

BANDIT™ 2i—MINIATURE TRI-BAND TRANSCEIVER

The new low-cost, lightweight, wideband data link and all-in-one digital transceiver with internal LNA and SSPA

The L3Harris BANDIT 2i Miniature L-, S- and C-Band Transceiver is a low-cost, lightweight, wideband data link and all-in-one digital transceiver adaptable to a wide variety of applications. The BANDIT 2i is the enhanced version and future replacement to the widely deployed and successful L3Harris BANDIT line. With its new tri-band operation, increased output power, standard network interfaces and built-in router, the BANDIT 2i is fully net-ready and is a powerful, tactical gateway into the net-centric battlespace.

PRODUCT DESCRIPTION

The L3Harris BANDIT 2i tri-band transceiver is a small, lightweight and low-power digital transceiver that provides wideband data link capability adaptable to a wide variety of applications. It delivers real-time, IP-based, full-motion digital video for situational awareness, targeting, battle damage assessment, surveillance, video broadcast, remote sensors, convoy operations and other situations where high-resolution video is required. The transceiver is designed primarily to be used on size and weight constrained platforms operating in harsh environments. It is interoperable with other products using the USG and NATO standard waveforms. The L-, S- or C-Band frequencies are centered around standard analog frequency ranges, making the BANDIT 2i software-defined radio a perfect replacement for analog links: and adding better-performing digital signal transmission and improved security.





Low-cost, lightweight, wideband data link all-in-one digital transceiver

KEY FEATURES

- > Low cost and low SWaP
- Digital video and data routing and relay capability
- Symmetric digital data rates up to 45 Mbps
- > FIPS 197 AES Encryption
- Ethernet interfaces for imagery and data transmission
- > Small, ruggedized, all-in-one system—internal amplifier for each band
- > Configurable L- S- or C-Band operation for either transmit or receive
- Interoperable with a wide range of products that support commercial and proprietary waveforms
- > H.264 SD Video Encode (available option)

SPECIFICATIONS

PERFORMANCE CHARACTERISTICS

RF

> Transmit (TX) and Receive (RX) bands (simultaneously uses one band for TX and the other band for RX):

- L-Band: 1,350 MHz to

> 1.390 MHz. 1,755 MHz to 1,850 MHz, 1 KHz steps

- S-Band: 2,025 MHz to

2,500 MHz,

1 KHz steps

- C-Band Low: 4,400 MHz to

4,990 MHz, 1 KHz steps

Encryption

> FIPS 197 AES

Waveforms

- > BE-CDL (modes 1–15, 101–105)
- > Tactical 1.6, 3.2, 6.4
- > ROVER® 466ER
- > Analog FM (transmit only)
- > IW (0.75, 1.5, 3.0, 6.0, 12.0, 24.0, and 42.0 Mbps)

Networking

- > IPv4/IPv6
- > Layer 2 switching or Layer 3 routing
- > DHCP server

External or User Interfaces

- > RS-232 (qty. 1)
- > 10/100 Base-T Ethernet (qty. 2)
- > Web-based GUI
- > SNMPv3

PHYSICAL CHARACTERISTICS

SWaP

- > Size: 5.05" (l) x 2.85" (w) x 0.80" (h)
- > Weight: < 0.6 lb.
- > Power:
 - Input voltage: 10 to 32 VDC
 - Power consumption: 35 watts maximum
 - RF output power: ≥ 33 dBm in all bands

Environmental

- > Altitude: < 70,000 feet (design objective)
- > Temperature:
 - -40 °C to 55 °C, operating (forced air)
 - -55 °C to 85 °C, non-operating

MIL-STD-810G (design objective)

APPLICATIONS

- > Group 1, 2 and 3 UAVs

> Vibration:

- > Smaller manned aircraft
- > Ground ISR/Command and Control platforms



