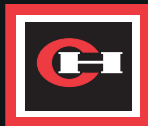


DIGITAL METERING

IQ ANALYZER®

Meter, Analyze
and Manage Power



Cutler-Hammer

EATON

ANALOG AND DIGITAL I/O:

Interface with sensors, transducers, PLCs and control systems

FLEXIBLE POWER SUPPLY OPTIONS:

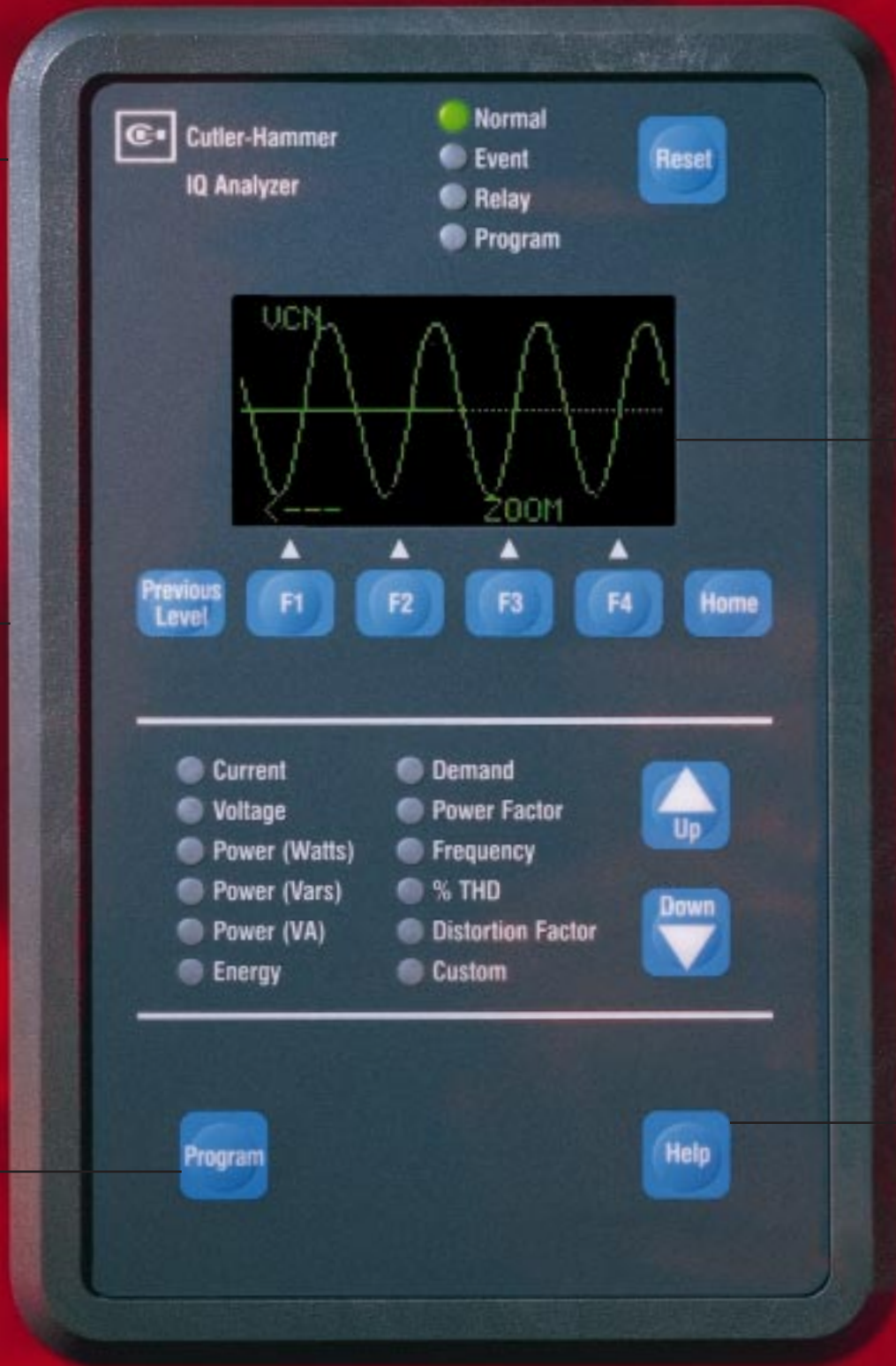
24-48 VDC, three-phase (up to 600 VAC) or separate source (110-240 VAC and 100-250 VDC)

