## MA-715A HF/VHF/UHF MONITOR ANTENNA



## **High-Performance Tri-Band Antenna**





Use of U.S. DoD visual information does not imply or constitute DoD endorsement.

L-3's MA-715A HF/VHF/UHF Monitor Antenna is used to intercept communications signals over a frequency range of 2 MHz to 3000 MHz. The antenna provides intercepted RF to the monitor receivers of Linkabit's portfolio of Signals Intelligence (SIGINT) Receiver/Processors in the AN/PRD-13(V)2 & (V)3 SIGINT Man-pack System configuration. There are four separate pieces to the MA-715A antenna:

- Antenna base
- HF/low-VHF blade element
- VHF/UHF monopole element
- Flexible gooseneck

The antenna is normally mounted on the handle of the receiver, but may be placed in any convenient location. A three-foot RF coaxial cable is used to connect the MA-715A to the MD-405A/MD-407. However, if the antenna needs to be placed in another location away from the receiver, a longer RF cable can be used. Our MA-715A uses two antenna elements that are combined into a single feed line. The longer, flexible HF/low-VHF blade element covers the frequency range up to 175 MHz. The second rubberduck-type monopole element is used to cover the 175 MHz to 3000 MHz frequency range. The flexible gooseneck can be used between the base and HF/low-VHF blade element to provide a full 90-degree bend over a 360-degree arc. The blade element can then be positioned without bending the element itself.

#### **FEATURES**

- Rugged design to stand up to the harshest of tactical environments
- Very large frequency coverage with a single unit 2 MHz to 3000 MHz
- Bendable blade antenna can be folded into a small form factor for easy storage

#### **BENEFITS**

- Flexible gooseneck antenna allows for numerous collection modes, including prone, standing, unattended and many others.
- By combining multiple antennas into a single package the MA-715A improves the operators' logistics and the systems suffer no downtime waiting for antenna change-outs.
- Easy mounting hardware allows the MA-715A to support a variety of configurations.

# **MA-715A HF/VHF/UHF MONITOR ANTENNA**



### **SPECIFICATIONS**

| PERFORMANCE CHARACTERISTICS                |   |  |  |
|--|---|--|--|
| Frequency coverage                         | 2 MHz to 3000 MHz   |  |  |
| Azimuth coverage                           | 360°  |  |  |
| Elevation coverage                         | 0° to 60°   |  |  |
| Sensitivity <sup>1</sup>                   | Typical<br>2 MHz to 175 MHz: 2 μV/m<br>175 MHz to 2000 MHz: 35 μV/m           |  |  |
| Polarization                               | Vertical  |  |  |
| Output impedance                           | 50 Ohms unbalanced  |  |  |
| Connectors                                 | BNC   |  |  |
| PHYSICAL AND ENVIRONMENTAL CHARACTERISTICS |   |  |  |
| Base dimensions                            | 48 mm x 132 mm x 102 mm   |  |  |
|  | (1.9 in. x 5.2 in. x 4.0 in.)   |  |  |
| Gooseneck height                           | 216 mm (8.5 in.)  |  |  |
| Gooseneck height Element height            | ,   |  |  |
|  | 216 mm (8.5 in.)  |  |  |
| Element height                             | 216 mm (8.5 in.)<br>715 mm (28 in.)   |  |  |
| Element height Weight                      | 216 mm (8.5 in.) 715 mm (28 in.) 0.68 kg (1.5 lb.) (base, gooseneck, element) |  |  |

<sup>1.</sup> Field strength required for a 10 dB S/N in a 10 kHz bandwidth with a receiver NF of 10 dB.

| PART NUMBER  | DESCRIPTION         | INCLUDES   |
|--------------|---------------------|--|
| 02-105675-01 | MA-715A             | Base, HF/VME blade,<br>UHF monopole,<br>gooseneck, manuals |
| 05-103072-01 | Coax Cable Assembly | Coax cable,<br>BNC connectors                              |

#### L-3 Linkabit

9890 Towne Centre Drive

San Diego, CA 92121

Tel: 858.552.9555

Fax: 858.552.9668

Product Service Help Desk: 800.331.9401

Email: LinkabitProducts@L-3com.com

www.L-3com.com/Linkabit

Cleared by DoD/OSR for public release under 16-S-1853 on May 3, 2016. Data, including specifications, contained within this document are summary in nature and subject to change at any time without notice at L-3's discretion. Call for latest revision. All brand names and product names referenced are trademarks, registered trademarks or trade names of their respective holders.