

WIRE WINDING

FSG-DESIGN

# PW70

## Wire wound precision Potentiometer

- Low coast flat type potentiometer in a plastic housing
- Short-circuit sections, additional taps, and special windings available upon request
- Resistance value and active angle can be customized as desired



### TECHNICAL DATA

Housing material	thermoset	Resistance values	to 50 kΩ
Housing diameter	70 mm	Resistance tolerance	2%
Model	FSG-Design	Linearity tolerance	±0.15 %
IP code	IP30	Resolution	max. 3621 turns
Shaft diameter	6 mm	Capacity	6 W
Adjustment speed	max. 360 U/min	Temperature range	-30 °C to +80 °C
Torque	0.5 Ncm	Temperature coefficient	0.0017 % / °C
Wiper without limit stops	no	Lifetime	typical 10–50 Mio. Cycles <i>The lifetime depends on the application and environmental conditions.</i>
Multiple execution	sixfold	Vibration*	5–200 Hz, 10 g
Bearing	needle bearing	Shock*	50 g, 6 ms
Connection	screw connection / solder-type terminals		
Fastening	2x M4 at a distance of 50 mm		
Resistance element	ring		
Active angle	max. 350°		

#### Specific features

Additional switches, maximum of 6, available

*\*Depending on customer specifications.*

**Article master number** 1700Z04

Typical

### APPLICATION AREAS



Ship



Rails



Automation



Logistics



Medicine



Industry

Optionally available

### PROTECTIVE HOUSING

To protect against mechanical damage and extreme environmental conditions, as well as for necessary adaptation gears and additional switches, suitable housings are available in various designs.



**For more information on protective housings, click here:** [www.fsg-sensors.de](http://www.fsg-sensors.de)

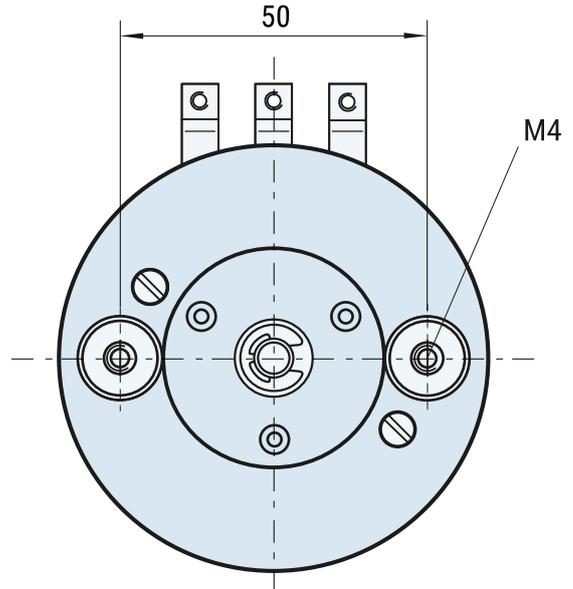
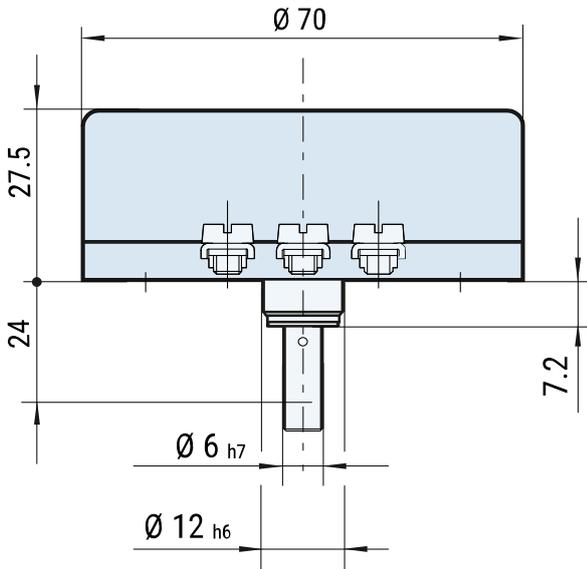


WIRE WINDING

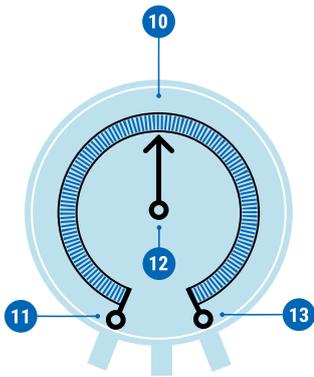
FSG-DESIGN

# PW70

## DIMENSIONAL DRAWINGS



## CONNECTION



**Standard**

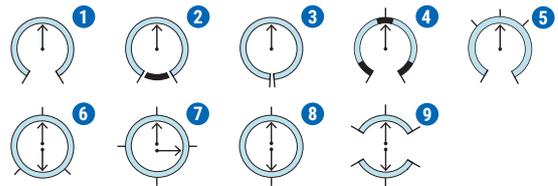
- 11 Resistance start
- 12 Wiper
- 13 Resistance end

**Optional**

- 10 Additional tap

## CIRCUIT VARIATIONS

Wire-wound resistive elements as **ring winding** on an anodized aluminum ring body can be executed in various circuit configurations, angle ranges, and resistance values.



- 1 Wiper limited by stops
- 2 Wiper continues rotation over 360° with dummy winding
- 3 Wiper continues rotation over 360° without reactive winding (sawtooth curve)
- 4 Free arrangement of shorted sections
- 5 Free arrangement of taps
- 6/7/8 Special windings with linear or sin/cos characteristic curves
- 9 Two electrically isolated windings on a winding body, angle  $\leq 175^\circ$

## CONTACT

If you have any questions about this or any other FSG product, please do not hesitate to contact us.

**BERLIN (HQ)**  
Fernsteuergeräte Kurt Oelsch GmbH  
Jahnstraße 68 + 70  
12347 Berlin

✉ info@fsg-sensors.de  
🌐 www.fsg-sensors.de  
📞 +49 30 6291-1  
📠 +49 30 6291-277

© Fernsteuergeräte Kurt Oelsch GmbH  
No guarantee for the correctness, completeness of the contents. The product illustration may differ from original.