

GEDO TRACK

SLAB TRACK SURVEY WITH TRACK MEASUREMENT TROLLEY

Slab track, direct fixated and embedded track construction requires fast, accurate measurements and immediate display of results. Trimble GEDO Track is a simply designed, integrated measuring system for high-precision track installation, inspection and quality control. The three-dimensional position of the track as well as the gauge and cant are recorded in a single step. The measured data is compared with the design data and the correction values are displayed on site to enable the construction teams to set up the track. The highly accurate Trimble GEDO Track system is suitable for both conventional and high-speed lines.

TRIMBLE GEDO SYSTEMS

Trimble GEDO systems can be used for various applications in measuring, recording and analyzing track position and track quality, as well as for construction and maintenance activities. The instruments and software of the Trimble GEDO systems are specifically designed for the various surveying tasks on railway lines and simplify the work in the field and in the office. Using standard data formats, information can be exchanged with leading software products for track planning and track maintenance machinery.



SYSTEM CONFIGURATION

Trimble GEDO CE 2.0

Track measurement trolley with sensors for measuring gauge and cant. In combination with a Trimble control unit suitable for use in the field, this forms the basis for a simple and fast acquisition of the most important parameters for assessing track quality. The track measuring trolley can easily be lifted off the track by one person before a train passes through.

Trimble Access Rail Modul GEDO Track Trolley ⁽¹⁾

Software module integrated in Trimble Access, optimized for setting up and checking slab track, direct fixated and embedded track. Based on the measurement, the differences between actual and target are displayed live in the field according to the alignment.

Trimble GEDO Office

Import and preparation of route data and exchange with external systems.

Trimble GEDO Office module Rec

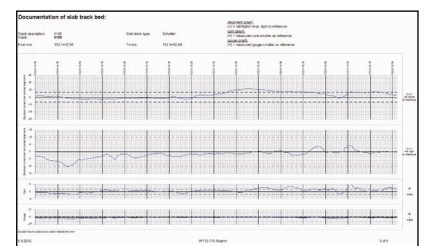
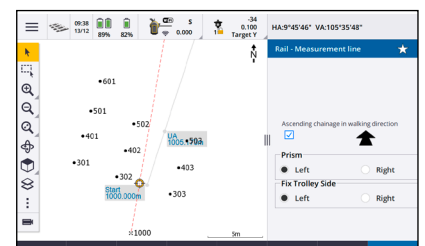
Software for processing and analysing measurements. In addition, the calculation of deviations from a target track position can be carried out.

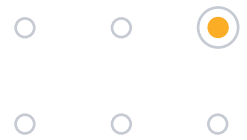
Trimble GEDO Office module Quality

Processing, analysis and verification of measurement data with reports for corrections and documentation for quality assurance.

Key Benefits

- ▶ Shorter construction time and reduced costs through immediate comparison with target data in the field
- ▶ Information on track adjustment for both rails with one measurement
- ▶ Recording of the three-dimensional track position, gauge and cant in one work step
- ▶ Support of all common elements of track design
- ▶ Support of special calculations (e.g. FAKOP® track head widening, load situation on bridges)
- ▶ Reduced time expenditure for documentation and acceptance measurement and rapid reporting for construction companies and quality control
- ▶ Standardized logging of correction values of lateral guidance and height correction plates in graphical and list form





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GENERAL	
APPLICATIONS	
	Track installation for slab track, direct fixated and embedded track construction with rail-bound alignment systems. Track documentation and acceptance for all slab track types, high-speed lines, streetcars, subway railroads, industrial tracks and switches.
SYSTEM ACCURACY	
Inner system accuracy	±3 mm
Positioning accuracy	<1 mm
PERFORMANCE	
Update rate	1 Hz
	200 m up to 400 m/day for track adjustments
	>100 m/h for track documentation and acceptance
Supported instruments ⁽¹⁾	Trimble S-series total stations (e.g. S7, S9) Trimble scanning total stations (e.g. SX10, SX12) Trimble GNSS systems (e.g. R10, R12, R12i) Trimble S9 HP is recommended
Controllers	Trimble TSC7, T7 and T100 controllers (Windows® OS) Trimble TSC5 (Android OS)
Trimble Access Version	2023.10 or above (for Windows OS) 2023.10 or above (for Android OS)
Software compatibility	Trimble Access Rail module GEDO Track Trolley

TRIMBLE GEDO CE 2.0	
Description	Track-mounted trolley
Gauges	1.000 mm, 1.067 mm, 1.435 mm, 1.520 mm, 1.524 mm, 1.600 mm, 1.668 mm (other gauges on request)
Weight	16,8 kg
GAUGE MEASUREMENT	
Range	-20 mm to +60 mm
Accuracy	±0.3 mm
CANT MEASUREMENT	
Range	±9° or ±235 mm at 1.435 mm track gauge
Accuracy	±0.5 mm (static)
BATTERY	
Type	Trimble S-Series Li-Ion, rechargeable
Life	8 - 10 h

⁽¹⁾ Analog to the support in Trimble Access



Line	Track	Station	Elev.	Gauge	Track level		Track level		Track level		Track level	
					Left	Right	Left	Right	Left	Right	Left	Right
1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000

Specifications subject to change without notice.

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