Logitek

Audio Metering...See the Difference



Ultra-VU Precision Audio Meter

- Big 70 dB Range for Full Control Over High Dynamic Range Material
- Detailed 63-LED, Tri-color Bargraphs Reduce Operator Fatigue & Confusion
- Simultaneous Display of VU & True Peak Gives a Complete View of Audio Signals
- · International Standard Ballistics
- · Adjustable Orange VU Reference Dot
- · Optional Orange Peak Reference Dot
- Clipping Indicator with Front Panel Adjustable Sensitivity
- FINE Mode for Precise Level Setting with .2dB per LED Detail
- Switchable Loudness Filter Referenced to 50dB SPL
- Stereo Image Display Shows Width & Location of Stereo Sound Field
- Image Also Shows Phasing Problems
- · Mono Sum Display
- · Stable .1 dB Accuracy
- Powerful DSP Based System Retains Accuracy Over Time & Temperature
- Alarm Output Available
- Internal 110/220 Power Supply



Super-VU Bargraph Audio Meter

- Expanded Range 40 Tricolor LEDs
- · Releasing or Non-Releasing Peak Hold
- · Stereo Image / Phase Display
- · International Standard Ballistics
- Illuminated Reference Markers
- · Analog or Digital Inputs
- · Stable .1dB Accuracy
- . Up to 6 Bargraphs per Rackunit
- · Alarm Output Available
- · Internal 110/220 Power Supply



Bright-VU Audio Meter

- · Analog or Digital Inputs
- · Loop-Through on Digital Inputs
- Multi-Color 20 LED Bargraphs
- · Simultaneous VU & True Peak Display
- IEC Standard Ballistics
- · Stable .1 dB Accuracy
- · XLR Input Connectors
- . Up to 6 Bargraphs per Rackmount
- · High & Low Level Alarms Available
- Internal Power Supply 110/220 VAC



2VUB & 4VUB Mechanical VU Meter

- · 2 1/2" Lighted Mechanical Meters
- 2 Meter & 4 Meter Versions
- · Balanced Analog Inputs
- XLR Input Connectors
- Phase Checking Switch
- · Sensitivity Adjustment
- · 2RU Enclosure
- · Switchable 110/220 Power Supply
- · Label Strip for Channel Identification



The Logitek Ultra-VU Precision Audio Meter

The Ultra-VU meter displays VU and peak levels on the same bargraph. Tricolor LEDs allow the VU level to be shown as a green bar and the peak level to be shown as a red dot. That way both levels can use the full meter range without confusion. A switchable hold feature supplies a momentary or continuous hold of the highest peak reading ensuring that operators will always know if maximum levels are exceeded. The sensitivity of the clipping indicator can be set from the front panel allowing the Ultra-VU to be used with multiple standards. The zero VU point is user setable allowing optimum use of the 70 dB meter range while the lighted zero reference marker ensures a clear reading of critical levels even from across the room. A second lighted marker provides a positive reference for peak program levels. And the front panel brightness control allows the meter to be easily adjusted for ambient lighting conditions.

The Ultra-VU's dual bargraphs display the left channel above the right channel with scale markings in between. Pressing the MODE button causes mono

sum to be displayed on the lower bargraph and phase to be displayed on the upper bargraph. This unique phase display uses a red LED to show the location of the furthest left sound in the sound field and a green LED to show the location of the furthest right sound. In this way the width and location of the stereo image can be easily seen or adjusted. Problems with phase reversal or off center mono are also easy to detect. Pressing the MODE button again activates a filter which tailors the VU frequency response to track more closely the perceived loudness of the signal. This allows better loudness matching between music and voice segments. Pressing the MODE button yet again causes the meter resolution to expand around the reference point. The .2 dB per LED resolution in this FINE mode makes precise level setting a snap.

On meters with digital inputs, the Ultra-VU provides several auxiliary data displays. The sample rate is measured and displayed while the auxiliary data is decoded to show the format and emphasis status. The digital input versions accept serial data in either professional

or consumer format via a transformer isolated input that automatically locks to the incoming sample rate. A passthrough mode allows the unit to monitor digital lines without the need for a distribution amplifier. Analog input versions have bridging inputs that accept balanced or unbalanced signals while the gain trim controls allow for easy calibration to any common reference level. And, if you want complete flexibility, choose our "B" version units that have both analog and digital inputs. These meters will automatically select the active input. Alarm outputs are also available. Triggers can be set for over level, under level, phase reversal, digital input error and alarm delay.

