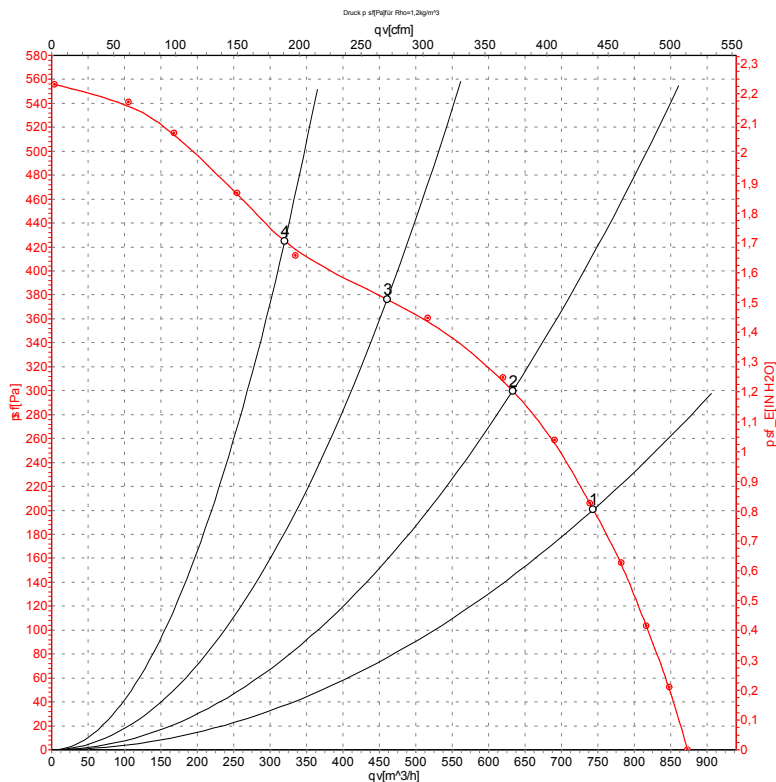
U1	blue	Z	brown	U2	black
PE	green/yellow				



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Charts: Air flow 50 Hz



Measurement: LU-22582

Air performance measured as per ISO 5801
Installation category A. For detailed
information on the measuring set-up, please
contact ebm-papst. Suction-side noise
levels: L_{WA} measured as per ISO 13347 /
L_{pA} measured with 1m distance to fan axis.
The values given are valid under the
measuring conditions mentioned above and
may vary according to the actual installation
situation. With any deviation from the
standard set-up, the specific values have to
be checked and reviewed with the unit
installed.

Measured values

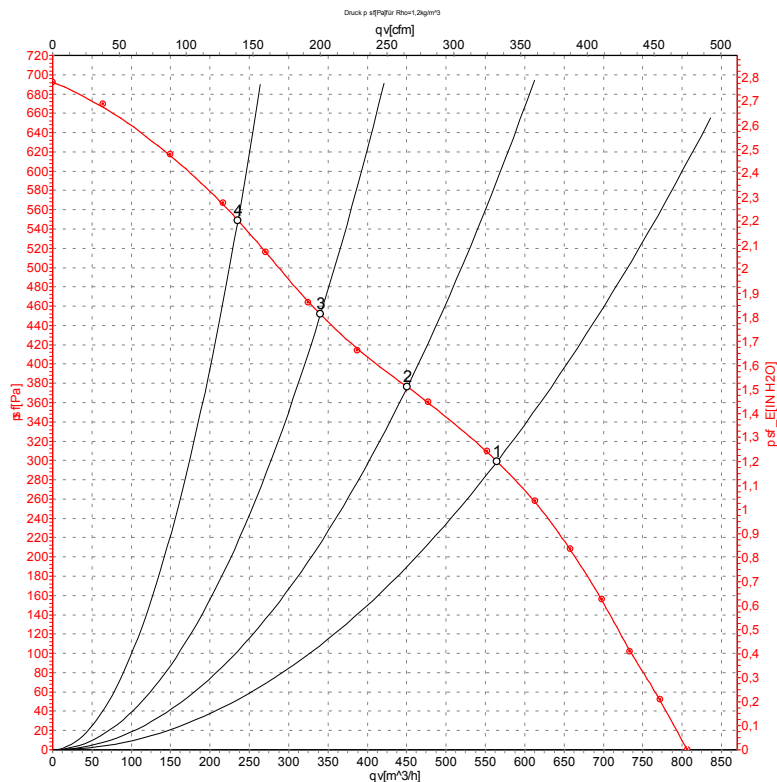
	U	f	n	P _e	I	q _v	P _{sf}
	V	Hz	min ⁻¹	W	A	m³/h	Pa
1	230	50	1850	230	1.01	745	200
2	230	50	2080	209	0.91	635	300
3	230	50	2320	184	0.80	460	375
4	230	50	2450	166	0.73	320	425



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Charts: Air flow 60 Hz



Measurement: LU-22583

Air performance measured as per ISO 5801 Installation category A. For detailed information on the measuring set-up, please contact ebm-papst. Suction-side noise levels: L_{WA} measured as per ISO 13347 / L_{pA} measured with 1m distance to fan axis. The values given are valid under the measuring conditions mentioned above and may vary according to the actual installation situation. With any deviation from the standard set-up, the specific values have to be checked and reviewed with the unit installed.

Measured values

	U	f	n	P _e	I	qv	P _{sf}
	V	Hz	min ⁻¹	W	A	m³/h	Pa
1	230	60	2100	250	1.09	565	300
2	230	60	2340	234	1.02	450	375
3	230	60	2545	224	0.97	340	450
4	230	60	2685	216	0.94	235	550

