



General operating condition

Data sheet

Overall data sheet – Individual values depend upon your configuration.

Adjustable end-position range/front length Adjustable end-position range/rear length Adjustable end-position grings/pads at both ends Elastic cushioning rings/pads at both ends Elastic cushioning, at both ends, stroke not adjustable Elastic cushioning rings/pads at both ends with fixed stop External hydraulic cushioning Any Mounting position Any Guide Recirculating ball bearing guide Structural design Twin piston Yoke Piston rod Slide Position sensing For proximity sensor Symbol Oop91249 Variants 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. Operating pressure Operating pressure 1 bar 8 bar Operating pressure 1 bar 8 bar Operating pressure 1 bar 8 bar Operating pressure 1 co.3 mm	Feature	Value
Adjustable end-position range/rear length Piston diameter 16 mm Voke Cushioning Short elastic cushioning rings/pads at both ends with fixed stop External hydraulic cushioning Mounting position Any Mounting position Any Recirculating ball bearing guide Structural design Twin piston Yoke Piston rod Slide Position sensing For proximity sensor Symbol Operating Wetals 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. Operating pressure Operating pressure 1 bar 8 bar Operating pressure 1 co.0.2 mm Mode of operation Operation Operation Operation Operation Operation modium 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) The corrosion resistance class (CRC) 1 - Low corrosion stress Labs (PWIS) conformity VDMA24364-B1/B2-L Suitability for the production with reduced Cu/Zn/Ni values (F1a) Cleanroom class Class 6 according to ISO 14644-1	Stroke	10 mm 150 mm
Piston diameter Drive unit operating mode Cushioning Short elastic cushioning rings/pads at both ends Elastomer cushioning, at both ends, stroke not adjustable Elastic cushioning rings/pads at both ends with fixed stop External hydraulic cushioning Mounting position Any Recirculating ball bearing guide Structural design Twin piston Yoke Piston rod Slide Position sensing For proximity sensor Symbol O0991249 Variants 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. Operating pressure O1 MPa O.8 MPa Operating pressure 1 bar 8 bar Operating pressure 1 4.5 psi 116 psi Max. speed C-0.3 mm (-0.02 mm Mode of operation Double-acting Operating medium Compressed air as per ISO 8573-1:2010 [7:4:4] Information on operating and pilot media Operating medium Compressed air as per ISO 8573-1:2010 [7:4:4] Uniformation on operating and pilot media Operation resistance class (CRC) 1 - Low corrosion stress LABS (PWIS) conformity VDMA24364-81/82-L Suitability for the production of Li-ion batteries Cleanroom class Class 6 according to ISO 14644-1	Adjustable end-position range/front length	6.2 mm 22.8 mm
Drive unit operating mode Cushioning Short elastic cushioning rings/pads at both ends Elastomer cushioning, at both ends, stroke not adjustable Elastic cushioning rings/pads at both ends with fixed stop External hydraulic cushioning Mounting position Any Recirculating ball bearing guide Structural design Yoke Piston rod Slide Por proximity sensor Symbol Oo991249 Variants 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. Operating pressure O.1 MPa 0.8 MPa Operating pressure 1 bar 8 bar Operating pressure 1 4.5 psi 116 psi Max. speed 0.5 m/s 0.8 m/s Repetition accuracy (-0.3 mm (-0.02 mm) Mode of operation Double-acting 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) 1 - Low corrosion stress VoMA24364-B1/B2-L Suitablifty for the production of Li-ion batteries Class 6 according to ISO 14644-1	Adjustable end-position range/rear length	6.35 mm 21.5 mm