DSP technology ensures that, even with all these features, the Ultra-VU is a very compact meter. And automatic self-calibration keeps the Ultra-VU's high accuracy stable over time and temperature. One or two meters will fit in a one rackunit enclosure with an internal power supply. A single meter in a portable desk-top enclosure is available for field work.

- Big 70 dB Range for Full Control Over High Dynamic Range Material
- Detailed 63-LED, Tri-color Bargraphs Reduce Operator Fatigue & Confusion
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- International Standard Ballistics
- · Adjustable Orange VU Reference Dot
- · Optional Orange Peak Reference Dot
- Clipping Indicator with Front Panel Adjustable Sensitivity
- FINE Mode for Precise Level Setting with .2dB per LED Detail
- Switchable Loudness Filter Referenced to 50dB SPL
- Stereo Image Display Shows Width & Location of Stereo Sound Field
- · Image Also Shows Phasing Problems
- Mono Sum Display
- · Stable .1 dB Accuracy
- Powerful DSP Based System Retains Accuracy Over Time & Temperature
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- Expanded Range 40 Tricolor LEDs
- · Releasing or Non-Releasing Peak Hold
- · Stereo Image / Phase Display
- International Standard Ballistics
- · Illuminated Reference Markers
- · Analog or Digital Inputs
- · Stable .1dB Accuracy
- Up to 6 Bargraphs per Rackunit
- · Alarm Output Available
- · Internal 110/220 Power Supply



The Logitek Super-VU Bargraph Audio Meter

the Super-VU meter simultaneously displays VU and peak levels on the same bargraph. Three-color LEDs allow VU to always be shown in green and peak to always be shown in red. That way both levels can use the full meter range without confusion. The meter ballistics conform to international standards for VU and true peak response. This helps prevent level problems when moving material between studios or facilities. A switchable peak hold feature supplies a momentary or continuous hold of the highest peak reading ensuring that operators will always know if maximum levels have been exceeded. The zero VU point is user settable allowing optimum use of the 40 segment bargraph while the lighted zero reference marker ensures a clear reading of critical levels even from across the room. And the brightness control allows the meter to be adjusted for ambient lighting conditions.

The Super-VU's dual bargraphs handle two channels per display. With the addition of a second dual bargraph, mono sum is displayed, helping to prevent problems with center channel build-up and mono compatibility. The remaining bargraph shows stereo image and phase information. This unique display uses a green LED to show the farthest left sound in the stereo soundfield and a red LED to show the farthest right sound in the soundfield. The location and width of the stereo image is clearly visible and any problems with phase reversals or off center mono content are immediately seen.

Analog input versions have bridging inputs that accept balanced or unbalanced signals while the gain trim controls allow for easy calibration to any reference level. Digital input versions accept professional and consumer format serial data via a transformer isolated input that automatically locks to the incoming sample rate. A bridging, pass-

through mode allows the unit to monitor digital lines without the need for a distribution amplifier.

The standard analog scale covers a range of -50 to +20 dB with 0 dB at center scale. The standard digital scale covers a range of -70 dB to 0 dBFS. Other common scales are also available and almost any scale or ballistics can be easily installed for a small setup fee. An alarm output is also available. Triggers can be set for high level, low level, phase reversal, digital input error and alarm delay.

DSP technology ensures that, even with all these features, the Super-VU is a very compact meter. Up to three stereo meters or one meter with an accompanying image/sum display will fit in a one rackunit enclosure. And a two rackunit frame can hold two meters with their accompanying image/sum displays. Phase display only models are also available.

The Logitek Bright-VU Audio Meter

ccurate and reliable presence monitors are hard to find. But by using the same DSP based technology that brings such power and precision to our more expensive meters, these advantages are now available in the economical Bright-VU models as well.

Each bargraph contains 20 LEDs. This allows a broad, 53 dB range to be displayed. The large range allows VU to be displayed as a solid bar and peak to be displayed as a single dot at the same time on the same bargraph. We even color coded the display so that operators can get a maximum of information with a minimum of thought.

The displays are controlled by a sixteen bit digital signal processor. This precision allows us to ensure that all Bright-VU meters conform to the international standard VU and true peak ballistics while maintaining a basic accuracy of .1 dB over the entire scale. This is important because it means that a program recorded using a mechanical VU or peak

program meter will show the same levels when played back on the Bright-VU, which will help reduce operator confusion and error. The digital circuitry and self calibrating data converters also help the meter keep its accuracy over time and temperature variations. And the user adjustable zero point makes the Bright-VU easy to calibrate to any house standard.

