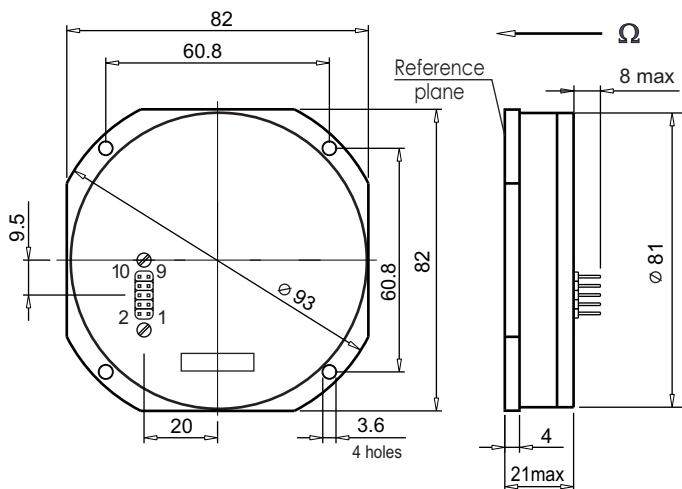


OUTLINE DRAWING



MAIN PARAMETERS (typical values)

- ◆ Rate range 150 deg/s
- ◆ Scale Factor (SF) 7 mV/deg/s
- ◆ Frequency range 0... 0.45 kHz
- ◆ Angle random walk 0.02 deg / \sqrt{h}
- ◆ Bias stability, RMS 1 deg / h
- ◆ SF stability, RMS 0.1 %
- ◆ Readiness time 0.1 s

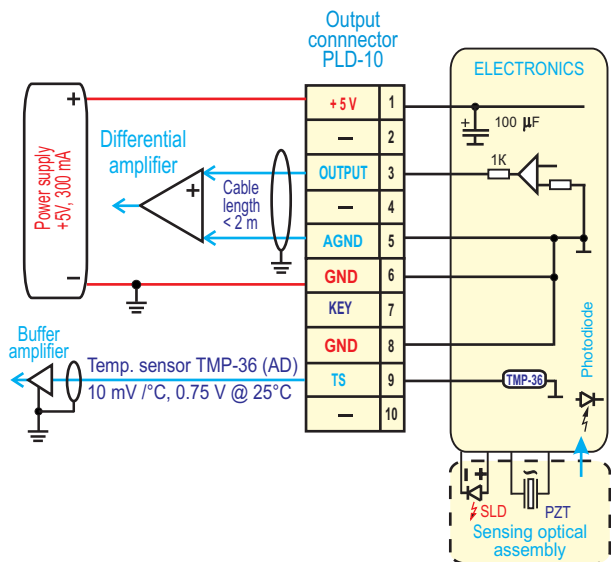
ENVIRONMENT

- ◆◆◆ Temperature operating -30°C ... +70°C
- ◆◆◆ Temperature endurance -55°C... +75°C
- ◆◆ Vibration (operating), RMS 2 g, 20Hz... 2000Hz
- ◆◆ Vibration (endurance), RMS 6 g, 20Hz... 2000Hz
- ◆◆ Shocks (endurance) 90 g, 1 ms
- ◆◆ Acceleration (operating) 5 g
- ◆◆ Acceleration (endurance) 20 g, 5 s

RELIABILITY

- ◆◆◆ MTBF 60000 hours (20°C, predicted)
- ◆◆◆ Lifetime (predicted) 15 years
- ◆◆ Precision class - ④
- ◆◆ Estimated for low humidity
- ◆◆◆ Operating temperature - temperature of built-in temperature sensor
- ◆◆◆ Endurance temperature - environment temperature. Sensor is turned off.

CONNECTION DIAGRAM



DESCRIPTION OF OUTPUT CONNECTOR PLD-10

| Contact | Name | Comments |
|---------|--------|---|
| 1 | + 5 V | Power input +5V ± 0.25V, 200mA max, ripple 10mV max within 0-1MHz |
| 2, 4 | - | Reserved |
| 3 | OUTPUT | Output voltage proportional to rotation, scale factor 7 mV/deg/sec. Differential input recommended. |
| 5 | AGND | Analog ground to use with "OUTPUT". Differential input recommended. Galvanic coupling with "GND". |
| 6, 8 | GND | Power return line, ground |
| 7 | KEY | Shortened pin |
| 9 | TS | Output of temperature sensor (TMP-36) 10mv per deg.C; 0.75V at 25 deg.C |
| 10 | - | Reserved |

RECOMMENDATIONS AND PRECAUTIONS

1. Do not deform housing
2. Fragile components inside - no shocks, no drop
3. Treat as electrostatic sensitive unit
4. Is designed to be mounted inside water protected equipment
5. Increased humidity shortens essentially lifetime
6. Power must be off during connecting
7. Soldering to contacts - by low-temperature solder

PHYSICAL PARAMETERS

1. Ω - sensing axis, $90^\circ \pm 1^\circ$ to the reference plane
2. Dissipation - 1 W
3. Weight - 85 gram (100 gram max)
4. Volume - 0.1 litre
5. Housing material - plastic
6. Tolerances per ISO 2768-m
7. Ingress protection class - IP67