





# **ADP-2.4F-2.4F**

2.4 mm Jack to 2.4 mm Jack Adapter

The ADP-2.4F-2.4F is a 2.4 mm jack to 2.4 mm jack adapter. Operating from 0 Hz to 50 GHz, the ADP-2.4F-2.4F combines superior performance, compact size, and a convenient threaded mating interface to provide a reliable, easy-to-use adapter. Linx adapters are ideal for precision applications. Additionally, all Linx adapters meet RoHS lead free standards and are tested to meet requirements for corrosion resistance, vibration, mechanical and thermal shock.

## **FEATURES**

- 0 Hz to 50 GHz operation
- Passivated stainless steel body
  - Superior corrosion resistance
- 2.4 mm jack (female socket) connection
  - Gold plated beryllium copper center contact

#### **APPLICATIONS**

- Radar, Satellite Communications, Experimental
- Industrial, Commercial, Enterprise
- · Test and measurement

# **TABLE 1. ELECTRICAL SPECIFICATIONS**

| Parameter                | Value                            |  |
|--------------------------|----------------------------------|--|
| Impedance                | 50 Ω                             |  |
| Frequency Range          | 0 to 50 GHz                      |  |
| Contact Resistance       | Center: ≤ 6.0 mΩ Outer: ≤ 2.0 mΩ |  |
| Insertion Loss (dB max.) | 1.0                              |  |
| VSWR (max.)              | 1.3                              |  |

#### **ORDERING INFORMATION**

| Part Number  | Description |  |
|--|-------------|--|
| ADP-2.4F-2.4F 2.4 mm jack (female socket) to 2.4 mm jack (female socket) adapter |             |  |

Available from Linx Technologies and select distributors and representatives.

## **PRODUCT DIMENSIONS**

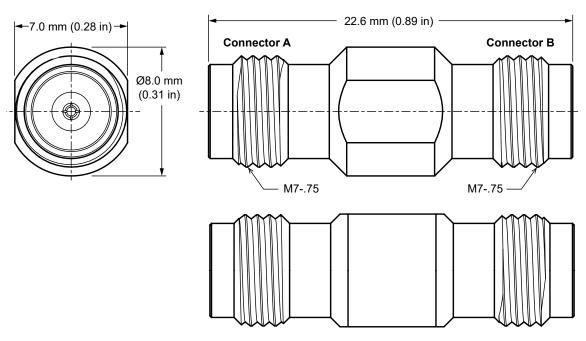


Figure 1: Product Dimensions for the ADP-2.4F-2.4F Adapter

## **TABLE 2. ADAPTER COMPONENTS**

| ADP-2.4F-2.4F  | Connector A<br>2.4 mm jack (female socket) |             |                  | ector B<br>emale socket) |
|----------------|--|-------------|------------------|--------------------------|
| Connector Part | Material                                   | Finish      | Material         | Finish                   |
| Body           | Stainless Steel                            | Passivated* | Stainless Steel  | Passivated*              |
| Center Contact | Beryllium Copper                           | Gold        | Beryllium Copper | Gold                     |
| Insulator      | Air  | -           | Air              | -                        |

<sup>\*</sup>Use of stainless steel tools may damage passivated finish.

#### **ADAPTER PERFORMANCE**

Table 3 shows insertion loss and VSWR values for the ADP-2.4F-2.4F adapter at commonly used frequencies. Insertion loss is the loss of signal power (gain) resulting from the insertion of a device in a transmission line. VSWR describes how efficiently power is transmitted through the adapter. A lower VSWR value indicates better performance at a given frequency.

