

PERFORMANCE SPECIFICATIONS

Satellite Signals Tracked Simultaneously ¹

Channels.....	866
GPS.....	L1, L2, L5
GLONASS.....	L1, L2
BDS.....	B1, B2, B3
Galileo.....	E1, E5a, E5b
SBAS.....	Support
QZSS.....	Support
Global correction service.....	Hi-RTP (optional)

Positioning Performance

High-precision static GNSS Surveying

Horizontal.....	2.5mm + 0.5ppm RMS
Vertical.....	5mm + 0.5ppm RMS

Real Time Kinematic (RTK)

Horizontal.....	8mm+1ppm RMS
Vertical.....	15mm+1ppm RMS

Tilt Survey Performance

2cm accuracy in the inclination of 30 degree
3cm accuracy in the inclination of 45 degree

DGPS

Horizontal.....	±0.25m+1ppm RMS
Vertical.....	±0.5m+1ppm RMS
SBAS.....	0.5m
Initialization time.....	Typically <10s
Initialization reliability.....	Typically > 99.99%

Communication

Bluetooth 4.2/2.1+EDR, 2.4GHz
Network Communication:
4G cellular mobile network (TDD-LTE, FDD-LTE, WCDMA, EDGE, GPRS, GSM)
WiFi frequency is 2.4G, support 802.11b/g/n protocol.

Internal UHF Radio

Frequency.....	410-470MHzMHz
Channels.....	116 (16 scalable)
Transmitting power.....	1~4W Hi-Target Advanced Radio
Supports multiple protocols: HI-TARGET, TRIMTALK450S, TRIMMARK III, TRANSEOT, SATEL-3AS, etc.	
Working Range.....	Typically 3~5km, optimal 5~8km

External UHF Radio

External HDL460A Full Protocols Radio	
Frequency.....	403-473MHz
Channel.....	116 (16 scalable)
Transmitting power.....	10W/35W adjustable
Protocols: HI-TARGET, TRIMTALK450S, TRIMMARK III, TRANSEOT, etc.	
Working Range.....	Typically 8~10km, optimal 15~20km

Physical

Internal Battery

Internal 7.4V/6800mAh lithium-ion rechargeable battery.
Charging: supports USB PD3.0quick charge, Quick charge within 3.5 hours.
RTK Rover (Network) for 10 hours.

External Power

7-28V DC external power input (5-pin port) with over-discharge protection	
Power Consumption.....	4.2W
Support Power Bank charging.	
Dimensions(W×H).....	156mm×77mm
Weight.....	≤1.2kg (includes battery)
Data storage.....	8GB ROM internal storage

Control Panel

Physical Button.....	2
LED Lamp.....	Satellite, Signal

Environment

Water/Dustproof.....	IP68
Shock and Vibration.....	Designed to survive a 2m natural fall onto concrete
Humidity.....	100%, condensing
Operation Temperature.....	-30°C~+70°C
Storage Temperature.....	-40°C~+80°C

I/O Interface

1 × USB port, Type C, OTG function
1 × SMA antenna connector
1 × DC power input (5-pin)
1 × Nano SIM card slot

Data Formats

Output Rate.....	1Hz-20Hz
Static data format.....	GNS, Rinex
Network model.....	VRS, FKP, MAC; supports NTRIP protocol
CMR& RTCM: CMR, RTCM 2.x, RTCM 3.0, RTCM 3.2	
Navigation Outputs ASCII.....	NMEA-0183

*Description and Specifications are subject to change without notice.

1. Compliant, but subject to availability of BDS ICD and Galileo commercial service definition. BDS B3 and Galileo E6 will be provided through future product upgrade.



AUTHORIZED DISTRIBUTION PARTNER

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Hi-Target Surveying Instrument Co. Ltd

ADD: Building 13, Tian'An Technology Zone HQ Center, No. 555,
North of Panyu RD, Panyu District, 511400 Guangzhou, China.
www.hi-target.com.cn +86-20-28688296 info@hi-target.com.cn

CE IP68

iRTK4

A Simple but not Simplistic GNSS System



iRTK4 GNSS RTK SYSTEM

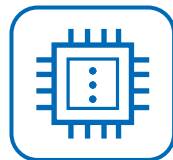


A Simple but not Simplistic GNSS System

iRTK4 is a full-featured, intelligent GNSS receiver system equipped with an integrated new-generation full-frequency antenna and advanced multi-channel engine, allowing users to attain accurate, reliable solutions. Users can also take advantage of calibration-free Tilt-Surveying without leveling the survey pole to collect point data in more places. In addition, the Smart Base function in iRTK4 automatically pairs the Rover with the Base by using Hi-Target global servers and ensuring communication by providing the best connection.

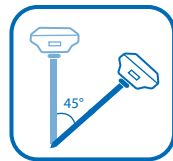
The iRTK4 system can maximize your productivity in unprecedentedly challenging environments with these powerful features and Hi-survey Road Field Software.

KEY FUNCTIONS



Advanced RTK engine

Flexible Satellites signal management helps you to get a more accurate solution and provides a 20 percent improved performance in challenging GNSS environments.



IMU

Immediately starts with calibration-free tilt compensation technology and assists you quickly. It can accurately survey or stake out points without leveling the pole. Its working efficiency is boosted by 20%, with errors less than 3cm within a 45° inclination.



Fast-Charge

Charge your battery up to 50 percent in just 50 minutes with a 45W adapter. Thanks to its fast-charge capability, you can recharge in less time.

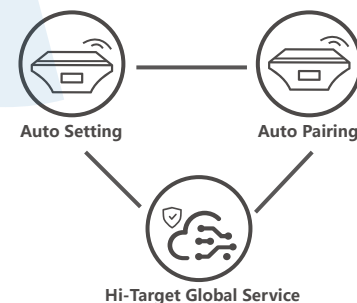


WebUI

A fast and efficient way to monitor and control hardware devices. Also offers access to the most commonly used features via the existing web browser on your device of choice, so there is no need to download or install anything!

Smart Base

Greatly optimizes the working mode setting, automatically pairing your Base and Rover by using the hi-Target global service, extending your work range and saving you time.



Features



IP68



Full-frequency Antenna



OLED



NFC



Magnesium Alloy Case

New Generation External Radio



HDL-460A provides reliable data communications for mission-critical applications that require a combination of stability, supreme performance and long-range.

Hi-Survey Road

Survey Data Collection Software

Hi-Survey Road is an Android software that is designed for all types of land survey and road engineering projects in the field. It is compatible with Hi-Target professional controllers, Android phones, tablets and other third-party Android devices. It is a sleek and easy-to-use software that supports the operating of big data with built-in tools. With customized industrial application solutions, more possibilities are created for users.



HBC

All-in-One Post-Processing Desktop Software

HBC, the all-in-one post-processing desktop software, supports processing multi-sourced data from all kinds of surveying equipment, including RTK, total station, UAV, GIS, 3D laser and levels. This one-stop service simplifies the workflow and improves the efficiency of field data processing.

HBC enables users to finish the joint operations of multiple pieces of equipment in projects more easily, enabling users to fix various problems, like switching between lots of different processing software and data results that are not interconnected, as well as complex, cumbersome workflows.

