METRO RK
The "Smart" GPS Amplifier System

KEY FEATURES

» Precise control over output signal level

» Passes L1 (L1/L2 optional)

» High frequency selectivity

» Power ON/OFF

» Perfect for any automated test environment and/or in a shielded room

AVAILABLE OPTIONS

» Power Supply AC & DC

» Filter L1/L2

» Antenna monitor

ONLY AVAILABLE TO APPROVED / LICENSED ENTITIES & INTERNATIONAL CUSTOMERS:

» Federal Government or agencies operating under the direction of the Federal Government

» Parties that have received an STA or Experimental License under part 5 of the FCC rules

» Parties operating in an anechoic chamber

INTRODUCTION

GPS Source's METRO marks the integration of the latest GPS smart amplifier technology into a self-contained unit. The METRO RK is a complete kit that includes: METRO, active antenna, passive antenna, swivel mount, pole mount, surge suppressor and cabling. A smart amplifier system, with a simple user interface, it is perfect for the commercial and public sector. It can help anyone working in an automated test environment or in a shielded room, safely bring the GPS signal inside. Derived from high performance systems for military applications, the METRO device features L1 GPS Signals (optional L2 for approved applications) and oscillation detection/ mitigation.

PRECISE CONTROL

With the METRO RK, the user has control over effective radiated power (ERP) levels. This is regardless of the uncertain loss or gain in the receive antenna cable network. It is smart enough to automatically condition the signal and prevent changes in performance.

OSCILLATION DETECTION & AUTOMATIC MITIGATION

The METRO GPS system prevents system oscillation that can occur as a result of improper installation or operation. If the METRO detects oscillation, it will independently reduce the system gain. Even if the METRO is improperly installed or operated incorrectly, it will still prevent system oscillation.

BUILT-IN TROUBLESHOOTING

The METRO will identify and isolate the following:

- Oscillation condition
- High gain
- Low gain
- Short/Open circuit
- Internal component failure
- Less than four satellites
- No satellites with adequate signal
  (call for complete list of conditions)

SYSTEM INCLUDES:

1. METRO
2. Passive Antenna
3. Active Antenna
4. Swivel Mount
5. Pole Mount
6. COPRO Surge Protector
7. 15 ft (4.6m) C240 coaxial cable
8. Up to100 ft (30.48m) C240 coaxial cable (Other cable configurations are available).

OUTPUT PORTS

» Number of ports   1

ELECTRICAL SPECIFICATIONS

» Input/Output impedance   50Ω
» SWR all ports (typical)
  Input: 2:1
  Output: 2:1
» Bandwidth
  L1   1575.42±15 MHz
» Gain (typical)   0-55dB
» Gain flatness   <3 dB
» Noise figure   <3 dB
» AC input level   110 VAC
    230VAC UK
    230VAC European
» DC input level   12 - 28 VDC
» Active Antenna Output
  Power Supply   Output 6.8V

PHYSICAL SPECIFICATIONS

» RF connectors
  N (m, f)
  SMA (m, f)
  TNC (m, f)
» RS232 Serial Connector DB9(F) DCE
» Weight 1.1 lbs (499 g)
» Size: 5.87" x 3.15" x 1.9"
  (149.1mm x 80mm x 48.3mm)
» Operating temperature -40 to +85ºC

LED READOUT

USER INPUT PANEL
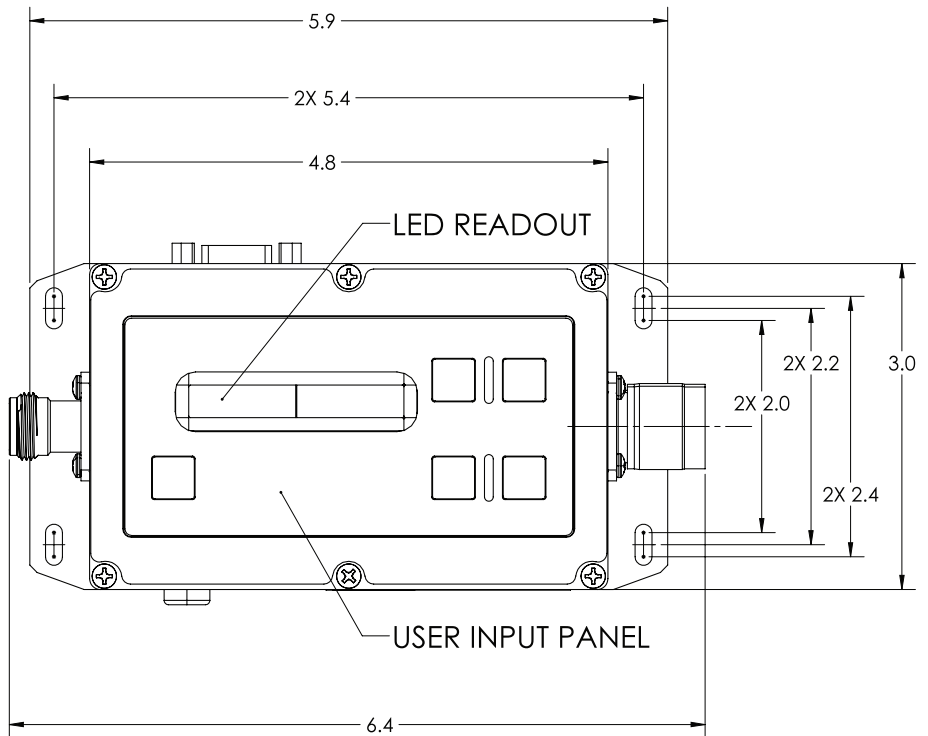
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