DEPURECO · ACD EX 1/- D (INTERN KONSTRUKTION SVARENDE TIL ZONE 20 PER IEC 60335-2-69 ANNEX AA)

Depureco M100 ACD

The Depureco M100 ACD is the big brother to the M65 ACD: same three-motor single-phase drivetrain, but with a 100 L container providing significantly longer intervals between emptying. It is ideal for production environments where dust volume is substantial and single-phase 230 V is the only realistic supply -- for example small metalworking shops, 3D-printing serial production setups or stationary polishing stations. Operation per IEC 60335-2-69 Annex AA keeps the internal Zone 20 construction and all shock baffles intact.

APPLICATIONS

- Production halls with fixed grinding and polishing stations
- Mid-size powder-coating installations without a dedicated ATEX booth
- CNC production with larger aluminium or magnesium volumes
- Foundries and forges with fine process dust
- Battery-cell production with combustible electrode powder

Technical specifications

ATEX marking	ACD EX 1/- D (intern konstruktion svarende til Zone 20 per IEC 60335-2-69 Annex AA)
Internal / external zone	20 / ikke-ATEX
Motor type	3 bypass-motorer i parallel (3 x 1,3 kW)
Airflow	570 m³/h
Vacuum	250 mbar (2550 mmH_2O)
Container	100 L
Sound pressure	72 dB(A)
Filter class	M class
Filter type	Stjernefilter antistatisk polyester klasse M, 24,000 cm2 (HEPA H14 22.000 cm2 som tilvalg)
Primary filter	Stjernefilter antistatisk polyester klasse M. 24.000 cm2
Collection system	Synthetic safebag
Material	Lakeret staalkonstruktion, AISI 304 stoevbeholder
IP class	IP54
Power	3.9 kW
Voltage	230 V / 50-60 Hz
Inlet	Diameter 50 mm
Dimensions (L x W x H)	660 x 800 x 1515 mm
Weight	80 kg

Questions and answers

Why is the Depureco M100 ACD a better choice than a standard industrial vacuum?

Because combustible dust in production volumes requires a dedicated ACD vacuum that cannot itself become the ignition source. The Depureco M100 ACD is built with three bypass motors in parallel, antistatic filter fabric and a reinforced AISI 304 container -- the whole construction is tested to IEC 60335-2-69 Annex AA to retain internal Zone 20 capacity even under prolonged duty.

Why this specific motor and phase configuration?

Three bypass motors at 1.3 kW each deliver a combined 570 m3/h at 250 mbar -- an airflow that normally requires a three-phase side-channel, here on standard 230 V. The model is sized for production halls that haven't run three-phase power out to the individual station, but where the dust volume still demands a dedicated collector with substantial air capacity.

What types of dust is the Depureco M100 ACD actually intended for?

Larger combustible dust volumes: powder-coating surplus, fine aluminium and magnesium swarf from CNC, fine process dust from foundries and forges, cellulose and wood dust from mills, fine flour dust from food production, electrode powder from battery manufacturing. For reactive metal dust in production volumes the INERT range is chosen instead.

What is the difference between ACD and ATEX?

ACD (Appliance for Combustible Dust) is for non-ATEX-classified areas where the dust itself is combustible. ATEX is for formally classified zones per Directive 2014/34/EU. Many production halls are not ATEX-classified because duty is intermittent, but still use combustible dust -- the Depureco M100 ACD is specifically for that scenario.

Contact and advisory

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