

Mechanical "Ball-in-Tube" Inclinometers

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Shatter-Proof Inclinometers for Measuring Slope Angle & Grade

Overview

RIEKER inc.

Rieker Inc. manufacturers Military Grade inclinometers using precision tube and ball construction. All our tubes are filled with a special damping fluid that controls the movement of the ball and will operate in wide MIL SPEC temperatures.

Our industry leading quality and control standards provides for the smoothest and most consistent roll among any other inclinometer of this type worldwide.

The housing is made of shatter-proof 100% Polycarbonate, making these inclinometers extremely rugged for all types of environments and weather conditions. The large, clear number and degree markings make it easy to get quick, accurate readings clearly visible from 10-feet away.

In ranges of ± 5 , 10, 26 and 45° there is a Rieker Inclinometer to fit most every application.

Rieker Inclinometers are the industry standard for providing real-time tilt of any object in most any environment.

Contact us today for a quote. OEMs welcome, quantity pricing available.

Definition

A Clinometer is any of various surveying instruments for measuring angles of elevation, slope, or incline, with respect to gravity. Also known as an inclinometer, slope meter, or gradiometer, Rieker precision instruments provide accurate real-time measurement of slope angle in Degrees or Percent Grade.

Features

- Military Grade 100%
 Polycarbonate Shatter-Proof!
- ALL-Weather Will Not Rust, Freeze or Hang Up
- Easy Installation bolt on or VHB Tape
- Extreme Shock / Vibration Resistant
- UV Resistant
- MIL SPEC Operating Temperature Range
- Custom Warning Zones (Red/Green)
- 5, 10, 26, 45° ranges
- Backlit available on certain models

Applications

Quick Visual of...

- Boom Angle
- Slope Meter
- Pitch Roll
- Heel Trim
- Tip-over Warning
- Platform Leveling
- Load Balancing

Equipment Types

- Aerial lift trucks
- Aircraft
- Bucket/Utility trucks
- Cranes
- Construction Equipment
- Conveyor and Material Handling Equipment
- Emergency Vehicles
- Fire Aerial Ladder trucks
- Government and Military (wheeled or tracked)
 Vehicles
- Marine Vessels (including sailboats)
- Recreational Vehicles (RV)
- Trailers

Rieker Rugged. Rieker Reliable.™

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2105 GENERAL TECHNICAL DATA

Dimensions	6"w X 1.85"h X 0.375"d (152,4mm X 47mm X 9,6mm)	
Case Material	100% Polycarbonate, IP68	
Operating Temperature	-50°F to +180°F (-45°C to +82°C)	
Measuring Scale	Lower in Degrees (default); Optional Upper in Percent Grade	

2105 STANDARD PART NUMBERS*

2105-B

Degree Range	±5°
Degree Markings	0.5°
Background Color	Black
Markings Color	White



2105-C

Percent Range	±5°
Degree Range	0.5°
Background Color	White
Markings Color	Black



Customer Specified Warning Zones*

Zone Example	Zone 1	0±3º	Green
Zone Example	Zone 2	±35º	Red
Background Color	Black		
Markings Color	White		



*Custom configurations available including adding an upper scale, color warning zones, and backlit housing. Please note that color zones are specified by the customer - your sales representative will be happy to assist.

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2110 GENERAL TECHNICAL DATA

2110 STANDARD PART NUMBERS*

Dimensions	6"w X 1.94"h X 0.375"d (152,4mm X 49,28mm X 9,6mm)	
Case Material	100% Polycarbonate, IP68	
Operating Temperature	-50°F to +180°F (-45°C to +82°C)	
Measuring Scale	Lower in Degrees (default); Optional Upper in Percent Grade	

		2110-A
Degree Range	±10°	
Degree Markings	1°	RIEKER inc.
Background Color	Black	
Markings Color	White	5 0° 5
		2110-F
Dorsont Dongs	1400	

Percent Range	±10°
Degree Range	1°
Background Color	White
Markings Color	Black



Customer Specified Warning Zones*

Zone Example	Zone 1	0±5º	Green
Zone Example	Zone 2	±510º	Red
Background Color	Black		
Markings Color	White		



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2126 GENERAL TECHNICAL DATA

Dimensions	6"W X 2.375"H X 0.375"D (152,4mm X 60,4mm X 9,6mm)	
Case Material	100% Polycarbonate, IP68	
Operating Temperature	-50° F To +180° F (-45°c To +82°c)	
Measuring Scale	Lower In Degrees (Default); Optional Upper In Percent Grade	

2126 STANDARD PART NUMBERS*

2126-C

Degree Range	±26°
Degree Markings	2°
Background Color	Black
Markings Color	White



2126-D (Gradiometer)

Percent Range	Upper Scale	±45%, 5%	
Degree Range	Lower Scale ±26°, 2°		
Background Color	Black		
Markings Color	White		



2126-E

Degree Range	±26°
Degree Markings	2°
Background Color	White
Markings Color	Black



Customer Specified Warning Zones*

Zone Example	Upper Scale	±25% To 45%	Red
Zone Example	Lower Scale	±14 To 26°	Red
Background Color	Black		
Markings Color	White		



*Custom configurations available including adding an upper scale, color warning zones, and backlit housing. Please note that color zones are specified by the customer – your sales representative will be happy to assist. Set-up fee or minimum quantities may apply.

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2145-05 GENERAL TECHNICAL DATA

Dimensions	5.25"w X 2.29"h X 0.42"d (133,4mm X 58,2mm X 10,7mm)	
Case Material	100% Polycarbonate, IP68	
Operating Temperature	-50° F to +180° F (-45°C to +82°C)	
Measuring Scale	±45° lower scale, ±5° upper scale	

2145-05 STANDARD PART NUMBERS*

2145-05-A

Degree Range	Upper Scale	±5°
Degree Markings	Lower Scale	±45°
Background Color	Black	
Markings Color	White	



2145-05-B

Percent Range	Upper Scale	±5°	
Degree Range	Lower Scale	±45°	
Background Color	White		
Markings Color	Black		



Customer Specified Options*:

background color | warning zones | backlit housing

2145-05-C

Color Zone 1	Green	030º	
Color Zone 2	Yellow	n/a	
Color Zone 3	Red	3045º	
Background Color	Black or White		
Markings Color	Black or White		



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610-500-2000



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Available For Models	2105, 2110, 2126 types		
LED (Default)	White		
LED (Optional)	Green, Red, (NVIS available)		
Input Voltage	12VDC		
Electrical Connection	20" wire w/(DTM04-2P) connector		
Outdoor Rating	IP67		



Description

The newest addition to the 2100 Series of rugged and accurate inclinometers is the backlit housing option, adding a highly visible backlight case to the back of the available models for increased safety - especially at night! This back lit version complies with FEMA and National Fire Protection Association (NFPA) 1901 Standards for Automotive Fire Apparatus.

Applications

The 2100 Series is recommended for use on equipment and vehicles where accurate inclination measurements must be taken under difficult conditions and harsh environments. Typical applications include aerial lifts, truck-mounted boom cranes, any fire truck with a mounted boom or ladder, telescoping off-road variable reach fork lifts, cranes and derricks, or any equipment that requires out-of-level or roll-over visual warning indication.

OEM quantity pricing available. Set-up fee or minimum quantities may apply.

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