



# **E200**

# Designed for Rover

E200 is a rover receiver by eSurvey GNSS. The durable IP67 design makes it possible to work in various of environments. Multi constellation and frequency tracking always gives a Fixed solution for your job. The Global 4G Network and RX radio makes it suitable as a rover station.

### Multi-constellation and multi-frequency

With 800 channels of GNSS tracking, E200 provides stable and reliable accuracy. All GNSS signals are coming with standard including GPS, BDS, GLONASS, GALILEO, QZSS and SBAS.

## MEMS Dynamic Tilt Survey

eSurvey's innovation tilt survey solution provides a surprising experience. The sensor is adapted to various of working environments and can be ready within 10 sec. Maximum 60° incline angle ensures a tilt-to-go survey without stopping your work.

#### L-band Atlas

Atlas is a service to provide global precision correction service over L-band satellites. With ATLAS subscription, E200 is able to achieve centimeter accuracy without any base station.

#### aRTK

Powered by Atlas, the innovative aRTK technology operates on any Atlas-capable device by enabling it to maintain RTK-level accuracy, availability, and reliability when RTK corrections fail without additional cost.

#### Web UI

It is able to view position status, set up working mode, download data and update firmware from Web user interface with any phone, tablet or PC.

#### Intelligent Voice

E200 will broadcast voice automatically to remind user the solution status is changed. It is also able to manually broadcast current working mode and solution status by short pressing power button.

#### Lightweight and Small-size

E200 is light-weight design and is good for hand carrying. The small size design makes it possible for various of applications such as car and machine control

#### Rugged Design

E200 main body is using magnesium materials to provide strong shock and vibration resistant characteristics. IP67 certification ensures operation in various of tough environments.

# **Product Specification**

GNSS		Internal Radio	
Satellites Tracking	GPS: L1CA/L1P/L1C/L2P/L2C/L5 BDS: B1I/B2I/B3I/B1C/B2a/B2b/ ACEBOC GLONASS: G1/G2/G3, P1/P2	Туре	RX Only
		Frequency Range	410 ~ 470 MHz
		Channel Spacing	12.5 KHz / 25 KHz
		Protocol	Satel, PCC, TrimTalk, TrimMark III,
	GALILEO: E1/E5a/E5b/E6/ALTBOC		South, HiTarget
	QZSS: L1CA/L1C/L2C/L5/LEX IRNSS: L5 SBAS¹: L1, L5	Internet Modem	
	L-Band: Atlas H10/H30/Basic	Support Band	Global GSM /WCDMA/LTE
Channels	800		
Signal Reacquisition	< 1 sec	Communication	
Cold Start	< 60 sec	Bluetooth	BT 5.0, BLE
Warm Start	< 30 sec	WIFI	802.11 b/g/n
Hot Start	< 10 sec	SIM Card	Support
RTK Signal Initialization	< 8 sec	5-pin Port	Connect to external radio and power NMEA data output
Initialization Reliability	> 99.9%		
Update Rate	10 Hz standard, up to 50 Hz	Type-C Port	Charge and data transmission
Operation System	Linux	Web UI	View status, update firmware, set up
Internal Memory	8 GB		working mode, download data
		Intelligent Voice	Broadcast working status
Performance		NMEA Output	GGA, ZDA, GSA, GSV, GST, VTG, RMC,
High Precision Static	H: 2 mm + 0.1 ppm	·	GLL, Binary
	V: 3 mm + 0.4 ppm	Correction Data	CMR, CMR+, RTCM2, RTCM3, RTCM32
Static/Fast Static	H: 2.5 mm + 0.1 ppm V: 3.5 mm + 0.4 ppm	MEMS	Fast initialization, dynamic tilt survey up to 60°
RTK	H: 8 mm + 1 ppm		1
	V: 15 mm + 1 ppm	Physical	
Code Differential	H: 0.25 m	Dimension	Ф152 mm x H92 mm
	V: 0.45 m	Weight	915 g
SBAS	H: 0.3 m	Operating Temperature	-40°C ~ +65°C
	V: 0.6 m	Storage Temperature	-45°C ~ +80°C
L-Band	Atlas H10: 4 cm RMS	Water/Dust Proof	IP67
	Atlas H30: 15 cm RMS	Shock	Survive a 2 m drop on concrete floor
	Atlas Basic: 30 cm RMS	Vibration	Vibration resistant
		Humidity	Up to 100%
Power Supply	T	Indicators	Satellites, datalink, battery, Bluetooth
Battery	Rechargeable and built-in Lithium-ion battery, 7.2 V ~ 6800 mAh	Button	Power button, short press to voice
Voltage	9~28 VD, with over-voltage protection	Contification	broadcast status
Working Time	RTK: 10 hours	Certificate	CE, FCC, NGS Calibration
	Static: 14 hours		
Charging Time	Typically 4 hours		



Tel: +86 21 54467213 Email: info@esurvey-gnss.com Web: www.esurvey-gnss.com Edition: 20210519