TOPCON

IS-3 Imaging Robotic Total Station

IS
IMAGING
STATION

Advanced Imaging Technology

- Twin Digital Cameras – Wide Angle and 30x optical zoom TTL
- Intelligent Image Scanning
- XTRAC8 Auto-Tracking
- 2000 m reflectorless measurement
- Long range live video instrument control

It's time.

Imagine the power, accuracy and speed of the proven Topcon QS-A robotic series, give it faster scanning capability and 2 cameras, and you have the IS-3. Advanced imaging and high-accuracy surveying techniques are combined in a single innovative instrument.

How it works:

Topcon's IS combines our proven robotic technology with dual digital Imaging cameras to provide a full colour, real-time image on a touch sensitive LCD display. View your data in real time and utilise the iSCAN options for thorough data collection. Select one of these routines to automatically measure feature points, cross sections or regular grids of points.

Point selection - as precisely as you need.

Thanks to digital imaging using our coaxial Through The Lens (TTL) camera, you can be confident that the point you select on the screen and measure is the point you need! Navigate your site with the wide-angle camera and zoom to pinpoint features which can be measured up to 2000m away. This can be carried out on the IS-3, or remotely on our field controllers, using the new WT-100, controlling the instrument by live video feed up to an amazing 300m away!
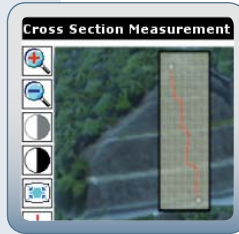
Built on a proven design.

The IS series demonstrates why Topcon continues to be the world's leader in precision survey instrumentation:

- ■ Twin Camera Imaging Solution
- ■ Fast iSCAN scanning routines
- ■ Superior X-TRAC8™ auto-tracking technology
- ■ Long range (2 km) Class 1 reflectorless EDM measurements
- ■ Full WiFi functionality for remote live video capability up to 300m from the instrument
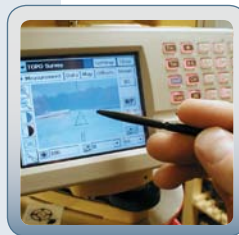
Topcon's new IS series:
Superior Technology – Superior Design – Superior Performance.

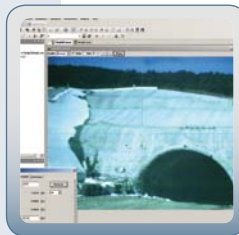## The new IS-3 Series – Advanced technology and modern design

iSCAN Intelligent Scanning Technology

- – Automatic feature detection and measurement – save time in the field
- – Regular grid scan at up to 20 points per second – affordable access to the laser scanning arena
- – Live cross section display based on scanned surface

iDRIVE Touch Control

- – Control the instrument simply by tapping on the touch screen interface
- – Seamlessly switch from rover to reflectorless measurement without having to return to the instrument

iCONTROL

- – Completly cable free Instrument Control
- – Remote Connection via WiFi™
- – Ideal for remote monitoring, Hazadous area or difficult location working
- – Use with PC Based ImageMaster or via WT-100 and Topcon Field Controller

Multiple Communication options

- – 2.4 GHz Interference free spread spectrum Radio
- – WiFi™ connectivity
- – Optional RC-4 for IR remote control and communications
- – Bluetooth®
- – New WT-100 increases WiFi range to an incredible 300m for live video control

Sample Robotic System in one Case

- — IS-3 1″, 3″ or 5″ instrument
- — Charging Cradles
- — FC-250 Controller with TopSURV
- — WT-100 System
- — A7R4 360° prism
- — Li-Ion Batteries
- — TopSURV on Board for IS
- — ImageMaster (Remote Control and Office Processing software)
- — Manuals & Utility software

Smaller – Lighter – Faster – Longer.

The Topcon IS-3 series total stations are the most advanced imaging robotic systems on the market today.

