



## FEATURES

- Designed for Space Flight
- Space Heritage Materials and Processes
- Hermetically Sealed Kovar Package
- Low Power Consumption
- Radiation Tolerance: 200kRad
- Multiple Gain Options
- RF Ports Matched to 50 Ohms

## TYPICAL APPLICATIONS

- Commercial Space

## ELECTRICAL SPECIFICATIONS (@ 23°C)

| Parameter                                   | Min                                                                                                                                                                                                                                              | Max   | Typ | Units |
|---------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------|-----|-------|
| Frequency Range                             | 26.00                                                                                                                                                                                                                                            | 40.00 | -   | GHz   |
| Noise Figure                                | -                                                                                                                                                                                                                                                | 2.7   |     | dB    |
| Gain (S21)                                  | 30                                                                                                                                                                                                                                               | -     | -   | dB    |
| Gain Flatness                               | -                                                                                                                                                                                                                                                | 2.5   | -   | ± dB  |
| Output Power @ 1dB Compression Point (P1dB) | 5                                                                                                                                                                                                                                                | -     |     | dBm   |
| Input VSWR (S11)                            | -                                                                                                                                                                                                                                                | 2.5:1 | -   | -     |
| Output VSWR (S22)                           | -                                                                                                                                                                                                                                                | 2.5:1 | -   | -     |
| DC Supply Voltage                           | -                                                                                                                                                                                                                                                | 5*    | -   | VDC   |
| DC Supply Current                           | -                                                                                                                                                                                                                                                | -     | 100 | mA    |
| Standard Hardware Options                   | -BT = Bias through Output<br>-RH = Internal Rad Hard Regulator. Operating Voltage: +8 to +18V                                                                                                                                                    |       |     |       |
| Connector Options                           | -MF = SMA Male / SMA Female<br>-FM = SMA Female / SMA Male<br>-MM = SMA Male / SMA Male                                                                                                                                                          |       |     |       |
| **Screening Options                         | -EM = Engineering Model (No Screening)<br>-H = MIL-PRF-38534, Table C-IX, Class H<br>-K = MIL-PRF-38534, Table C-IX, Class K<br>-N2 = NASA EEE-INST-002, M2, Table 2, Level 2, Non-QML<br>-N1 = NASA EEE-INST-002, M2, Table 2, Level 1, Non-QML |       |     |       |

\*Standard model does not include internal voltage regulator. Must maintain ±2% Voltage and 10 mV Max Ripple

\*\*Screening options do not include Element Evaluation, Group B nor Group C Testing. Consult factory to add these requirements. Engineering Models are built using same materials and processes but are not screened. Not recommended for flight.

## Included Standard Screening (Meet requirements of NASA EEE-INST-002 Level 3)

| Parameter                | MIL-STD-883 Method                |
|--------------------------|-----------------------------------|
| Hermetic Seal            | -                                 |
| Temperature Cycling      | 1010, Condition C, 10 Cycles      |
| Mechanical Shock         | 2002, Condition B (Y1 only)       |
| PIND                     | 2020, Condition B                 |
| Fine and Gross Leak Test | 1014                              |
| Burn-in                  | 1015, 160 hours at 125 °C minimum |

The information above is relative to the sale of a COTS product as depicted. For information regarding other amplifier features not listed for this specific LNA model, please review our product overview brochure at the following link or contact your local representative.

The material presented in this datasheet was current at the time of publication. Narda-MITEQ's continuing product improvement program makes it necessary to reserve the right to change our mechanical and electrical specifications without notice. If either of these parameters is critical, please contact the factory to verify that the information is current.

This material consists of Narda-MITEQ general capabilities information and does not contain controlled technical data as defined within the International Traffic in Arms (ITAR) Part 120.10 or Export Administration Regulations (EAR) Part 734.7-11. D-405/05.01.18.

