

AEROcontrol Compact TERRAcontrol

up to 600 Hz
data rate



GNSS / IMU system
Compact FOG



GNSS / IMU system
Compact MEMS



The IGI compact GNSS/IMU system is an ALL-IN-ONE solution. It is designed for airborne sensor systems as well as back-pack solutions and other mobile mapping applications. The system can be upgraded to a dual-antenna solution. Because of its compact size and low weight, the new *AEROcontrol* & *TERRAcontrol* also offers direct geo-referencing for RPAS/UAV/MAV systems.

Two different models are available, based on fibre-optic gyros (*Compact FOG*) or MEMS gyros (*Compact MEMS*). Optimized for mobile mapping and airborne applications, there are different accuracy options available (see table on the rear side).

Both systems are export free (no BAFA, no ITAR restrictions)!

SPECIFICATIONS	Compact FOG	Compact MEMS
Physical Dimensions		
Height:	126.5 mm (4.98 inches)	
Width:	98.0 mm (3.86 inches)	
Depth:	153.5 mm (6.04 inches)	
Weight	2.23 kg (4.92 pounds)	1.65 kg (3.64 pounds)
Power Consumption at Full Performance	12 ... 32 VDC 18W @ 24 VDC 20W @ 12 VDC	12 ... 32 VDC 15W @ 24 VDC 16W @ 12 VDC

AEROcontrol / TERRAcontrol Compact™ - Specifications

PERFORMANCE

Performance*	Compact MEMS**	Compact MEMS Plus	Compact FOG-I**	Compact FOG-II**	Compact FOG-III
Position [m]	0.02	0.02	0.02	0.02	0.02
Velocity [m/s]	0.005	0.005	0.005	0.005	0.005
Roll / Pitch [deg]	0.015	0.01	0.008	0.004	0.0025
True heading [deg]	0.03	0.02	0.015	0.01	0.005
Gyro-Bias [deg / h]	1	1	0.03	0.03	0.03
Gyro-RW (Random Walk) [deg / sqrt(h)]	0.07	0.07	0.005	0.005	0.005
Accelerometer Bias [mg]	0.1	0.1	0.3	0.3	0.3
Data rate	up to 400 Hz	up to 600 Hz	up to 256 Hz	up to 256 Hz	up to 600 Hz

PERFORMANCE, after 60 sec GNSS outage

Performance*	Compact MEMS**	Compact MEMS Plus	Compact FOG-I**	Compact FOG-II**	Compact FOG-III
Position [m]	0.3	0.15	0.1	0.06	0.05
Roll / Pitch [deg]	0.018	0.012	0.008	0.004	0.003
True heading [deg]	0.03	0.02	0.015	0.01	0.005

* Post Processing ** Upgrades to higher accuracy possible at any time

INTERFACES

Integrated GNSS Receiver

- 544 channels for tracking GPS (L1, L2, L5), GLONASS (L1, L2, L3), BEIDOU (B1, B2, B3), GALILEO (E5ab, AltBoc, E6), IRNSS (L5), QZSS (L1, L2, L5) & SBAS (EGNOS, WAAS, GAGAN, MSAS, SDCM, L5 tracking) on both antennas
- Precise and robust heading calculation
- L-band channel, support for TERRASTAR corrections

Communication

- Ethernet: Fast Ethernet LAN Port
- Serial Port: 1 x RS232
- Discretes: PPS Output, 3 x Event Mark Input
- Antenna: 2 x SMB type

Options

- Combination with flight management system CCNS-5 or as stand-alone system
- BEIDOU, IRNSS, GALILEO, QZSS & SBAS, TERRASTAR
- Dual Antenna Support
- IGI Precise Leveling for stabilized mounts or IGI Optical Odometer

Processing Software

AEROoffice for INS post-processing,
incl. GrafNav & BINGO30 for GNSS post-processing & aerial triangulation

System control & Data storage

- Webinterface for system control
- 64 GB internal storage
- FTP-server for data download
- External SDCard possibility
- Data rate 64 Hz .. 600 Hz

export free
no BAFA, no ITAR



+49 (0)2732 5525-0



info@igi-systems.com



+49 (0)2732 5525-25



www.igi-systems.com

IGI mbH

Langenauer Str. 46

57223 Kreuztal

Germany