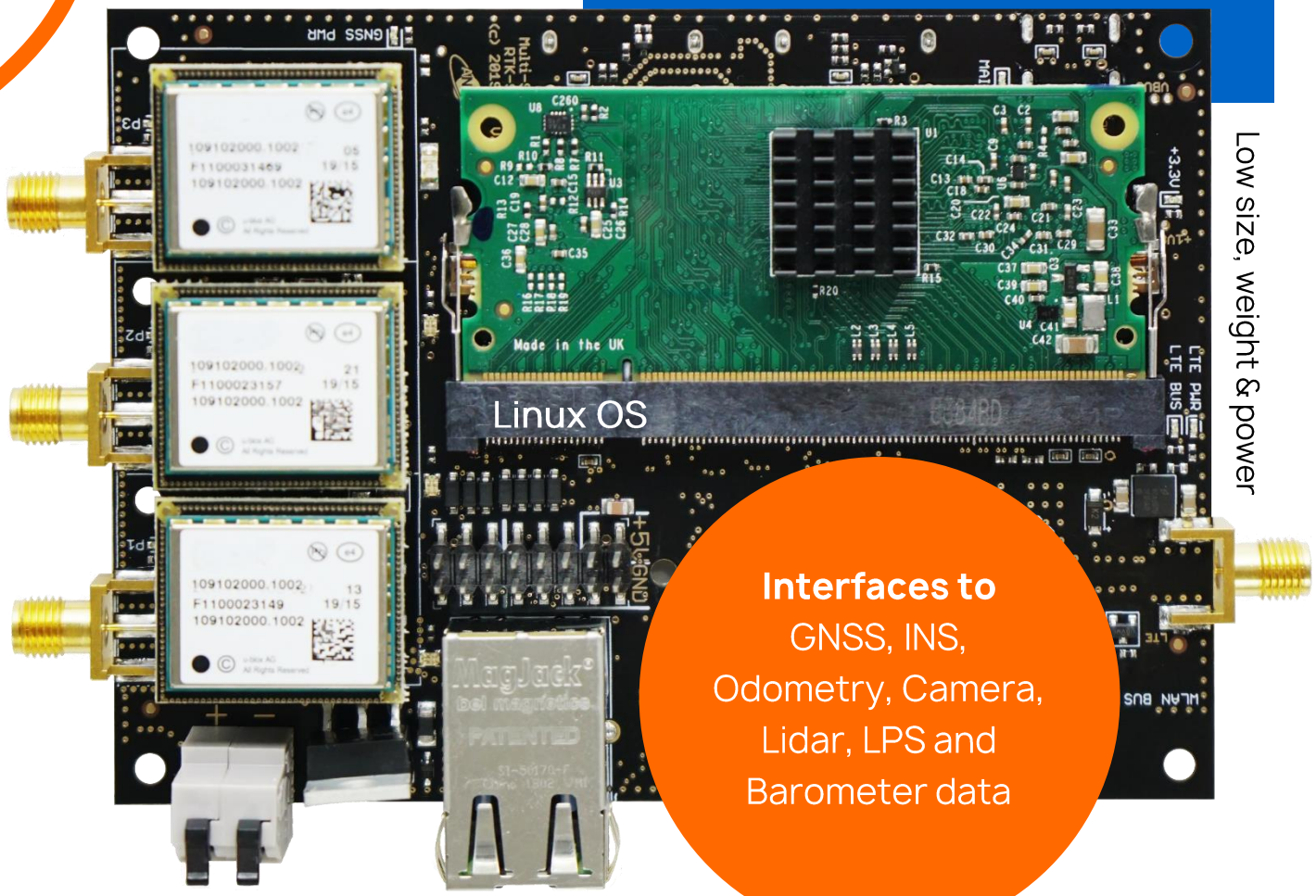
Multi-Sensor RTK Module

WITH ANAVS SENSOR FUSION FRAMEWORK

Dual-Frequency &
Multi-Constellation GNSS
for fast convergence time

Multi-Sensor fusion on a single board for Autonomous Vehicles, Robots, UAVs and Vessels



Low size, weight & power

Interfaces to
GNSS, INS,
Odometry, Camera,
Lidar, LPS and
Barometer data

High rate solution output

Accurate attitude and position

Overcomes signal outages

- Breakthrough price
- Easy System Integration

SENSOR FUSION PERFORMANCE

Accurate Positioning (1σ):
Horizontal accuracy: 0.015 m + 1 ppm
Vertical accuracy: 0.030 m + 1 ppm
Accurate Attitude (1σ):
Accuracy: 0.25° (1m antenna spacing)

Velocity Accuracy: 0.03 m/s RMS
Time-Stamp Accuracy: 1 µs RMS
Solution Output-Rate: up to 120 Hz

RTK Initialization:
Initialization Time: ‹ 10 sec
Initialization Reliability: › 99 %
Solution Latency: ‹ 30 ms

GNSS FEATURES

GNSS Constellations:
Galileo, GPS, Glonass, Beidou, SBAS
GNSS Const. concurrent:
All
GNSS-Bands:
GPS L1C/A L2C,
GLO L1OF L2OF,
GAL E1B/C E5b,
BDS B1I B2I,
QZSS L1C/A L2C
Channels: 184
GNSS data rate: 20 Hz
Jamming detection: Yes
Timepulse-Output: Yes

MECHANICAL & ENVIORNMENTAL

Dimension:
135 x 90 x 30 mm
Weight:
110 g
Temperature:
-40°C to +85°C

ELECTRICAL & INTERFACES

Power Connector:
USB-C 5V or
Terminal connector up to 24V
Power Consumption:
Peak: 10 W (2 A)
Average: 6.5 W (1.3 A)
Communication Interfaces:
Ethernet, WLAN, CAN, UART, LTE
Output format:
Standardized: NMEA format
Proprietary: ANavS binary format

ANAVS

Advanced Navigation Solutions

ANavS GmbH
Gotthardstraße 40, 80686 Munich
Phone: +49 (0) 89 89056721
Fax: +49 (0) 89 89056720
Email: info@anavs.de
Web: http://www.anavs.de