

Special Report Hot new products from NAB2007





D-12: Compact Enough for OB Powerful Enough for Breaking News

The D-12 Digital Audio **Control Surface**

- mixing router based topology
- 5.1 surround sound plus 3 stereo masters
- COMPACT 32 faders 53" wide / 32" deep / 9" high talkback communication (programmable)
- router based source/destination selection
- paging channel strips 64 channels on 32 faders
- scalable up to 64 input faders
- routable mixes
- event storage and recall
- eight stereo subgroup mixes
- eight stereo sends
- eight mix-minus outputs (can be expanded)
- four DCM faders (digitally controlled groups)
- Bus-Minus (w/TB & solo) on every input (direct out) pageable fader option

• fullscale digital peak and VU metering

- two studios, CR and HDPN/Studio 3 monitors
- mix follows talent / logic follows source
- 12 user-programmable switches (salvos, triggers, etc.)
- automatic failsafe DSP card option
- automatic failsafe CPU card option
- redundant power supply option
- switched meters with system wide access (including all console inputs and outputs)
- dedicated master, group and DCM faders (no fader sharing)
- motorized faders
- pan/bal, blend, mode, EQ/dynamics on every input dedicated LCD display per function (EQ, Pan, Dynamics) • multiple surfaces can share I/O • delay inputs or outputs (frames or milliseconds)

With thousands of digital consoles installed, trust Wheatstone for your next project!

THE DIGITAL AUDIO LEADER

Wheatstone

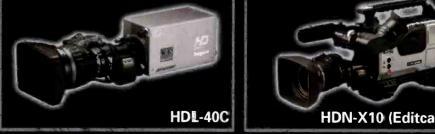
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tel 252-638-7000 / www.wheatstone.com / sales@wheatstone.com

Ikegami HD Cameras: Our greens won't give you the blues.

lkegami's HD cameras are making the competition green... with envy. With a full line of Native 1080i, Native 720p, and multi-format CMOS cameras, including the HDL-40HS Camera, the HDN-X10 Tapeless Editcam, and the HDK 79EC camera system, Ikegami CCD and CMOS cameras deliver Texibility and performance that stands out. Plus our superb colorimetry means that with Ikegami cameras, the grass is always greener. Discover the Ikegami difference today.

Ikegami



DIGI SUPER S625

HDK-79EC (with System Expander



Ikegami Electronics (USA), Inc. 37 Brook Avenue, Maywood, NJ 07607 East Coast: (201) 368-9171 West Coast: (310) 297-1900 Southeast: (954) 735-2203 Southwest: (972) 869-2363 Midwest: (630) 834-9774 www.ikegami.com



NEW PRODUCT EXTRAVAGANZA

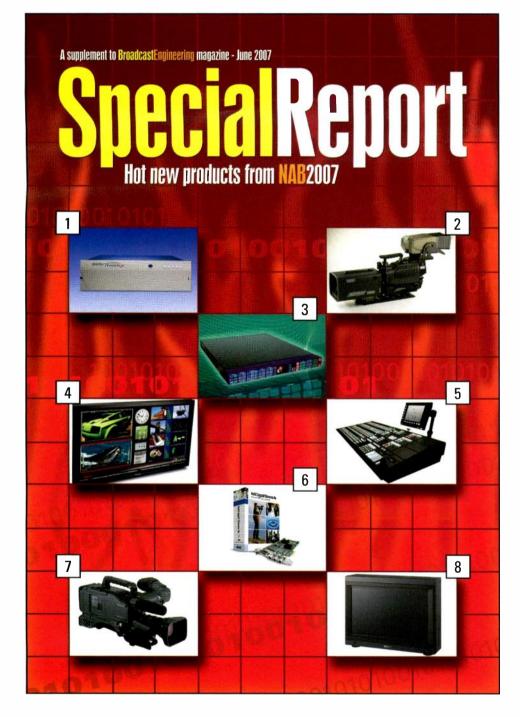
You are holding today's version of a broadcast/production equipment catalog. It's filled with products, technology and solutions. If you want it, it's probably listed inside, just a few page turns away.

Broadcast Engineering writers and editors canvassed the 2007 NAB convention show floor for more than four days to collect this information. Each product highlight includes a brief description and full company contact information. Additional products are highlighted in the regular June issue of *Broadcast Engineering*.

So, grab yourself a beverage, put your feet up, and read on. There's lots to cover, and we're just getting started.

Brow Dich

Brad Dick, editorial director



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JAPAN

ON THE COVER

- 1. 360 Systems MAXX 6T
- 2. Fujinon XA22x7BES
- 3. Miranda JAZZ-800
- 4. Harris CENTRIO
- 5. Ross Vision
- 6. Avid Chrome Xe with AJA support
- 7. Panasonic AG-HVX500
- 8. Sony BVM-L230

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pure instinct

Avid

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PORTABLE P2 HD MEMORY CARD

PANASONIC AG-HPG10



Offers backup recording of HD and SD content; provides extremely reliable, inthe-field performance; the 2lb solid-state memory card unit has a heavy-duty, shock-resistant body; comes equipped with easy-to-use controls; features a flip-up, 3.5in 4:3 LCD monitor and speakers for video and thumbnail clip viewing, selecting or deleting footage, or shot marking; features a two-slot P2 card reader; offers instant access to recorded content with playback in multiple formats.

> 201-392-4127 www.panasonic.com/broadcast

CAMERA HITACHI HV-HD30



An HDTV digital color camera; incorporates three HDTV 1/3in, 1.3-megapixel CMOS sensors; provides both 1080i and 720p camera outputs; the camera is a compact box type head, weighing 600 grams; a wide range of adjustments can be made remotely, providing versatility that makes the camera usable as a studio subcamera, in remote observation applications, as a point-of-view camera and in industrial applications.

516-921-7200; www.hitachikokusai.us

VIDEO SERVER

360 SYSTEMS MAXX 6T



Delivers more than 700 hours of program storage with 6TB of capacity; uses 360 Systems' Double Fault Tolerant RAID-6 technology; provides three-channel playout server, includes graphics store capability with key-and-fill; composite and SDI video ports, a frame synchronizer for recording satellite feeds, and a complete set of audio formats including AES/EBU digital, +4 balanced analog, and SDI-embedded audio.

818 991-0360; www.360systems.com

CABLE CONNECTOR NEUTRIK EMC-XLR



Designed for EMI protection; comprised of three-pole male/female XLR cable connectors with integrated LC filters, which avoid the RD interference and LF noise; includes a 360-degree shield contact on the female connector to ensure the best possible shielding and chassis contact.

732-901-9488; www.neutrikusa.com

VIDEO IMAGE CONDITIONING SYSTEM

SNELL & WILCOX PROTUS PH.C

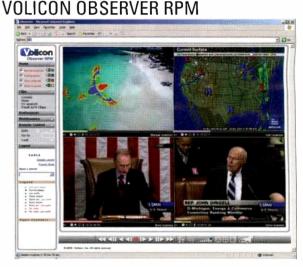


NEWSROOM SYSTEM HARRIS NEWSFORCE

A newsroom system built on the NEXIO XS shared storage server architecture; includes a new generation of Harris editors, optimized for fast cutting and airing of news; with servers, editors and graphics systems working directly on the NEXIO storage area network, the system provides newscasters with a streamlined, MOS-enabled infrastructure for producing, processing, distributing and managing SD and HD content.

513-459-3400 www.broadcast.harris.com

REMOTE PROGRAM MONITORING



Designed to help MSO and cable operators monitor the quality of their broadcasts in central and remote unmanned headend facilities; monitors and records 500 or more video channels for audio and video signal integrity; notifies the operator, by e-mail or SMS alerts, if the signal does not conform to prespecified limits.

781-221-7400; www.volicon.com

FIBER-OPTIC TRANSMISSION SYSTEM

COMMUNICATIONS SPECIALTIES

AUDIO CONSOLE WHEATSTONE D-10

Features 12 programmable switches, redundant failsafe DSP/CPU card options, motorized faders, redundant power supply option, switched meters with systemwide access, a dedicated master, and group and DCM faders; includes 5.1 surround sound plus three stereo masters, eight stereo subgroup mixes and eight mix-minus outputs.

252-638-7000; www.wheatstone.com

Allows mobile TV service providers to increase picture quality and/or reduce bandwidth requirements; works with almost any video compression encoder and all compression formats; features image conditioning tools such as noise reduction and motion-compensated deinterlacing and scaling, which coverts video to the correct scanning format, picture size and aspect ratio with few artifacts and image degradations. 212-481-2416; www.snellwilcox.com

FIBERLINK 7500 SERIES

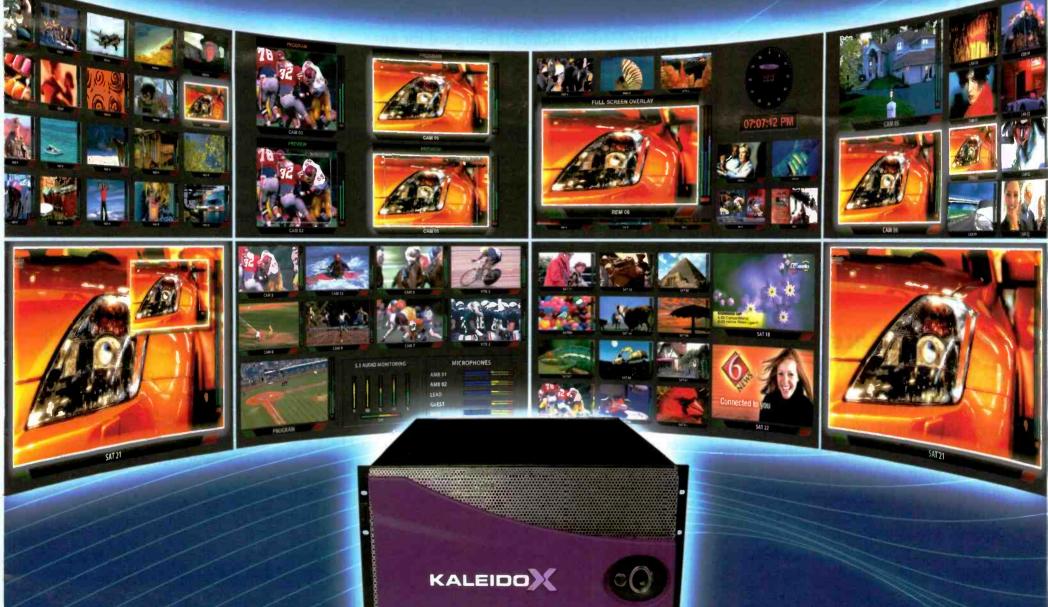
Transmits all single-link DVI resolutions (up to 1920 x 1200), plus stereo audio, over one, single-mode nonproprietary fiber; supports distances up to 15km; features a DVI loop-through for monitor and EDID; the receiver provides two DVI outputs; the system does not use any compression, scaling or color space conversion and does not require tweaks or adjustments.

631-273-0404; www.commspecial.com

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Unlimited signal repetition across 8 displays

Kaleido-X sets a new standard for signal flexibility among multi-room, multi-image processors. Any of its 96 inputs can be displayed, any number of times and at any size, over eight monitors without grouping restrictions. And the picture quality has to be seen to be believed.



Miranda

www.miranda.com/KX

HDMI SWITCHERS

TV ONE 1T-HDMI SERIES



Provide two inputs on the 1T-HDMI-821, four inputs on the 1T-HDMI-841 and eight on the 1T-HDMI-881; feature HDMI, HDCP and RoHS compliancy; enable control via front-panel push buttons, IR or RS-232 interface; support HDTV resolutions of 480p, 720p, 1080i and 1080p, as well as SD 480i.

859-282-7303; www.tvone.com

LIGHTING FIXTURES

BRIGHTLINE SERIESONE



Provide performance designed specifically to work with digital cameras, including HD; feature one, two or four lamps, color temperatures ranging from 3000K to 5600K, 55W, advanced-phosphor lamp formulations and dimming-control options including phase, DMX and DALI; include horizontal or vertical yokes and diverse racking options; automatically sense and adjust to ambient light.

412-206-0106; www.brightlines.com

PROGRAMMABLE PATCHING SYSTEM ADC PRO PATCH

Designed for digital audio patching; features a patented system that includes individual front-access circuit programmability with a DIP switch, light weight and conversion to a 1.5RU space panel with larger designations; features a 2 x 48 bantam configuration and 2 x 32 longframe configuration, without using special patch cords.

CAPTURE CARD AJA KONA 3



An uncompressed capture card for seamless operation with PCI Express (PCIe) Apple G5 Power Mac or Mac Pro systems and Apple Final Cut Pro; supports any uncompressed SD or HD format, including dual link and 2K; captures and plays back uncompressed 8-bit and 10-bit digital video and 24-bit digital audio.

530-274-2048; www.aja.com

LOW RFR ANTENNA

DIELECTRIC LOW RFR PYLON ANTENNA MobileMedia antenna is designed for applications where downward radiation is a concern; holds the power density at all elevation angles up to 50 percent of the MPE limit for occupational uncontrolled areas (based on 50kW ERP, 6ft observer and 15ft CR); available with horizontal, elliptical or circular polarization.

800-341-9678; www.dielectric.com

REMOTE CONTROL SYSTEM

ANT GROUP GARDA SYSTEM

Allows broadcasters to completely monitor and control site equipment; connects any product and presents the collected data, alarms and events in a standard, comprehensive interface; all communication passes through the control center.

+39 0365 34558; www.antgroup.it

TEST PATTERN GENERATOR OMNITEK LAB

Provides digital video generation and analysis; combines a full-motion video test pattern generator with comprehensive data analysis capabilities; contains the ability to capture, store and play out video images or sequences complete with the associated blanking interval data, which may contain audio, time code or any other ancillary data packets.

+44 118 988 6226; www.omnitek.tv

RACK APWMAYVILLE STANTRON E-RACK



The modular design allows users to configure their own rack systems; removable, quick-release side panels and cable chase panels provide easy access for cable management, reducing installation time for large-scale installations; multiple lacing points located every 6in along the rack support heavy bundles; other standard and customizable features include heavyduty shelving, filler panels and temperature control.