IS
IMAGING STATION

1	2 Digital Cameras (Wide Angle and 30x optical coaxial zoom with TTL)	4	Long range 2000 m reflectorless	7	Intergrated Bluetooth®	10	USB memory stick & CF interface
2	Assisted Focus with Manual override	5	Extended WiFi™ for up to 300 m range remote control	8	Bright Windows CE® colour touchscreen	11	Topcon Tablet
3	Rapid scanning up to 20 points per second	6	Ultra Fast servo motors 85 deg/Sec	9	Built in 2.4 GHz radio	12	Optional WT-100 WiFi™ device

Field Controllers	FC-25A	FC-236	FC-250	FC-2500	GRS-1
Windows OS	Mobile 6.5	Mobile 6.1	Mobile 6.5	CE.net	Mobile 6.1
Integrated WiFi & Bluetooth®	Yes	Yes	Yes	Yes	Yes
Internal Processor	520 MHz	806 MHz	806 MHz	624 MHz	806 MHz
Memory MB / Storage GB	256 / 2	256 / 4	256 / 1	256 / 2	256 / 1
Keyboard	5 Keys keypad*	Numeric*	7 Keys keypad*	Alpha-numeric*	3 Keys keypad*
Optional RS-1 radio module			Yes	Yes	
Internal GNSS	Yes	Yes			RTK
Integrated Camera	3 MP	3 MP		5 MP	2 MP
e Compass	Yes	Yes		Yes	

* All controllers have full on-screen alpha-numeric keyboards

GRS-1

FC-25A

FC-236

FC-250

FC-2500

It's time.

The Leader in Positioning Technology ...

Topcon offers positioning products that deliver unparalleled site-wide performance and integration. Topcon's history of technological advances and our reputation for superior reliability means there's no other company positioned to provide you with a better "Total Positioning Solution."

From survey to inspection Topcon, through our dealer network, provides the innovative technology that gives surveyors, civil engineers, contractors, equipment owners, and operators the competitive edge by addressing such critical issues as increasing profits, quality craftsmanship, improving productivity, lowering operating costs, and enhancing job site safety.

CAPTURE
R E A L I T Y

Full positioning integration field-to-finish: That's the goal of Topcon. When it's time for you to step up to the next level, it's time to turn to Topcon.

The Leader in Customer Satisfaction ...

To ensure that your Topcon instrument maintains peak performance, your local Topcon dealer offers factory trained and certified service technicians. If service isn't available in your area, our European Service Center offers a repair and return policy second to none.

SPECIFICATIONS

	IS-3 1″	IS-3 3″	IS-3 5″
ANGLE MEASUREMENT			
Method	Absolute Reading		
Minimum Reading	0,1 / 0,5 mgon	0,2 / 1 mgon	0,2 / 1 mgon
	0,5″ / 1″	1″ / 5″	1″ / 5″
Accuracy	0,3 mgon / 1″	1 mgon / 3″	1.5mgon / 5″
Tilt Correction	Dual Axis		
Compensating Range	±6′		
DISTANCE MEASUREMENT			
Prism Mode			
– Range 1 / 3 / 9 prism	3000 m / 4000 m / 5000 m		
– Accuracy	±(2 mm + 2 ppm x D*) m.s.e.		
Non-Prism Mode			
– Short Range	1,5 m - 250 m		
Accuracy	±3 mm m.s.e.		
– Long Range	5,0 m - 2000 m		
Accuracy	±(10 mm + 10 ppm x D*) m.s.e.		
Rapid scan	Up to 20 Hz ±5 mm m.s.e.		
EDM Laser Class	Class 1 (IEC publication 825)		
AUTOMATIC TRACKING			
Tracking Speed	15°/sec		
Tracking Range	1000 m (with standard prism)		
Rotating Speed	85°/sec		
IMAGING			
Cameras	2 x 1.3 Mp ccd, wide angle apparent resolution equivalence to 4.8 Mp		
Image Speed	up to 15 fps		
USER INTERFACE - FEATURE RECOGNITION SYSTEM			
OS	Microsoft Windows CE®.NET 5.0		
Processor	Intel PXA255 400 MHz		
Screen	3.5″ TFT Full colour touch-screen		
Interface	RS-232C / Compact Flash / USB(Type A,Type B mini)		
Memory	128MB RAM, 2MB Flash ROM, 1GB micro SD Card		

TOPCON
www.topcon.eu

Your local authorised Topcon distributor is:

grafit-werbeagentur.de