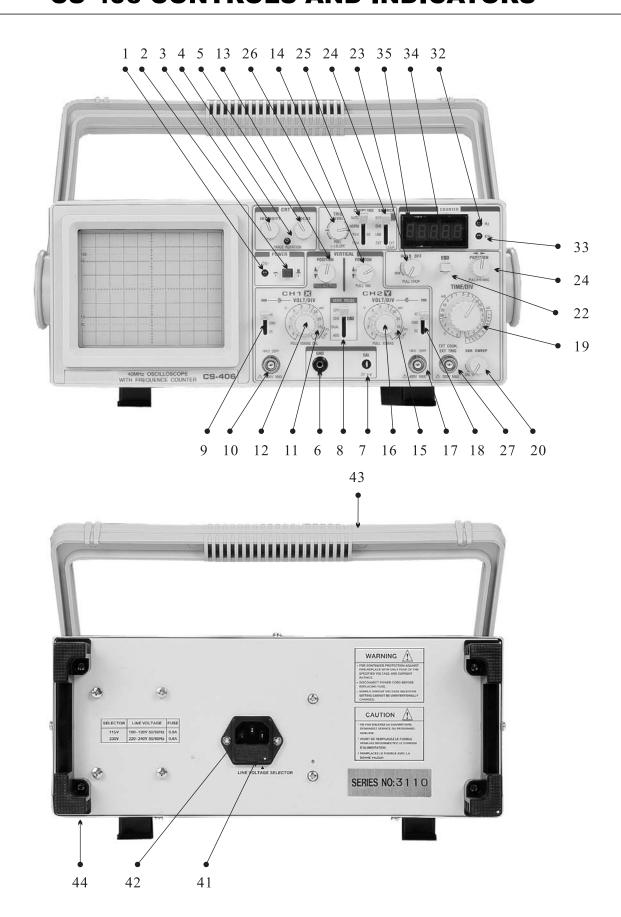
CS-406 CONTROLS AND INDICATORS



GENERAL FUNCTION CONTROLS

- 1. ON Indicator. Lights when oscilloscope is "on".
- POWER Pushbutton. Turns: oscilloscope"on" and "off".
- **3. INTENSITY Control.** Adjusts brightness of trace.
- **4. TRACE ROTATION Control**. Adjusts to maintain trace at a horizontal position.
- 5. FOCUS Control. Adjusts trace focus.
- 6. GND

 Terminal. Oscilloscope chassis ground jack, and earth ground via three-wire ac power cord.
- **7. CAL Terminal**. Terminal provides 2Vp-p, 1kHz (nominal) square wave signal. This signal is useful for checking probe compensation adjustment. as well as providing a rough check of vertical calibration.

VERTICAL CONTROLS

8.VERTical MODE Switch. Selects vertical display mode. Four-position lever switch with the following positions:

CH1:

Displays the channel 1 signal by itself.

CH2/X-Y:

CH2: displays the channel 2 signal by itself. **X-Y:** used in conjunction with the X-Y control and **Trigger SOURCE** switch to enable X-Y display mode.

DUAL

Displays the channel 1 and channel 2.signals simultaneously. Dual-trace mode may be either alternate or chopped sweep: see the description under **HOLDOFF/PULL CHOP** control.

ADD:

The inputs from channel 1 and channel 2 are summed and displayed as a single signal. If the Channel 2 **POSition/PULL INVert** control is pulled out, the input from channel 2 is subtracted from channel 1 and the difference is displayed as a single signal.

9. CH1 AC-GND-DC Switch. Three-position lever switch with the following positions:

AC:

Channel 1 input signal is capacitively coupled; DC component is blocked.

GND:

Opens signal path and grounds input to vertical amplifier. This provides a zero-volt base line, the position of which can be used as a reference when performing dc measurements.

DC:

Direct coupling of channel 1 input signal; both AC and DC components of signal produce vertical deflection.

- **10. CH1 (X) Input Jack.** Vertical input for channel 1. X-axis input for X-Y operation.
- 11. CH1 (X) VOLTS/DIV Control. Vertical attenuator for channel 1. Provides step adjustment of vertical sensitivity. When channel 1 VARiable control is set to (CAL), vertical sensitivity is calibrated in 10 steps from 5 mV/div to 5 V/div in a 1-2-5 sequence. When the X-Y mode of operation is selected, this control provides step adjustment of X-axis sensitivity.

12. CH1 VARiable/PULL X5 MAG Control: VARiable:

Rotation provides vernier adjustment of channel 1 vertical sensitivity. In the fully-clockwise (CAL) position, the vertical attenuator is calibrated. Counterclockwise rotation decreases gain sensitivity. In X-Y operation, this control becomes the vernier X-axis sensitivity control.

PULL X5 MAG:

When pulled out, increases vertical sensitivity by a factor of five. Effectively provides two extra sensitivity settings: 2 mV/div and 1 mV/div. In X-Y mode, increases X-sensitivity by a factor of five.

13. CH1 POSition/PULL ALT TRIGger Control: POSition:

Adjusts vertical position of channel 1 trace.

PULL ALT:

Used in conjunction with the Trigger **SOURCE** switch to activate alternate triggering. See the description under the Trigger **SOURCE** switch.

14. CH2 POSition/PULL INVert Control: POSition:

Adjusts vertical position of channel 2 trace. In X-Y operation, rotation adjusts vertical position of X-Y display.