You get two-way, secure, voice, video and data communications with a completely automatic, self-acquiring 1.2 meter Ku-band antenna. Connectivity is full mesh, reducing network delay by 50% over other TDM/TDMA systems. Reduced delay is critical for real time applications such as VoIP, VTC and other collaborative applications.

ViaSat Dynamic Bandwidth Resource Allocation (DBRA) technology shares bandwidth among remote terminals and adjusts the size of the satellite channel to match data traffic.

An automatic antenna control system enables you to be deployed and operating in less than ten minutes with only one push of a button, and with minimal operator training.

The standard Flyaway is totally plug-and-play, featuring the ViaSat LINKWAY® modem, TCP-PER, FIPS 140-2, Level 2, crypto, router, Ethernet switch, VoIP gateway and an integrated 1.2-meter auto-acquiring antenna for Ku-band operation.

Optional terminal configurations are available for operation on C or Ka band transponders and/or to support vehicular-mounted antennas and/or semi-permanent deployments. Other customizations are available based on customer mission requirements.

The ViaSat IP SATCOM Flyaway Terminal provides a remote office environment, by allowing the user to work wirelessly and securely from any location in the theater of operation.

Applications
- US military or government secure voice, video and data communications
- Unit level C2 or combat support service communications – videoconference, voice and fax support
- Emergency first responders field operations

Benefits
- Any-to-any connectivity with full mesh topology
- Minimal network delays with full mesh topology
- Fully automatic satellite acquisition – One button operation
- Easy transportability (with only 3 transit cases)
- Rapid deployment with minimal training (within 10 minutes)
- Internet or NIPRNET access
- Secure communication via FIPS 140-2, Level 2, 256-bit AES encryption (option for NSA Type 1 encryption)
- Bandwidth efficiency with LINKWAY® IP burst modem (option for LinkStar®, modem)
- Communication priority with IP QoS (Diffserv) and layer 2 prioritization
- Tightly integrated network security with VLAN support

Options
- AltaSec® KG-250, NSA Type 1 certified HAIPIS compliant INE (for SIPRNET or JWICS access)
- LINKWAY® Master Reference Terminal/Network Controller
- Hub/Spoke IP Burst Modem (LinkStar®)
- FDMA-SCPC Modem (EBEM-500, MIL-STD-188-165A/B)
- Vehicular-Mounted Antenna
- WiFi 802.11 (a, b, g or Secure Type 1 encryption)
**SPECIFICATIONS**

**RF/ANTENNA (OUTDOOR UNIT)**
- **Reflector**: 1.2 meter, circular, 4-segment carbon fiber
- **Transmit Frequency**: 14.0 – 14.5 GHz
- **Receive Frequency**: 10.95 – 11.7 GHz, 11.7 – 12.2 GHz or 12.25 – 12.75 GHz with interchangeable LNBs
- **Polarization**: Transmit and receive signals are linear orthogonally polarized
- **SSPA**: 25 Watts (8 Watts optional)
- **EIRP (P1 dB)**: 55.3 dBW (25 W SSPA), midband, typical
- **G/T**: 22.4 dB/K @ 11.95 GHz, 30° EL, clear sky, 23° C, typical
- **Cross-Pol Isolation**: 35 dB with the 1 dB beamwidth
- **Off-Axis Performance**: Meets FCC, ITU, Intelsat and Eutelsat requirements
- **Antenna Pointing Accuracy**: ≤ ±0.1 deg
- **Antenna Position Control**: Auto-Acquire (Motorized EL, AZ and POL axis)
- **Antenna Travel Limits**: AZ: ±200°, EL: 10° to 90°, POL: ±95°

**BASEBAND/RF INTERCONNECT**
- **Cable**: RG 6 Coax (L Band Tx and Rx IF, DC and 10 MHz reference), Multiconductor (Antenna Controller), Multiconductor (SSPA AC Power)
- **Physical**: 50 ft. (100 ft. optional)

**POWER**
- **Prime Power**: 110/220 VAC, single phase, 50/60 Hz
- **Consumption**: 1000 VA (typical), 1210 VA Max

**ENVIRONMENTAL**
- **Temperature Range**: ODU Operational: -25° C to +50° C, IDU Operational: 0° C to +40° C
- **Humidity**: ODU Operational: 0 to 100%, condensing, IDU Operational: 10 to 95%, noncondensing
- **Wind**: Operational: 30 mph gusting to 45 mph with stabilizers deployed

**TRANSPORT CASES**
- **Baseband (IDU)**: Single, SRU rugged transit case 12.9 x 22.5 x 34.5 inches (HWD), @ 90 lbs.
- **RF/Antenna (ODU)**: Two, rugged transit cases Pedestal: 20.5 x 43.0 x 28.5 inches (HWD), @ 170 lbs. Reflector/Feed Boom/RF: 20.5 x 43.0 x 28.5 inches (HWD), @ 135 lbs.

**BASEBAND (INDOOR UNIT)**
- **Antenna Control Unit**: One button operation auto satellite acquisition with integrated GPS/Compass/Level Sensor
- **IP Modem**: LINKWAY (LinkStar or EBEM optional)
- **TCP Accelerator**: TCP Performance Enhancing Proxy (TCP-PEP) for Bandwidth on Demand (BoD) Networks
- **Router/Switch**: Cisco Systems® Router with integrated 1-port Fast Ethernet Switch, supports the following services:
  - TCP, UDP, ICMP, IGMP, RIP, OSPF, NAT/PAT, DHCP, HTTP, FTP, SNMP, Telnet, etc.
  - Firewall
  - IPSec (AES 128, 192 or 256-bit)
  - Crypto certified to FIPS 140-2, Level 2
  - Dynamic Multipoint VPN (DMVPN) tunneling
  - VLAN (802.1q)
  - IP QoS (DiffServ) and layer 2 prioritization
  - Call Control Signaling Support: H.323, MGCP and SIP
  - FXS loop-start and ground-start signaling (FXO Optional)
  - ITU G.711 (64 kbps), G.729 (8 kbps) and G.723.1 (6.3 & 5.3 kbps)
  - Fax Relay Support
  - Echo Cancellation
  - Voice Activity Detection (VAD)
  - Comfort Noise Generation (CNG)
- **Rack PDU**: 1 RU, 12 Outlets, IEC, 20A Circuit Breaker
- **User Interfaces**: 16 ports: 10/100BaseTX (RJ-45) for Data, 4 ports: FXS (RJ-11) for POTS (Telephony)
- **Data Rates**: 3.0 Mbps (full-duplex) maximum terminal IP throughput (link budget dependent)
- **Multiple Access Method**: MF-TDMA (TDM/MF-TDMA [DVB-RCS] or FDMA optional)