800-558-7297; www.stantronracks.com

AUDIO MULTIVIEWERS

952-917-0279; www.adc.com

DUAL-PURPOSE ANTENNAS ADVENT FLYDRIVE

Available in two modes: the 1.5m Fly-Drive and 1.2m FlyDrive; support X, Ku, DBS and Ka band feeds, as well as C band for the 1.5m; offer full three-axis motorized control with manual backup, satellite auto acquisition and tracking. **978-671-5700; www.adventcomms.com**

LI-ON CAMERA BATTERY ANTON/BAUER ELIPZ 10K

A 7.2V Li-Ion battery that delivers allday operating times for a 10W handheld camera; frees the operator from being cabled to a beltpack or adapter; uses the underside of the camera as a mounting surface, away from the operator controls; requires no voltage conversion circuitry; provides a strong and secure structural foundation for the camera. **800-422-3473; www.antonbauer.com**

AVITECH ACC-8000 SERIES

Multi-audio processing modules designed to monitor analog stereo and AES/ EBU audio inputs; can be used either as standalone units, or cascaded together to provide facility-wide audio monitoring capabilities (up to 15 modules); the ACC-8000 can be cascaded with the MCC-8004 and/or VCC-8000 series, offering users the ability to monitor both video and audio on the same display. **877-284-8324; www.avitechvideo.com**

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Introducing the DP600 Program Optimizer The Quick Fix for File-Based Media

Desigr ed specifically for broadcasters who work in file-based environments, the award-winning **Dolby® DP600 Program Optimizer** is a powerful, intelligent, and automatic system. It ensures consistency in delivery of broadcast media and audio files for terrestrial networks, local stations, and cable, satellite, and IPTV operators. Expanding on the unique Dialogue Intelligence[™] technology of the Dolby LM100 Broadcast Loudness Meter, the DP600 automatically analyzes and normalizes the loudness of programs and commercials without impacting their original dynamic range.

In addition to loudness analysis and correction, the DP600-C version supports faster-than-real-time encoding, decoding, and transcoding of Dolby Digital, Dolby Digital Plus, Dolby E, and MPEG-1 LII contained within several broadcast media file formats.

Both the DP600 and DP600-C can be used for a range of invaluable applications. Discover how the Dolby DP600 Program Optimizer can save you time and money. **Visit our website, and** click the DP600 spotlight for additional information.

DP600 Program Optimizer



DP600 and DP600-C applications include:

- Broadcast media file Q€ and loudness correction
- Broadcast media file transcoding
- Automated digital program insertion (DPI)
- VOD file analysis and loudness correction

www.aolby.com



21:00 08 May 2007

WEATHER SYSTEM UPGRADE

BARON SERVICES VIPIR

Designed for covering severe and daily weather; offers radar display and hurricane tracking in one computer; upgrades include an easy-to-use interface, sleek visuals and sophisticated weather analysis; features HD capability and a voice recognition tool to allow meteorologists to work directly from the weather wall by voicing their commands.

256-881-8811; www.baronservices.com

MONITORING SYSTEM TERANEX CLEARVUE

Includes a ClearVue processor matched to a 24in 16:10 WUXGA TFT LCD panel; employs HQV technology; offers Teranex technology such as PixelMotion Deinterlacing and Multi-Directional Diagonal Filtering, as well as proprietary algorithms that reproduce incoming signals accurately.

407-858-6000; www.teranex.com

AUTOMATION SYSTEM SUNDANCE DIGITAL **INTELLI-SAT V4.0**

Automates the scheduling and capture of incoming content from satellite and live sources; brings greater usability to the wizard-driven option for Titan and FastBreak.

> 972-444-8442 www.sundancedigital.com

DOWNSTREAM LINEAR KEYER

EYEHEIGHT KEYEYESMDI

Incorporates all the facilities needed for generating matte overlays; enables overlays to be located anywhere on the video display as a solid or transparent image; provides fill and key inputs with adjustable horizontal timing, matte generators, wipe, independent main and preview keyers, and EDH reinsertion; supports 1080i, 720p, 625 and 525 operation.

+44 208 255 2015; www.eyeheight.com

BNC AND RCA CONNECTORS BELDEN

Part of the Belden Brilliance line of A/V products; available in both straight and right-angle versions; feature a solid, one-piece construction, plated in either nickel or gold with gold-plated center pins; two independent compression points seal and hold the connector onto the miniature coaxial cable and ensure electrical contact.

765-983-5815; www.belden.com

DISTRIBUTED **ROUTING SWITCHER QUSTREAM PESA CHEETAH DRS 64X64**

Offers all AES/analog/time code or mix with 64 AES or analog inputs by 64 analog or AES outputs; features include Dolby E routing, soft switching and delay functionality in the input and output frames; delays an incoming frame-synced video signal coming into the router; allows processing delay in the video to be matched with audio output delay.

631-912-1301; www.qustream.com

How does a 20" HD monitor fit into 19" rack ?

(Answer: it is not a magic trick, it is just superior engineering)

.....



Now for just under \$3K you can get a 20" High Definition monitor with all Analog

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Multibridge Pro has HD-SDI and analog editing with HDMI monitoring for only \$1,595



Multibridge Pro is the first bi-directional converter that's also an editing system. Featuring a built-in PCI Express link, you can connect to Windows or Apple Mac systems for the highest quality editing solution.

Connect to any Deck, Camera or Monitor

Multibridge Pro supports standard and high definition 10 bit SDI and analog YUV, as well as NTSC/PAL video in and out. Multibridge

World's Highest Quality

Multibridge Pro works natively in 10 bit 4:2:2 and features the industry's only true 14 bit analog conversion with uncompressed video capture/playback. With uncompressed 10 bit capture and playback, you'll always retain that pristine film look.

Dual Use - Converter and Capture Card

Get the world's most amazing editing solution for Apple Final Cut Pro[™] and Adobe Premiere Pro[™]. When not connected via the PCI

Pro also features 4 channels of sample rate converted AES audio and analog stereo XLR audio in and out, combined with two channel RCA audio outputs, great for low cost HiFi monitoring.



Advanced HDMI Monitoring

Multibridge Pro includes built-in HDMI out. Perfect for connecting to the latest big screen televisions and video projectors for incredible digital cinema style edit monitoring. Express link to your computer, Multibridge Pro also works as a bi-directional video and audio converter. Multibridge Pro is really two products in one, always adapting to your needs.



The Drawn Together images are courtesy of Comedy Partners.

Learn more today at www.blackmagic-design.com

STORM TRACKER

BARON SERVICES FASTRAC

A Windows-based storm tracker; users can create a manual storm track by clicking and dragging the mouse in the direction they want; a storm track instantly pops up, with a list of communities that lie in harm's way, as well as the time the storm should arrive; features include live weather sensors, live weather cameras, multiple mobile GPS, multiple NEXRADs, real-time lightning and multiple live radars.

256-881-8811 www.baronservices.com



Meters for a variety of Applications including: - Broadcast - Cable

- Satellite - Hi-Speed (DOCSIS) Provides analog and digital

measurements including:

- BER - MER - Noise Margin - Constellation - Avg. Power - Spectral View

MEDIA ROUTER

BROADCAST MICROWAVE SERVICES TCII MEDIA ROUTER



Offers extended network capabilities to mobile ENG field units using the BMS Truck-Coder II digital microwave system; transmits recorded video files back to the studio while live on-air; allows the operator to send prerecorded program segments as files to the studio over the digital radio link.

858-391-3050; www.bms-inc.com

HD VIDEO TRANSPORT STREAMBOX SBT3-9100



Provides full-motion, full-frame 1080i/720p HD broadcast video and audio in real time over satellite and IP-based networks; the HD encoder/HD decoder works seamlessly with the full range of Streambox systems and solutions; built on the company's ACT-L3 codec, which provides HD video quality at data rates ranging from 20Mb/s to 512Kb/s.

206-956-0544; www.streambox.com

PATCH PANEL JAMPRO RCPU

Features low insertion loss and a positive lock mechanism for quick redirections of RF signal paths, as well as an optional signal-flow indicator panel, dual-line power splitter or power measuring VSWR; applications include patching RF feeds to emergency antenna, alternate main/auxiliary transmitters, filter bypass, master station combiner reroutes and test point insertions.

916-383-1177; www.jampro.com

PRODUCTION SWITCHERS BROADCAST PIX SLATE SERIES

BROADCAST MONITORING SYSTEM BARCO NETWORKED BROADCAST MONITORING SYSTEM

Allows high-quality, low-latency distribution of video sources and metadata over an IP network toward multiple screens, even in different control rooms; consists of rear-screen projection modules or LCD panels, the NG System hardware and the Networked Broadcast Monitoring Suite software package; one rear-screen projection module is capable of simultaneously displaying multiple analog and digital video feeds together with related metadata, audio metering information and computer applications.

678-475-8000; www.barco.com

GRAPHICS AUTOMATION MIRANDA XMEDIA SUITE



Streamlines both live production and channel branding graphics workflows; ideal for all types of news programs, including special events such as elections, as well as for branding and promotional graphics in master control; an open and modular architecture allows scaling from a single user up to hundreds of users across multiple locations.

514-333-1772; www.miranda.com

ENCODING SERVERS

DIGITAL RAPIDS STREAMZHD Allows users to capture, encode, transcode and deliver content in multiple formats ranging from uncompressed HD video to high-quality streaming media, all from a single, intuitive interface; is format-agile; can capture HD or SD video in its native format, or format convert it on-the-fly from HD to SD, SD to HD, or between HD resolutions and frame rates; supports 10-bit and 8-bit uncompressed video and hardware-based JPEG2000 compression, plus a broad range of encoding formats. 905-946-9666; www.digital-rapids.com

Built-in Channel Plans for Cable (FCC, IRD, HRC) UHF/VHF, Satellite, or build to your specific needs

Rugged Design for years of dependable service



Innovative Video Network Solutions Your Partner Since 1951

www.sencore.com

1-800-SENCORE(736-2673)

New AutoAspect software enables 16:9 and 4:3 inputs, clips and graphics to be used interchangeably and mixed together in the same live production, while maintaining the native aspect ratio of each element, rather than stretching them; the new HD-SD I/O board enables all new and existing Slate switchers to add HD cameras and produce an HD show. 781-221-2144; www.broadcastpix.com

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DECKLINK CARD BLACKMAGIC DESIGN DECKLINK 5.7 FOR WINDOWS

Allows users to choose uncompressed online JPEG video that's full-resolution HD, includes high-quality 4:2:2 color sampling and a low compression rate; fully compatible with Adobe Premiere Pro, After Effects and other DirectShow software; users working with online JPEG will see a significant reduction in disk space and bandwidth requirements.

408-954-0500 www.blackmagic-design.com

VIDEO TIME AND DATE GENERATOR ESE ES-206U

A video time and date inserter that references an internal standalone clock; the clock is line-frequency referenced; an internal DIP switch allows selection of a crystal time base reference; six digits of time and six digits of date are superimposed onto a video signal looped through the unit; on-screen menus allow time setting, adjustment of the display size and position.

310-322-2136; www.ese-web.com



REMOTE AES I/O BOX CALREC AUDIO JB5607

A 3RU unbalanced AES I/O unit with 32 AES inputs and 32 AES outputs on BNC connectors; also available as a 110Ω XLR-based 4RU variant; has built-in PSU redundancy with single or optional dual IEC power connections; interfaces to the Calrec Hydra Network with dual Cat 5e GigE ports for audio and control redundancy up to 90m; supports duplex fiber GBIC connectors. +44 142 284 2159

www.calrec.com

HD STUDIO LENS CANON DIGISUPER 22XS

Now there's an Omneon media server tailored for you.

Maintains size and weight commensurate to that of other portable production cameras, weighing one-third a typical HD box lens; features a 105mm input optical port, which produces a high sensitivity, high contrast, optimized uniformity of brightness across the image plane.

> 800-321-4388 www.usa.canon.com

ADVERTISERS MARKED IN RED

MediaDeck gives you true Omneon functionality, performance and reliability – at a price that fits a limited budget. It comes fully integrated with up to 6 channels, integrated GigE connectivity, and a whopping 3TB of storage standard. When you need a complete feature set, ease of deployment, reliability, and effordability...MediaDeck fits!

www.omneon.com

For details, go to www.omneon.com/mediadeckfits or call us at 1-866-861-5690

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Active Storage for M∋dia™

AUDIO PROCESSOR

LINEAR ACOUSTIC AEROMAX-DTV

Six-channel television audio processor; the fully integrated, entry-level unit controls loudness and ensures stable audio imaging for 5.1-channel broadcasts; accepts 5.1- or two-channel audio inputs, plus a dedicated EAS input via four BNC connectors; audio is processed by the DSP core; two-channel audio then can be mixed up if triggered by front-panel or GPI control.

717-735-3611; www.linearacoustic.com

CHANGEOVER SWITCH

MICROFIRST ENGINEERING ICS-3200



Provides real-time redundant changeover control of two MicroFirst MPC-1600 and MPC-3200s; provides a series of 32 A/B switch ports; has an additional integral 10/100 Ethernet port, designed for residing on a standard network infrastructure; using the internal switchover design, a detected failure routes data to the other ports, thus passing the appropriate data at the exact moment required, providing a redundant data system.

201-651-9300; www.microfirst.com

PLAYOUT APPLICATION

MASSTECH MASSCHANNEL

Integrates with MassStore for transmission playout; stores file-based content and plays out frame-based content for automated environments; allows managed playout of content and automated playout; the playout device has full access to all file-based content in the facility. 905-707-2614; www.masstechgroup.com

AUDIO AND DATA MULTIPLEXER CLARATECH CTP1000

WIDESCREEN LCD MONITORS

SONY LUMA



LMD-2030W 20in model features WSX-GA+ 1680 x 1050 resolution, HDMI input connectivity for HDV camcorders and decks in portable applications; supports composite video, Y/C, RGB component as standard and optional DI-SDI; LMD-2450W 24in and LMD-2050W 20in models accept 1080/60P signals via standard DVI input; feature 10-bit processing, waveform monitoring and audio level meter display; support composite video, Y/C, RGB, component as standard and optional SDI.

800-686-7669 www.sony.com/professional

NETWORK INTERFACE CARD CLEAR-COM E-FIB

Extension to the Eclipse range of products; offers users a nonblocking, highspeed audio connection between isolated locations; a dual concentric fiber ring provides full redundancy while maintaining audio links, even if the main fiber pair is fully disconnected; runs at full audio bandwidth, allowing intercom matrices to share audio resources as if they were local.

510-496-6600; www.clearcom.com

BELTPACKS TELEX/RTS BP-319, BP 325 AND BP-351



DIGITAL VIDEO ROUTER NVISION NV8256-PLUS

A digital video router suited for missioncritical applications in which downtime is not allowed and where NVISION's HD-SDI super wideband signal transport technology is required; easily expands from 256 x 256 to 512 x 512 without distribution amplifiers; users can start with a single 256 x 256 frame and add a second frame to make the router 512 x 512; future-proofing includes support for HD-SDI, SDI and analog signals in either 525 or 625 line formats and 3Gb/s capability.

530-265-1119; www.nvision.tv

ASPECT RATIO CONVERTER CRYSTAL VISION ARC-10MC



Offers 10-bit processing and motionadaptive video deinterlacing; maximizes the picture's vertical resolution; selectss the best processing method based on the video content; performs conversions to 4:3 full screen, 14:9 pillarbox, 4:3 pillarbox, 16:9 full screen, 14:9 letterbox and 16:9 letterbox; has a one-frame fixed video delay.

+44 1223 497049; www.crystalvision.tv

MPEG TRANSPORT STREAM IME SHIFTER

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Accommodates up to eight full duplex audio and data channels plus eight general-purpose inputs/outputs in 1U; these are multiplexed onto one optical channel for transmission along single-mode or multimode fiber; the single-mode version can also operate in duplex, enabling simultaneous bidirectional communication along a single fiber; ideal for carrying program audio; can also be used for intercom links.