PROGRAM BUTTON:

Completely programmable at the device or via PowerNet

CERTIFICATIONS:

ANSI 12.20, UL, CUL, CSA, CE, Industry Canada



LED BACKLIT LCD DISPLAY:

View graphical waveforms at the device (6600 model only)

HELP BUTTON:

Comprehensive help feature right at the device

- THE IQ ANALYZER PROVIDES EXTENSIVE METERED DATA, INCLUDING HARMONICS AND WAVEFORMS.
- THE IQ ANALYZER MONITORS SAGS AND SWELLS.
- THE IQ ANALYZER TRENDS AND LOGS DATA — AT THE DEVICE OR VIA POWERNET COMMUNICATIONS.

IQ Analyzer: The Power in Power Quality.

UNPARALLELED METERING AND POWER QUALITY ANALYSIS

If you are looking for power quality meters, you have plenty of choices. If you are looking for the best in class, you have only one choice, the IQ Analyzer from Cutler-Hammer. The IQ Analyzer is brimming with features... and brimming with value.

In addition to providing extensive metered data including harmonics and waveforms the IQ Analyzer also monitors sags and swells. Need to trend and log data? The IQ Analyzer allows you to do it at your convenience—either at the device level or via PowerNet™ communications. And that's only the beginning, because the IQ Analyzer captures events at 128 times per cycle and can measure currents with the highest of accuracy.

Standalone or system-based, the IQ Analyzer offers you more features and more functions than any other power quality analyzer in its class.

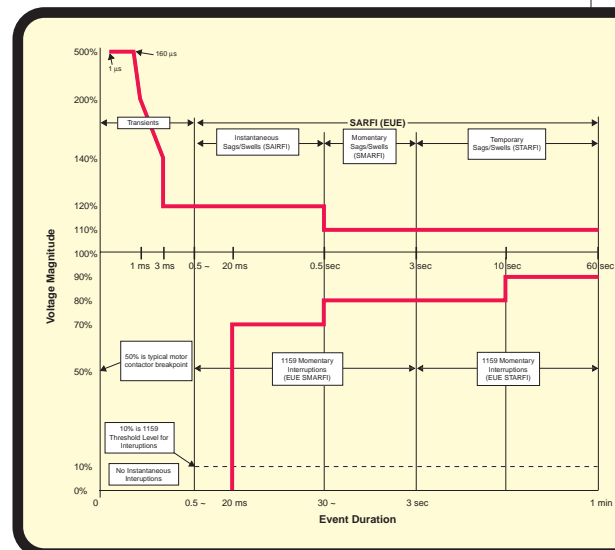
More Data. Better Analysis. Increased Uptime. Better Value. All with the IQ Analyzer—only from Cutler-Hammer.

RICH DIAGNOSTICS INFORMATION

To perform accurate and complete power quality analysis, you need accurate and complete data. The IQ Analyzer measures and records over 150 electrical distribution system parameters, forming the foundation for real-time or historical analysis.

With the wealth of information provided by the IQ Analyzer, you can approach the task of managing your power quality and addressing disturbance issues with renewed confidence. While most meters capture line-line and line-neutral voltages, the IQ Analyzer also measures and captures line-ground and neutral-ground voltages with +/- 0.20% accuracy. Harmonics, waveforms, power, frequency and energy are just a sampling of the additional variables captured by this premier meter.

YOU CAN USE THE INDUSTRY STANDARD
ITIC (FORMERLY CBEMA) CURVE TO
HELP YOU ANALYZE EVENT CAUSES.

