

ACCELEROMETER TRANSDUCER

TA-18/S

The TA-18/S transducers seismically measure absolute machine vibrations by directly fastening the vibrating part on the supports. They provide an output signal directly proportional to the vibration of the point on which they are fastened. This signal can subsequently be processed by a measuring channel of a CEMB "T" or "N" series device.

The TA-18/S transducers exploit the piezoelectric effect, i.e. the capability of a material to provide a difference of potential when mechanically stressed. In this application, a ceramic material subjected to acceleration generates an electrical signal proportional to the stress



TECHNICAL CHARACTERISTICS

GENERAL

| | |
|------------------------|--|
| Type of measurement | ■ seismic (absolute vibration) piezoelectric |
| Sensitivity | ■ 100 mV/g |
| Response in frequency | ■ ± 3 dB 0,5 ÷ 15000 Hz ■ ± 10 % 2 ÷ 10000 Hz |
| Vibration direction | ■ any |
| Dynamic range | ■ ± 50 g pk |
| Transverse sensitivity | ■ < 5 % |

ELECTRICAL

| | |
|-----------------------------|---------------------------|
| Power supply | ■ 2 ÷ 10 mA - 18 ÷ 30 Vdc |
| Output polarization voltage | ■ 10-14 Vdc |
| Output impedance | ■ < 100 ohm |
| Outer casing insulation | ■ > 10 ⁸ ohm |
| Settling time | ■ < 2,5 sec. |

AMBIENT

| | |
|------------------------------------|-------------|
| Protection against shocks | ■ 5000 g pk |
| Protection against external agents | ■ IP68 |

PHYSICAL

| | |
|---------------------------|---------------------------------------|
| Weight | ■ 90 grammi |
| Resonance frequency | ■ 23 kHz |
| Outer casing material | ■ AISI 316-L stainless steel |
| Retaining screw threading | ■ see "dimensions and threads" |
| Connection | ■ MIL-C-5015 2-pin connector provided |
| Tightening torque | ■ 2.7 to 6.8 Nm |

تجهیز انرژی باکhtar

TAJHIZ ENERGY BAKHTAR

TA-18/S

INFORMATION FOR THE ORDER:

A B
TA-18/S / /

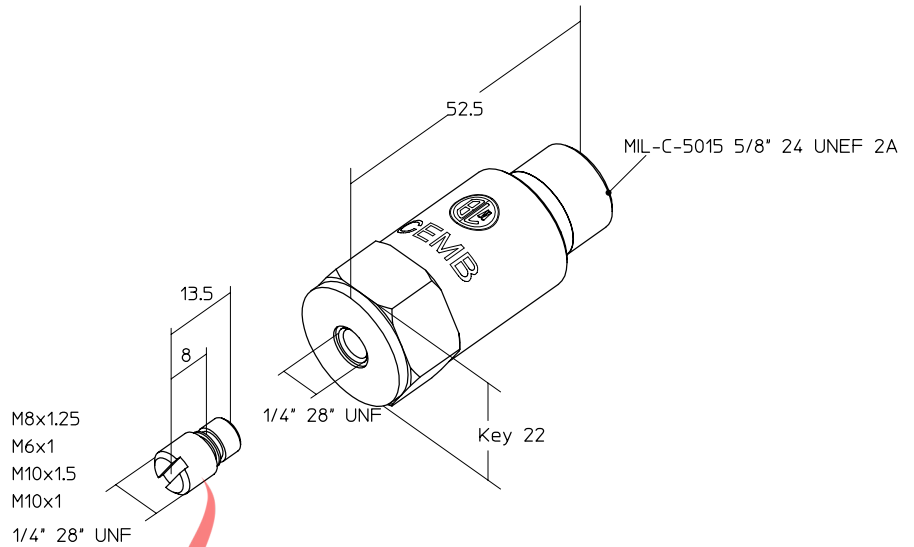
A: RETAINING SCREW

| | |
|---|---|
| 0 | 1/4" - 28 UNF |
| 1 | M8 X 1,25 |
| 2 | M6 X 1 |
| 3 | M10 X 1,5 |
| 4 | M10 X 1 |
| 9 | MULTI THREAD KIT (1/4"-28 UNF - M8X1,25 - M6X1 - M10X1,5) |

B: TEMPERATURE RANGE

| | | | |
|---|------------------|-------|--------|
| 0 | STANDARD | -50°C | +121°C |
| 1 | HIGH TEMPERATURE | -50°C | +150°C |

DIMENSIONS AND THREADS



CABLES AND OPTIONAL ACCESSORIES

CABLES:



SHIELDED CABLE 2X1 STANDARD

CBL / TA-18 / S / 0 / XX (length in meters)

80419-P

ONLY CONNECTORS:



2 PINS STRAIGHT (standard)

597023104



SHIELDED CABLE ARMoured IN ETFE

CBL / TA-18 / E / 0 / XX (length in meters)

87SEA7952



2 PINS 90°

597023108 + 59070352



SHIELDED CABLE 2X1 WITH METAL JACKET COVERED BY PVC

CBL / TA-18 / A / 0 / XX (length in meters)

95743-P

TAGS:

B5MAG10 CY002

PLASTIC TAG

040STR000

B5MAG10 CY002

STAINLESS STEEL TAG

980710835



CEMB
BALANCING MACHINES

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