+44 1234 271053; www.claratech.com

Portable user stations for use with intercom RTS Two-Wire systems; BP-319 is а microprocessor-controlled one-channel intercom beltpack; BP-351 is a microprocessor-controlled two-channel select intercom beltpack; BP-325 is a two-channel fully selectable intercom beltpack. 800-323-0498; www.telexintercoms.com

Provides real-time user controllable delay of MPEG transport streams; features time delayed rebroadcast across time zones, international program distribution, real-time program screening and filtering, and two hot-swappable power supplies with automatic input voltage selection; includes either a 500GB or 1TB RAID disk array.

954-472-5445; www.pixelmetrix.com

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The World's Smallest HD Video Camera What Could You Do With a Dozen? HD-RH1



Multi-Format

- □ 720p @ 24, 25,30, 50, and 60 Hz □ 3-1/3" Progressive Square Pixel CCDs
- 1080i @ 50 & 60 Hz
 Dual Link Hd-SDI, DVI-D, and Analog Outputs
- □ 1080p @ 24, 25, 30, 50, and 60 Hz □ 14-Bit Quantization

Iconix Video, Inc

800.783.1080

iconixvideo.com

HD STANDARDS CONVERTER

SNELL & WILCOX ALCHEMIST PH.C – HD



Offers HD frame-rate conversion for both 1080i and 720p standards; performs SD standards conversion between 50Hz and 60Hz material, and HDTV upconversion, downconversion and crossconversion; provides two outputs that can be used for transmission of program feeds in multiple standards or formats.

212-481-2416; www.snellwilcox.com

OPEN MEDIA ASSET MANAGEMENT

DALET DALETPLUS ENTERPRISE EDITION

Designed for open broadcast workflows; customizable to any media-driven environment; offers a range of production and media management functionalities; Web-services-based API allows integration to service-oriented architectures for users to embed digital media services within the corporate data backbone of their customers.

212-825-3322; www.dalet.com

REMOTE NEWSROOM COMPUTER SYSTEM OCTOPUS NEWSROOM FIELD

REPORTER

All incoming information, such as wires, Web feeds, media, faxes and e-mails, are organized and ready to be used as ideas for last-second news coverage; offers a global search engine, keyboard shortcuts for frequently used actions and saved screen layout recall; features a new service for transferring stories and whole rundowns, allowing channels to share their assets between offices around the world.

+420 221 181 511 www.octopus-news.com

HD PRODUCTION WORKSTATION

DAYANG D³-EDIT HD9



Performs five-layer HD stream playout in real time with 3-D DVEs active on the top four layers; incorporates 12b realtime chroma and luma key, graphics and title key matte extraction, including fine mask adjustment; provides four upconversion modes (window, box, margin and zoom) and three downconversion modes (box, margin and zoom); supports IEEE-1394 devices (miniDV, DVCAM and DVCPRO25/50), Panasonic P2/P2 HD and Sony XDCAM/XDCAM HD.

+852 2730 2117; www.dayang.com

COMPRESSION PRODUCTS HARRIS

The suite of HD MPEG-4 part 10 compression products address the contribution, distribution and transmission needs of the television industry; leverage the latest advances in compression algorithm technology; enable new applications and services by allowing lower-bandwidth operation of HD services over satellite, terrestrial and IPTV delivery platforms. 513-459-3400

www.broadcast.harris.com

RED-WHITE LED OBSTRUCTION BEACON DIALIGHT



AUDIO METER

DK-TECHNOLOGIES MSD 600M

New features include the latest LEG loudness measurement protocol, an upgraded Jellyfish surround-sound display that provides more information, improvements in Session Logging and LEG Logging and graphing with SMPTE time code, and improvements to DK-Level Read — the PC-based long-format logging and documentation software.

831-335-5299 www.dk-technologies.com

CHANNEL INGEST TV MAGIC I/OINGEST

Offers users an ingest channel for capture of footage from tape- or file-based media; allows users to view the feed at the same time it is being recorded with Apple Quick-Time, as well as add as many record, edit and playback channels as desired; captures direct-to-local or shared storage; can perform long captures at varying durations.

858-650-3155; www.tvmagic.tv

INTERCOM SYSTEM RIEDEL PERFORMER CR-4

A 19in, four-channel, 1RU master station; any combination of beltpacks, splitboxes or desktop-panels can simply be plugged to the master station using XLR microphone cables; provides noise- and hum-free, high-quality digital audio with side-tone nulling; features integrated power supplies to power up to four beltpack lines.

818-563-4100; www.riedel.net

RG7 HD VIDEO SNAKE

FLUID HEAD SACHTLER CINE 30 HD

Comes with a side-load clamping mechanism for the camera plate, which increases the camera plate's sliding range and enables easy side loading of the fluid head with its premounted camera setup; the clamping mechanism is compatible with camera plates from most manufacturers.

845-268-0100; www.sachtler.com



The medium-intensity beacon is designed for marking broadcast and communications towers; offers a solid-state design that enables 20,000 candela flashing white combined with a 2000 candela steady or flashing red all-LED obstruction light; designed to withstand high levels of vibration and the most severe environments.

732-919-3119; www.dialight.com

GEPCO VS57000

The five-channel RG7 HD video snake provides multichannel transmission of serial digital, uncompressed HD video over long distances; each coax element is constructed from Gepco's VHD7000 16-gage HD coax, which features a gasinjected foam polyethylene dielectric and a 3GHz bandwidth; for broadband noise rejection, the cable is shielded with both a tinned copper braid and foil shield. 818-569-5222; www.gepco.com

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Because the Lens Creates the Image

You Can Be Confident When You Invest In Canon HD Lenses.

Don't put the wrong HD lens on the right HD camera! Remember: An HD lens is not a mere accessory to a camera. It is the crucial first stage where HD images are created before entering the camera's imagers. That's why Canon, a world leader in optics for the broadcast, digital cinema, and professional video industries, engineers a full range of HD lenses. Each lens is carefully designed for a specific category of HD camera, which are provided by leading manufacturers to the television and visual-entertainment industries.

This includes Canon's new **HDgc** line of lenses, engineered for the new generation of affordable HD camcorders (tapeless and tape-

HDxs

- Five Models From 60X To 100X
- Built-In Optical Image Stabilization
- Latest Digital Servo System

HJxs

Field

Studio

- The World's First Compact Studio Lens
 Full Line Of HD
- DIGISUPER Lenses
 Ideal For Robotic Systems



Digital Cine

HJec

- Six Primes From 5 To 55mm
- Three Zooms
- (variable focal length)
- Unique Anamorphic Converter (ACV-235)
- The Broadcast Production Standard

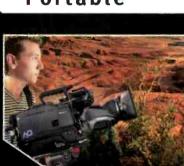
O-DXS

- Eight HD Lenses To Choose From
- Proven, Superior
 Performance

HDGC

- Portable
- A Range Of Affordable HD Lenses
- Supports New HD Tapeless Models
- Available In All







based) using 2/3-inch, 1/2-inch, or 1/3-inch image formats.

Image Formats

The Lens Creates the Image Find out more at <u>canonbroadcast.com</u>

imageANYWARE

Canon

1-800-321-HDTV (Canada: 905-795-2012)

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WIRELESS CAMERA TRANSMITTER ELBER WLCT-01

A mobile transmitter, ideal in situations where portability and mobility is important; the system incorporates MPEG-2 and COFDM technologies; features an optional 36MHz IF frequency output and a frequency range from 2.1GHz to 2.5GHz; supports 6MHz, 7MHz or 8MHz bandwidths; features low-power consumption.

+39 0185 351 333; www.elber.eu

MICROWAVE RECEIVER

MRC MDR-2

A portable, dual-diversity digital microwave receiver that may be rapidly deployed to cover sports, news and outside broadcasts from ground locations, from the air, or from a moving vehicle; the ideal companion to a camera-mounted COFDM transmitter; uses the latest maximal ratio combining technology to optimize the quality and usable range of the transmitted signal.

978-671-5700; www.mrcbroadcast.com

SIGNAL INTEGRATION SYSTEM ENSEMBLE DESIGNS AVENUE



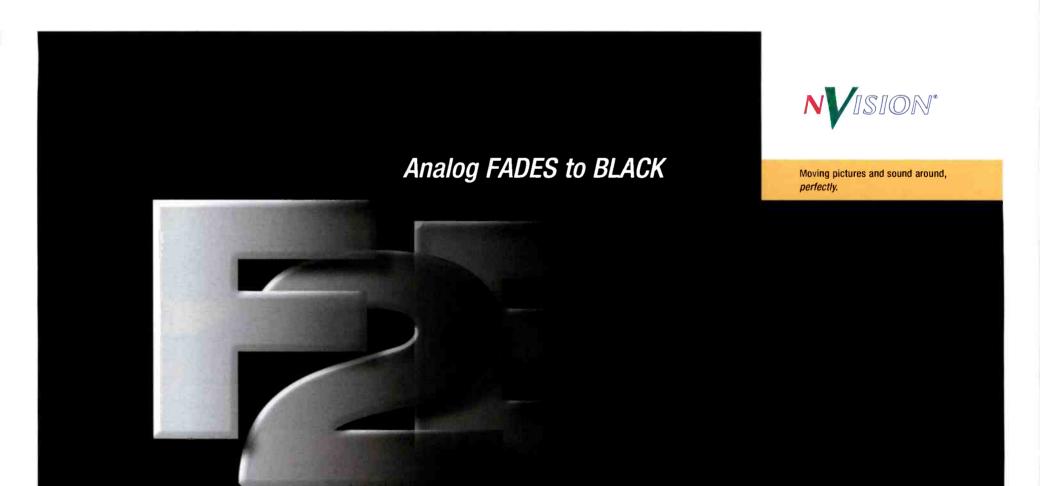
Includes HD video/downconverters, logo inserters, protection switches, audio embedders and video converters; an expandable, modular tray-based signal integration system housed in a 1RU or 3RU frame; allows any combination of HD video, SD video, DVB-ASI and audio modules in the same frame; PC software and touchscreens allow users to control and monitor every module from any location.

> 530-478-1830 www.ensembledesigns.com

ROUTER EVERTZ EQX



A 576 x 576 router, expandable to 1152 x 1152; accepts digital signals from 19.4 (SMPTE 310M) through SDI, ASI, HD/ SDI and up to 3Gb/s; features a modular, hot-swappable, redundant design, independent monitoring bus, SNMP interfacing, advanced system control, and sourceby-source intelligent autoconfiguration. 905-335-3700; www.evertz.com





Who will survive?

1-800-860-HDTV www.nvision.tv

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When time is critical...



... it's smart to make productions instantly.

The closer your event is to going live, the more you'll value the reliability and speed of the XT2 server. The greater the volume of material, the more you'll appreciate its agility and the more complex your workflows, the more you'll like the dedicated production applications like IPDirector.

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Instant tapeless technology

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SIGNAL PROCESSOR FOR-A FA-9100



A new HD/SD FA series signal processor; a more advanced version of the FA-9000; supports all formats, including HD, SD, analog, digital and audio; uses 12-bit internal processing for high-quality images; features numerous options such as an upconverter, downconverter, color corrector, median-based noise reduction, logo generator and Dolby E decoder.

714-894-3311; www.for-a.com

WORKFLOW AND MEDIA MANAGEMENT

THOMSON GRASS VALLEY CONTENTSHARE2

Defines media workflows by their progress through the entire enterprise; an open, service-oriented architecture; includes a workflow engine to manage workflow across the entire production and business chain; the software moves each project through the workflow from concept to delivery, allocating tasks to be completed at each workplace; provides a global monitoring solution.

503-526-8150; www.thomsongrassvalley.com

BNC CONNECTORS CANARE BCP-PC

The 75 Ω connectors are designed for SD-SDI applications; include a longer body, making them easier to grip; feature a threepiece crimp design, making assembly and field-replacement easy; models are available for several industry-wide cables, with 26dB or less return loss at 1Ghz and 20dB or less at 1.5GHz.

818-365-2446; www.canare.com

AUTOMATION

FLORICAL AUTOMATED JOIN IN PROCESS (JIP)

Featured in the AirBoss presentation controller; fully automated to provide potentially unattended join in progress of local recorded programs based on a remote signal from the network.

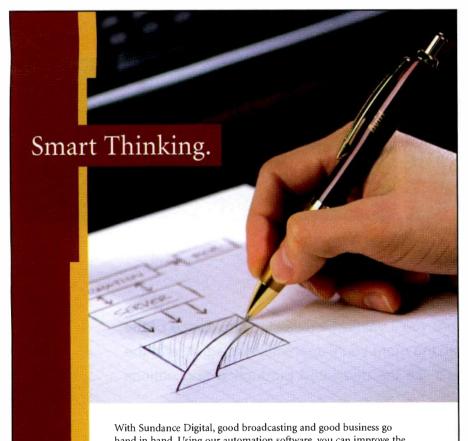
352-372-8326; www.florical.com

NEWS SYSTEM

QUANTEL NEWSBOX HD

The self-contained news system is ready to go on-air straight out of the box; available in both HD-now and HD-upgradable configurations, allowing broadcasters to manage their HD investments; works with all the latest HD acquisition formats; allows users to ingest material, view rushes, choose shots, edit stories, review finished pieces and play them out to air.

+44 1635 48 222; www.quantel.com



hand in hand. Using our automation software, you can improve the efficiency, accuracy, productivity and profitability of your broadcast

INTERFACITLITY MEDIA SHARING



A file-sharing program for broadcast news production that facilitates user collaboration and media sharing; blends client/server distribution with peer-to-peer distribution; enables streamlined filesharing between HD and SD stations within a group; uses any commodity storage to inexpensively archive at a cost far lower than tape.

800-214-2828; www.bitcentral.com

HD TELEPHOTO LENS FUJINON XA88X8.8BESM



and news operations. By integrating digital television and information technologies, we give you the capability to manage your entire broadcast workflow. As a result, you'll get greater control, more flexibility and unprecedented speed. That's what we mean when we say we'll improve your on-air product — and your bottom line.

How's that for smart thinking?

And speaking of great ideas, we've combined everything you expect from Sundance Digital — exceptional service, open technology, reliable products — and added the power of an industry leader. Now, as part of Avid, we have even more resources to serve your business.

Smart. Real smart.

www.sundancedigital.com 972.444.8442



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Features 88X magnification with the widest focal length of 8.8mm to 777mm telephoto; ideal for large sporting events; captures wide-angle shots or long-range close-ups in 16:9, 4:3 HD or SD; comes equipped with Fujinon's GO-Technology, which improves image resolution and chromatic aberrations at all focal lengths. 973-633-5600; www.fujinonbroadcast.com

WE'VE GOT VIDEO TRANSPORT COVERED.

COAX, FIBER AND MEDIA CONVERTER SOLUTIONS.



UPL-2000 Video BNC Connector

High frequency, true 75 ohm BNC designed

to handle high bit-rate digital video signal transmissions in conjunction with low loss broadcast coaxial cables. Return loss performance of -30 dB up through 3GHz.



Video Patchjacks and Panels HDVDP/M Patchjacks designed and engineered to exceed SMPTE 292M specifications. Available in WECo and Mini-WECo sizes.

