

3D Crack Meter

Electrical Crack Meter

Vibrating Wire Crack Meter



PRODUCT CATEGORY:
EXTENSOMETERS

Crack Meters

RST's Crack Meters are designed to measure movement across surface cracks and joints. They are easily installed by grouting, bolting or bonding the two threaded anchors (with ball joints) or other mounts, on either side of the crack/joint, and then reattaching the anchors to the sensor. Crack Meters are available in the following configurations:

> AVAILABLE CONFIGURATIONS

ELECTRICAL

VIBRATING WIRE

MECHANICAL (MANUAL)

1D, 2D and 3D

Submersible (up to 200 m) versions are also available (for example, on the upstream perimeter joint of CFRD dams).

> APPLICATIONS

Monitor crack separation or convergence, in concrete structures.

Monitor joints for movement caused by nearby geotechnical activity.

Alarm triggering when separation or convergence of two reference points reach a preset critical rate or value - requires use of data logger and RST's GeoViewer Software (separate brochure).

> FEATURES

Rugged & reliable construction.

High accuracy and readability.

Versatile.

Low cost.

Long-term stability.

Full performance in hostile site conditions.

> BENEFITS

✓ **Increase Safety**

✓ **High Accuracy**

✓ **Increase Productivity**

✓ **High Reliability**

WORKS WITH

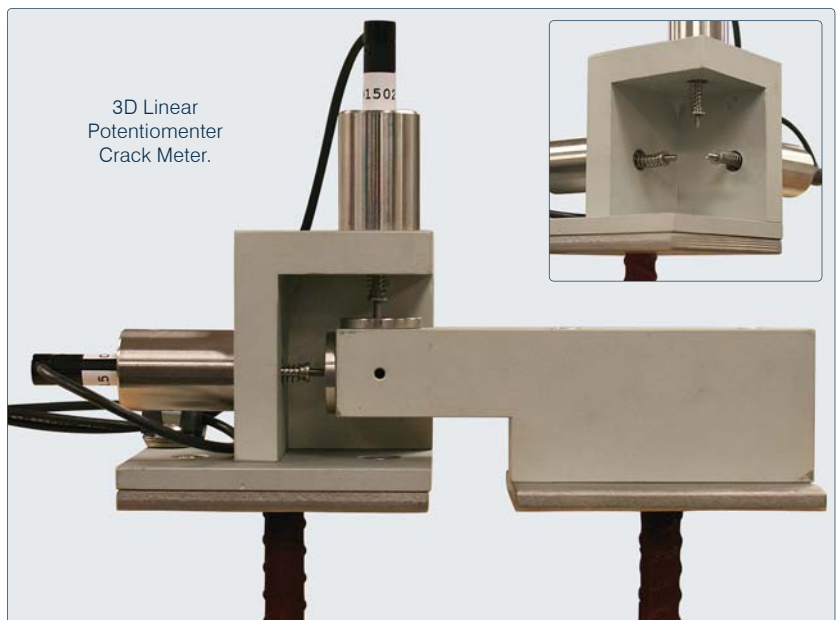


WORKS WITH



READY TO RUN

pre-assembled
pre-wired
pre-tested
pre-programmed



3D Linear
Potentiometer
Crack Meter.

Crack Meters



PRODUCT CATEGORY:
EXTENSOMETERS

SPECIFICATIONS + ORDERING

VIBRATING WIRE

SENSOR SPECIFICATIONS:

DESCRIPTION	SPECIFICATIONS
Range	12, 25, 50, 100, 150, 200 mm
Accuracy	0.1% F.S.
Thermistor Type	NTC 3K Ohms @ 25°C

1D ORDERING INFO:

RANGES	PART #	COLLAPSED LENGTH
12 mm (0.5 in.)	VWCM012	231 mm
25 mm (1.0 in.)	VWCM025	278 mm
50 mm (2.0 in.)	VWCM050	311 mm
100 mm (4.0 in.)	VWCM100	436 mm
150 mm (6.0 in.)	VWCM150	564 mm
200 mm (8.0 in.)	VWCM200	694 mm

3D ORDERING INFO:

DESCRIPTION	PART #
50 mm (2.0 in.)	VWCM3D050
100 mm (4.0 in.)	VWCM3D100

SUBMERSIBLE ORDERING INFO:

DESCRIPTION	PART #
25 mm (1D)	VWCM025S
50 mm (1D)	VWCM050S
100 mm (1D)	VWCM100S
150 mm (1D)	VWCM150S
200 mm (1D)	VWCM200S
50 mm (3D)	VWCM3D050S
100 mm (3D)	VWCM3D100S

CABLE SPECS - FOR VIBRATING WIRE OR ELECTRICAL CRACK METERS

PART #	DESCRIPTION
EL380004	Two twisted pairs cable with polyurethane jacket.

Other types of cables, depending on site conditions and atmospheric reference requirements, are available upon request. These include vented, FEP, PVC, polyurethane, and armored varieties.

ELECTRICAL CRACK METER

SENSOR SPECIFICATIONS:

ELECTRICAL LINEAR POSITION TRANSDUCER

DESCRIPTION	SPECIFICATIONS
Range (in 25 mm/1 in. increments)	12 to 152 mm (0.5 to 6 in.)
Linearity	1% F.S. (0.1% F.S. optional)
Resistance	1500 Ω/in. electrical travel
Operating Temperature	-40° to 212°F (-40°C to 100°C)
Resolution	Infinite
Insulation Resistance	500 M Ω @ 500 Vdc
Dielectric Strength	1000 V rms
Power Rating	0.20 Watt/in. electrical travel
Recommended Wiper Current	<1μA

OPTIONS:

Linearity to ±0.1%
Extended Bar

1D ORDERING INFO:

DESCRIPTION	PART #
50 mm (2 in.)	EXCM1050
100 mm (4 in.)	EXCM1100
150 mm (6 in.)	EXCM1150

3D ORDERING INFO:

DESCRIPTION	PART #
10 mm	EXCM1000-P
Installation Template	EXCM1010

MECHANICAL (MANUAL)

3D ORDERING INFO:

DESCRIPTION	PART #
25 mm (1.0 in.)	EXCM1000
Installation Template	EXCM1010
Depth Micrometer (0 - 150 mm)	EXDM150DT

OPTIONS FOR ALL CRACK METERS

Terminal Boxes
Transducers
Armoured Cable
Lightning Protection
Junction Boxes
Readouts
Data Loggers
Anchor/Mount Types