

Kircuit 12V AC/DC Adapter

Kircuit 12V AC/DC Adapter Instruction Manual for HYT TC-500 TC-700 Two-Way Radios

Model: 12V AC/DC Adapter

1. INTRODUCTION

This manual provides essential information for the safe and effective use of your Kircuit 12V AC/DC Adapter. This adapter is designed to provide reliable power for HYT TC-500 and TC-700 series two-way radios, as well as other compatible devices requiring a 12V DC power supply. Please read these instructions carefully before use and retain for future reference.

2. SAFETY INFORMATION

To ensure safe operation and prevent damage, observe the following safety guidelines:

- Ensure the adapter's input voltage (100V-240V AC) matches your power source.
- Do not expose the adapter to water, moisture, or extreme temperatures.
- Avoid dropping or subjecting the adapter to strong impacts.
- Do not attempt to open or modify the adapter. Refer all servicing to qualified personnel.
- Unplug the adapter from the power outlet when not in use or during electrical storms.
- This adapter features built-in dynamic IC, charger IC, and power fuse for rapid charging and protection against overcharge, short circuits, excess voltage, over temperature, and overcurrent.

Image 2.1: Built-in safety protections of the Kircuit adapter, including safeguards against short circuits, excess voltage, over temperature, and overcurrent.

3. PRODUCT OVERVIEW AND FEATURES

The Kircuit 12V AC/DC Adapter is designed for durability and stable performance. It includes an anti-interference magnetic ring for enhanced system reliability.



Image 3.1: Kircuit 12V AC/DC Adapter showing key dimensions and cable lengths.



Image 3.2: The Kircuit 12V AC/DC Adapter with its connected cables.

3.1 Durable Design

- **Cable Construction:** The power cable is made of high-quality materials with a thick insulation layer to protect against wear, tear, and external damage.
- **Heat Resistance:** The cable is designed to withstand high temperatures without melting or degrading, ensuring safety and longevity, especially under high current loads.
- **Secure Plugs:** The plugs are well-made to provide a secure and stable connection, capable of handling electrical loads without overheating.

- The plugs on the power cable also well-made and designed to provide a secure and stable connection.
- The plugs can handle high electrical loads without overheating or causing a fire hazard.

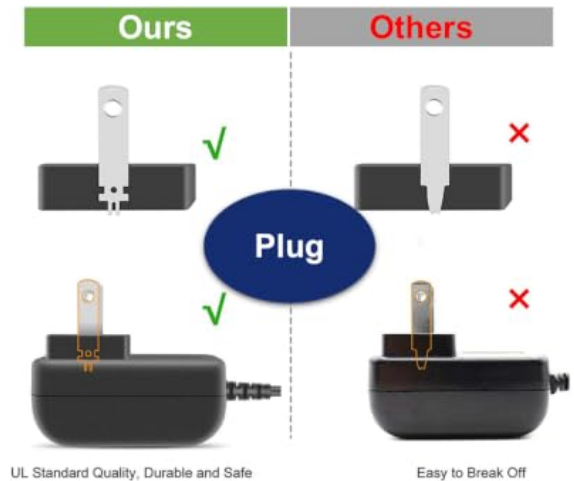


Image 3.3: Details of the durable cable design, highlighting material quality and insulation.

Why choose Kircuit ?



Kircuit adapters have a wide range of product offerings that are compatible with various device types, power requirements, and connector standards. Kircuit adapters have a strong quality control process in place to ensure our products meet the highest standards of safety and performance.

Image 3.4: Comparison illustrating the secure and stable design of the Kircuit adapter's plug.

4. SETUP INSTRUCTIONS

1. **Inspect the Adapter:** Before first use, visually inspect the adapter and cables for any signs of damage. Do not use if damaged.

2. **Connect to Device:** Plug the DC output connector of the Kircuit adapter into the appropriate power input port of your HYT TC-500, TC-700 two-way radio, or other compatible device. Ensure a firm connection.
3. **Connect to Power Outlet:** Insert the AC input plug of the adapter into a standard 100V-240V AC wall outlet.
4. **Verify Connection:** Once connected, the device should indicate it is receiving power or charging.



Image 4.1: The Kircuit adapter connected to a power source and a device.

5. OPERATING INSTRUCTIONS

Once properly set up, the Kircuit 12V AC/DC Adapter operates automatically:

- The adapter will supply continuous 12V DC power to your connected device.
- For devices with rechargeable batteries, the adapter will initiate charging as per the device's internal charging circuit.
- The built-in protection features will monitor the power delivery to prevent overcharging or damage to your device.

Note: Always ensure your device is compatible with a 12V DC power input before connecting this adapter.

6. MAINTENANCE

To maintain the performance and longevity of your Kircuit 12V AC/DC Adapter:

- **Cleaning:** Disconnect the adapter from both the power outlet and your device before cleaning. Use a soft, dry cloth to wipe the surface. Do not use liquid cleaners or solvents.
- **Storage:** When not in use, store the adapter in a cool, dry place away from direct sunlight and moisture. Avoid tightly coiling the cables to prevent damage.
- **Cable Care:** Do not bend, twist, or pull the cables excessively. Avoid placing heavy objects on the cables.

7. TROUBLESHOOTING

Problem	Possible Cause	Solution
Device not powering on/charging.	• Adapter not properly plugged in. • Wall outlet not active. • Device power input issue. • Adapter or cable damage.	• Ensure all connections are secure. • Test the wall outlet with another device. • Verify the device's power input port is functional. • Inspect adapter and cables for visible damage. Replace if damaged.
Adapter feels excessively hot.	• Overload or poor ventilation. • Internal fault.	• Ensure adequate ventilation around the adapter. • Disconnect immediately and contact support if overheating persists.
Intermittent power supply.	• Loose connection. • Damaged cable or connector.	• Check all connections for tightness. • Inspect cables and connectors for fraying or bending.

8. SPECIFICATIONS

Feature	Detail
Input Voltage	100V-240V AC
Output Voltage	12V DC (specific amperage not provided, but implied by "AC/DC Adapter")
Compatibility	HYT TC-500, TC-700 Two-Way Radios, and other compatible 12V DC devices.
Safety Features	Dynamic IC, Charger IC, Power Fuse, Overcharge Protection, Short Circuit Protection, Excess Voltage Protection, Over Temperature Protection, Overcurrent Protection.
Item Weight	8 ounces (approx. 227 grams)
Manufacturer	Kircuit

9. WARRANTY AND SUPPORT

Kircuit products are designed for quality and reliability. This adapter is backed by a **3-year warranty**, as indicated on product packaging. For warranty claims or technical support, please contact the seller or Kircuit customer service directly

through the platform where the product was purchased.



Image 9.1: Kircuit product packaging indicating a 3-year warranty.

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ASK A QUESTION ABOUT THIS MANUAL

Ask about setup, troubleshooting, compatibility, parts, safety, or missing instructions. Manuals+ will review the question and use this page’s manual context to help answer it.

Name

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After a successful submission, we securely hash the supplied account or form email before sending it to Microsoft Advertising for conversion attribution. [Privacy details](#).

Question

Example: How do I reset this device or fix this error?

Details

Model number, symptoms, what you tried, or the section of the manual you are using.

Submit question