Video Panels available in 19" and 23" sizes, and in insulated black phenolic.



HD-Ready Mini WECo Looping Plugs and Patch Cords

Looping plugs have 50 millionths gold plated center contact for exceptional conductivity and durability over thousands of mating cycles. Unique insertion bushing protects plug barrel.

Video Patch Cords are fully tested for continuity, shorts, and Hi-Pot.



BNC-to-Fiber Media Converters

ST and miniature LC versions adapt 75ohm BNC interconnects to fiber interface. VMC's feature integrated SMPTE cable equalizer, and the rx module features re-clocker and cable driver. Models available to support SD and HD-SDI. SMPTE 292M compliant to 1.485 Gbps.



Video Media Converter Racks

Easy-to-use housing platform for power management, diagnostics, and cabling on coax and fiber sides of video transport networks. Built-in Digital Diagnostic Monitoring.

VMCR-CWDM Transport Packages

Pre-configured with 16 uni-directional or 8 bi-di channels in a 19" 1RU package. Simply plug a BNC-terminated coax video signal line into one rack and mate to the coax port in

another using fiber as the transport media.

Allows multiple signals over a single fiber pair, enabling distance and weight savings versus coax cable.

Hx1080 Expanded Beam Connector



Expanded beam technology in SMPTE compatible format.

Rugged, environment-proof hermaphroditic construction, optical insertion loss typical -0.75 db, return loss >-45 db. Field-repairable, easy-clean interface design.

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HIGH RELIABILITY . VIDEO CONNECTIVITY

RF connectivity



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VIDEO-OVER-IP PLATFORM

HEWLETT PACKARD HP IPTV

A standards-based video-over-IP platform; enables service providers to deploy a high-quality video delivery service that enables subscribers to watch live broadcasts or on-demand video content.

800-752-0900; www.hp.com

MEDIA STORAGE NETWORK AVID UNITY ISIS

Features four-way scalability, from 8TB to 192TB of storage and redundant, hotswappable system components; supports up to 150 dual-stream 50Mb/s clients and up to 1000 user accounts; delivers realtime SD and mastering-quality DNxHD media in formats up to 145Mb/s; employs standard GigE technology.

800-949-2843; www.avid.com

CONSOLE LAW0 MC²66

Broadcast and production console has lightweight construction, low-power consumption and compact dimensions; in combination with the routing matrix integrated in the core, it offers maximum flexibility for I/O interfaces and DSP resources; has a matrix capacity of 8192 mono inputs and outputs and 512 DSP channels.

+49 7222 10020; www.lawo.de

HD BOX CAMERAS IKEGAMI HDL-45 AND HDL-45P

Feature advanced 14-bit analog-to-digital conversion; are designed to deliver superb 1080i and 720p HD image-capture, respectively; feature a built-in servo-filter that enables insertion of a neutral density or other filter by remote control.

201-368-9171; www.ikegami.com

VC-1/WM9 ENCODER INLET TECHNOLOGIES SPINNAKER



Designed for live media delivery, including broadband TV, Web streaming and IPTV enterprise; is compatible with existing cable, broadband and streaming infrastructures, as well as with new IPTV middleware; supports resolutions from Web to HD quality; provides real-time encoded output delivered in the SMPTE VC-q and Windows Media formats.

919-856-1080; www.inlethd.com

NEWSROOM EDITOR JUSTEDIT VSNSCENES

The low-cost editor allows low-resolution proxy preview in variable speeds directly from the chosen format (XDCAM or P2) and a selection of a list of clips or subs; automatically uploads high-resolution content to shared video servers.

+34 93 734 99 70; www.vsn-tv.com

STUDIO LIGHTING KINO FLO VISTABEAM 600 AND 300



Large area studio soft lighting fixtures; feature DMX control systems and ability to produce daylight or tungsten balanced light from the same fixture and flickerfree, remote operation; VistaBeam 600 delivers the equivalent of a 6000W spacelight, using only 10 amps of power.

818-767-6528; www.kinoflo.com

RASTERIZER LEADER LV7700

The multiformat SD and HD-SDI rasterizer conforms to 17 SD and HD standards; accommodates two SDI inputs; waveform, vector, audio, picture and data monitoring functions can be displayed individually or in several screen combinations; XGA output provides for excellent display clarity and resolution; error detection and error logging facilities include gamut detection and settable error limits.

800-645-5104; www.leaderusa.com

PORTABLE SURROUND

BEYERDYNAMIC HEADZONE

MIXING SYSTEM





Broadcasters have counted on ESE precision master clocks and timing-related products for over 35 years. ESE products accurately synchronize broadcast operations using a choice of GPS, WWV, Modem, Crystal or line frequency for affordable, reliable, perfect time.

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vast universe of timing systems that are designed for easy

142 Sierra Street El Segundo, CA 90245 USA Tel: (310) 322-2136 Fax: (310) 322-8127 www.ese-web.com Provides headphone-based 5.1 surround-sound reproduction for broadcast, post production, recording studios, mobile recording and video game sound design; offers ultrasonic tracking system that locates the orientation of the listener's head with respect to the source material and adjusts the audio accordingly. 239-283-7880 www.beyerdynamic.com

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installation, set-up and operation.

ADVERTISEMENT

CALREC LAUNCH OMEGA WITH BLUEFIN



Already installed in a new remote production vehicle for QVC, Calrec's Omega uses Calrec's award-winning Bluefin technology, and provides phenomenal processing power in a very compact frame. Featuring 160 channel processing paths packaged as 48 stereo plus 64 mono channels, and in keeping with previous Bluefin implementations, all this power is managed on just one DSP card. Available in three frame sizes -24, 40,and 56 faders — Omega with Bluefin has 8 x 5.1 surround, stereo, or mono audio groups, 20 auxiliary outputs (which can be 20 mono or 10 stereo), and 48 outputs for multitrack or general purpose feeds. The console also has two main stereo or 5.1 surround program outputs with full EQ and compressor/limiter facilities, with full control of the stereo downmix of the surround main outputs, often necessary when doing simultaneous HD and SD transmissions.

CALREC'S NEW RANGE OF FIXED FORMAT MIC BOXES

Ranging in size from 2U to 4U, Calrec's new line of fixed-format remote audio I/O boxes tional duplex fiber GBIC connectors, which allow operation up to five kilometers. The new range also includes a 2U, 4-SDI input de-embed unit that extracts up to 64 channels of synchro-

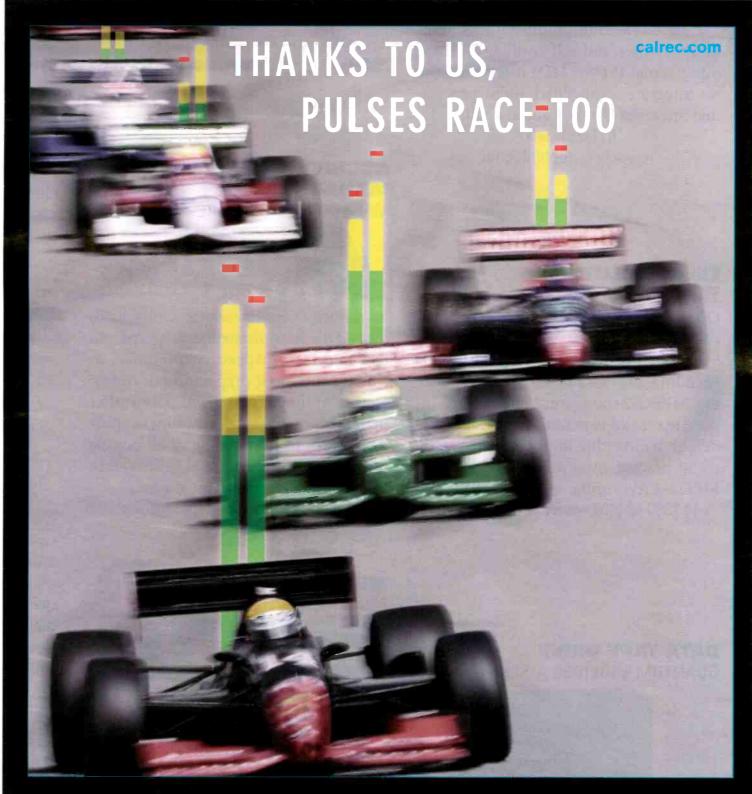
nous or asynchronous embedded audio

from four HD/SD streams. The unit



then makes these channels available to any console connected to the Hydra network. In addition, each SDI unit can process up to eight Dolby E signals to provide a further 64 decoded chan-

nels. Metadata from each Dolby E signal is also brought out as a serial interface.



complement the company's existing modular remote I/O box, and all include built-in power supply redundancy with dual IEC power connections. The boxes link to Calrec's Hydra network using dual Cat5e Gigabit Ethernet ports for audio and control redundancy at distances up to 90 meters. For greater distances, the new I/O boxes also support op-

Sound gives pictures an emotional dimension that movement alone can't convey. The increasing use of surround sound adds even greater impact to the viewing experience. But it calls for much greater console capacity.

At Calrec we've been meeting the changing needs of broadcasters for over thirty years. And as you'd expect from a company dedicated exclusively to live production and on-air broadcast audio mixing, we've developed an innovative surround sound solution that's as economical as it is practical.

New Bluefin technology provides twice the signal processing capacity in a fraction of the space of conventional systems and with 100% redundancy.

Sounds exciting? Find out more at calrec.com

Putting Sound in the Picture

R

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HD DOWNCONVERTER

LYNX TECHNIK C DX 5624



Multiformat module offers both analog and digital video and audio outputs; autodetects/senses and self-configures to the input signal (SD or HD) it is connected to; integrates embedded audio processing; preserves Dolby E audio quality. 611-251-8600 www.lynx-technik.com

TELCO SOLUTION TANDBERG

Offers an IPTV headend video processing solution that includes MPEG-2 SD encoding, MPEG-4 AVC HD and SD encoding, MPEG-2 to MPEG-4 transcoding, MPEG-2 transrating, and picture-inpicture service generation; is designed to deliver bandwidth improvements of up to 50 percent over previously deployed MPEG-4 AVC units.

+44 2380 484000; www.tandbergtv.com

DATA TAPE DRIVE QUANTUM PROVIDEO A-SERIES



TV AUTOMATION SYSTEM CONTROLLER

LEIGHTRONIX TCD/V3



Allows users to manage up to 16 channels of digital video playback; interfaces with the LEIGHTRONIX TCD/NX, as well as third-party servers; controls a wide variety of resources, including DVD players, recorders and VCRs; includes Win-LGX network management software for scheduling, immediate system control, user account management, system configuration and site management.

800-243-5589; www.leightronix.com

ARCHIVE AND ASSET MANAGMENT MASSTECH MASSSTORE



Now features commercial assembly to automate the flow of satellite-delivered content into the broadcast environment, including automatic preparation of content (e.g. trimming, color bars, slate); offers increased transcoding capability, supporting intelligent transcoding of all popular formats; now supports Avid Unity and Interplay, as well as Final Cut Studio. **905-707-2614; www.masstechgroup.com**

MULTI-IMAGE PROCESSOR MIRANDA KALEIDO-X



COAXIAL CABLE TEST KIT WHITE SANDS ENGINEERING

Designed to simplify the testing and remote identification of coaxial cable assemblies; adapter cables enable the tester to be used with a variety of A/V connectors, including F, BNC, RCA and SMB; includes a TSTL-3A cable tester, seven adapter cables, one F-female adapter, one AAA battery and a carrying case.

623-581-0331 www.whitesandsengineering.com

VIDEOCASETTE MAXELL HDCAM

Uses binder systems to achieve durability and exceed the compulsory storage performance demands of long-term archiving; incorporates super-fine ceramic armor metal particles $(0.1\mu m)$ to surpass the low-noise requirements of HDCAM's 7:1 compression algorithm; lineup includes 6-, 12-, 22-, 32- and 40-minute cassettes; large cassette lineup includes tapes that run for 34, 64, 94 and 124 minutes.

800-533-2836; www.maxell.com

DIGITAL AUDIO MIXER

EUPHONIX SYSTEM 5-B



Comprises a control surface, digital processing core, digital and analog interfaces, and a system management software application called eMix; designed for highquality sound, with full support for 24bit I/O and internal processing at 40-bit floating point; 96kHz sample rate operation is available.

650-855-0400; www.euphonix.com

WAVEFORM MONITOR AND VECTORSCOPE



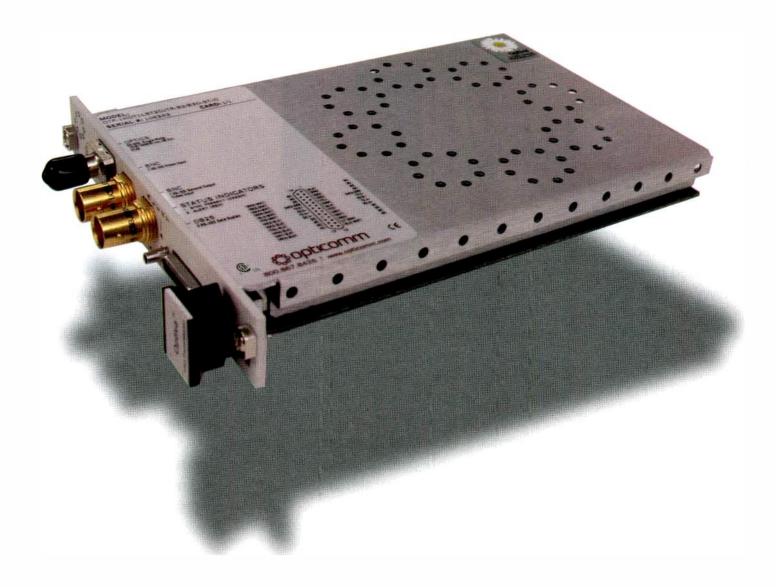
With a built-in GigE port, drives are network-attached so they can be directly connected to any network and accessed by every edit workstation, networked server, graphics device and other computer-based video equipment on the network; is MXF-aware, allowing videotapelike access to subclips by time code. 719-536-5263; www.quantum.com

and the second second

Allows unlimited signal repetition over eight monitors; all the multi-image outputs can be grouped to create large, highly integrated monitoring systems; can be controlled independently for multi-room environments, using one or more remote control panels; layout configurations can be changed instantly; can monitor up to 2304 channels of audio, including embedded, discrete AES or discrete analog. 514-333-1772; www.miranda.com

HAMLET VIDSCOPE-VX

A range of video test and measurement systems running entirely in software for Windows PC users for assessment of video/audio via capture cards and files imported to a computer; runs from a USB memory stick, allowing users to freely move their software from computer to computer; provides waveform monitoring, vectorscope and color gamut error checking and logging tools. 866-4-HAMLET; www.hamlet.co.uk



BROADCAST HD OVER FIBER.

Just one of the many options available with the Optiva[™] Platform.

Optiva[™] offers the most comprehensive optical communication solution for broadcast control rooms, studios and OB stations. With its integrated patent-pending Daisy Chain technology, Optiva[™] provides a truly configurable and upgradeable solution.

