

TEKSCOPE



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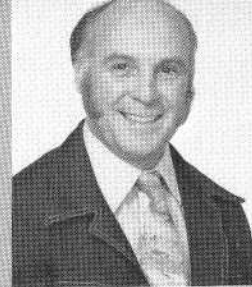
Part II describes "dry cleaning" techniques for those users who can't release their instruments long enough for a thorough wash job.

Cover: Dr. Gail Massey of Oregon Graduate Center studies a YAG laser pulse stored and displayed on the 400 MHz 7834 Storage Oscilloscope.

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Jerry Rogers



Ken Hawken

A big step forward for direct-view storage

State of the art direct-view storage takes a big step forward with the introduction of the TEKTRONIX 7834 Storage Oscilloscope. Up to now the maximum stored writing speed has been 1000 cm/ μ s in the 7633 plug-in oscilloscope and 1350 cm/ μ s in the 466 portable. Both are 100 MHz instruments.

The new writing speed mark is 2500 cm/ μ s, and it's coupled with 400 MHz bandwidth in the new 7834. This means you can now capture a 3.5 cm high, single-event risetime of 1.4 ns.

The 7834 is a general-purpose laboratory oscilloscope with all of the synergistic measurement power produced by the four plug-in capability of the 7000 Series. For example, real time and spectrum analyzer plug-ins can be housed to simultaneously present both time and frequency domain displays for a given signal. Using the 7834's variable persistence storage mode, a steady display of the time domain can be viewed while observing slow changes in the spectral content. In another configuration, logic analyzer and real time plug-ins can be combined to zero in on a logic fault and then display that fault in real time, even though it may occur only once.

Multimode storage

The 7834 features multimode storage—bistable, variable persistence, and fast modes for each, pioneered in the 7623 a few short years ago.

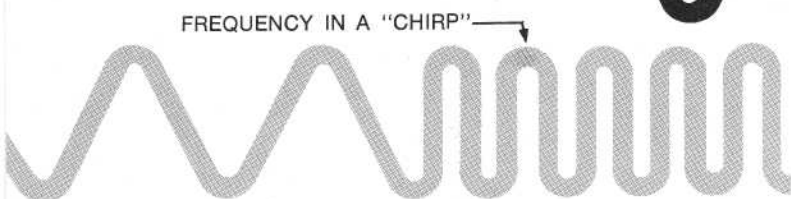
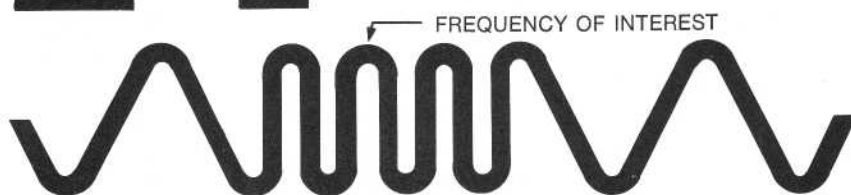
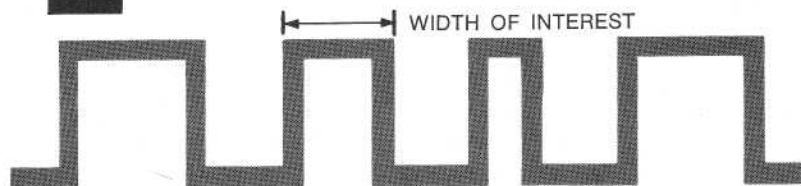
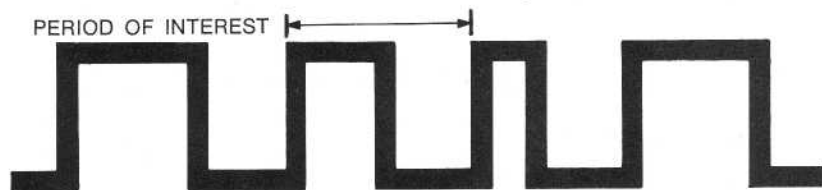
The bistable storage-display is characterized by having two intensity levels—the stored-image intensity and the background level. There are two such modes: BISTABLE and FAST BISTABLE. The chief advantage of both of these modes is long view-time. Once an image is



Emory Harry

Counter and oscilloscope combination makes difficult measurements

Modern electronic counters are versatile, accurate instruments used in a wide variety of applications. However, many measurements are difficult or even impossible to make with conventional counters. Here are a few examples:





Ralph Livermore

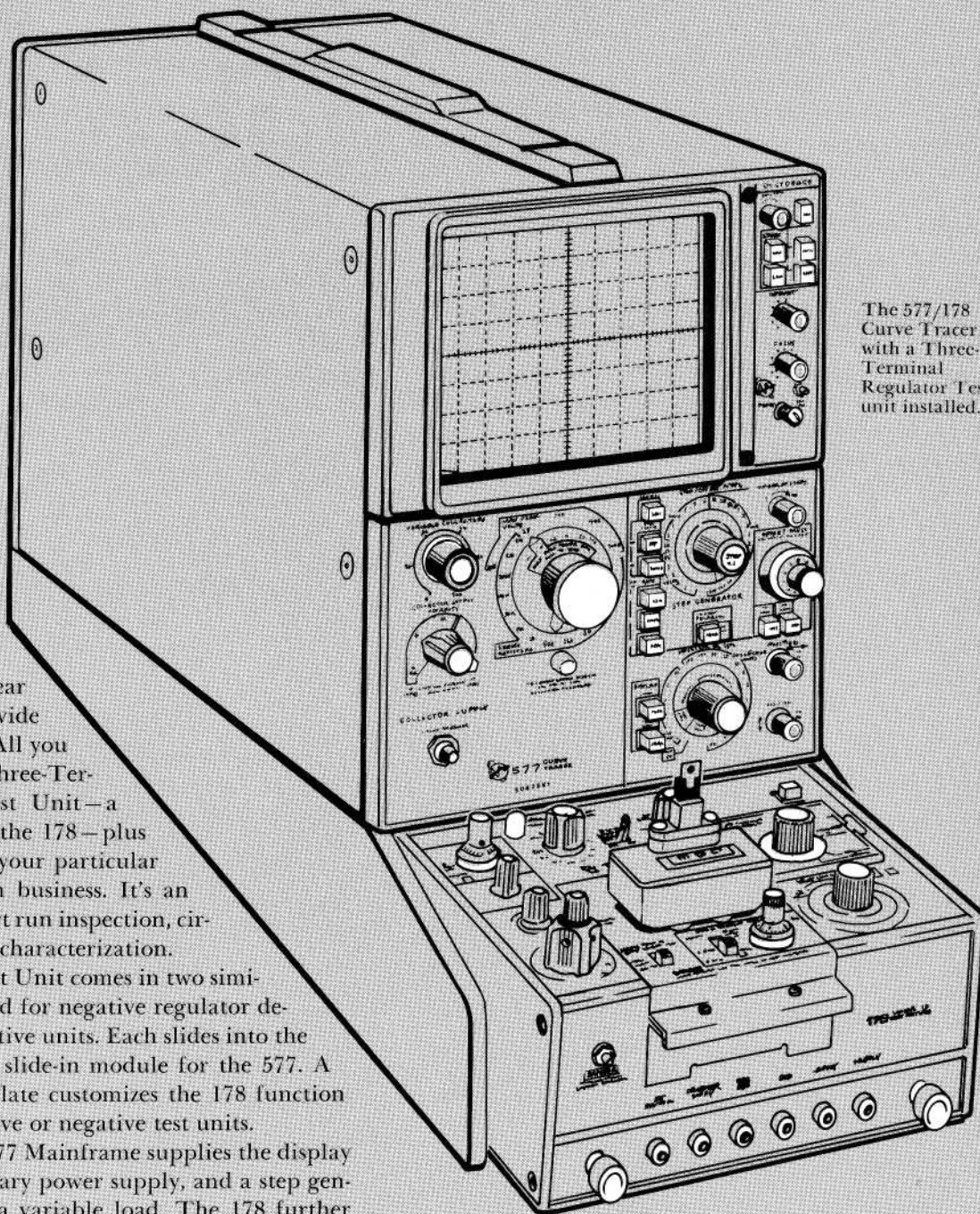
Testing three-terminal regulators with a curve tracer

The increasing cost of on-board three-terminal regulators has created a need for a fast and easy means of testing these devices. Many of you already possess that capability and may not realize it.

The Tektronix 577-D1 Storage Curve Tracer and 178 Linear IC Test Fixture provide the basic capability. All you need to add is the Three-Terminal Regulator Test Unit—a plug-in accessory for the 178—plus a socket adapter for your particular device, and you're in business. It's an ideal solution for short run inspection, circuit design, or device characterization.

The Regulator Test Unit comes in two similar models—one wired for negative regulator devices and one for positive units. Each slides into the 178, which is itself a slide-in module for the 577. A snap-on escutcheon plate customizes the 178 function switch to either positive or negative test units.

Functionally, the 577 Mainframe supplies the display and its controls, primary power supply, and a step generator that serves as a variable load. The 178 further



The 577/178 Curve Tracer with a Three-Terminal Regulator Test unit installed.