

SPECIFICATIONS

		N41	N40	N4
Distance Measurement				
Max. Range	Reflectorless	1000m	1000m	600m
	1 Prism	3.5km/ under good condition 4.0km		
	3 Prism	5.0km		
	Mini Prism	800m		
	Sheet	1.2km		
Accuracy	Reflectorless	± (3 + 2ppm × D) mm		
	Reflector	± (1 + 1ppm × D) mm	± (2 + 2ppm × D) mm	
Reading		Maximum: 9999999.999m; Minimum: 1mm		
Measuring Time		Fine Mode: <1.2s; Tracking Mode: <0.3s; Repeat: <0.7s		
Atmospheric Correction		Auto Correction		
Prism Constant		Auto Correction		
Angle Measurement				
Measurement Method		Absolute Encoding		
Diameter of the Absolute Encoding Disk (Horizontal/Vertical)		79mm		
Minimum Reading		0.1″ / 1″ Optional		
Accuracy	ISO 17123-3	1″	2″	
Detection Method		Horizontal: Dual		Vertical: Dual
Telescope				
Image		Erect		
Length		152mm		
Effective Aperture		45mm, (DTM: 47mm)		
Magnification		30 X		
Field of View		1° 30′		
Minimum Focus		3″		
Minimum Focussing Distance		1.3m		
Reticle Illumination		Adjustable		
Automatic Compensator				
System		Dual Axis Liquid-electric Sensor Compensation		
Working Range		± 6′		
Accuracy		1″		
Sensitivity of Vial				
Plate Vial		30″ / 2mm		
Circular Vial		8′ / 2mm		
Optical Plummet				
Image		Erect		
Magnification		3 X		
Focusing Range		0.3m ~ ∞		
Field of View		5°		
Laser plummet (optional)		5 levels adjustable		
Camera (Optional)				
Pixel		780000		
Focal length		16mm		
Field of view		12.5 × 11.7 degree		
Refresh rate		11 frames/s		
Deep of field		2m - ∞		
Digital zoom		1 X, 2 X, 3 X		
White balance		Automatic		
General				
Display		3.5 inches LCD, 320 × 240 dpi Touch Screen backlight, contrast adjustment		
Keyboard		Alphanumeric Keyboard/ 30 keys with backlight		
EDM Trigger Key		Quick Measure Key located on side cover		
Laser pointer		Easy to find target		
Guide light (optional)		Indicates correct position fast and easy		
Bluetooth		Easier way to transfer data and connect with controller		
Communication				
SD card		Supportable		
Serial I/F Port		USB flash disk/ RS-232C/ USB Mini-B/ SD card/ BLUETOOTH		
On-board Battery				
Power Supply		Rechargeable Lithium Battery		
Voltage		7.4 V dc		
Operating Time		Operating Period with Single Angle and Measurement every 30 seconds 8 hours		
Physical				
Dimension		L206 × W200 × H353 mm		
Weight(without battery)		6Kg		
IP Standard		IP54		
Data Storage	Internal Memory	98M, ready for 833,000 data blocks		
	External Memory	SD Card 8GB, ready for approx. 34,000,000 data blocks 8G USB Flash disk, ready for approx. 68,000,000 data blocks		
Working Temperature		-20℃ — 50℃		

ACCESSORIES



N4 Series
TOTAL STATION



**SOUTH SURVEYING & MAPPING
INSTRUMENT CO.,LTD.**
www.southsurvey.com
www.southinstrument.com

KEY FEATURES



Bluetooth 4.0



Data transfer and storage
Flash disk and SD card,
Mini USB.



T-P sensor, automatic correction



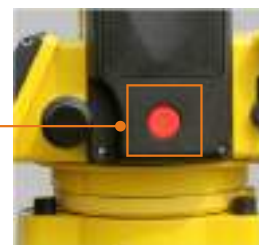
Concentrated ball bearing
Solve axis jam, more stable and
reliable.



Camera Optional for N40/N41



1000m/600m reflectorless EDM
Laser pointer, easy to find target



EDM Trigger Key
Special design for quick
measurement

Control panel with high resolution
touch screen
Back-lights keypad with 3.5 inch colorful
LCD touch screen, display for easy viewing
of graphics and operations.
Active screen back-light technology



HD
Display



T/P
Sensor



4-probe
Encoding



Dual
Compensation



Laser
Plummet



Bluetooth



SD
Storage



USB
Interface

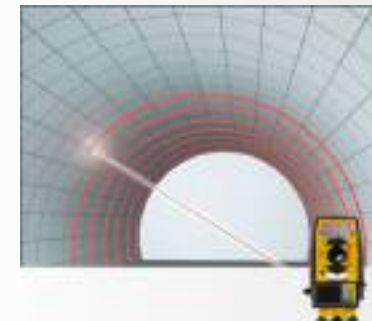
TUNNEL MEASUREMENT



Overbreak & Underbreak



Restoration Construction



Reflectorless Cross-section Measurement



Program optional for N4 Series

Powerful

- Integrated the Random detection of overbreak & underbreak, Excavation contour line lofting, Cross-section measurement, Points & lines lay-out and Data processing as a whole

Simplify

- One-key operation to finish the data seamless transform among modules

Precise

- Millimeter accuracy ensured by considering various plane curve and vertical curve, contour shape and tunnel interface in same time



CONTROLLER



Powerful application platform

- Increase efficiency with data controller

Combine with different kinds of fieldwork software

- EGStar, Field Genius, etc.