By using the Product Configurator at opticomm.com, you can easily plan your fiber network. Choose any of our video, audio or data signals to design the perfect system tailored to your needs. Manage your projects and test configurations, all at the touch of a button.

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Opticomm Corporation | 6827 Nancy Ridge Drive | San Diego, CA 92121 | Phone 858 450 0143 | Fax 858 450 0155 | www.opticomm.com

LIGHT PEDESTAL

VINTEN OSPREY LIGHT

A 40kg (88lbs) capacity pedestal; improves wheel/floor interface with crabonly steering for creative shot development; has the ability to be broken down into skid and column modules; is easy to transport; can be pressurized in any location with its manual integral pumping system and also comes with standard four-bolt interface, allowing simple attachment of any flat base head or bowl adapter for spherical based heads.

954-572-4344; www.vinten.com

MULTIFORMAT VIDEO ROUTER NETWORK ELECTRONICS SL-HD3232

Compact 32 x 32 video router supports SD-SDI and HD-SDI; offers re-clocking on all standard video rates; includes support for dual-link 3G for 1080p50 and 1080p60 HDTV formats; supports 1.5Gb/s HD formats, including 720p50, 720p60, 1080i50 and 1080i60. 800-420-5909 www.network-electronics.com

TAPELESS RECORDING MEDIA

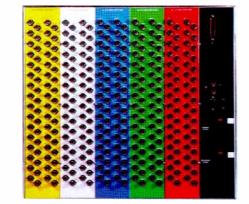
MAXELL PROFESSIONAL DISC FOR XDCAM



Optical media for XDCAM high-definition video systems; is designed for professional video and broadcast direct-todisc tapeless recording; provides 23.3GB of high-capacity storage, fast transfer rates and a high-precision polycarbonate plastic cartridge to protect against dust, scratches and fingerprints; offers 122 minutes of record and playback time in the MPEG HD LP mode, more than 65 minutes in the MPEG HD HQ mode, about 45 minutes at 50Mb/s in the MPEG IMX mode, and up to 85 minutes in the DVCAM mode. **800-533-2836; www.maxell.com**

440MHZ ROUTING SWITCHER

SIERRA VIDEO SYSTEMS SIERRA PRO XL



Routing switcher features IP connectivity for control via a standard TCP/IP socket connection; offers five-channel video measuring 450MHz at -3dB in matrix sizes from 8 x 4 to 32 x 32; frames can be five-channel RGBHV, four-channel RGBS, three-channel RGB/YUV, twochannel S-video (Y/C) systems or a custom video-only configuration.

530-478-1000; www.sierravideo.com

HD VIDEO PATCHBAY SWITCHCRAFT MVP SERIES

Features two rows of 34 jacks (rated to 3GHz and for 30,000 mate/unmate cycles) in a 1RU patch panel; options include normalled or non-normalled with 75Ω termination or non-termination.

773-792-2700; www.switchcraft.com

KVM EXTENDER OPTICOMM RGB-4000 SERIES



3-CCD HD CAMERA

PANASONIC AK-HC3500



A 2/3in 2.2-megapixel 3-CCD camera designed for studio and electronic field production; the 9.9lb camera features an advanced single-channel transfer system and spatial offset processing for reduced aliasing and higher HD resolution (1100 horizontal lines); offers pristine HD images in 1080/59.94i and 1080/50i signals; features a newly developed 38-bit digital signal processor (DSP), 14-bit A/D converter and 12-axis color matrix to ensure exceptional image quality.

201-392-4127 www.panasonic.com/broadcast

TRANSCEIVER SYSTEM

TELECAST FIBER SYSTEMS TELETHON Combines the functionality of Telecast's Python II series of transmitters and receivers with the CWDM wavelength functionality of the company's Teleport system; accepts both optical and electrical digital signals, ranging from 19.4Mb/s up to 1.5Gb/s uncompressed HD/SDI; multiplexes the signals for transmission in either or both directions, with up to 16 optical signals on one fiber.

> 508-754-4858 www.www.telecast-fiber.com

A multifunctional KVM extender offering RGB H/V (VGA), stereo audio, keyboard and mouse, and RS-232 serial data, all over one fiber; ideal for high-resolution video applications; simplifies cabling infrastructures and provides LED indication for optical link status, signal status and power monitoring; features multior single-mode operation; reduces fiber count from five to one fiber.

858-450-0143 ext. 242 www.opticomm.com

TEST STREAM GENERATOR PIXELMETRIX DVSTORIP-GEN

Features a Web-based GUI control; generates up to seven unique transport streams simultaneously and up to 900Mb/s of IPTV traffic; supports single- and multiple-program TS generation, as well as both UDP and RTP streaming; stream transport is at the original bit rate based on its PCR time stamp or at a user-defined bit rate.

954-472-5445; www.pixelmetrix.com

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It's a multiformat world, and the new FS1 brings it all together...at a breakthrough price.

Turn SD into HD, HD into SD, or HD 1080 into 720 (and vice versa), with FS1's hardware-based 10-bit up/down/cross-conversion.

Embed and disembed audio.

Mate analog and digital. Video. Audio. HD captioning. Whatever.

FS1 not only interfaces to all of your equipment, but also with your facility via its LAN-based web-server and SNMP monitoring. Push a button, or talk to it from across the web.

Put FS1 in the middle of your facility, and see how it makes nice with your gear, your multiformat needs, your engineers...and your budget.



FS1 rear panel

Check out our website, or give us a call to find an Authorized AJA Converter Dealer near you.

www.aja.com 800.251.4224



EXTERNAL HOLOGRAPHIC DRIVE IKEGAMI HDS-300R

Enables users of Ikegami's Editcam and EditcamHD camcorders to transfer edited or camera-original video content via network interfaces to highly stable 300GB cartridges with all the advantages of tapeless nonlinear archiving and retrieval; offers high storage densities, fast transfer rates and a 50-year shelf life.

201-368-9171; www.ikegami.com

HIGH-RES DISPLAYS

ZANDAR TECHNOLOGIES PREDATOR HD MULTIVIEWERS



HD4, HD8, HD12 and HD16 offer HD images, driving high-resolution displays up to 1080p with auto-detect of SDI and HD-SDI signals; include audio and video monitoring, UMD and tallies, clock display, and LAN control; offer control options, such as the Z-Configurator layout editing software, on-screen display, GPI and ZRP remote pane; can output dual HD across two displays at various 50Hz resolutions using the ZdHT Zandar dualhead display feature.

+353 1 450 0901; www.zandar.com

ENCODING PLATFORM

SCOPUS UE-9410



The second-generation H.264 encoding platform features improved compression capabilities, enhanced picture quality, and DVB-S/S2 and IP transmission schemes; is part of Scopus' UE-9000 universal encoder series.

609-987-8090; www.scopus.net

ASPECT RATIO CONVERTERS EVERTZ 7710ARC AND 7710ARC-F

Assist in transitioning SD wide screen and SD/HD facilities; with the 7710ARC, users can take an SD source in and convert it to a properly configured wide screen; with the 7710ARC-F, users can add a fill input for side-panel keying; both products are modular, support WSS and VI, and can be configured through SNMP.

905-335-3700; www.evertz.com

ARCHIVAL AND STORAGE SYSTEMS INTEGRATION

CRISPIN ARCHIVEMANAGER

The archival and clip retrieval tool now integrates with the Omneon MediaGrid active storage system; provides a view of video server and archive content through an integrated database; allows for quick drag-and-drop asset transfers.

919-845-7744; www.crispincorp.com

ARCHIVE SOFTWARE EVS XFILE

The latest software module of the XFile delivers IMX OP1a media files onto removable HDD during the feed record in the XT[2] video production server; as soon as the recording process starts, the material is simultaneously ingested on the XT[2] server and transferred on the station's shared storage; the XFile acts as a gateway to post production and is responsible for all copy and transfer requirements during ingest.

+32 4 361 70 00; www.evs.tv

SERVER CODEC SEACHANGE MEDIACLIENT 6000



Codec is built for SD; can establish an HD-powered transmission server for an economical migration path to HD; is optimized to harness the power of Intel's dual-core Xeon 5100 series processors to drive bit rates up to 80Mb/s with MPEG-2 4:2:2 long GOP; consumes half the bandwidth typically required by solutions that use intra-frame coding.

978-897-0100; www.schange.com

UHF TRANSMITTER SCREEN SERVICE SCT 100U/S 10W

Transmitter has a modular construction, conventional cooling, and AGC and ALC controls; features three-slope linearity pre-correction; can program the local os-

cillator from the front panel; has a preset for precision OFFSET; offers a soft-start circuit, low power consumption, a SAW vestigial filter and Sync restore.

+39 030 3582225; www.screen.it

MONITORING SYSTEM

K-WILL QUMAX-2000 A/V quality monitoring device; supports video formats, including SD and HD and analog systems in NTSC and PAL, as well as analog, embedded, AES/EBU digital and SDI/HD-SDI audio formats; detects A/V errors automatically in real time on a single stimulus frame-by-frame basis, and quality degradation by a double stimulus process.

Legendary Teranex Processing

VC100:Frame Synchronizer & Format Converter

EBEFEE

Exceptional Up/Down/Cross Conversion & Noise Reduction

HD/SD Standards Conversion Extensive Analog & Digital I/O

Easy Setup with Intuitive User Interface

Two Fully Independent Processing Channels

Front Panel LCD Serves as Video I/O Monitor & Menu Display

Legendary Teranex processing in a space saving one rack unit frame.



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310-512-6910 www.kwillcorporation.com

ADC's Pro Patch® video panels

have long been recognized as the leader in video patching. Panels are available in a wide variety of configurations for rack sizes, jack types, and color options. The PPI series panels are the ideal choice for demanding professional environments:

- Durable welded-steel frames prevent bent, cracked and broken ears
 - Widest variety of jack types available including standard, midsize, and MUSA standard
 - Exclusive snap-over designations keep cards and windows in place and make changes easier
 - Durable molded ABS inserts prevent stripped screws and cracked inserts

Whether it's copper or fiber, ADC's audio, video and data products are built to provide unmatched performance and reliability, and all ADC products are backed by outstanding pre/post-sale engineering support as well as the industry's best warranty.

Contact us today and find out why ADC means "performance by design."



2x32 Midsize PPI Series Super Video Jack Panel, featuring the industry leading normalling jack MVJ. Call today for fast delivery!

For a free copy of ADC's 13th edition broadcast product catalog, call 1.800.366.3891 ext. 20000. Or visit adc.com/broadcast.

performance

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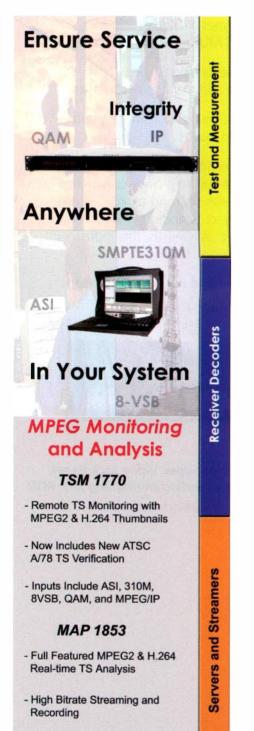


AVC HD DECODER

SCIENTIFIC-ATLANTA D9854

Supports PowerVu and multiple thirdparty conditional-access systems; for IPcentric headends, delivers MPEG-over-IP capabilities to support delivery of IP video streams; DVB-S2 modulation functions help expand the content capacity of existing satellite bandwidth by up to 30 percent.

> 800-433-6222 www.scientificatlanta.com



POV HD CAMERA ICONIX VIDEO HD-RH1



High-definition POV 3-CCD remote camera system features a 1/3in progressive 16:9 image sensor, backed by a 1/3in 3-CCD prism system for optics, using 14bit quantization at the A/D conversion and processing steps; prism leverages an asynchronous signal processing architecture that runs the CCD imagers at a different clock rate from the output signal; captures and outputs video in NTSC and PAL formats in all HD resolutions, while supporting frame rates of 24fps, 25fps, 30fps, 50fps and 60fps.

800-783-1080; www.iconixvideo.com

DIGITAL VIDEO ROUTER NVISION NV8288

Ideal for mobile production trucks or facilities, the router incorporates NVISION's HD-SDI super-wideband signal transport technology; delivers density with exceptional signal quality; can be future-proofed with 3Gb/s capability; HD-SDI and SDI composite monitor outputs offer complete format flexibility; a 288 x 576 router in 10RU and 12in of depth in a standard EIA 19in rack; 576 x 576 requires 20RU.

530-265-1119; www.nvision.tv



AUTOMATED CONTENT REPURPOSING WORKSTATION SNELL & WILCOX ICR

iCR

Enables users to create high-quality digital masters of their content and repurpose them for distribution on multiple, revenue-generating platforms; integrates image conditioning, content mastering, quality control and content repurposing functionality; features concurrent processing capabilities that eliminate the need for separate encoding and transcoding, and performs these functions as part of a single workflow.

212-481-2416; www.snellwilcox.com

TRANSPORTER

STRATEGY & TECHNOLOGY TSBROADCASTER

Allows a broadcaster or network operator to configure and automatically generate MPEG-2 transport streams containing DSM-CC object carousels for interactive TV; the solution is fully compliant with DVB and OCAP standards; supports MHEG, MHP, OCAP and ETV-compliant applications.

303-926-4933; www.s-and-t.com

PAN/TILT HEAD

TELEMETRICS PT-LWP-S3



- Highly Detailed Off-line Analysis



Innovative Video Network Solutions Your Partner Since 1951

www.sencore.com

1-800-SENCORE(736-2673)

Uses three 2.2Mb 2/3in progressive CCDs and a 14-bit A/D converter; supports 1080/23.98P, 24P, 25P, 29.97P, 50P, 59.94P, 50i and 59.94i formats; captures and records variable speed images from 1P to 60P (1P to 30fps at 4:4:4 and 1P to 60fps at 4:2:2) at 1920 x 1080 HD resolution. 800-686-7669 www.sony.com/professional Fully sealed, weatherproof pan-and-tilt head features an internal heater, compact housing, weatherproof power supply, Ethernet connectivity and a mounting base with internal cable management that minimizes external cabling; protects broadcast cameras and lenses from the elements with heater, wiper and washer options.

201-848-9818; www.telemetricsinc.com

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PICK HIT WINNER - VALID8 LIP SYNC SOLUTION

VALID8 is the HD, eight-channel audio version of the Vistek product line's highly regarded VALID (Video and Audio Line-Up and Identification). Providing foolproof assistance in the battle against the ever-present problem of audio/video synchronization issues. VALID8 offers users a simple and accurate method of assessing these timing issues, allowing a solution to be implemented. VALID8 is designed for today's HD world and works with any HD standard. In addition, there are eight audio channels – four left-right pairs. VALID8 can also produce and measure SD signals if required. The Generator produces four separate signals: a user-definable test pattern background; two dynamic display elements (the video equivalent of a film clapper board); up to eight channels of audio and; ID – up to four lines of user-defined captions plus a central indication of the original standard and audio level. Users can detect A/V delay on a purely visual/aural basis. The VALID8 Reader can display timing errors to the nearest millisecond. It can also indicate whether there has been any channel crossover or if there is phase error between left and right. The actual level of signals can be displayed in a variety of metering formats. A new compact flash memory allows a user instant recall of up to 64 separate sets of audio and video idents.



