

## DPS-K-ON

### Description

DPS-K series inclinometer is available with two measurement axes. The inclinometer working principle is based on a micromachined silicon capacitive transducer (developed with MEMS technology). The plastic housing is made in high grade PBT. Typical application are cranes, aerial platforms, drilling machines, excavators, robotics and mobile equipment. DPS-K-ON features a single relay output. Relay switching points are factory set but cannot be changed by the customer, yet they can be chosen while ordering.



### Features

- MEMS sensing unit;
- one or two measuring axis;
- High grade plastic enclosure;
- Angle Range:  $\pm 5^\circ$  to  $\pm 20^\circ$ ;
- Input Voltage: 9VDC to 30VDC;
- Output: Single relay output;
- Zero function;
- Operating Temperature:  $-20^\circ\text{C}$  +  $70^\circ\text{C}$ ;
- IP67 protection;
- Weight 240g;
- Cable exit with cable gland for relay connection;

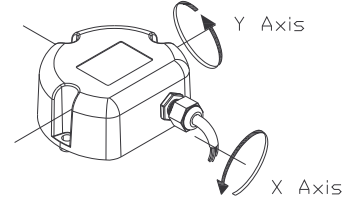
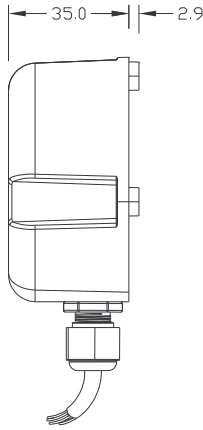
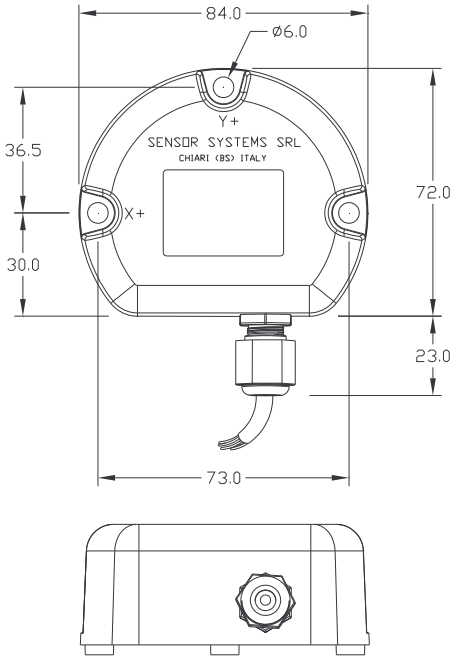
### Technical specifications

Measuring range (selectable)	$^\circ$	$\pm 5$ to $\pm 20$
measuring axes	-	single or double
Input voltage	V	9 to 30
Output	-	Single Relay
Current consumption	mA	200
Operating temperature range	$^\circ\text{C}$	$-40^\circ + 70^\circ$
Stocking Temperature	$^\circ\text{C}$	$-40^\circ + 80^\circ$
Alarm switch-on delay time	s	0.5 (factory default)
Alarm switch-off delay time	s	0.5 (factory default)
Thermal zero drift	$^\circ / ^\circ\text{C}$	$\pm 0.002$

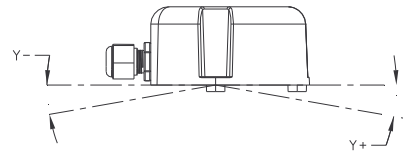
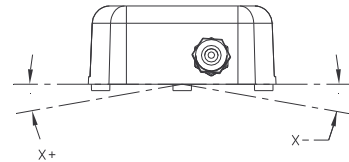


# MOBILE AUTOMATION

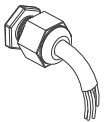
## Dimensions and mounting



Mounting:  
Horizontal  
Tilt:  
positive rotation  
shown in figure



## Connections



- Green: Relay 1 NC      White: V+ (Voltage supply 10-30 Vdc)
- Gray: Relay 1 NA     Yellow: V-
- Blue: Relay CDM      Brown: Zero
- Pink: PNP1 Output

Relay Switching points			
X+	5°	Y+	5°
X-	5°	Y-	5°
5° set as factory default. Factory settings can be decided by user only while ordering			

## Ordering informations

Ordering Information	
DPS-K-□N-XX-XX-XX	
□P: for Horizontal mounting (progr version); □N: hor mount, non progr. verison)	
XX: Angle range	
XX: Switch angle Y	
XX: Switch angle X	