Short elastic cushioning rings/pads at both ends Elastomer cushioning, at both ends, stroke not adjustable Elastic cushioning rings/pads at both ends to be ends Elastic cushioning rings/pads at both ends Elastic cushioning rings/pads at both ends with fixed stop External hydraulic cushioning Mounting position Any Recirculating ball bearing guide Structural design Twin piston Yoke Piston rod Slide Position sensing For proximity sensor Oo991249 Variants 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. Operating pressure O.1 MPa 0.8 MPa Operating pressure 1 bar 8 bar Operating pressure 1 bar 8 bar Operating pressure 0.5 m/s 0.8 m/s Repetition accuracy 4 0.3 mm 4 0.02 mm Mode of operation Double-acting 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) LABS (PWIS) conformity VDMA24364-B1/B2-L Suitabliity for the production of Li-ion batteries Class 6 according to ISO 14644-1	Piston diameter	16 mm
Elastic cushioning, at both ends, stroke not adjustable Elastic cushioning rings/pads at both ends Elastic cushioning rings/pads at both ends with fixed stop External hydraulic cushioning Mounting position Any Guide Recirculating ball bearing guide Structural design Twin piston Yoke Piston rod Slide Position sensing For proximity sensor Symbol O0991249 Variants 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. Operating pressure 0.1 MPa 0.8 MPa Operating pressure 1.4s. psi 116 psi Max. speed 0.5 m/s 0.8 m/s Repetition accuracy (= 0.3 mm (= 0.02 mm Mode of operation Double-acting 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) LABS (PWIS) conformity VDMA24364-B1/82-L Suitability for the production of Li-ion batteries Class 6 according to ISO 14644-1	Drive unit operating mode	Yoke
Recirculating ball bearing guide Twin piston Yoke Piston rod Slide Position sensing For proximity sensor Operating pressure Operation Operation occuracy Congressed air as per ISO 8573-1:2010 [7:4:4] Operating medium Operating medium Operating medium Operating medium Operating medium Operation on operating and pilot media Operation with oil lubrication possible (required for further use) Operation resistance class (CRC) 1 - Low corrosion stress VDMA24364-B1/B2-L Suitability for the production of Li-ion batteries Class 6 according to ISO 14644-1	Cushioning	Elastomer cushioning, at both ends, stroke not adjustable Elastic cushioning rings/pads at both ends Elastic cushioning rings/pads at both ends with fixed stop
Structural design Twin piston Yoke Piston rod Slide Position sensing For proximity sensor Symbol O0991249 Variants 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. Operating pressure O.1 MPa 0.8 MPa Operating pressure 1 bar 8 bar Operating pressure 14.5 psi 116 psi Max. speed O.5 m/s 0.8 m/s Repetition accuracy 0.3 mm 0.02 mm Mode of operation Operating medium Compressed air as per ISO 8573-1:2010 [7:4:4] Information on operating and pilot media Operating medium in the initial control of the compression of the complex of the compression of the compre	Mounting position	Any
Yoke Piston rod Slide Position sensing For proximity sensor Symbol 00991249 Variants 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. Operating pressure 0.1 MPa 0.8 MPa Operating pressure 1 bar 8 bar Operating pressure 1.4.5 psi 116 psi Max. speed 0.5 m/s 0.8 m/s Repetition accuracy <= 0.3 mm	Guide	Recirculating ball bearing guide
Symbol Variants 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. Operating pressure Operating pressure Operating pressure 1 bar 8 bar Operating pressure 14.5 psi 116 psi Max. speed O.5 m/s 0.8 m/s Repetition accuracy 4 0.3 mm 5 0.02 mm 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) 1 - Low corrosion stress LABS (PWIS) conformity VDMA24364-B1/B2-L Suitability for the production of Li-ion batteries Class 6 according to ISO 14644-1	Structural design	Yoke Piston rod
Variants 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. Operating pressure Operating pressure 1 bar 8 bar Operating pressure 14.5 psi 116 psi Max. speed 0.5 m/s 0.8 m/s Repetition accuracy	Position sensing	For proximity sensor