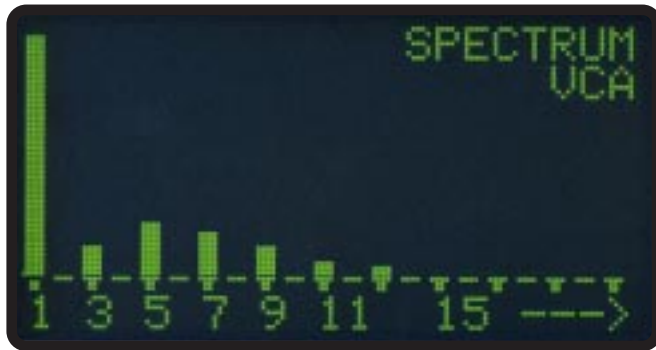


POWER QUALITY DATA

Spotting trends in your electrical supply is crucial to preventing process disruptions and equipment damage. The IQ Analyzer monitors current and voltage through the 50th

harmonic. The IQ Analyzer also provides a graphical harmonic spectrum bar chart so you can quickly identify the magnitude of each harmonic and pinpoint the source of potentially harmful harmonics.

Waveform characteristics tell the story of your electrical distribution system performance. When an event such as a trip or high current occurs, a precise, graphical waveform is captured by the IQ Analyzer, providing



WITH THE WEALTH OF INFORMATION PROVIDED BY THE IQ ANALYZER, YOU CAN APPROACH THE TASK OF MANAGING YOUR POWER QUALITY AND ADDRESSING DISTURBANCE ISSUES WITH RENEWED CONFIDENCE.

invaluable data to diagnose and correct power quality problems.

SAG/SWELL DISTURBANCE MONITORING

Imagine there's been a process or equipment disruption in your facility. What do you troubleshoot first—the equipment or the electrical distribution system?

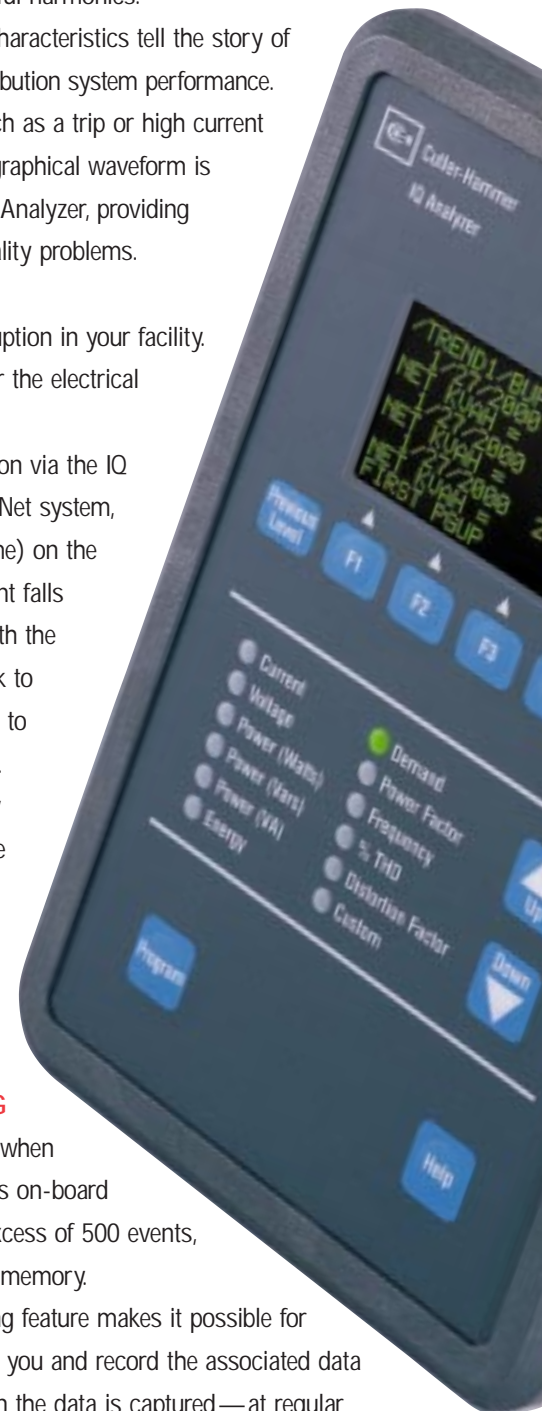
You can quickly and easily answer this question via the IQ Analyzer. When configured with an optional PowerNet system, the IQ Analyzer will plot event data (voltage vs. time) on the ITIC (formerly CBEMA) curve. If a disturbance event falls within the curve, it's a safe bet the problem lies with the equipment. If the event falls outside the curve, look to your electrical distribution system for answers and to determine how to prevent it from happening again.

