

DUNA 9 – Robotic Total Station



Professional Choice for Monitoring Projects

Backed by a 5-megapixel camera and advanced multi-prism recognition technology, DUNA 9 delivers fast, reliable robotic performance even in narrow fields of view. Designed for demanding monitoring applications such as tunnels, bridges, and dams.

Details

- 0.5" / 1" angular accuracy
- 1 + 1 ppm distance accuracy
- Torque drive, 180°/s
- Auto prism recognition: 3000 m
- Prism search: 300 m, H: 360°, V: 20°
- Guide light in red and green
- Camera for target aiming assistance
- DUNA Collect onboard program
- Real-time data transmission
- Continuous power supply via RS-232
- Free to build your own monitoring system
- IP65 for humid environment

Specifications

Angle

SUREWAY LTD – I always have a way.

Accuracy	0.5" / 1"
Method	Absolute Encoding
Detecting System	H: quadruple, V: quadruple
Minimum Reading	0.1"
Diameter of Circle	79 mm
Vertical Angle	Zenith 0
Horizontal Angle	Horizontal 0
Unit	360° / 400 gon / 6400 mil
Distance	
With Reflector – Range	3500 m
With Reflector – Accuracy	0.8 + 1 ppm (0.5"), 1 + 1 ppm (1")
Measure Interval	Fine: 0.7 s, Tracking: 0.3 s
Without Reflector – Range	1000 m
Without Reflector – Accuracy	D ≤ 500 m: 3 + 2 ppm; D > 500 m: 5 + 2 ppm
Measure Interval (No Prism)	T < 600 m: 0.5–3 s; T > 600 m: <10 s
Telescopic	
Image	Erect
Length	164.5 mm
Diameter	45 mm, EDM 47 mm
Magnification	30×
Resolving Power	3"
Field of View	1°30'
Minimum Focus	1.5 m
Robotics	

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Drive	Torque drive
Speed	180°/s
Auto Prism Recognize	1.5–3000 m
Prism Search Range	1.5–300 m
Search Range	V: 20°, H: 360°
Prism Lock	Yes
Prism Track	No
Compensator	
Tilt Sensor	Dual-axis electric sensor
Range	4'
Accuracy	1"
Level	
Circular Level	6' / 2 mm
Laser Plummet	
Type	635 nm, Class II
Accuracy	0.4 mm at 1.5 m height
Spot	1.8 mm at 1.5 m height
General	
Display	6-inch color touch screen
Keys	3 keys
Camera	5 MP
Guide Light	Red, green
OS	Android 9.0
Internal Memory	RAM 3 GB, ROM 32 GB
CPU	MSM8953

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I/O Interfaces	RS232, Micro USB
Bluetooth	Bluetooth 4.0
WLAN	Dual-band 802.11 a/b/g/n
Power Supply	
Battery	14.4 V, 6400 mAh Li-ion
Working Duration	8 hours
Waterproof/Dustproof	IP65
Operating Temperature	–20 °C to +50 °C
Physical	
Dimension	430 × 255 × 435 mm
Weight	9.3 kg