## TABLE 3. INSERTION LOSS AND VSWR FOR THE ADP-2.4F-2.4F ADAPTER

| Band                     | Ku               | К                | Ka               | Q                |
|--------------------------|------------------|------------------|------------------|------------------|
| Frequency Range          | 12 GHz to 18 GHz | 18 GHz to 27 GHz | 27 GHz to 40 GHz | 33 GHz to 50 GHz |
| Insertion Loss (dB max.) | 0.2              | 1.0              | 0.8              | 1.0              |
| VSWR (max.)              | 1.1              | 1.2              | 1.2              | 1.3              |

#### **TABLE 4. MECHANICAL SPECIFICATIONS**

| ADP-2.4F-2.4F                | Connector A<br>2.4 mm jack (female socket) | Connector B<br>2.4 mm jack (female socket) |  |
|------------------------------|--|--|--|
| Mounting Type                | Inline, Free-hanging                       |  |  |
| Fastening Type               | M7 Threaded Coupling                       | M7 Threaded Coupling                       |  |
| Interface in Accordance with | IEC-61169-40                               | IEC-61169-40                               |  |
| Durability                   | 500 cycles min.                            | 500 cycles min.                            |  |
| Recommended Torque           | 8.0 inlbs                                  | 8.0 inlbs                                  |  |
| Weight                       | 4.8 g (0.17 oz)                            |  |  |

#### **TABLE 5. ENVIRONMENTAL SPECIFICATIONS**

| ADP-2.4F-2.4F                | Connector A<br>2.4 mm jack (female socket) | Connector B<br>2.4 mm jack (female socket) |  |
|------------------------------|--|--|--|
| Mounting Type                | Inline, Free-hanging                       |  |  |
| Fastening Type               | M7 Threaded Coupling                       | M7 Threaded Coupling                       |  |
| Interface in Accordance with | IEC-61169-40                               | IEC-61169-40                               |  |
| Durability                   | 500 cycles min.                            | 500 cycles min.                            |  |
| Recommended Torque           | 8.0 inlbs                                  | 8.0 inlbs                                  |  |
| Weight                       | 4.8 g (0.17 oz)                            |  |  |

#### **PACKAGING INFORMATION**

The ADP-2.4F-2.4F adapter is placed in an ESD safe plastic bag and sealed in Polyethylene bags of 25 pcs. Four bags (100 pcs.) are packaged in a box. Distribution channels may offer alternative packaging options. Connector ends are protected by a blue LDPE plastic cap.

#### TE TECHNICAL SUPPORT CENTER

USA: +1 (800) 522-6752 +1 (905) 475-6222 Canada: Mexico: +52 (0) 55-1106-0800 Latin/S. America: +54 (0) 11-4733-2200 Germany: +49 (0) 6251-133-1999 UK: +44 (0) 800-267666 France: +33 (0) 1-3420-8686 Netherlands: +31 (0) 73-6246-999 China: +86 (0) 400-820-6015

#### te.com

TE Connectivity, TE, TE connectivity (logo), Linx and Linx Technologies are trademarks owned or licensed by the TE Connectivity Ltd. family of companies. All other logos, products and/or company names referred to herein might be trademarks of their respective owners.

The information given herein, including drawings, illustrations and schematics which are intended for illustration purposes only, is believed to be reliable. However, TE Connectivity makes no warranties as to its accuracy or completeness and disclaims any liability in connection with its use. TE Connectivity's obligations shall only be as set forth in TE Connectivity's Standard Terms and Conditions of Sale for this product and in no case will TE Connectivity be liable for any incidental, indirect or consequential damages arising out of the sale, resale, use or misuse of the product. Users of TE Connectivity products should make their own evaluation to determine the suitability of each such product for the specific application.

TE Connectivity warrants to the original end user customer of its products that its products are free from defects in material and workmanship. Subject to conditions and limitations TE Connectivity will, at its option, either repair or replace any part of its products that prove defective because of improper workmanship or materials. This limited warranty is in force for the useful lifetime of the original end product into which the TE Connectivity product is installed. Useful lifetime of the original end product may vary but is not warrantied to exceed one (1) year from the original date of the end product purchase.

©2023 TE Connectivity. All Rights Reserved.

1/23 Original



# **Mouser Electronics**

**Authorized Distributor** 

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

TE Connectivity: