T10Pro GNSS Receiver

T10Pro is a latest portable multifunctional GNSS receiver, a new generation of measurement engine, supporting tilt measurement, NFC, built-in 4G Modem, Bluetooth and WIFI. It adopts a new appearance design, magnesium alloy structure and Linux operating system. It is an extremely light-weight, fully functional and portable geodesic GNSS receiver.



HEIGHT | DIAMETER | WEIGHT 68mm | 147.9mm | 740g

CHARACTERISTIC

Linux Intelligent System

ARM Cortex-A7 + Linux, the intelligent system platform, brings efficient computing and unlimited expansion of product functions to users.



Multi Constellation

With its 1408 channels, T10Pro provides an excellent on board real time navigation solution with high accuracy. All GNSS signals (GPS, GLONASS, BDS, GALILEO, QZSS, SBAS and IRNSS) are included.



Tilt Measurement

T10Pro has the IMU module. Fast initialization and up to 60° inclination.

Combined Antenna

The new four in one antenna integrates GNSS, WIFI, Bluetooth and 4G, with smaller volume and better signal.



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4G Modem

T10Pro has an internal 4G Modem that operates with more cellular network signals. A fast internet connection is guaranteed.

Long Endurance

Built-in high-capacity lithium battery ensures continuous working time of more than 16 hours under normal operation.



IP68 Design

Industrial design, solid magnesium alloy shell, in line with IP68 design requirements, safe and reliable.

TECHNICAL PARAMETERS

| | ITEM | SPECIFICATION | REMARKS |
|-------------------------|---------------------------|--|---|
| HARDWARE SYSTEM | | ARM Cortex-A7 1.8GHz | |
| | OS | Linux | |
| GNSS | GPS | L1C/A, L1C, L2P(Y), L2C, L5 | PPP-B2b, PPP-E6, SBAS supported |
| | GLONASS | L1, L2, L3 | |
| | BDS | B1I, B2I, B3I, B1C, B2a, B2b | |
| | GALILEO | E1, E5a, E5b, E6 | |
| | QZSS | L1, L2, L5 | |
| | SBAS | L1 | |
| | NavIC (IRNSS)* | L5* | Requires firmware support |
| | Channel | 1408 | |
| | Data format | NMEA-0183 | |
| | Correction I / O Protocol | RTCM3.X | |
| | Data update frequency | 20Hz(max) | |
| | Recapture Time | <1s | |
| | Cold Boot | <30s | |
| POSITIONING ACCURACY | Single (RMS) | Horizontal: 1.5m ; Vertical: 2.5m | |
| | DGPS(RMS) | Horizontal: 0.4m ; Vertical: 0.8m | |
| | RTK(RMS) | Horizontal: ±(8mm+1ppm) | |
| | | Vertical: ±(15mm+1ppm) | |
| | Time Accuracy (RMS) | 20ns | |
| | Static Accuracy (RMS) | Horizontal: ±(2.5mm+0.5ppm) | |
| | | Vertical: ±(5mm+0.5ppm) | |
| | Speed Accuracy (RMS) | 0.03m/s | |
| | Tilt compensation | ≤2cm | |
| | Accuracy(within 60°) | | |
| SYSTEM | Bluetooth | BR+EDR+BLE | |
| | WIFI | 802.11 b/g/n LTE FDD:B1/2/3/4/5/7/8/12/13/18/19/20/25/26/28 | |
| | Network | LTE TDD: B38/39/40/41 WCDMA: B1/2/4/5/6/8/19 GSM: B2/3/5/8 | |
| | Data Radio | Frequency: 410~470MHz Protocol: TRIMTALK, TRIMMK3, SOUTH, TRANSEOT RF transmit power: 0.5W/1.5W Air baud rate: 9600 / 19200bps | |
| | Storage | 32GB storage | |
| INDICATOR | Power Indicator | Show power status | |
| | Satellite Indicator | Show position status | |
| | Data link Indicator | Show differential signal status | |
| BATTERY | Battery | 3.7V, 9600mAh | |
| | Work time | More than 16 hours (Typical, Rover, GSM) | The static working mode supports continuous data collection for 24 hours under full power. |
| | Charge | MTK PE+1.1/2.0 9V/2A USB PD 12V/1.25A 5V/3A | Support fast charging adapt and adaptively and dynamica adjust charging current. |
| ENVIRONMENTAL | Work Temperature | -20℃~+60℃ | |
| | Storage Temperature | -40℃~+85℃ | |
| | Shock | Withstand 1.5M pole drop | |
| | Protection | IP68 | |
| PHYSICAL | Material | Magnesium alloy main body, ABS/PC top cover | |
| | Dimension | Ф147.9mm*68mm | |
| | Weight | 740g | |
| CERTIFICATION | Regulatory Compliance | | VAN AND |

" Any issue please contact Toknav or local dealers to verify the specific details.