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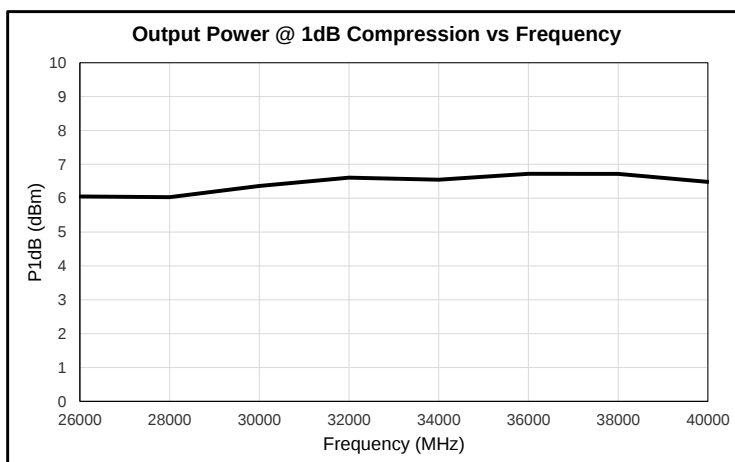
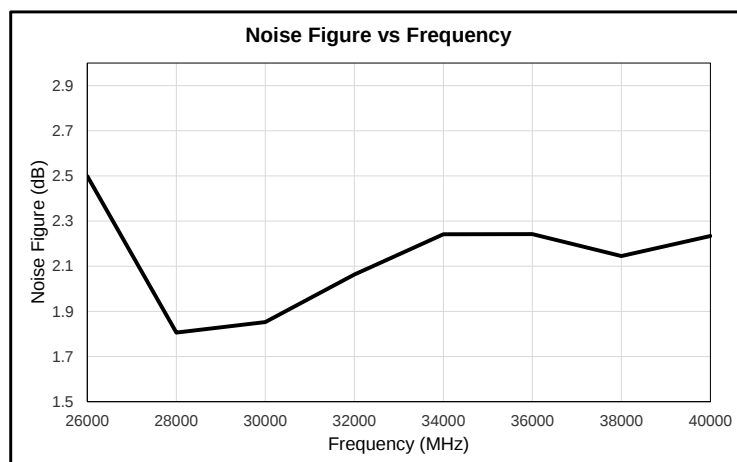
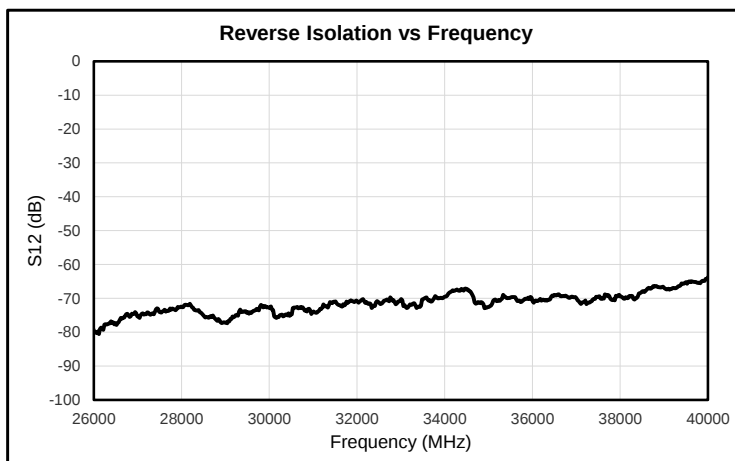
