Simple steps to choose the model that fits your needs.

Fluke 190 Series II models	190-062	190-102/ 190-104	190-202/ 190-204	190-502
# of scope channels	2	2 or 4	2 or 4	2
Bandwidth: Choose > 5 x DUT clock frequency	60 MHz	100 MHz	200 MHz	500 MHz
Max sample rate	0.5 GS/s	1.25 GS/s	2.5 GS/s	5 GS/s
Max rise time: Choose > 1/5 x signal under test rise time	5.8 ns	3.5 ns	1.7 ns	0.7 ns
IEC 61010 safety rating: CAT IV/ CAT III safety certified for industrial or electronic environments	CAT III 1000 V/CAT IV 600 V			

Learn more at www.fluke.com/190series

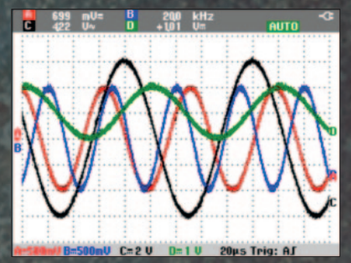
Fluke ScopeMeter® test tools work harder to make your job easier

Why use an oscilloscope?

The difference between an oscilloscope and a DMM (digital multimeter) can be summarily stated as "pictures vs. numbers."

A scope adds a wealth of information to the numeric readings of a multimeter. While displaying instantaneous numerical values of a wave, it also reveals the shape of the wave, including its amplitude (voltage) and frequency. With such visual information, a transient signal or other sources of disturbances that may pose major consequences to a system can be captured, displayed then measured and isolated.

DMM provides precise quantitative data


Scopes offer qualitative information

Why use a ScopeMeter test tool?

The Fluke ScopeMeter portable oscilloscope offers several advantages over bench top models:

- It's lightweight and compact
- Being battery operated means it can go to the problem instead of bringing the problem to the scope
- Safety certified to CAT III 1000 V, CAT IV 600 V and IP-51 rating makes measurements possible in harsh industrial environments
- With its sealed case it is dust-proof and drip-proof and works reliably wherever you need it to

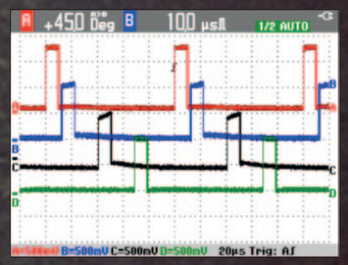

The 190 Series II delivers up to seven hours of battery life

20 years of Fluke ScopeMeter® test tool innovation

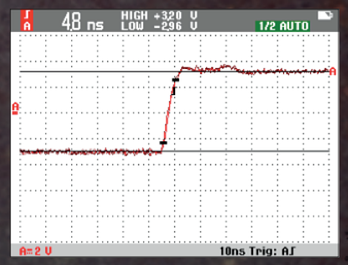
Why choose a four-channel ScopeMeter test tool?

Electronic systems comprise several subsections, from power supplies, input response and output stimulus conditioning circuits, processors and display circuits to many others. Using a four channel to display the signal time, amplitude and wave shape relationships can lead to isolating the failures to a module subsection, circuit or even component.

Three phase power control circuits require measuring electrically floating voltages across each phase or across the logic control circuit and output of the high power switching transistors. Using a four channel scope with electrically isolated inputs will allow you to safely measure each phase simultaneously revealing common issues like waveform reflections, excessive distortion or imbalances.



Measure time or amplitude relationships of 4 test points simultaneously



500 MHz with fast sample rate accurately capture and displays edges of pulse width modulated signals or harmonic content in fast clocks signals

Why choose the new 500 MHz two-channel ScopeMeter test tool?

A faster sample rate and higher bandwidth means greater accuracy and clarity. The scope will capture and display unknown waveform shapes, amplitudes and any disturbances. In order to display at least the fifth harmonic component of a signal, a good rule of thumb is to select a scope with a bandwidth of at least five times the maximum clock rate of the device under test. The faster the sample interval, the more accurate and detailed the scope will display a signal edge (dV/dt) and peaks of any reflections or transients.