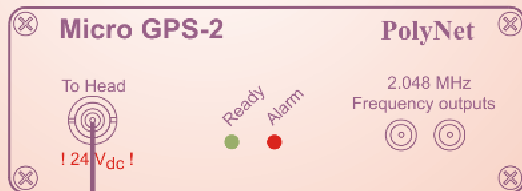


EQUIPMENT FOR HIGH PERFORMANCE SYNCHRONISATION
OF TELECOMMUNICATIONS NETWORK



Micro GPS-2

LOW COST GPS BASED SYNCHRONISATION SOURCE



- ☺ PRC quality output in GPS locked state
- ☺ Default output frequency: 2.048 MHz
- ☺ Optional output frequencies: 1 or 2 or 5 or 10 MHz
- ☺ Two synchronizing outputs
- ☺ Alarm output
- ☺ Low power consumption 3.5W typical
- ☺ Simple installation, low cost head connection cable
- ☺ Full autonomous operation, not need any maintenance

The Micro GPS-2 GPS based synchronization source is a cost effective solution for far end backup synchronisation stations in transmission rings, base stations, remote base station controllers and satellite connected remote stations.

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EQUIPMENT FOR HIGH PERFORMANCE SYNCHRONISATION OF TELECOMMUNICATIONS NETWORK

TECHNICAL DATA

GPS receiver outdoor unit (GPS-OD5)

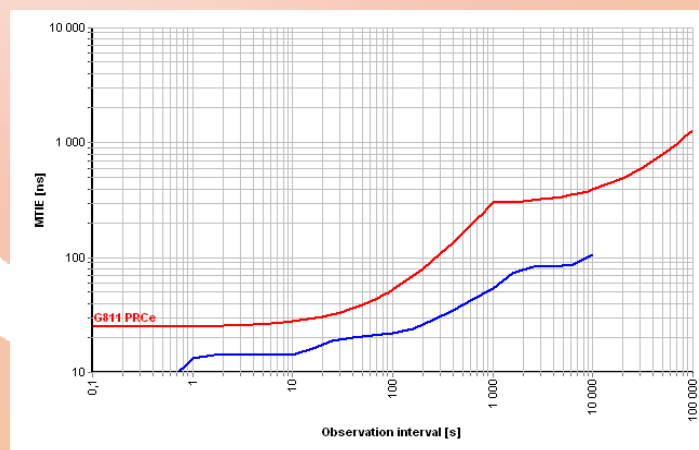
GPS receiver:	12 channel C/A code receiver
Receiver frequency:	L1 carrier, 1575.42 MHz
Updating frequency:	1 Hz
Interface to Micro GPS-2 indoor unit:	Coaxial, 75 ohms; TNC connector
Cable length between outdoor and indoor units:	Max. 100 meters (RG-59 cable)
Power supply:	24 V _{dc}
Environment:	-25...+70°C; IP 67
Dimensions, weight:	125x80x57 mm; 0.4 kg

GPS receiver indoor unit (Micro GPS-2)

Interface to the GPS-OD5 head:	75 ohms, coaxial (1.6/5.6 female connector)
Power supply to the head:	+24 V _{dc} , (150 mA current limited)
Default outputs:	2 x 2.048 MHz, G.703, 75 ohm
Optional output frequencies:	1 MHz, 2 MHz, 5 MHz, 10 MHz
2.048 MHz output connector:	1.0/2.3 female coax
Accuracy:	$\pm 1 \times 10^{-11}$ One day average in GPS locked state
Stability in GPS locked state:	MTIE: EN 300 462-6-1 (1998-05), Figure 1. ITU-T G.811 (09/97) Figure 1
Alarm interface:	Relay contact (max. 60V _{dc} , 100 mA)
Powering:	-36...-72 V _{dc} 6 W max, 3.5W typical
Size, weight:	105 x 38 x 164 mm; 0.4 kg

Synchronising output performance in GPS locked mode

MTIE performance (blue) with PRC limit curve (red)
Measured on 2.048MHz output of the indoor unit



(Test equipment: PolyNet PW 1012D Wander Analyzer, SW version: WaCa 2.31)

Typical installation set

- GPS OD-5 outdoor unit
- Head fixing accessories
- Micro GPS-2 indoor unit
- 20 m outdoor cable to head connection (Preassembled with TNC male – N male connectors)
- Lightening arrester (N - N)
- 5 m indoor cable (Preassembled with N male – 1.6/5.6 male connectors)
- MSTB2.5/3 connector for power cable preparation
- MSTB2.5/2 connector for alarm cable preparation
- 1.0/2.3 connectors for output cable preparation

PolyNet Ltd. reserves the right to change the specifications for improvement without notice.
Issue: Micro_GPS-2_Leaflet_01_en, April 2009.

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