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Hydropneumatic – Rapid feedrate Cylinder

Pneumatic - Cylindrical according to ISO 15552 (ISO 6431 VDMA replaced) with integrated oil cylinder.

The cylinder is connected to the main dimensions identical to the ISO - cylinder 15552nd It has the advantage of an individually adjustable feed rate and a relatively high rapid traverse rate of up to 6 m / min. This represents approximately 50% of a conventional pneumatic - cylinder. Over the, in the piston rod, integrated oil brake cylinder of the cylinder operates without the otherwise occurring bending moment, as the movement and braking force are in one axis.

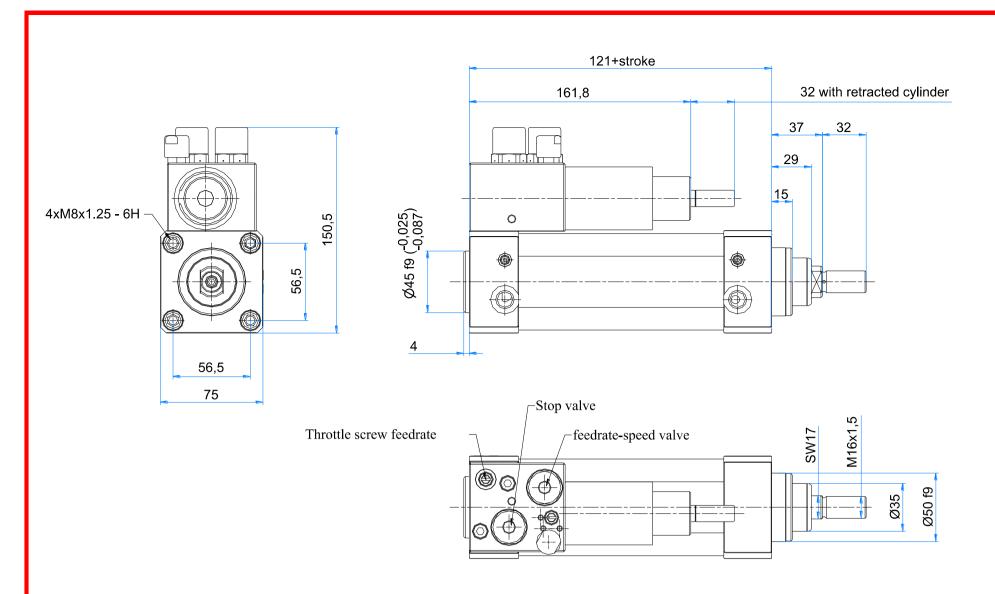


The cylinder is first offered in a basic version. This includes all the important functions like an incoming and extends the federate – Rapid with a throttle. While the retraction of the cylinder is considered to be subordinate function. In addition, the cylinder is in the basic version retraction and extension during a stop function.

The cylinder is also available in the following other features:

- Extending the feedrate
- Extending the feedrate Rapid
- Extending the feedrate Rapid Stop
- Retracts in the feedrate
- Retracts in feedrate Rapid
- Retracts in feedrate Rapid Stop
- Resp. all these models with an external inductor.

The cylinders are fitted with an end position damping and a non-contact signal transfer, which can be called via a magnetic sensor.



piston-Ø [mm]	piston rods-Ø [mm]	stroke direction	effective piston area [cm²]	theoretical piston power in dependence with the operating preassure [N]									
				1 bar	2 bar	3 bar	4 bar	5 bar	6 bar	7 bar	8 bar	9 bar	10 bar
50*	25	Extending	19,6	0	0	0	0	0	0	0	0	0	10
		Retracts	14,7	190	390	580	780	980	1170	1370	1570	1760	1960
63	35	Extending	31,2	140	290	440	580	730	880	1030	1170	1320	1470
		Retracts	21,6	310	620	930	1240	1550	1870	2180	2490	2800	3110
80*	40	Extending	50,3	210	430	640	860	1070	1290	1500	1720	1930	2150
		Retracts	37,7	500	1000	1500	2010	2510	3010	3510	4020	4520	5020

^{*} in time not available

Specifications:

Stroke length: up to 500 mm

Feed speed: 0 - 3 m/min, but is dependent on cylinder size and the mass to be decelerated

Rapid traverse rate: 4 - 6 m / min, but is dependent on cylinder size and the mass to be decelerated

Mounting: any

Temperature range: $0 \text{ to } +80^{\circ}\text{C}$ Operating pressure: 1 to 10 bar

Materials: - Housing: anodized aluminum,

- Rod: C45 HC

- Seals: nitrile, polyurethane