Add to this an internal, multi-voltage power supply and the convenience of XLR input connectors and you have a meter that can't be beat anywhere in its price range.

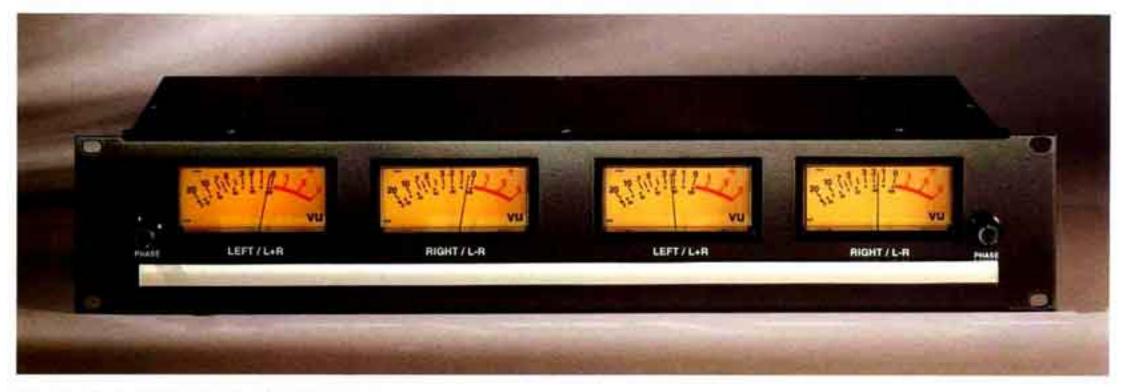
However, we aren't finished yet. The Bright-VU is also available in digital input versions. Now these great Bright-VU features are available for all your AES/EBU or S/PDIF serial digital inputs - at no additional charge. We also offer an alarm output with user settable over level, under level and alarm delay points.

Finally, the Bright-VU is designed to give years of service without becoming obsolete. Its software based operation is easily updated to accommodate new standards and the modularized input sections can be easily upgraded to new formats as your requirements change, without having to replace the entire meter.

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- · Loop-Through on Digital Inputs
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- XLR Input Connectors
- Up to 6 Bargraphs per Rackmount
- High & Low Level Alarms Available
- Internal Power Supply 110/220 VAC

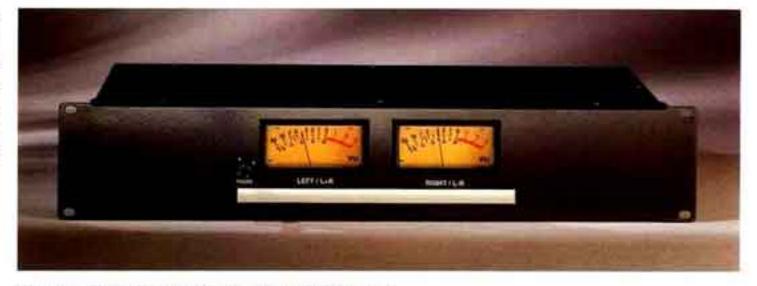


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The Logitek 4VUB Mechanical VU Meter

echanical VU meters have been the industry standard for years. And in loudness measuring applications they are hard to beat. The trouble is that many of the meters installed in today's tape machines and related products are either too small to read easily or too inaccurate to be of much use.



The Logitek 2VUB Mechanical VU Meter

The Logitek 4VUB solves this problem by supplying four large, accurate, mechanical VU response meters in a 2RU self powered box. For smaller applications, the 2VUB provides two meters centered in a 2RU enclosure. Each meter has a balanced, bridging, high-impedance input and a rear panel zero adjustment control.

A phase button for each pair of meters places left plus right on the left meter and left minus right on the right meter. Comparing these two readings gives a quick check for correct phasing. Meter lights and an integral label strip add to the usefulness of this handy unit.

Whatever your application, a 4VUB or 2VUB VU meter is easy to install, easy to use and highly reliable.

ne of the many great advantages of the Logitek LED meter systems is their software based construction. Because of this, we can economically offer a wide variety of custom features. Among those we have already supplied:

Scales

Output Alarms

Input Connector Type

Ballistics

Front Panel Controls

Enclosures

Piece Parts





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