



In-place Inclinerometer OG310F

Technical features

In-place inclinometer is constituted by a stainless steel body in which is mounted a biaxial or uniaxial sensor. The instrument is equipped with two pairs of opposite wheels which allows inclinometer to follow movement. The distance (wheel base) between the pairs of wheels is 1000 mm (or 24" or 500 mm on demand). The sensor of the probe is a MEMS-type sensors that ensure high robustness with strokes (for example due to possible repositioning in different holes and depths). The sensors are sealed in epoxy resin and resist in conditions of high pressure. The full scale of $\pm 15^\circ$ or $\pm 30^\circ$ allows a measurement resolution and stability appropriate to the normal conditions of use. Measurements can be executed by a portable readout unit or by datalogger placed on the top of the casing. If the management of the measures is automatic OTR has a specific software that allows a real-time monitoring and an relative activation of warning thresholds.

Applications

In-place inclinometer is mainly used for continuous automatic monitoring of landslides, it is also applied in :

- Landslides and unstable areas
- Rock masses and walls
- Tunnels and underground works
- Diaphragms and retaining walls
- Earth and concrete dams
- Foundation piles

Installation

- Placement of in-place inclinometer usually requires manual measurements before installation. The sensor must be placed in the right part of the casing. The wheelbase of 1000 mm allows an easy installation. The probe is suspended in the hole by a steel wire and a suspension steel head.

Related Instrumentation

- Cable 3x2x0.25 PUR
- NTC Thermistors
- Stainless Steel rope
- Suspension Head
- Mounting accessories
- Manual readout Geotester
- Datalogger D4000-D800-D1600-D3200
- OtrMonitoring



Technical specifications



Model	OG310F
Description	In-place inclinometer MEMS sensor monoaxial and biaxial
Working principle	MEMS
Range	$\pm 15^\circ \pm 30^\circ$
Resolution	0.0013°
Power supply	12-18 Vcc
Non linearity	< 0.5% del F.S.
Cross axis	< 1%
Termal drift	<0.002° /K
Operating temperature	Da -20°C a +60°C
Material sensor housing	Stainless Steel AISI 304
Protection degree	IP68

Codes & Part Numbers

P/N 2013010	IN-PLACE INCLINOMETER , 1m MEMS, biaxial $\pm 15^\circ$
P/N 2013011	IN-PLACE INCLINOMETER , 1m MEMS biaxial, $\pm 30^\circ$
P/N 2013012	IN-PLACE INCLINOMETER, 1m MEMS monoaxial, $\pm 15^\circ$
P/N 2013013	IN-PLACE INCLINOMETER, 1m MEMS, monoaxial $\pm 30^\circ$
P/N 2013014	FIXING CLAMP COUPLE
P/N 2013015	STAINLESS STEEL ROPE
P/N 2013016	SUSPENSION HEAD
P/N 2015000	CABLE 3x2x0.25 PUR KEVLAR Halogen Free CAVO PER STRUMENTAZIONE IN FORO