

The motorsports proven ELPM series linear position sensor provides long life and extremely reliable performance for harsh environment position measurement applications such as ride height, suspension and steering angle measurement. The compact 9.5 mm diameter sensor includes a conductive plastic resistance element technology with multi damped wipers that maintains complete and even contact with very low electrical noise, even under the most arduous physical and environmental conditions. The IP67 sealing system employed in the design

may be enhanced with the extended 'S' sealing option for improved reliability and endurance where unpredictable wet and hostile environmental conditions exist. The ELPM series offers stroke lengths from 25 to 175 mm in convenient increments with self aligning pivot bearing mountings or optional snap-on mountings with the ELPM-Pop option for fast installation or removal. Further options include a spring return version as well as customer specified mounting and electrical connector options on request.

Specifications	
Electrical stroke	25 to 175mm (7 range options)
Mechanical stroke	as electrical stroke
Independent linearity	Typically ± 1%, improved linearity upon request
Repeatability	Up to ± 0.01 mm
Max. voltage	24V DC
Recommended wiper current	< 10µA
Temperature range	ELPM u. ELPM-RCE: -30 to 150°C (short term 175°C) ELPM-POP: -30 to 140°C
Mechanical life	>25 x 10 <sup>6</sup> operations
Sealing	IP67 (optional 'S' version for extended IP67 performance)
Mounting	Standard version: rod end bearings POP: snap on RCE: rear cable exit
Cable type / length	24 AWG Raychem 55M-wire, FDR25 sleeve /500mm
Operational speed	10 m/sec max.
Power rating	0.25W at 40°C

# LINEAR POSITION SENSOR FOR MOTORSPORTS: ELPM SERIES



## Ordering information

(Please use the characters in the chart below to construct your product code)

### Sample code

ELPM(S) - 25 - POP

#### Series

ELPM  
optional "S" version

#### Electrical stroke

see table below

#### Mounting options

Blank = standard  
POP = snap-on  
RCE = rear cable exit

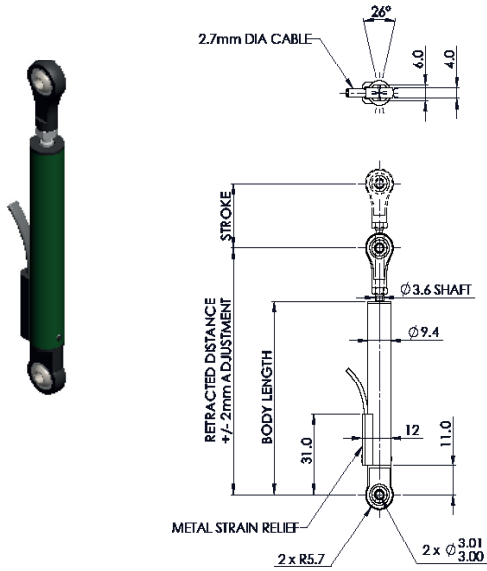
## Custom options available on demand

	Unit	ELPM / ELPM-RCE and ELPMS extended sealing options							ELPM-POP and ELPMS-POP extended sealing options						
		25	50	75	100	125	150	175	25	50	75	100	125	150	175
Order code															
Electrical stroke	mm	25	50	75	100	125	150	175	25	50	75	100	125	150	175
retracted mounting distance	mm	95	120	145	178	203	228	253	115	149	175	205	230	260	285
Body length	mm	75	100	125	153	178	203	228	88	113	138	173	198	228	253
Resistance +/- 20%	kΩ	2.5	5.0	7.5	10.0	10.0	10.0	10.0	2.5	5.0	7.5	10.0	10.0	10.0	10.0
Weight	g	26	29	33	37	43	46	51	23	27	31	35	41	44	57

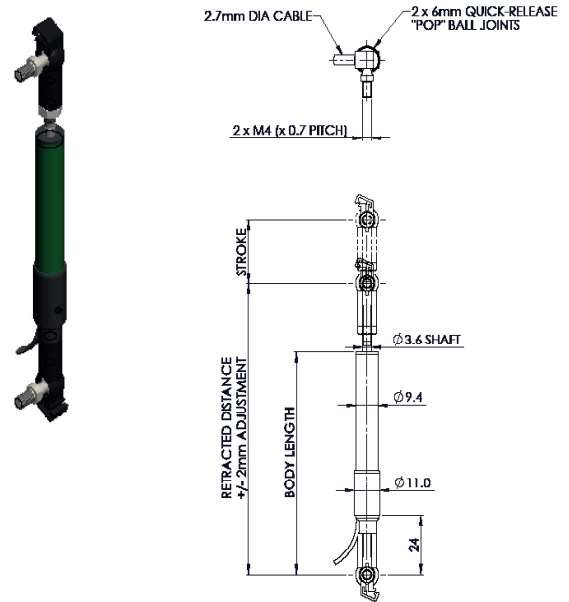


## Dimensions

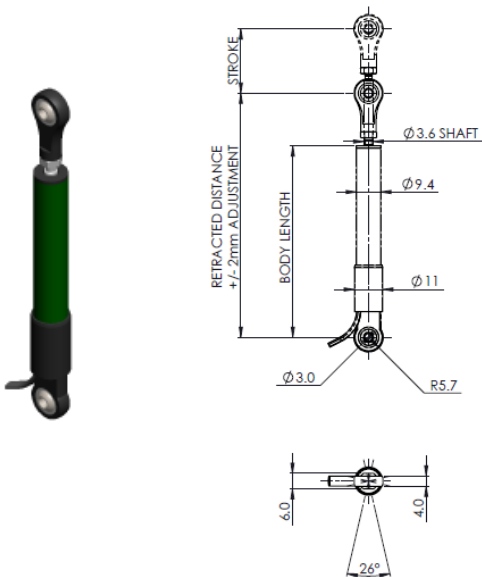
### ELPM and ELPMS extended sealing option



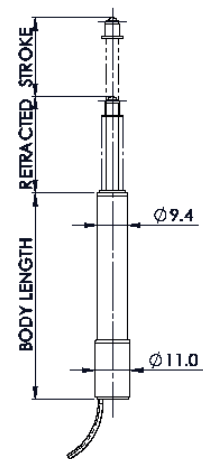
### ELPM-Pop and ELPMS-Pop extended sealing option



### ELPM-RCE version



### ELPM-SO version with spring loaded shaft



## Wiring connections

### Retracted end



- Black: GND / 0V
- Red: +VE Supply
- White: Signal out