

Compact air cylinder ADN-12- -

Part number: 536203



 General operating condition

Data sheet

Overall data sheet – Individual values depend upon your configuration.

Feature	Value
Stroke	1 mm ... 300 mm
Piston diameter	12 mm
Based on norm	ISO 21287
Cushioning	Elastic cushioning rings/pads at both ends
Mounting position	Any
Mode of operation	Double-acting
Structural design	Piston Piston rod Profile barrel
Position sensing	For proximity sensor
Variants	EX protection approval (ATEX) Metals with copper, zinc or nickel by mass as main constituent are excluded from use. Exceptions are nickel in steel, chemically nickel-plated surfaces, printed circuit boards, cables, electrical plug connectors and coils. Extended external thread piston rod Special thread on piston rod Extended piston rod With anti-twist protection High corrosion protection Uniform, slow movement Low friction Through piston rod Heat-resistant seals max. 120°C
Operating pressure	0.1 MPa ... 1 MPa
Operating pressure	1 bar ... 10 bar
Operating pressure	14.5 psi ... 145 psi
CE marking (see declaration of conformity)	as per EU explosion protection directive (ATEX)
UKCA marking (see declaration of conformity)	acc. to UK EX instructions
Explosion protection certification outside the EU	EPL Db (GB) EPL Gb (GB)
Explosion prevention and protection	Zone 1 (ATEX) Zone 1 (UKEX) Zone 2 (ATEX) Zone 21 (ATEX) Zone 21 (UKEX) Zone 22 (ATEX)
ATEX category gas	II 2G
ATEX category for dust	II 2D
Type of ignition protection for gas	Ex h IIC T4 Gb
Type of (ignition) protection for dust	Ex h IIIC T120°C Db

Feature	Value
Explosive ambient temperature	-20°C ≤ Ta ≤ +60°C
Operating medium	Compressed air as per ISO 8573-1:2010 [7:4:4]
Information on operating and pilot media	Operation with oil lubrication possible (required for further use)
Corrosion resistance class (CRC)	0 - No corrosion stress 2 - Moderate corrosion stress 3 - High corrosion stress
LABS (PWIS) conformity	VDMA24364-B1/B2-L VDMA24364 zone III
Suitability for the production of Li-ion batteries	Metals with more than 1% by mass of copper, zinc or nickel are excluded from use. The exceptions are nickel in steel, chemically nickel-plated surfaces, circuit boards, cables, electrical plug connectors and coils
Ambient temperature	-20 °C ... 120 °C
Theoretical force at 6 bar, retracting	51 N
Theoretical force at 6 bar, advancing	51 N ... 68 N
Weight surcharge per 10 mm piston rod extension	2 g
Weight surcharge per 10 mm piston rod thread extension	2 g
Type of mounting	Optionally: With through-hole With internal thread With accessories
Pneumatic connection	M5
Note on materials	RoHS-compliant
Flange screws material	Steel
Cover material	Wrought aluminum alloy, anodized
Piston rod material	High-alloy steel
Material of cylinder barrel	Wrought aluminum alloy, smooth-anodized