



GM-50 SERIES

REFLECTORLESS TOTAL STATIONS





Reflectorless Total Stations

- Fast and accurate new EDM
- Bluetooth® communications (optional)
- Advanced angle accuracy
- Long battery life – 14 hours
- Rugged, waterproof design with IP66 rating
- 500 m long-range reflectorless measurement
- 50,000 point internal memory

Topcon GM-50 Series total stations – advanced design with superior technology

The GM-50 Series was designed from the ground up to deliver the very latest technological advantages, all in a small, sleek design – you'll appreciate the advantages from the very first measurement.

Featuring a class leading EDM unit, the GM-50 is able to measure up to 4,000 m at 1.5 mm + 2 ppm accuracy, to standard prisms, and can measure in reflectorless mode up to 500 m at an incredible 2 mm + 2 ppm accuracy.

Measurements are captured faster than ever, and with a beam width of 13 mm (at 30 m), the bright red laser dot pinpoints features with ease.

Versatile, Economical Solution

The GM-50 Series is smaller, lighter, with increased storage capacity. Offered at an even more cost-efficient option than previous models, it provides your customers the perfect tool for entry-level site layout and surveying.

Bluetooth® Communication

With integrated Bluetooth® capability and internal antenna, the sleek design enables you to deliver measurements cable-free to your data controller.



Tested for toughness

We perform the tough environmental tests to ensure long-term operation even under the rough site environments. GM Series total stations are thoroughly inspected with dust-proof and water-proof test chambers. In addition, the various tests against vibration, drop, temperature, and humidity were successfully passed to achieve the best environmental spec. The measuring distance accuracy test on base line and the instrument leveling and angle accuracy test and adjustment by collimator system ensure your satisfaction on GM Series product quality.



| Angle Measurement | |
|---|--|
| Min. Resolution/ Accuracy | 2"/5" |
| Min. Display | 1"/5" (0.0002 / 0.001gon, 0.005 / 0.02 mil) |
| Dual-axis compensator / | Dual-axis liquid tilt sensor, working range: ±6' |
| Collimation compensation | On/Off (selectable) |
| Distance Measurement | |
| Prism EDM Range | 4,000 m |
| Prism EDM Accuracy | 1.5 mm + 2 ppm |
| Non-Prism Range | 500 m |
| Non-Prism Accuracy | 2.0 mm + 2 ppm (0.2 - 200 m) |
| Measuring Time | Fine: 0.9 sec Rapid: 0.6 sec Tracking: 0.4 sec |
| Communications | |
| Bluetooth Class 1.5, Operating range: up to 10m | |
| USB flash memory (max. 32GB) | |
| Serial RS-232C, USB2.0 (Type A for USB flash memory) | |
| General | |
| Display | Graphic LCD, 192 x 80 dots, backlight : on/off (Selectable) / Alphanumeric keyboard / 28 keys with backlight |
| Battery Operation | Up to 14 hours |
| Dust/Water Rating | IP66 |
| Operating Temp | -20°C to 60°C* |



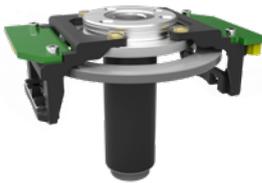
Ultra-powerful, advanced EDM

- 500 m non-prism range
- 4,000 m prism range
- Coaxial red laser pointer
- Pinpoint, precise beamspot



Easy access USB 2.0 memory

- Up to 32GB storage
- Environmentally protected
- Compatible with industry standard thumb drives



Advanced angle encoder system

- 2" or 5" angle accuracy
- Incorporates exclusive IACS
(Independent Angle Calibration System)
on 2" and 5" models



Rugged, waterproof design

- Waterproof/dustproof IP66 design
handles the toughest environments
- Magnesium-alloy housing providing
stable angle accuracy
- Graphic display and alphanumeric key
board (standard)



For more information:
topconpositioning.com/gm-series

Specifications subject to change without notice.
©2018 Topcon Corporation All rights reserved.
7010-2251 A 4/18

The Bluetooth® word mark and logos are registered trademarks owned by Bluetooth SIG, Inc. and any use of such marks by Topcon is under license. Other trademarks and trade names are those of their respective owners.