

Special features

- Linearity: $\pm 0.1\%$
- Resolution: infinite
- Life time: 5×10^6 cycles
- Max. Rotating speed: 100×10^6
- Infinite continuous rotation
- Good price/performance ratio

Technical Specifications

ELECTRICAL		
Electrical travel	345;350;355	"
Recommended supply voltage	5	V(Vref)
Max. permissible applied voltage	30	V
Independent linearity	± 0.1	%
Hysteresis	<1	%
Repeatability	≤ 0.01	%
Available resistance values	1; 2; 5;10	k Ω
Resistance tolerance	± 20	%
Insulation resistance	≥ 10	M Ω
MECHANICAL		
Dimensions		see drawing
Mechanical travel	360°	°(continuous)
Maximum operational speed	10,000	RPM
DURABILITY		
Vibration		16-22 G _{RMS} Random for 20hrs
Shock		50 g;11 ms
Thermal shock	5000 cycles	-40 °C 1hr→100°C 1hr→-40°C
Room temperature	100×10^6	cycles (4Hz,5v)
Salt fog	96 hrs	with 5% Neutral Salt at 35°C
Dust	2hrs	48 km/hr Coarse Dust at 80°C
Shock		850 g 11 ms
Drop	1m, 3 times	
ENVIRONMENTAL		
Housing class	IP40	IEC 529
Temperature range	-40~+100	°C
Life	$> 5 \times 10^6$	movements

RPS



Description

The sensor is made of all-metal shell, spherical bearing, electric conductive plastic baseplate and elastic damping wiper, which brings a capacity to change direction very freely. As a high precision rotary position sensor, it fits both the analog quantity output application and the digital signal output application. Because of its high reliability, long life, excellent linearity, outstanding resolution, high-speed movement ability and decay resistance material the traditional sensor technology based on potentiometer theory reaches a new level application.

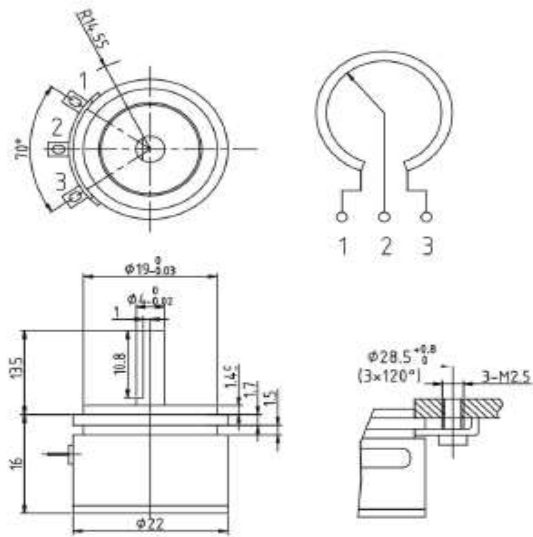
Application

Plastic resistance potentiometer, applied to measurement, control and apparatus instruments.

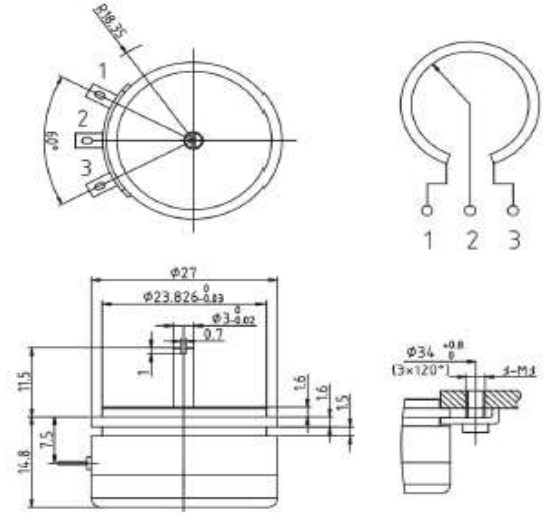
Customized travels and rotation shaft dimensions are available.

Mechanical Dimensions

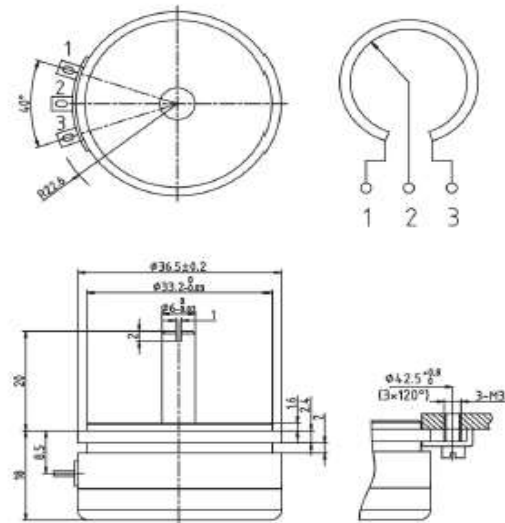
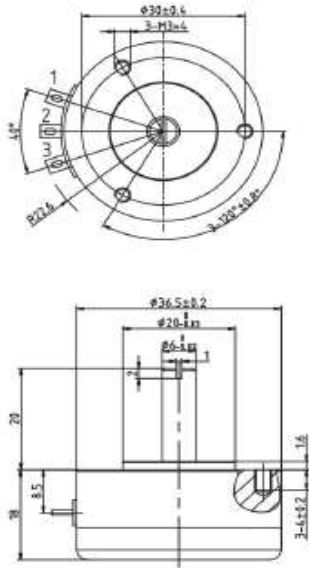
RPS22



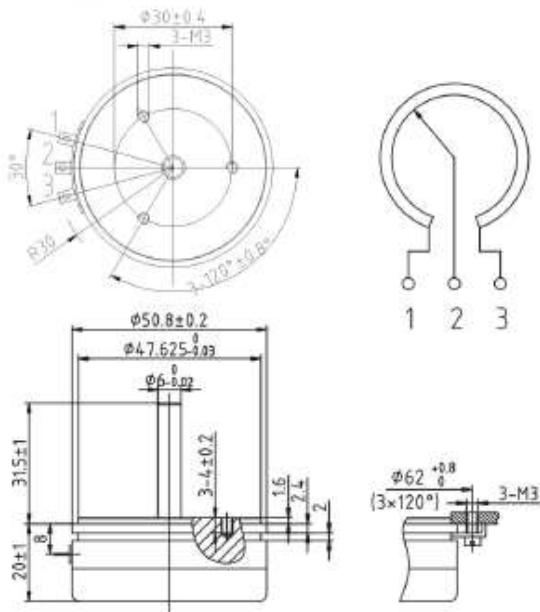
RPS27



RPS36



PRS50



RPS65

