

<RoHS Compliance> CP-3HABS

FEATURES

- Substitution model of QP-3HA
- Dust, Drip proof
- Low cost
- Dual Output, 6Pin Connector, Return Spring

Model No. Designation

CP-3HABS-211-01

Return Spring : 0=No, 1=Yes

Drip Proof : 0=No, 1=Yes

Output : 1=single, 2=dual

Electrical Specifications

Electrical Angle	$\pm 45^\circ$
Output Range	10~90%Vin
Absolute Linearity (Independent. Linearity)	$\pm 4\%FS$ (FS=90°) ($\pm 3\%FS$)
Input Voltage	DC5V $\pm 0.5\%$
Load Resistance	10K MIN.
Supply Current	20mA MAX.
Insulation Resistance	DC50V 100M MIN.
Resolution	12 Bit
Hysteresis	0.3° MAX.
Temp.Characteristics -40~125 (ReferenceTemp.25)	@0° : $\pm 2^\circ$ @ $\pm 45^\circ$: $\pm 4^\circ$

Mechanical Specification

Mechanical Angle	120° $\pm 5^\circ$
Stopper Strength	1N · m MIN.
Torque	5 ~ 60mN · m
Weight	Approx. 30g
Shaft Radial Load	6N MIN.
Shaft Thrust Load	3N MIN.

Environmental Specification

Life Cycles	50M Cycle MIN.
Vibration	200m/S 5 ~ 500Hz (6 min) 3axis 2hours
Shock	1000m/S ² 6ms 3axis 3times
EMS	100V/m 200MHz ~ 1GHz
Operating Temp.	-40 ~ 125
Storage Temp.	-40 ~ 125
ESD(Case~Each Terminal)	$\pm 16kV$ (IEC61000-4-2)
ESD(Each Terminal)	$\pm 8kV$ (IEC61000-4-2)
IP Level	IP65

OPTIONS

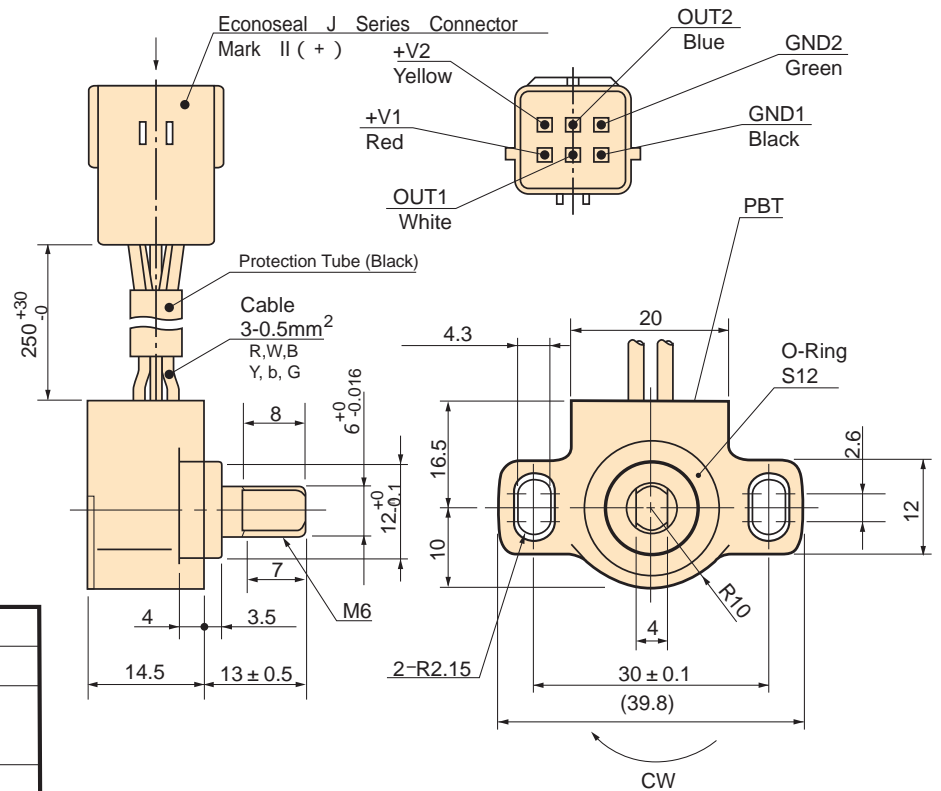
- Single Output
- Dual Output (Parallel Outputs)
- Electrical Angle: $\pm 30^\circ$
- Without Return Spring (D-cut Shaft)



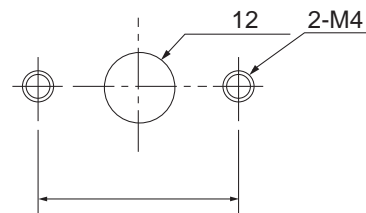
HANDLING INSTRUCTION

- This product may be influenced from external magnetic field of apparatus which generates a magnetic field.
- Use this sensor in the place where is protected from ESD

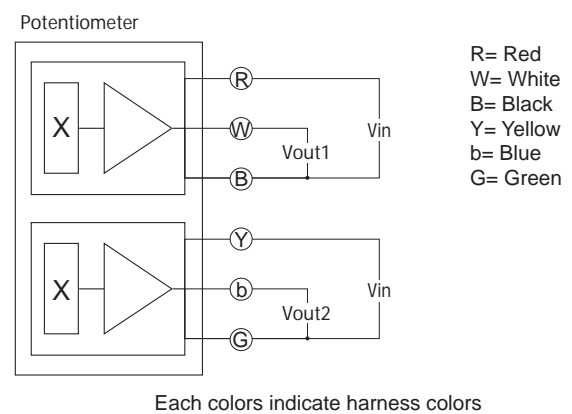
DIMENSION (mm)



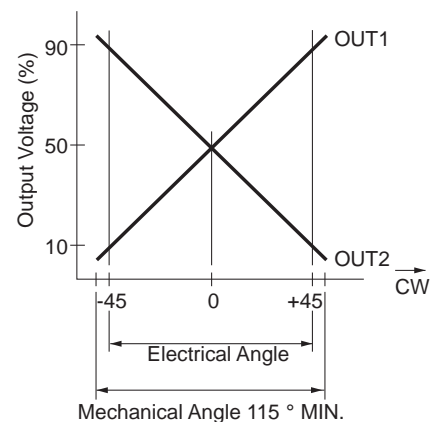
MOUNTING



SCHEMATIC



OUTPUT CHARACTERISTICS



- Cross output for Self-diagnosis function:
Output 1 + Output 2 = 100 $\pm 6.4\%$