

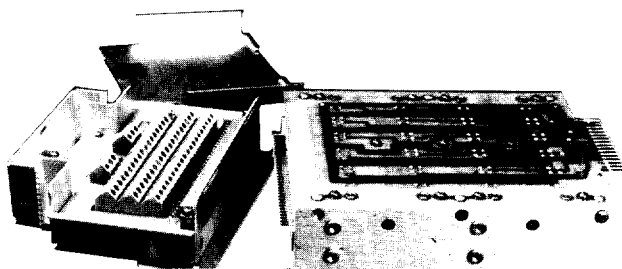
HP 3495A

### Description

#### General

The HP 3495A Scanner switches analog input signals to an appropriate measuring device (voltmeter). It can also control external devices with relay actuator closures. Ideal for many data logging and data acquisition applications, the scanner can be used for sequential or random scanning. Any Hewlett-Packard Interface Bus (HP-IB) compatible controller can be used to operate the Scanner. Any combination of four relay assemblies (discussed below) can be used per scanner mainframe. More than four assemblies requires additional scanner mainframes.

Five optional relay assemblies are available with the scanner, four low thermal assemblies and one actuator assembly.



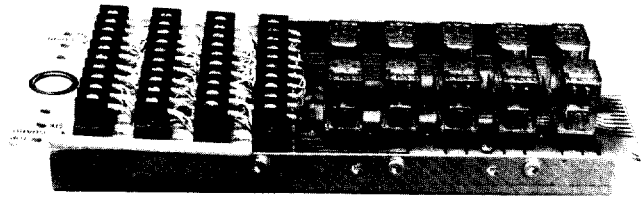
Option 004

#### Low Thermal Relay Multiplexer Assemblies

These assemblies are used to multiplex signals into a common detector, often a digital voltmeter. Typical applications are the multiplexing of low level dc voltages and resistances like the outputs of thermocouples, thermistors, strain gages and other transducers. Options 001 and 004 have 10 and 20 channels respectively. Options 003 and 005 have 9 and 19 channels respectively, an isothermal connector block and a thermistor to sense the temperature of the isothermal block. This gives options 003 and 005 thermocouple compensation capability.

#### Multiplexer Comparison

	Option 001	Option 003	Option 004/005
Number of Channels	10	9	20/19
Voltage Maximum	230 V peak	42 V peak	42 V peak
Current Maximum	200 mA	200 mA	40 mA
Thermal Offset	<2 $\mu$ V	<2 $\mu$ V	<1 $\mu$ V
Isolation	>10 <sup>9</sup> ohms	>10 <sup>7</sup> ohms	>10 <sup>7</sup> ohms
Switching Time	10 ms max.	10 ms max.	10 ms max. 1 ms max. using HP 3495A high speed controller



Option 002

#### Relay Actuator Assembly

**Applications:** process control, actuate visual or audio indicators, control high current relays, up to 2 x 5 x 2 matrix switching.

**Ten Channel Relay Actuator Assembly:** This relay actuator assembly provides ten independently-programmable, 2-wire closures for controlling high current relays, distributing low current dc or ac voltages, or external control function. Each two-pole relay can switch currents up to 2 A rms. Any combination of channels on this assembly may be closed or opened simultaneously.

**Maximum contact ratings:** voltage: 100V rms; Current: 2 A rms; Maximum input voltage: 230V peak; Thermal offset: < 30  $\mu$ V differential EMF; Switching time: 40 ms max. (Caution: For use in circuits fused at 2 amperes or less and less than 200 VA).

#### General

**Operating temperature:** 0°C to +55°C

**Humidity range:** 95% R.H., 0°C to +40°C

**Power:** 100/120/220/240 +5%, -10%  
48 to 66 Hz line operation, <100 VA

**Size:** 190.5 H x 428.6 W x 520.7 mm D (7.5" x 16.87" x 20.5").

**Weight:** depends on options. Net: 18 kg (39.6 lb) maximum with four relay assemblies. Shipping: 22 kg (48.4 lb) maximum.

#### Option

<b>001:</b> Ten Channel Low Thermal Relay Assembly	+ \$910
<b>002:</b> Ten Channel Relay Actuator Assembly	+ \$530
<b>003:</b> Nine Channel Reference Assembly With Thermocouple Compensation	+ \$1010
<b>004:</b> Twenty Channel Low Thermal Relay Assembly	+ \$860
<b>005:</b> Nineteen Channel Reference Assembly With Thermocouple Compensation	+ \$960
<b>100:</b> High Speed Control Board	+ \$380

#### Field Installation Kits

<b>HP 44401A</b> Ten Channel Low Thermal Relay Assembly	+ \$910
<b>HP 44402A</b> Ten Channel Relay Actuator Assembly	+ \$530
<b>HP 44403A</b> Nine Channel Reference Assembly With Thermocouple Compensation	+ \$1010
<b>HP 44404A</b> Twenty Channel Low Thermal Relay Assembly	+ \$860
<b>HP 44405A</b> Nineteen Channel Reference Assembly With Thermocouple Compensation	+ \$960
<b>HP 44413A</b> High Speed Control Board	+ \$380

In addition, options 001 or 004 can be field modified to include thermocouple compensation by ordering the appropriate terminal connectors.

#### Additional Terminal Connectors for

Ten Channel Low Thermal Relay Assembly, HP 03495-64101	+ \$105
Ten Channel Relay Actuator Assembly, HP 03495-64104	+ \$92.50
Nine Channel Thermocouple Reference Assembly, HP 03495-64103	+ \$370
Twenty Channel Low Thermal Relay Assembly, HP 03495A-64114	+ \$160
Nineteen Channel Thermocouple Reference Assembly, HP 03495-64115	+ \$210

#### HP 3495A Scanner

**\$2200**