Keysight Technologies Y1132A Module Service Extender Installation Guide

The Keysight Y1132A Module Service Extender assembly extends the backplane of the Keysight 34980A Multifunction Switch/Measure Unit outside the instrument's frame for easy servicing of plug-in modules. The accessory consists of a *backplane extender module*, which you install in the 34980A, and an external *probing board*, which connects to the extender module via two ribbon cables provided. Test points are provided on the probing board for measuring control and supply signals. A 0.02Ω current shunt resistor is installed in series with the mainframe's +5V and +12V power supplies to enable direct measurement of the supply currents.

WARNING

Shock Hazard. The Y1132A Service Extender is intended to route Analog Bus voltages up to only 42V peak from Earth and from each other. Before installing the Y1132A Service Extender, be sure to remove ALL terminal blocks, wiring, and Analog Bus connections from the 34980A. Also, if you have connected a plug-in module to the probing board, disconnect it before using the Y1132A.

CAUTION

Static Sensitive Circuitry. The signals exposed on the Y1132A Service Extender are sensitive to static discharge. Damage may result if there is static discharge to the Y1132A. Use the Y1132A only in a static-controlled environment.

CAUTION

Static Sensitive Configuration. Signals on the Y1132A Service Extender are routed directly from the 34980A frame and are therefore sensitive to fields caused by static discharge within the vicinity. Static discharge to the 34980A or in the vicinity while connected to an Y1132A may cause the 34980A to become inoperable.

If the 34980A becomes inoperable, cycle the power to return to normal operation. Use the Y1132A only in a static-controlled environment.



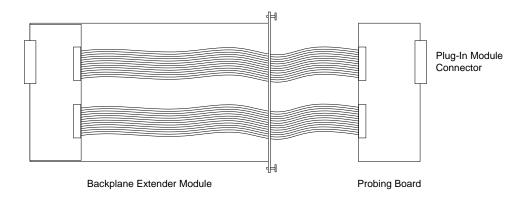
Contents of Your Shipment

The following items are shipped with your Y1132A Module Service Extender kit:

- Keysight Y1132A Installation Guide
- Keysight Y1132A Backplane Extender Module (ribbon cables are shipped inside module)
- Keysight Y1132A Probing Board

Assembling the Y1132A Service Extender

The Y1132A consists of a *backplane extender module*, which you install in the 34980A, and an external *probing board*, which connects to the extender module via two ribbon cables provided. When shipped from the factory, the ribbon cables are located inside the extender module. The following steps show how to connect the ribbon cables to the probing board.



- 1. Using a Torx® T10 driver, remove the cover from the extender module.
- Route the ribbon cables through the cutouts at the front of the extender module as shown above.
 Be careful not to cross the cables.
- 3. Connect the ribbon cables to the probing board.

Installing the Y1132A Service Extender

The following steps show how to install the extender module in the 34980A and connect a plug-in module to the probing board.

- 1. Turn off power to the 34980A before installing the Y1132A. Also, remove ALL terminal blocks, wiring, and Analog Bus connections from the 34980A.
- 2. Install the Y1132A in any of the eight slots in the 34980A.
- 3. Turn on power to the 34980A. An LED on the Y1132A indicates the presence of +5V.
- 4. Turn off power to the 34980A.
- 5. Attach the plug-in module to be serviced to the connector on the probing board.
- 6. Turn on power to the 34980A. If the supply LED on the Y1132A is not illuminated, the +5V or +12V supply is likely shorted. Turn off power to the 34980A to repair the short.

Measuring Supply Current

A 0.02Ω current shunt resistor is installed in series with the mainframe's +5V and +12V power supplies to enable direct measurement of the supply currents. To measure current, measure the voltage across the 0.02Ω resistor. Multiply the measured voltage by 50 to determine the current that the module uses.

Warranty

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