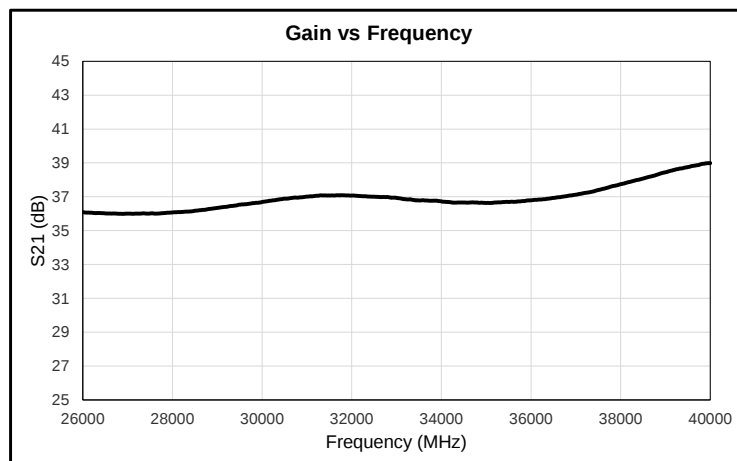
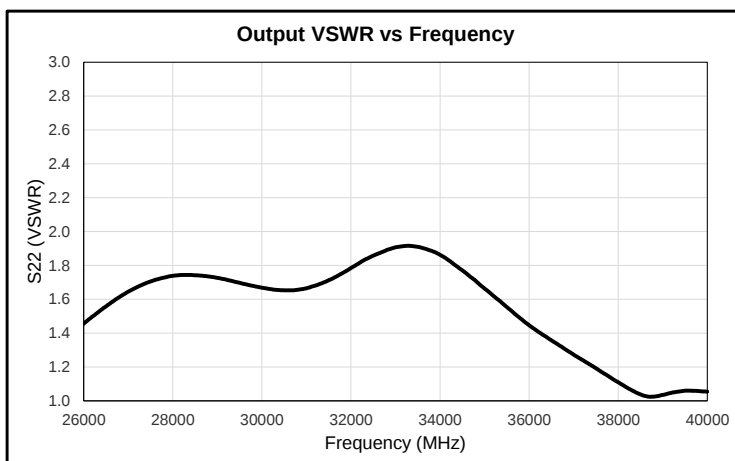
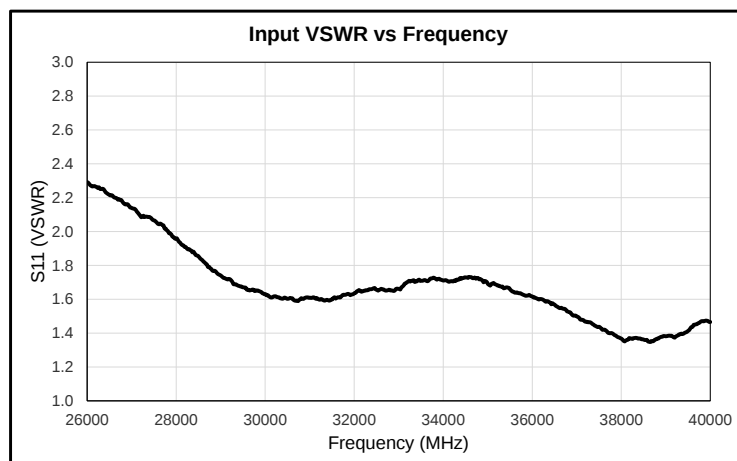
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Typical Performance @ 23°C