PRO-BEL LAUNCHES BRAND NEW HD ROUTER

Cygnus is a brand new, 1080p 3Gbit/s native router. In line with Pro-Bel's philosophy of 'HD for free', there is only one card set, which is SD, HD and 3G capable from the outset. All cards are hot-swappable on a card-by-card basis, expansion of systems is simply a case of inserting a card. The Cygnus family consists of three different frame configurations: 576 x 576 in 26U (including PSUs); 288 x 576 in 10U and; 288 x 288 with redundant crosspoints in 10U. Different formats are configurable in any combination of 12-channel input and 24-channel output blocks, up to 576 x 576 in one frame. Further expansion is possible by combining frames. Four monitoring outputs allow simultaneous monitoring of

both inputs (i.e. before the primary crosspoint cards) and outputs. The Cygnus router range offers the highest density routing available using industry standard BNC connections. These are essential for the low loss coaxial cables needed for long cable runs associated with routers of this size. Of course, Pro-Bel's usual robustness and exemplary reliability comes as standard. Cygnus is fully integrated with the latest version of Pro-Bel's emerging enterprise wide management application -Morpheus Control and Monitoring. This provides enhanced commandand-control capabilities across content production and delivery infrastructure. "Routing is one of the most fundamental requirements of our industry and Cygnus takes large scale routing to the next level. It combines a compact form with the latest routing technology in a cost-effective package. It is the complete expression of Pro-Bel's groundbreaking expertise," concludes Adrian Scott, CMO, Pro-Bel.





MORPHEUS FOUNDATION

ENTRY-LEVEL AUTOMATION THAT LEAVES YOU WITH TIME AND MONEY TO SPARE

Morpheus Foundation allows broadcasters to take an effortless first step onto the next generation automation ladder. Based completely on format and device-



independent platforms, it provides a self-contained, fast and responsive environment to control from one to six delivery channels. By capturing in detail a user's requirements and planned environment at the time of purchase -- and making full use of the company's highly evolved approach to third party integration - the system is fully specified and configured at the factory. This means that it can be shipped, installed and commissioned as fast as possible. Of course, Morpheus Foundation addresses all the key areas of content management and delivery: ingest (live, from tape or direct file import), storage management, playout, master control and router automation, real-time manual intervention and feedback, graphics/logo insertion, closed captioning/subtitling, GPI interface, extended data services, EAS integration for the US market, traffic interface, schedule and as-run log conversion options. But the system can also be expanded as businesses require and there is a clearly defined upgrade path to Morpheus. All systems come with a one-year Gold Support Contract that provides access to a 24/7 helpdesk manned by experienced engineers. A comprehensive set of training courses is also available.

www.pro-bel.com



Engineering The Broadcast Future

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VIDEO TRANSPORT SYSTEM

STREAMBOX SBT3-5200

0 Estreambox - Carro in

The 1RU video transport system uses the company's ACT-L3 codec and advanced proprietary compression technologies; enables customers to transmit broadcast video in real time over any IP- or satellite-based network for live news broadcasts or distribution to cable headends; measures 1.75in x 19in x 16.25in.

206-956-0544; www.streambox.com

VIDEO CARD AJA XENA 2K

The video card for Windows XP delivers uncompressed SD, HD and dual link HD; enables customers to work with 2K frames in a flexible and future-safe architecture. 530-274-2048; www.aja.com

MPEG PORTABLE ANALYZER TEKTRONIX MTX100B

Now includes real-time monitoring and offline analysis in addition to the existing MPEG transport stream generation and recording capabilities; is small, light and robust; is ideal for field installation, commissioning and debugging of complex MPEG transmission systems.

800-833-9200; www.tektronix.com

WALL MONITOR SYSTEM TBC CONSOLES TRACWALL

Uses a gird of structural t-slotted aluminum to facilitate many variations of monitor wall arrangements and upgrades; features a variety of fixed, tilt/swivel and articulating mounts for holding displays from 15in to 65in; channels cables directly into base cabinets, which also provide space for equipment and power supplies.

631-293-4068; www.tbcconsoles.com

2K PROCESSOR

PANASONIC AJ-HDP2000



Records and processes high-quality 2K and HD images to D-5 VTRs for editing, interchange and distribution; is designed specifically for use with telecine systems and especially within the rapidly growing DI workplace; uses JPEG2000 compression; accepts 12-bit 4:4:4 2K 2048 x 1080 resolution film image data, or 12-bit 4:4:4 sampled 1920 x 1080 HD images; records to the AJ-HD3700H, AJ-HD3700A and AJ-HD3700B D-5 HD VTRs for editing, archiving and distribution.

> 201-392-4127 www.panasonic.com/broadcast

SERVER SYSTEM THOMSON GRASS VALLEY MEDIAEDGE2

Is a LAN-based video delivery system using standard TCP/IP networks and displays; is designed to offer a cost-effective method for distributing video content to multiple PC and set-top box clients, including preprogrammed broadcast, live streaming and full-featured interactive video-on-demand.

> 503-526-8150 www.thomsongrassvalley.com

AUDIO MASTERING SOFTWARE DOLBY MEDIA PRODUCER

Support all Dolby audio formats used in mastering DVD-Video, DVD-Audio, HD-DVD and Blu-ray disc formats; supports multichannel non-real-time encoding and real-time file decoding of Dolby Digital Plus, Dolby Digital, Dolby TrueHD and MLP Lossless formats via an intuitive user interface; is comprised of three separate software products: Dolby Media Encoder, Dolby Media Decoder and Dolby Media Tools.

415-645-5000; www.dolby.com

PEDESTAL VINTEN RADAMEC QUATTRO SE





RKP-4 Wireless Intelligent Matrix Keypanel

UHF Frequency-Agile
Digital Encryption
Rugged Cast Magnesium Beltpack



CRONUS DSP Matrix Intercom • RVON-C VoIP Option Card • Up to four units can be linked • Modular Architecture

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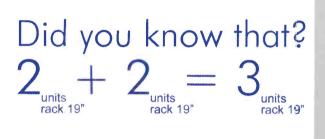
In Broadcast, every moment is critical. You need an intercom system that is up to the challenge.

Manually operated pedestal features an ergonomically assisted lifting column, small doorway width and precision encoders to provide real-time digital electronic positioning over the floor and during elevation; includes a base processor and head processor electronic modules and PDA for configuration and user interface. 845-268-0100 www.vintenradamec.com



Screen Service

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Software Defined Transmitter





ENCODING & MULTIPLEXING

ENCODER - MULTIPLEXER - MIP INSERTER - DECODER



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TRANSPOSERS & GAP FILLERS - DVB-H CITY-FILLER

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MICROWAVE LINKS - QPSK, QAM, COFDM MODULATION - FROM 1 to 24 GHz - FIXED and MOBILE - COFDM CAMERA RADIO LINK

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INTERCOM SYSTEM

PRODUCTION INTERCOM AS-100



Is designed to allow the announcer to broadcast and communicate with one headset; intended to be associated with a compatible intercom or IFB system and will normally draw its power from that system; where no intercom or IFB exists, a power supply is available that will power the AS-100 and up to 10 beltpacks or IFB packs connected to the AS-100 rear panel.

800-562-5872; www.beltpack.com

PROMPTER

AUTOCUE MSP08

One of the smallest daylight-readable prompters available; when combined with the QNxt, it untethers from the control PC and the camera, enabling the camera operator to get the best shots and the presenter to look more fluent and professional.

203-406-1400; www.autocue.com

ANALOG/DIGITAL CENTRAL RECEIVE SITE

BROADCAST MICROWAVE SERVICES CENTRAL-DECODER II



Detects and adjusts COFDM, MPEG-2 transmission parameters, data rate, modulation, guard interval, code rate, GOP structure and bandwidth pedestal; contains COFDM, MEPG decoding and analog FM demodulation; features 6MHz RF bandwidth capability for signal reception in congested RF environments.

858-391-3050 www.bms-inc.com

AUDIO MONITORING

TSL AMU1-BHD



Compact audio monitoring system is ideal for desk mounting or where rack space is at a premium; features an auto sensing HD/SDI video input, 2X balanced AES/ EBU and four stereo analog inputs; the unit also offers dual high-resolution 106segment tri-color bar graphs and a powerful integrated amplifier, all in 1RU.

+44 1628 676 200; www.tsl.co.uk

AUTOMATION SOFTWARE SYSTEM **VCI SOLUTIONS AUTOXE**

Manages the entire content lifecycle, from point-of-sale to point-of-air; enables scheduling, monitoring, managing and playback; is designed to manage one, 25, 50 or more channel streams with ease; allows transparent integration and interoperability with other broadcast systems such as Pathfire and Omneon.

413-272-7200; www.vcisolutions.com



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SET-TOP-BOX FORENSIC MARKING

THOMSON TECHNOLOGY NEXGUARD FOR STBS

Video watermarking technology is designed for set-top-box companies, conditional-access system vendors, and VOD and push-VOD operators; works with compression codecs, including MPEG-2, MPEG-4/AVC and VC-1; has been integrated into STMicroelectronics' STx7100 family of System-on-Chips (SoC); deters illegal copying and distribution of all forms of broadcast content delivered via

IPTV, satellite, cable or traditional broadcast and viewed with digital STBs. 818-260-3683 www.thomson.net

HD MONITOR MARSHALL **ELECTRONICS TFT-**MEGAPIXEL

Provides high-pixel density for 3.5in to 10.4in displays in one-, two-, three- and four-screen configurations; features improvements in brightness, contrast ratio and viewing angles; configurations are available with HD-SDI, SDI, DVI, component HD/SD and composite video inputs.

800-800-6608 www.lcdracks.com

IMAGE CONVERTER MIRANDA DENSITE XVP-1801

Modular up-, down-, cross-

SYNCHRONIZER, TRACKER AND EMBEDDER

CRYSTAL VISION SYNNER HD

Features a video synchronizer, tracking audio delay, an embedder and de-embedder, and an audio processor in one 4in x 10.5in board; with timing from SD or HD analog syncs, it will synchronize the video, de-embed up to two audio groups, mono route the audio channels and



pass them through a tracking audio delay, resampling them to match the synchronized video; it then finally re-embed the two groups.

+44 1223 497049; www.crystalvision.tv



converter with AFD and background keying; offers remote control and monitoring over IP; features a second HD/SD video input which can be fed by background video to replace the black bars that are normally present during aspect ratio conversion.

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CONTROL PANELS

UTAH SCIENTIFIC UCP-1 AND UCP-DT



The UCP-1 is a full-featured X-Y panel in a compact 1RU package; the UCP-DT is a desktop version of the company's UCP-MM multimode panel, which was introduced last year; these new panels join the UCP panel series, a complete and flexible range of router control panels for every application.

801-575-8801; www.utahscientific.com

MULTIDEFINITION LEGALIZER

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Accepts 1080i and 720p HD and 625i PAL and 525i NTSC SD; enables users to ensure that the level of their video signals remains within the strict tolerances required for HD/SD transmission to air and DVD mastering; monitors levels continuously and manually or automatically corrects them; includes hard and soft clipping levels, luma and chroma gain, and black level user adjustments.

+44 208 255 2015; www.eyeheight.com

MULTIVIEWERS

AVITECH VCC-8000 SERIES

Allow broadcasters to visually monitor video as well as DVI/VGA (computer) inputs on the same display; the distributed intelligent architecture enables an unlimited expansion for inputs; a facility has the ability to purchase and use only what is required at present, with the option to expand the system as the facility's monitoring needs grow; a single module provides up to eight inputs.

877-284-8324; www.avitechvideo.com

AUDIO MONITORING SYSTEM WOHLER TECHNOLOGIES ATSC/DVB-3/M

Monitors Dolby Digital, AES/EBU and HD-SDI/SDI; isolates individual channels of Dolby Digital and decodes Dolby Digital and AES/EBU embedded in HD-SDI/ SDI; features a tri-LED phase indicator.

510-870-0810; www.wohler.com

VIDEO SERVER AND SYSTEM CONTROLLER LEIGHTRONIX MINI-T-NX

Offers full station automation for singlechannel operations on a budget; includes digital video playback, video messaging and digital signage, DVD and VCR control, and video and audio switching.

800-243-5589; www.leightronix.com

DTV DEMODULATOR MEASUREMENT

Z TECHNOLOGY DM1010



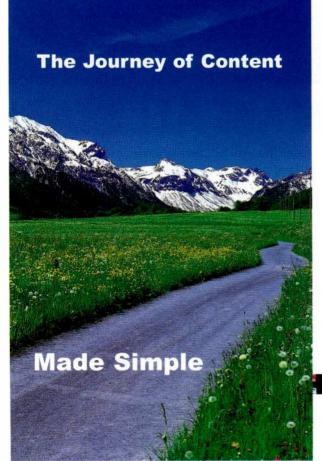
Simultaneously monitors distributed transmitters from multiple locations, providing remote Web-based transport stream data monitoring and video thumbnail displays from dispersed terrestrial transmitters; TSR hardware/software option analyzes the transport stream outputs and reports a full complement of TS information, such as PAT, PID, PMT, data rates, data errors and stream allocation statistics.

888-613-9832; www.ztechnology.com

MPEG-OVER-IP GENERATOR SENCORE MIP 1664

Plays out hundreds of media streams simultaneously from the system RAM or directly from the system hard drives; features seamless looping, easy stream duplication, network stressing capabilities to ensure system QoS, and timestamp capturing; applications include verifying VOD server performance, monitoring IPTV and digital cable QoS, and network stress.

800-736-2673; www.sencore.com





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VIDEO INTERFACE CLARATECH CTP2100



Houses up to eight SD/HD optical receivers or transmitters in 1U; features include automatic rate detection, cable length equalization and re-clocked outputs; each module provides multiple SDI outputs on BNC connectors; the rack unit also offers four 2 x 2 routers to allow functions such as routing and fiber protection switching; a built-in Web server alleviates the need for special software.

+44 1234 271053; www.claratech.com

SINGLE-FORMAT HD CAMERA

THOMSON GRASS VALLEY LDK 4000 MARK II

Features 14-bit analog-to-digital conversion and other signal processing improvements derived from the LDK 8000 multiformat camera; is available either as a 1080i camera or as a 720p camera; is switchable between 50Hz and 50.94Hz; is ideal for handheld or crane operation, but it can also be used with the Grass Valley SuperXpander large lens adaptor with its 7in HD viewfinder for studio pedestal or sports operation.

503-526-8150 www.thomsongrassvalley.com

SWITCHERS

BRICK HOUSE VIDEO CALLISTO

Updated range of switchers includes chroma keyer and hot-cut, which enables the user to switch asynchronous signals directly on the program bus with no freeze frame on the output.