The IQ Analyzer plots just one event for every three phase voltage sag or swell, providing concise information for your disturbance analysis. Many other power quality metering systems plot a three-phase voltage sag or swell as three separate counts, one for each phase, resulting in diluted data.

ADVANCED DATA LOGGING AND TRENDING

When a communications system isn't available or when data redundancy is preferred, the IQ Analyzer offers on-board data storage. This device is engineered to log in excess of 500 events, complete with time and date stamp, in nonvolatile memory.

For added flexibility, the historical trend logging feature makes it possible for you to select up to 24 variables most important to you and record the associated data in the IQ Analyzer's memory. And you decide when the data is captured—at regular intervals, when a discrete input to the IQ Analyzer is received, or when a parameter exceeds a predefined value. This high speed trending can be set to sample at a rate as high as every 8 cycles and is especially useful to capture a motor start profile or for sag/swell analysis.



For effective energy management programs, the IQ Analyzer offers flexible time-of-use energy registers. Simply program the device with the times at which your utility rate changes. The IQ Analyzer will record energy usage and report it by rate level. Then you can perform energy usage analysis at the device, or tie in a PowerNet communications system and analyze utility rate structures in greater detail.

HIGH SPEED EVENT CAPTURE

The IQ Analyzer simplifies diagnostics with the innovative dv/dt subcycle trigger of events. This feature gives you more data “snapshots” for analysis by monitoring voltage and current 128 times per cycle and automatically capturing events.

MEASURE HIGH CURRENTS WITH ACCURACY

The quality of the data captured is just as important as the quantity of the data captured.

The IQ Analyzer monitors phase, neutral and ground current up to 800% of nominal.

Most competing products max out at less than 300%. Advantage: you get precise inrush and fault data of events that can take your process down.

ADDITION OF AN ETHERNET PONI ENABLES HIGH-SPEED POWERNET COMMUNICATIONS VIA 10-BASE T OR FIBEROPTIC CABLE.

EASY OPERATION

The IQ Analyzer is high-powered, yet easy to drive. It can be programmed at the device or via PowerNet. Either way, the advanced menu structure and simple on-line help means that programming is simpler and easier, while navigation is unequalled in the industry.

The IQ Analyzer boasts four custom screens for which you choose seven parameters to monitor on each screen, giving you a customized, data-rich window into your system. No other power quality analyzer is as easy to program and operate as the IQ Analyzer.

POWERNET COMMUNICATIONS

The IQ Analyzer provides the information you need to assess the quality of your power and the efficiency of your system. With the Cutler-Hammer PowerNet Power Management System, you can view this information anytime, anywhere, right from your PC, because it uses the same high-speed Ethernet

TCP/IP-based protocol used by your web browser. You can analyze the cause of a disturbance without leaving your office.

PowerNet turns simple data into valuable information, empowering you to make informed power quality and energy management decisions, troubleshoot and increase reliability and uptime.

PowerNet allows you to connect the IQ Analyzer to the rest of your power management system, or integrate into a process control, facility management or enterprise-wide information system.



IQ ANALYZER SERIES

Model 6600	Model 6400
View waveforms at device or via PowerNet	View waveforms via PowerNet
View harmonic spectrum bar chart at device or via PowerNet	View harmonic spectrum bar chart via PowerNet
Equipped with dv/dt subcycle trigger of events for high speed event capture	dv/dt subcycle trigger of events not available

Cutler-Hammer, a part of Eaton Corporation, is a worldwide leader providing customer-driven solutions. From power distribution and electrical control products to industrial automation, Cutler-Hammer utilizes advanced product development, world-class manufacturing, and offers global engineering services and support.

For more information on Cutler-Hammer products, call 1-800-525-2000 or 1-616-982-1059, for engineering services call 1-800-498-2678, or visit our web site at www.cutlerhammer.eaton.com



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