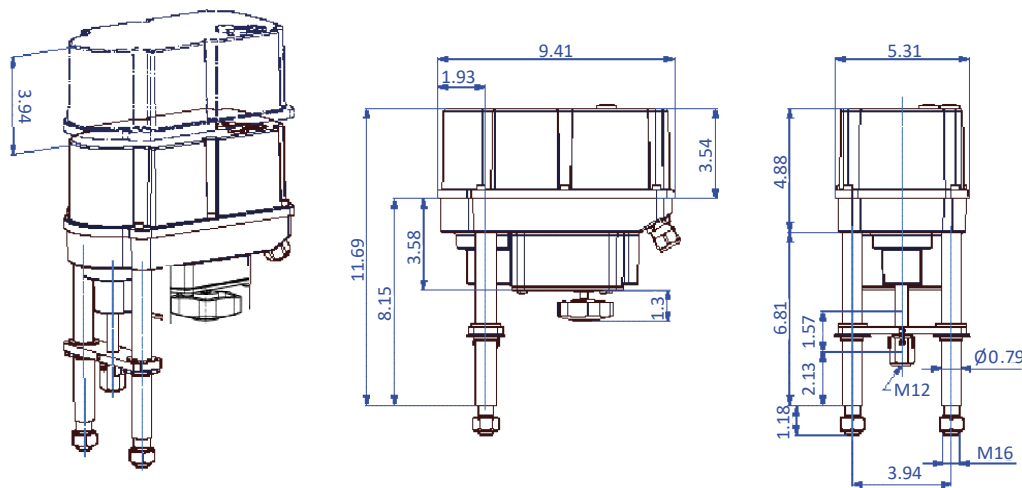


Explosion-Proof Linear Actuator with mechanical failsafe function



Approx. weight: 15.9 lb without accessories

PSF-EX

Spring Return
Function

449 lbf
Max. Thrust ¹⁾

28.2 Secs/In.
Stroke speed

0.19 - 1.575 In.
Stroke

Positioner
integrated

Actuator
Class C
acc. EN ISO 22153

Enclosure IP65
EN 60529

Stroke Speed		8.2 Secs/In. (motor operation) 23 Secs/In. (failsafe operation)) ³		PSF-402.1-EX 2 kN
Device category		II 2G II 2D		
EU Type Examination Certificate		TPS 22 ATEX 110398 0002 X		
ATEX directive gases		Ex db eb IIC T6/T4 Gb Ex h db eb IIC T6/T4 Gb		
ATEX directive dusts		Ex tb IIIC T80°C/T100°C Db Ex h tb IIIC T80°C/T100°C Db		
IECEX CoC		IECEX TPS 22.0019X		
IECEX directive gases		Ex db eb IIC T6/T4 Gb		
IECEX directive dusts		Ex tb IIIC T80°C/T100°C Db		
Power Supply	[V]	100-240 VAC 1~	24 VAC/DC	
Frequency	[Hz]	50 - 60	50 - 60	
Nominal Current	[A]	0.12 - 0.24	1.2 / 0.6	
Maximum Current	[A]	0.12 - 0.24	1.2 / 0.6	
Power Consumption) ²	[W]	16.5	16.5 / 14.5	
Duty Cycle	IEC 60034-1,8	S2 30 min / S4 50% ED - 1200c/h		

Standard	Description	Standard Equipment
Ambient Temperature [°F]	4°F ≤ Ta ≤ +104°F (T6) / +140°F (T4)	
Motor Protection	electronic motor current monitoring with safety cut-off	
Overvoltage Category	II	
Set Value and Feedback	0-20 mA, 4-20 mA, 0-10 V, 2-10 V selectable	
Binary Control	24 - 230 VAC & 24 VDC for ON/OFF service	
Valve Positioner Function	integrated, deadband 0.6% of full signal range, shut-off minimum	
Automatic Start-up	Recognizing the end position(s) and autoscaling set and feedback values	
Internal Fault Monitoring	force, set value, temperature, power supply	
Cable Glands	2 pcs. ISO M20 x 1.5 and 1 pcs. ISO M16 x 1.5	
Fail-Safe Operating Direction	Spring Extend (SE) - Spring extends actuator stem or Spring Retract (SR) - Spring retracts actuator stem	

¹⁾ = permissible average force over the entire travel is 50% of the max. thrust

²⁾ = at max. thrust

³⁾ = stroke speed +/- 10%

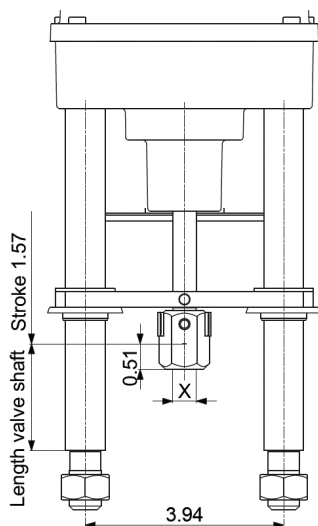
Wiring Diagram

24V AC/ DC

GND	Set Value	Feedback	L/+ OPEN	Com	L/+ CLOSE	24VAC/DC Power Supply	
8	7	6	5	4	3	V- 2	V+ 1

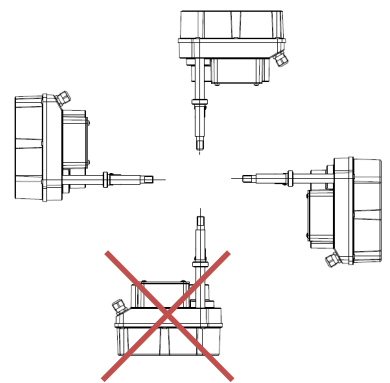
100-240V AC

GND	Set Value	Feedback	L/+ OPEN	Com	L/+ CLOSE	100-240VAC Power Supply	
8	7	6	5	4	3	V- 2	V+ 1

Valve ConnectionConnection Thread X

M8	Optional
M10	Optional
M12	Standard

Fine threads and other sizes on request!

Mounting PositionAccessories / Options

Higher Enclosure	IP	Higher Enclosure to IP 67
Diagnose-Kit		Diagnosis-Kit PSF including Software and USB Data Cable

For more information and accessories, please visit our website www.ps-automation.com!