A2D160-AA22-05

AC axial fan

straight blades (A series)



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Nominal data

Type	**A2D160-AA22-05**
Motor	**M2D068-BC**

Phase		3~	3~
Nominal voltage	VAC	400	480
Wiring		Y	Y
Frequency	Hz	50	60
Method of obtaining data		cs	cs
Valid for approval/standard		CE	CE
Speed (rpm)	min^{-1}	2800	3350
Power consumption	W	40	52
Current draw	A	0.19	0.18
Min. ambient temperature	°C	-25	-25

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

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Technical description

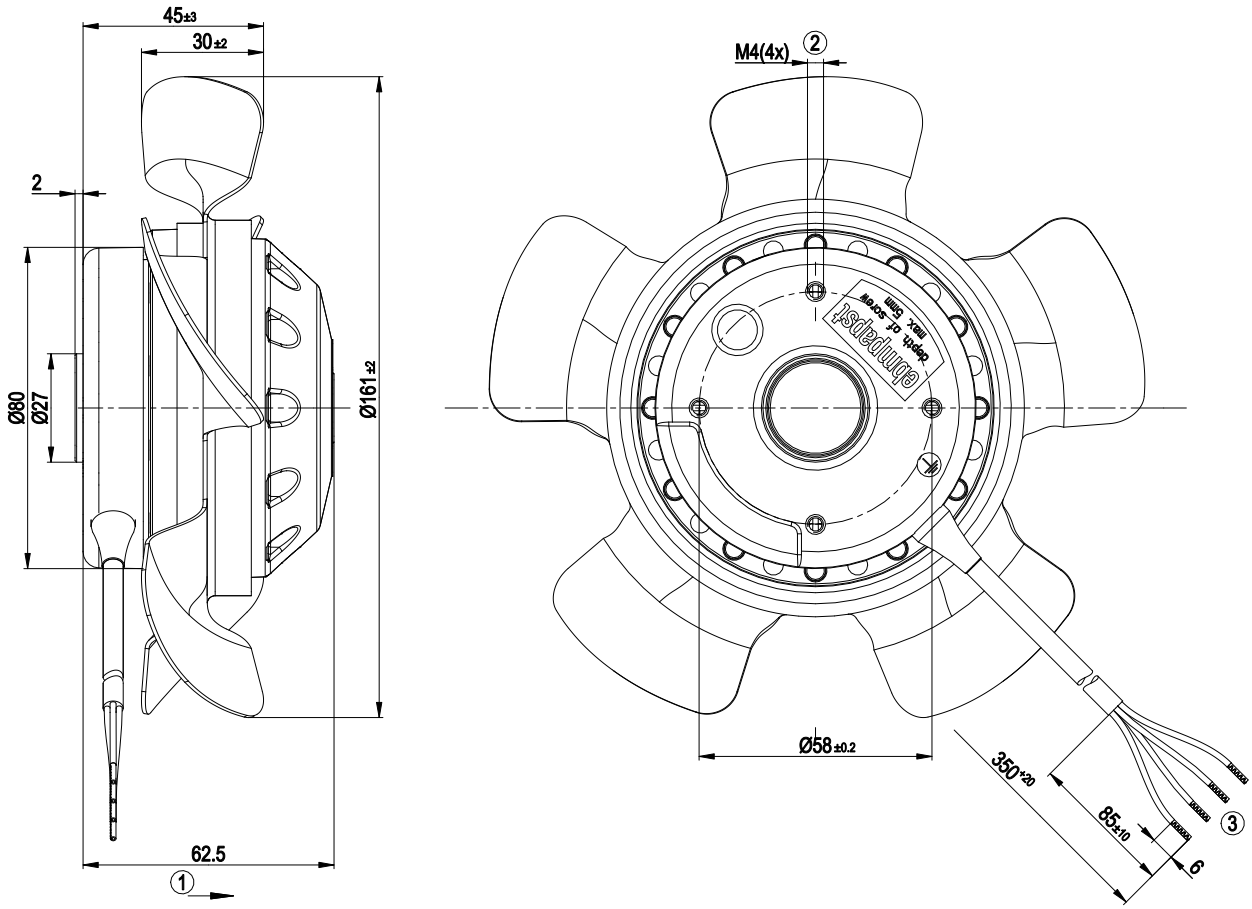
Weight	1.2 kg
Fan size	160 mm
Rotor surface	Painted black
Blade material	Sheet steel, galvanized
Number of blades	5
Airflow direction	"A"
Direction of rotation	Clockwise, viewed toward rotor
Degree of protection	IP44; installation- and position-dependent as per EN 60034-5
Insulation class	"F"
Moisture (F) / Environmental (H) protection class	F2-2
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
Touch current according to IEC 60990 (measuring circuit Fig. 4, TN system)	< 0.75 mA
With cable	Lateral
Protection class	I (with customer connection of protective earth)
Conformity with standards	EN 60335-1; CE
Approval	UL 1004-1; CSA C22.2 No. 100

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Product drawing



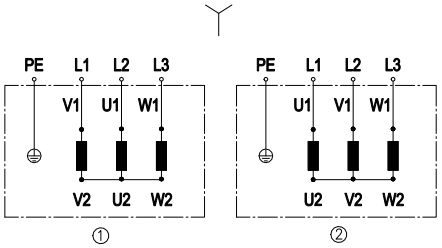
1	Direction of air flow "A"
2	Max. clearance for screw 5 mm
3	Cable PFA 4G AWG20, 4x crimped splices