excluded from use. Exceptions are nickel in steel, chemically nickel- plated surfaces, printed circuit boards, cables, electrical plug connectors and coils. Operating pressure Operating pressure 1 bar 8 bar Operating pressure 14.5 psi 116 psi Max. speed 0.5 m/s 0.8 m/s Repetition accuracy	Symbol	00991249
Operating pressure 1 bar 8 bar 14.5 psi 116 psi Max. speed 0.5 m/s 0.8 m/s Repetition accuracy 4 0.2 mm Double-acting 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) 1 - Low corrosion stress LABS (PWIS) conformity VDMA24364-B1/B2-L Suitability for the production of Li-ion batteries Class 6 according to ISO 14644-1	Variants	excluded from use. Exceptions are nickel in steel, chemically nickel- plated surfaces, printed circuit boards, cables, electrical plug connectors
Operating pressure 14.5 psi 116 psi Max. speed 0.5 m/s 0.8 m/s (= 0.3 mm (= 0.02 mm) Mode of operation Double-acting 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) 1 - Low corrosion stress LABS (PWIS) conformity VDMA24364-B1/B2-L Suitability for the production of Li-ion batteries Class 6 according to ISO 14644-1	Operating pressure	0.1 MPa 0.8 MPa
Max. speed O.5 m/s 0.8 m/s Repetition accuracy (= 0.3 mm	Operating pressure	1 bar 8 bar
Repetition accuracy (= 0.3 mm (= 0.02 mm) Mode of operation Double-acting 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) 1 - Low corrosion stress LABS (PWIS) conformity VDMA24364-B1/B2-L Suitability for the production of Li-ion batteries Class 6 according to ISO 14644-1	Operating pressure	14.5 psi 116 psi
Compressed air as per ISO 8573-1:2010 [7:4:4]	Max. speed	0.5 m/s 0.8 m/s
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) 1 - Low corrosion stress LABS (PWIS) conformity VDMA24364-B1/B2-L Suitability for the production of Li-ion batteries Class 6 according to ISO 14644-1	Repetition accuracy	
Information on operating and pilot media Operation with oil lubrication possible (required for further use) 1 - Low corrosion stress LABS (PWIS) conformity VDMA24364-B1/B2-L Suitability for the production of Li-ion batteries Cleanroom class Class 6 according to ISO 14644-1	Mode of operation	Double-acting Double-acting
Corrosion resistance class (CRC) 1 - Low corrosion stress VDMA24364-B1/B2-L Suitability for the production of Li-ion batteries Cleanroom class Class 6 according to ISO 14644-1	Operating medium	Compressed air as per ISO 8573-1:2010 [7:4:4]
LABS (PWIS) conformity VDMA24364-B1/B2-L Suitability for the production of Li-ion batteries Suitable for battery production with reduced Cu/Zn/Ni values (F1a) Cleanroom class Class 6 according to ISO 14644-1	Information on operating and pilot media	Operation with oil lubrication possible (required for further use)
Suitability for the production of Li-ion batteries Suitable for battery production with reduced Cu/Zn/Ni values (F1a) Class 6 according to ISO 14644-1	Corrosion resistance class (CRC)	1 - Low corrosion stress
Cleanroom class Class 6 according to ISO 14644-1	LABS (PWIS) conformity	VDMA24364-B1/B2-L
	Suitability for the production of Li-ion batteries	Suitable for battery production with reduced Cu/Zn/Ni values (F1a)
Ambient temperature -10 °C 60 °C	Cleanroom class	Class 6 according to ISO 14644-1
	Ambient temperature	-10 °C 60 °C

Feature	Value
Impact energy in the end positions	0.06 J 2 J
Cushioning length	0.65 mm 5 mm
Max. force Fy	820 N 960 N
Max. force Fz	820 N 960 N
Max. torque Mx	11.3 Nm 14 Nm
Max. torque My	7 Nm 16 Nm
Max. torque Mz	7 Nm 16 Nm
Theoretical force at 6 bar, retracting	207 N
Theoretical force at 6 bar, advancing	241 N
Moving mass	235 g 701 g
Product weight	454 g 1484 g
Type of mounting	With through-hole
Pneumatic connection	M5
Note on materials	RoHS-compliant
Cover material	Wrought aluminum alloy
Seals material	HNBR
Guide material	POM TPE-E High-alloy steel
Housing material	Wrought aluminum alloy
Piston rod material	High-alloy stainless steel