S2P file may be available upon request

**Absolute Maximum Ratings**

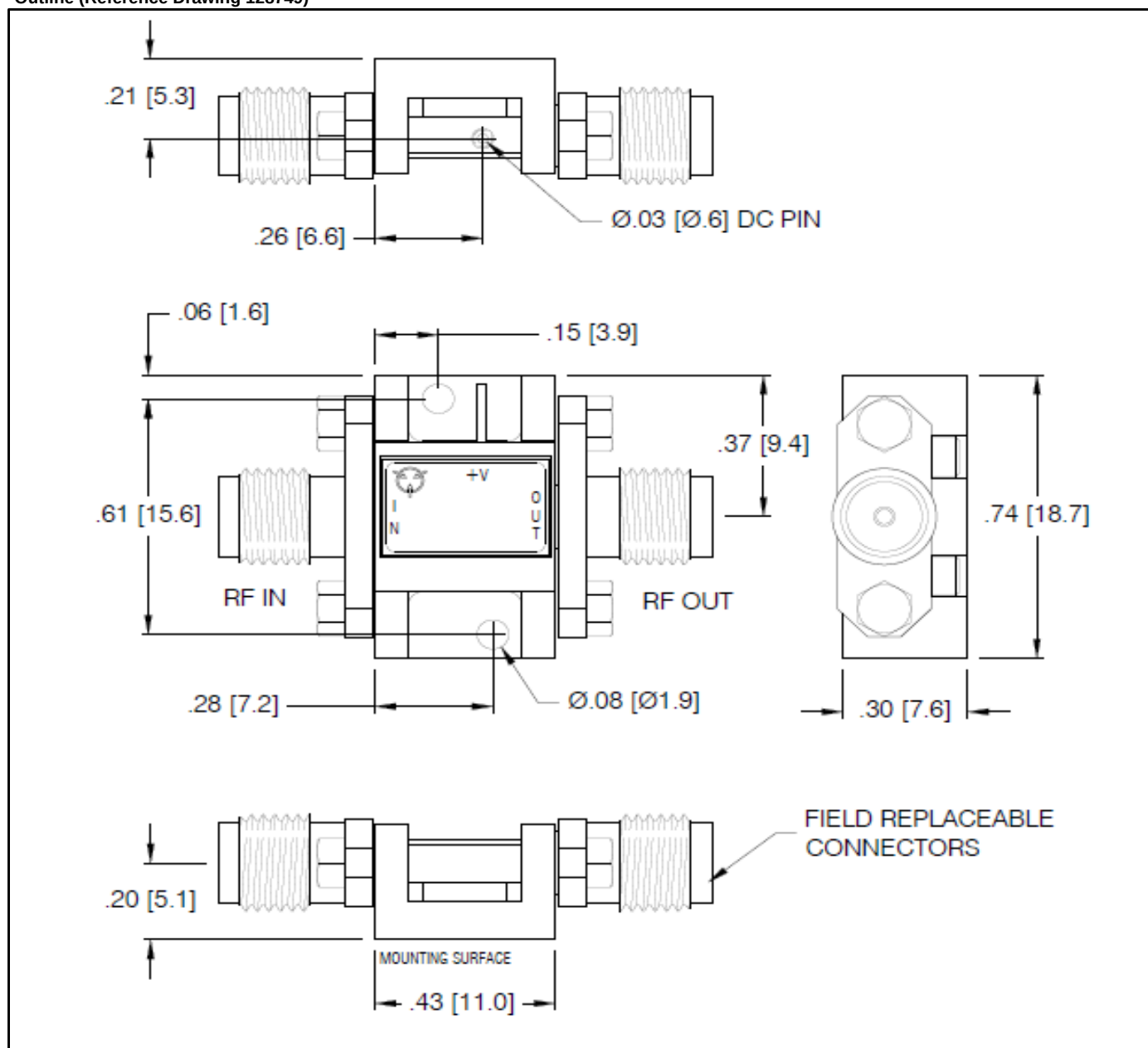
| Parameter                 | Rating                     |
|---------------------------|----------------------------|
| DC Supply Voltage         | +5 V*, +22V with regulator |
| RF Input Power            | +13 dBm                    |
| Operating Temperature     | -55°C to +85°C             |
| Non-Operating Temperature | -65°C to +150°C            |
| RF Port Coupling (In/Out) | AC Coupled / AC Coupled    |
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## Mechanical Specifications

| Parameter           | Value             |
|---------------------|-------------------|
| Length              | 0.43 in [11.0 mm] |
| Width               | 0.74 in [18.7 mm] |
| Height              | 0.30 in [7.6 mm]  |
| Connectors (In/Out) | K(F) / K(F)       |
| Approx. Weight      | 8.6 g             |

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