> +44 1962 777733 www.brickhousevideo.com

MASTER CONTROL SWITCHER PRO-BEL MASTERPIECE

Offers HD and SD switching, advanced audio processing, and flexible keying and DVE options; upgrades include the addition of an HD DVE, as well as the option to install Dolby E decoders and logo storage; now benefits from four keyers and has the ability to handle audio mixing.

631-549-5159; www.pro-bel.com

PORTABLE RECEIVER SENNHEISER EK 3241

Uses a 36MHz switching bandwidth that is tunable in 5kHz increments to generate 7200 frequency options; is designed for location sound recording; weighs just 7oz; can be powered from a camcorder or via a rechargeable battery that delivers between nine hours and 18 hours of continuous operation.

860-434-9190; www.sennheiserusa.com

UNIVERSAL ENCODER

SCOPUS UE-9810

Features ASI and IP outputs as well as integrated, advanced multiplexing capabilities; offers a smooth migration path from MPEG-2 ST to H.264 SD to H.264 HD encoding formats; is available as 1RU for broadcast, satellite, cable and IP contribution applications, as well as in a SDNG version.

609-987-8090; www.scopus.net

MODULAR ROUTER NVISION SYNAPSE

Now includes GDR26 module with 3Gb/s capability; comprises more than 100 modules for HD/SD signal processing and transmission; can be cost-effectively integrated into one powerful media system over time; users can also integrate Synapse modules with any other NVISION router, router control and master control products in order to add specific features, increase system functionality and lower overall costs.

530-265-1119; www.nvision.tv

STEREO ADAPTER ZAXCOM STA100



Stereo adapter for the company's ZFR100 and TRX900/900AA; integrates with the ZFR/TRX to provide a balanced stereo audio input that eliminates ground loop problems; time code input synchronizes the time code generator inside the ZFR/TRX and supports automated loading of audio onto the memory card; this enables an exact match of audio recorded on the ZFR or TRX and audio/video recorded on camera. 973-835-5000 www.zaxcom.com



norizontal and vertical beam. Slide in your choice of focusing louvers to spot the beam down to a 90°, 60° or 45° pool of light. DMX, analog and manual controls can dim the light to black. Like all Kino Flos, the ParaBeam is flicker free and dead quiet. If you think the ParaBeam looks good on paper, wait 'til you see how it looks on video.

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You can easily protect your on-air feed and be sure to be on-air at all times with an Avenue Protection Switch. Simply feed your primary on-air feed and your secondary. back up signal into the Avenue protection switch. If the primary should fail, the secondary signal will take over.

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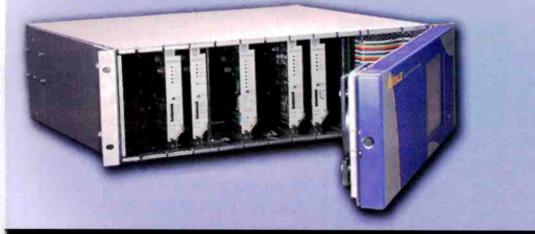
You can use the **sophisticated detection system** to your advantage by adjusting the switch's parameters for *your* facility's needs. For example, the black detection system allows you to set both the threshold and the percentage of non-black pixels. But that's not all, you can also determine the portion of the picture to be considered. This allows a corner bug to be either included or excluded in the detection process.

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800-323-0498; www.telexintercoms.com

DOLBY E DECODING OPTION STUDER D21M

For use with the Studer Vista and OnAir 3000 ranges of digital consoles; a single optional I/O card accepts any AES/EBU stream containing signals encoded with Dolby E or Dolby Digital, decodes the stream within the input stage and then provides up to two sets of eight channels to the console; one D21m I/O frame can take up to 12 of these cards in a 3RU space; each card may contain up to two decoders, making it possible to decode up to 24 Dolby E streams.

818-920-3212; www.studer.ch

AVC HD ENCODER

SCIENTIFIC ATLANTA D9054

MPEG-4/H.264 toolset delivers highquality HD and SD video at bandwidthsaving bit rates; features a flexible stat mux architecture to enable content distributors the ability to mix SD and HD content in MPEG-2 and MPEG-4 formats.

> 800-433-6222 www.scientificatlanta.com

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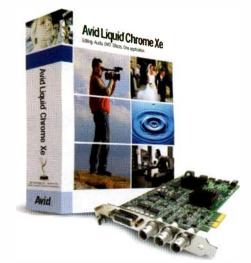
FUJINON XA22X7BES



Is designed for stations using ENG-type cameras for studio applications as well as those employing smaller field production units; features a focal length starting at 7mm and ranging up to 154mm; is well-suited for shooting in tight locations and smaller studios; incorporates a belt drive for zoom and focus, enabling smooth and precise operation.

973-633-5600 www.fujinonbroadcast.com

VIDEO EDITING SYSTEM AVID CHROME XE WITH AJA SUPPORT



SONY HDC-1400



Operates in either 1080/59.94i or 720/59.94P mode; includes three-skin detail control, multimatrix color control and high-quality SD downcoversion capability; features compatibility with the HDVF-C35W color viewfinder; applications include HD studio broadcasts and live events.

800-686-7669 www.sony.com/professional

HIGH-DENSITY PATCHING SYSTEM ADC SUPER HIGH-DENSITY COAX (SHDC)



Designed for AES audio, 5.1 and 7.1 audio applications where coax medium is preferred but space is critical; is available in 1RU and 1.5RU; the 1RU panel features a pullout designation strip and 2 x 48 coax ports; the 1.5RU panel features 4 x 48 coax ports; the jack features a patent-pending switchable termination feature that allows users to select or de-select a 75 Ω termination function on each circuit pair.

952-917-0279; www.adc.com



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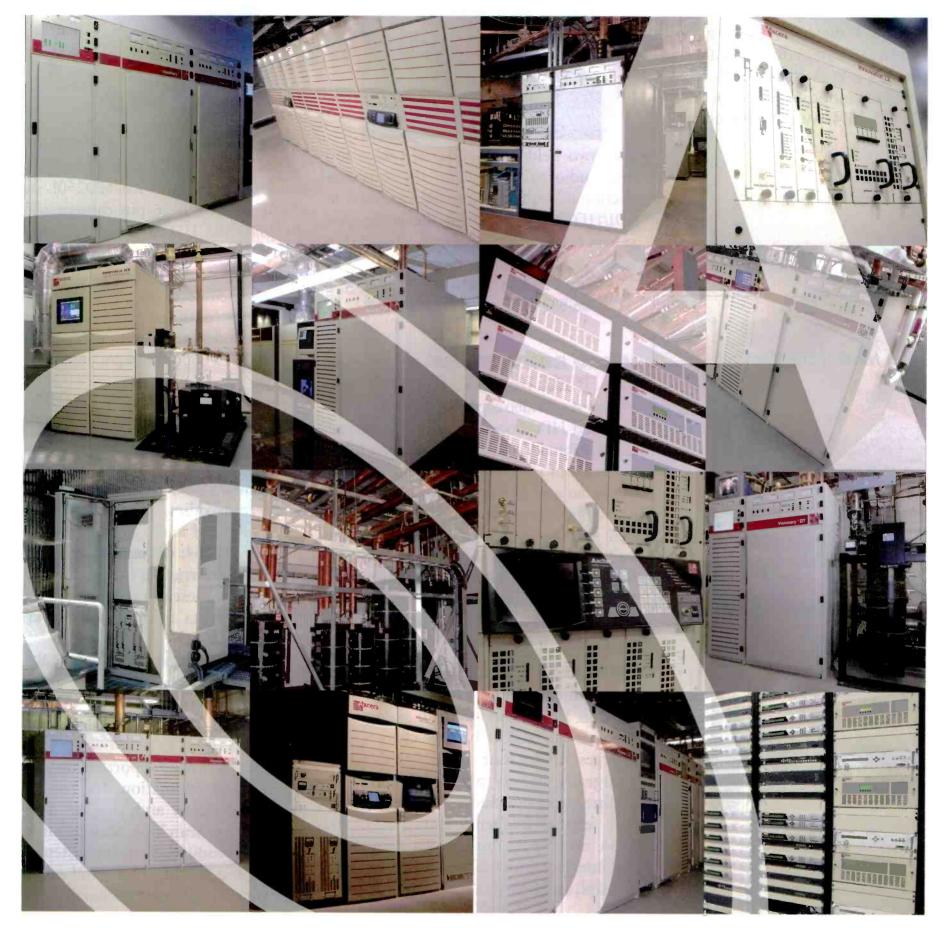
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board, providing a powerful, lowcost SDI I/O option and support for uncompressed SD/HD video; supports a variety of new camera formats including JVC, Panasonic, and Canon, as well as 24p support for JVC cameras; creates and outputs high-quality SD and HD video productions in a variety of formats for tape, DVD, the Web, cell phones, iPods and game devices. 800-949-2843; www.avid.com

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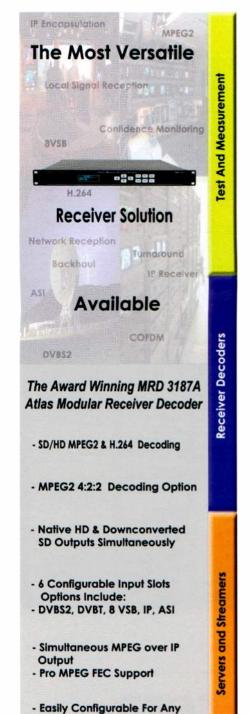


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CAMERA CABLE

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Uses two Belden A/V coaxial cables and four audio pairs; ideal for the interconnection of digital remote field cameras in SDI/HDTV applications; the coaxes are sweep tested from 5MHz to 1600MHz, achieving minimum return loss values of 23dB and 21dB, respectively.

765-983-5815; www.belden.com

VIDEO CONVERTERS ENSEMBLE DESIGNS BRIGHTEYE

Pocket-sized video converters, audio embedders and HD processing; ideal for mobile, desktop, broadcast and post; interface to the full range of SD video formats; include analog audio and AES digital audio converters and embedders; feature multiformat inputs and outputs; easy configuration interface and signal status indicators make it simple to install and troubleshoot a system.

> 530-478-1830 www.ensembledesigns.com

WIRELESS INTERCOM SYSTEM HME PR0850 UHF

Version 3.10 of the intercom system now features an AC850 battery charger that charges up to four BAT850 NiMH rechargeable battery packs simultaneously in three hours; includes a new setup wizard; features frequency agility, a PC and PDA interface, simultaneous dual-channel interface, individual belt-pack volume control, and belt-pack channel lockout. 858-535-6060

www.hme.com/proaudio.cfm

CAPTURE AND PLAYBACK CARD BLACKMAGIC DESIGN DECKLINK HD STUDIO

CAMCORDER

JVC GY-HD251E



Offers live, uncompressed 1080i/60 and 720p/60 via HD-SDI with embedded audio; features optional KA-HD250E studio adapter with full 26-pin camera control alongside the HD-SDI and SDI output; operates at 12V DC via either the built-in battery V-plate or the four-pin XLR input; features include BNCs for genlock, time code in/out, SDI and HD-SDI out, and a six-pin connector for remote control.

800-526-5308; www.jvc.com/pro

TRANSCODING SYSTEM OMNEON PROXCHANGE

Runs on MediaGrid active storage system; provides a scalable and efficient gridbased transcoding platform; handles a wide variety of audio and video formats including H.264; conversion and rewrapping between wrapper formats supported with preservation and accurate placement of all metadata through all conversion operations.

408-585-5000; www.omneon.com

CONTENT MANAGEMENT OMNIBUS OPUS 2

Delivers soft-XML support for customized logging and annotation, frame-accurate proxy generation and viewing, full-text indexing and searching, seamless integration with production editing systems such as Avid and Final Cut Pro, and standardized Web services data exchange with adjacent systems; moves the content process from specialized hardware to a standard IT platform; Smart Client provides access from both Windows and Mac desktops.

303-237-4868; www.omnibus.tv

Application



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Allows capture from HDMI cameras or decks, as well as analog decks and set-top boxes; HDMI playback and analog playback allows connection to a wide range of video monitors, big screen TVs and video projectors; offers 10-bit capture and playback, high-speed 4-lane PCI Express and 14-bit digital-to-analog conversion. 408-954-0500 www.blackmagic-design.com

3-D ANIMATION

PIXEL POWER CG-3D The latest option for the Clarit

The latest option for the Clarity range of SD/HD switchable graphics generators offers real-time 3-D animation with parametric control of elements, lighting and moves; is capable of both automated control and input; requires no 3-D experience on the part of the operator. 954-943-2026; www.pixelpower.com

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HD SERVER DOREMI LABS MCS-HD



The HD server features up to four independent HD video channels; can be used as a drop-in replacement for HD VTRs, for sports slow-mo and for the broadcast delay of up to two HD video channels; features HD-SDI and SDI in/out; can delay video from a few seconds to several hours; features a full-function front

panel; delay mode can be run without the need for an external controller. 818-562-1101 www.doremilabs.com

COMPACT DIGITAL CONSOLE CALREC AUDIO OMEGA WITH BLUEFIN

Small digital console with high-density signal processing and 160 mono DSP paths; features 8 x 5.1 surround, stereo or audio groups, and 20 auxiliary outputs (20 mono or 10 stereo) and 48 outputs for multitrack or generalpurpose feeds; comes in three frame sizes with 24, 32 or 48 faders.

+44 142 284 2159 www.calrec.com

OPTICAL SWITCHING PLATFORM OPTICOMM OPTILINX OLX-3000

Switches digital signals up to 4.25Gb/s with any of its 144 ports, all housed in a compact 4RU chassis; also available in a 288-port version in an 8RU chassis; provides high-speed switching between ports with minimal effect on overall network latency; accepts up to six modular port cards with up to 48 Small Form Pluggable (SFP) transceiver modules per card. 858-450-0143 ext. 242 www.opticomm.com

SIGNAL PROCESSOR MIRANDA JAZZ-800

Single/dual channel, up/down/cross/standards conversion plus A to D / D to A; all in 1RU; provides high-quality conversion using pixel motion de-interlacing; offers HD/SD motion adaptive noise reduction; provides flexible aspect ratio conversion using the common pre-



sets, as well as nonlinear anemographic conversion, with control by AFD, WSS, and VLI; integral audio processing with 8 AES pairs, 16 channels of embedded audio and 8 analog audio channels.

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BROADCAST MULTIVIEWER HARRIS CENTRIO



Multi-image processor enables customizable, image layouts including scrolling PIPs and integrated T&M applications; based on Harris Platinum router architecture, system is capable of accessing up to 512 inputs and driving 32 independent DVI or 64 independent HD-SDI monitors from a single chassis.

513-459-3400 www.broadcast.harris.com

VHF ANTENNA ELECTRONICS RESEARCH (ERI) XWING



A side-mounted VHF TV antenna featuring ERI's new SLIMWing design; uses stainless steel construction for the radiating elements, feed and grounding components; its two-bay modular design allows for ease of installation.