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Connection diagram



Change of rotation direction by reversing two phases

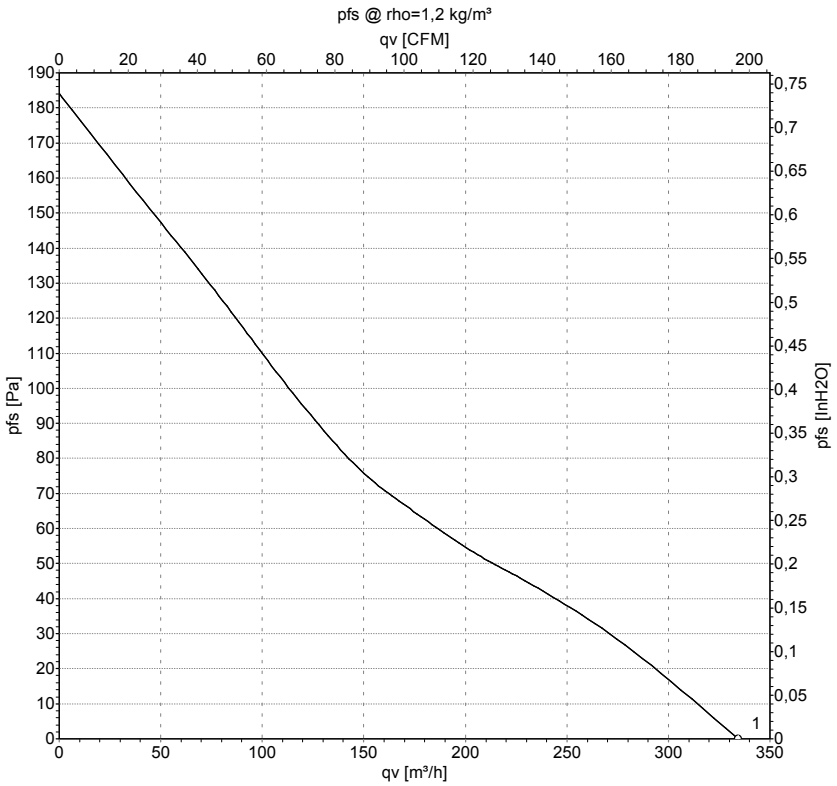
	Three-phase motor
Y	Star connection
1	Counterclockwise operation
L1	= V1 = blue
L2	= U1 = black
L3	= W1 = brown
2	Clockwise operation
L1	= U1 = black
L2	= V1 = blue
L3	= W1 = brown
PE	green/yellow

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AC axial fan

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Curves: Air performance 50 Hz



Measurement: LU-43403-1

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_e	I	qv	qv	p_{fs}
	V	Hz	min^{-1}	W	A	m^3/h	CFM	inH2O
1	400	50	2800	40	0.14	335	195	0.00

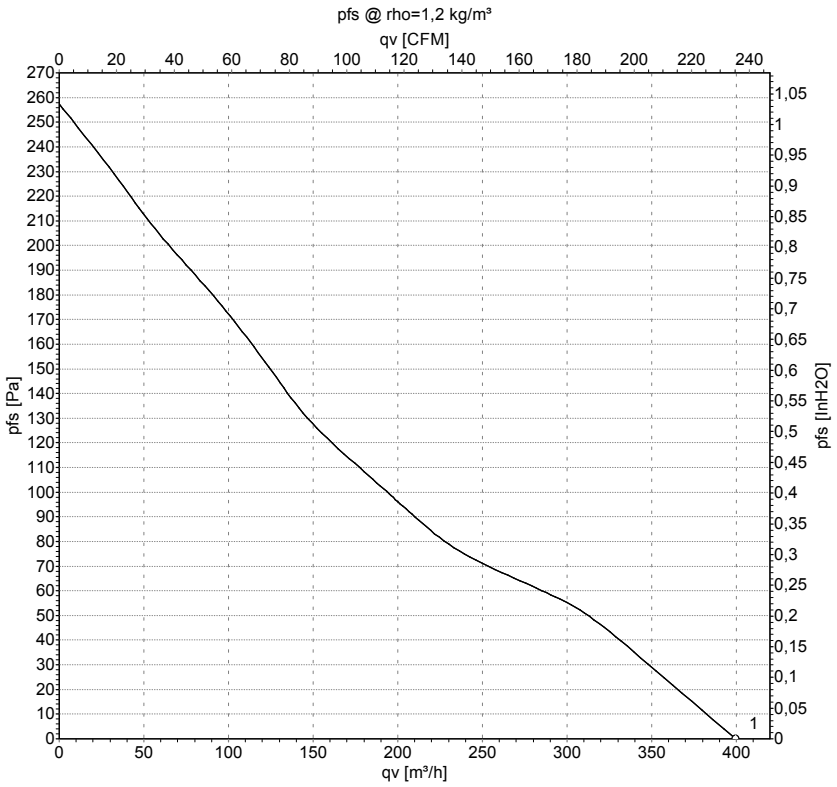
U = Power supply · f = Frequency · n = Speed (rpm) · P_e = Power consumption · I = Current draw · qv = Air flow

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AC axial fan

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Curves: Air performance 60 Hz



Measurement: LU-43405-1

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_e	I	qv	qv	p_{fs}
	V	Hz	min^{-1}	W	A	m^3/h	CFM	inH2O
1	480	60	3350	52	0.15	400	235	0.00

U = Power supply · f = Frequency · n = Speed (rpm) · P_e = Power consumption · I = Current draw · qv = Air flow

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