877-ERI-LINE; www.eriinc.com

CAMERA HITACHI DK-HD32



Ideal for graphics stand, point-of-view and remote observation applications; produces high-quality images with three 2/3in 2.2-milion pixels CCDs and a 1.8 milliongate single-chip DSP; employs 30-bit accuracy; functions can easily be controlled remotely from a personal computer or dedicated control panel; command and communications protocol are available to users wishing to build custom software control applications.

516-921-7200; www.hitachikokusai.us

WIRELESS INTERCOM SYSTEM

CLEAR-COM TEMPEST 2400/900



Operates in unlicensed 2.4GHz and 900MHz bands, unaffected by reallocation of the UHF-TV spectrum; sends each packet of audio data twice on different frequencies, through different antennas; interoperates with the company's other intercom systems and third-party systems through two- and four-wire connections.

510-337-6600; www.clearcom.com

FIBER-OPTIC CONNECTOR STRATOS HMC

A four-channel expanded beam connector, with a diameter of just more than 3/4in; small enough for use with compact HD broadcast and cinema cameras and disk recorder products; the compact design also gives system designers the option of using expanded beam technology in situations traditionally limited to telecom-style PC patch connectors; available in multimode and in single mode twoand four-fiber configurations.

708-867-9600; www.stratosintl.com

FORMAT CONVERTER/FRAME SYNCHRONIZER TERANEX VC100

The 1RU sync features the company's PixelMotion Deinterlacing and Multidirectional Diagonal Filtering (MDDF) algorithms, which drastically reduce jaggies on diagonal lines; the company's Per-Pixel algorithm minimizes HD and SD video noise; correct cadence is assured through Per-Pixel Video/Film detection; the sync can handle any signal at its inputs and outputs in either SD or HD formats; uses two Silicon Optix Realta image processing engines, reducing overall size while maximizing image processing capability.

407-858-6000; www.teranex.com

HD MONITOR MARSHALL ELECTRONICS V-R201P-AFHD

HD monitor is 20in wide; features a completely digital TFT-MegaPixel active matrix LCD platform; proprietary digital signal processing features 10-bit A/D conversion of all analog signals, with 4X oversampling and five-line super-adaptive 2-D comb filtering of composite signals; multiformat compatibility accommodates virtually all video formats; advanced features include aspect ratio settings, a variety of screen markers and H/V delay. <u>310-333-0606</u> www.lcdracks.com



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MONITORING SYSTEM CRISPIN SUPERVISORY VIEW

Now incorporates a complete 90-minute timeline view of each channel's playlist; the timeline view highlights potential errors and warnings with specific events related to missing or incorrect material, device errors or warnings that an operator needs for manual intervention; the timeline also incorporates a scrolling index of cued and on-air events per channel.

919-845-7744; www.crispincorp.com

VIDEO SERVER OMNEON MEDIADECK

Multichannel video server is built on the same technology as the company's Omneon Spectrum media server; supports both HD and SD; supports up to six simultaneous video channels; contains 4TB of disk storage, enough for more than 200 content hours at 25Mb/s; all disk storage and I/O modules are contained within a single 2RU chasses; a standard configuration includes eight enterprise-class SATA disk drives featuring dual-parity RAID for added protection.

> 408-585-5000 www.omneon.com

COLOR MANAGEMENT

AUTODESK LUSTRE

Provides greater fidelity in color reproduction between Autodesk systems products; features custom-built look up tables, which accurately and consistently emulate how a digital image will appear when printed to film; brings various image input formats into a common frame of reference so they can be previewed and converted to the necessary output format.

415-507-5000; www.autodesk.com

GRAPHICS SYSTEM

CHYRON HYPERX2



A switchable single- or dual-channel system; Lyric PRO 7 option supports Adobe XMP metadata; simultaneous, dual-channel HD animation rendering; integrated video mixer; intelligent transitions for effortless multiscene compositing with Lyric PRO.

631-845-2000; www.chyron.com

CONSOLE WHEATSTONE EVOLUTION 6



Features include event recall, bus-minus, four mix-minus and four aux mixes, four monitor outputs and standard EQ, dynamics, panning and mic processing on all channels simultaneously, real-time graphic displays, production tools, and password-protected set-up screens.

252-638-7000; www.wheatstone.com

AUDIO CONSOLE YAMAHA DSP5D



A DSP-expander for the PM5D digital sound reinforcement console; the standalone unit expands the capabilities of the PM5D to 96 mono plus 16 stereo input channels, includes two additional card slots, with more effects and dynamics processing, and can be used with a PC and Yamaha Studio Manager software; if using ADK's new 4U rack-mounted LYVE Tracker which is available in three models, and based around a Steinberg Nuendo 3 or Cubase 4 audio engine, PM5D can also provide a recording solution capable of up to 192 simultaneous tracks.

714-522-9011; www.yamahaca.com

ROUTERS NETWORK ELECTRONICS VD256256L AND HD256256L



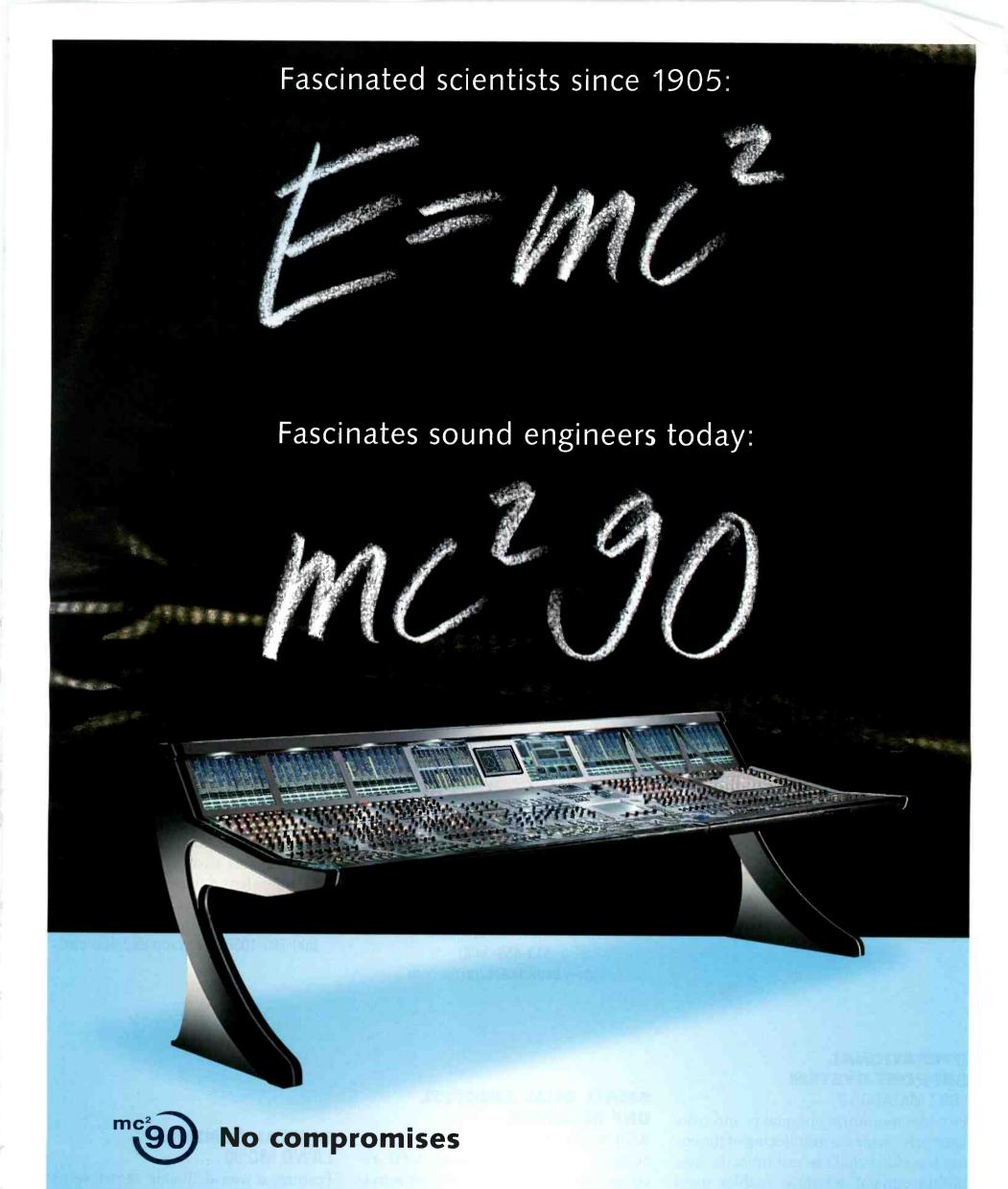
The new routers are 256 x 256 versions of the VikinX modular range; the units provide fully hot-swappable module cards, built-in



dual redundant power supply and fully redundant control architecture and controller functions; control features include a TCP/ IP control interface and TCP/IP interconnectivity with VikinX modular control panels, SNMP agent, as well as a comprehensive surveillance of the routers' vital parameters. 800-420-5909 www.network-electronics.com

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The mc²90 digital audio console guarantees the best possible result in the most challenging production situations. This top-of-the-range console from Lawo sets new standards thanks to its maximum flexibility, double redundancy, and its intuitive user control surface of up to 200 physical faders. **Total Performance from Lawo**.

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TRANSPORT STREAM ANALYZER TEKTRONIX MTS400 SERIES

Enables cross-layer testing capabilities and in-depth compressed video analysis at many points in a broadcast stream; includes H.264 compression testing; helps user identify source errors and potential causes over transmission, transport stream or elementary stream layer without third-party equipment.

800-833-9200; www.tektronix.com

STORAGE MANAGEMENT SYSTEM

FRONT PORCH DIGITAL DIVARCHIVE 6.0 Powerful feature enhancements; supports Avid Interplay interface for SD and HD; storage expansion for Avid Unity and Avid Interplay-based infrastructures; maximized network resources by frame-accurately restoring only the portion of stored content required for use in on-line storage.

303 440 7930; www.fpdigital.com

BROADCAST GRAPHICS HARRIS INSCRIBER G-SCRIBE 5.0



MANAGEMENT SOFTWARE EVS IP DIRECTOR V4 Integrated production management software; new functionalities and tools provide more flexibility and adaptability

vide more flexibility and adaptability with different workflows and applications; includes intuitive playlist management module; features tools for server control and new user interface.

+32 4 361 70 00; www.evs.tv

Enhanced software for Inscriber G-series graphics products; real-time HD/SD live production system; streamlining video content creation, interface and playout; supports ODBC files, RSS feeds and some third-party applications to update graphics dynamically; includes software codecs to allow native file formats to play out directly within CG layouts. 513-459-3400

www.broadcast.harris.com

DIGITAL AUDIO MIXER

EUPHONIX S5 FUSION



Features DSP SuperCore, which powers the mixer's signal processing and routing, providing full multiformat channels with EQ, filters and dynamics together with mix, aux and group busses with bus processing; EuCon Hybrid, which incorporates the EuCon high-speed Ethernet protocol, extends the control capabilities of the console beyond the dedicated DSP SuperCore to bring Mac and PC DAW tracks onto the console surface for mixing.

650-855-0400; www.euphonix.com

REMOTE CONTROL ICONIX REMOTE CONTROL RCP-160

Allows control of up to six HD-RH1 cameras from a single RCP; features a touch-screen LCD GUI for full menu and control access; provides dedicated and assignable encoder knobs and buttons; offers lens motor control, including zoom, focus and iris; allows full camera paint and feature control.

800-783-1080; www.iconixvideo.com

OPERATIONAL SUPPORT SYSTEM

FBBT MATADOR 2

PRODUCTION

Provides monitoring of quality and costs enterprise-wide via monitoring of the enSMALL DUAL-CHANNEL UHF RECEIVER AZDEN 320UPR

DIGITAL CONSOLE

tire broadcast chain in real time; the new multidocument interface enables users to open any number of panes simultaneously, providing the ability to look at several broadcast paths together, or look at a historical view at the same time as the current path; alarm management understands recurrent alarm conditions so that trends can be identified and rectified; provides a searchable history of previous alarm situations.

+44 118 965 4058; www.fbbt.co.uk

Features discrete two-channel UHF receiver with stereo output, 240 user-selectable frequencies for each channel, dual digital LCD displays with multifunction readout and separate power on-off switch for each channel; comes with both dualplug XLR and stereo mini-plug output cables, flexible high-gain antennas and a dual-function DC jack for charging batteries in-camera or to power from an external source.

516-328-7500; www.azdencorp.com

LAWO MC²90

Features a user-definable center section that lets users hot-swap the control modules to fit their needs; offers the ability to accommodate up to five rackspaces of outboard gear into the meter bridge or the control surface; central control functions can be transferred to anywhere on the desk; Double Star Technolog makes redundancy ubiquitous for live and broadcast operation.

+49 7222 10020; www.lawo.de

ELBER'S CPM DIGITAL PORTABLE MICROWAVE SYSTEM

From the very beginning in 1978 Elber has chosen to work in the microwave radio link sector for the broadcast industry. The highly specialised staff, the attention paid to each and every single phase of the production from the design to the realization of the product and the use of high quality components form the benchmark of Elber's philosophy. The increasing expansion of the company

has never kept Elber from maintaining a personal contact with its clients, from the smaller local broadcasters to the national television and radio networks. This philosophy, together with the high reliability of the equipment, allows Elber to offer a five-year warranty on its products.



Important and continuous investments into the Research & Development



market. Many investments have been made in this field: from the design of the first model TMC/P to the SPM, with its possibility to place two RF heads for duplex or redundant configurations.

Today, Elber offers the new CPM: practical, portable, analogue or digital. It is the suitable model for fast and reliable link: digi-

tal COFDM technology, extremely low noise RF oscillators, ensuring stable connections also under harsh weather and difficult terrain conditions.

The CPM operates in any 500MHz band between 6 GHz and 15 GHz. The modulation can be either analogue

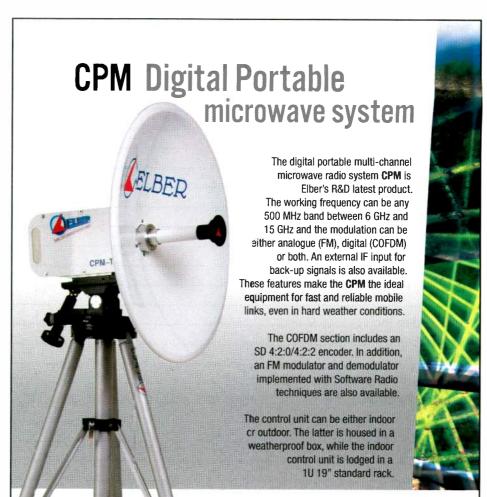
(FM) or digital (COFDM). An external IF input for different or backup signals is also available.

The system can be composed of indoor and outdoor units or outdoor units only. The outdoor equipment is composed of a Tripod complete with Panoramic Head, Base Plate, Orthomode Transducer, Parabolic Dish complete with feeder and one or two RF Heads. The outdoor control units have thesamedimensions of the RF heads and can be placed under the equipment, connected through a RG-216 cable. The indoor control units are 1U 19" standard rack and can be lodged in a van. The weatherproof RF heads that



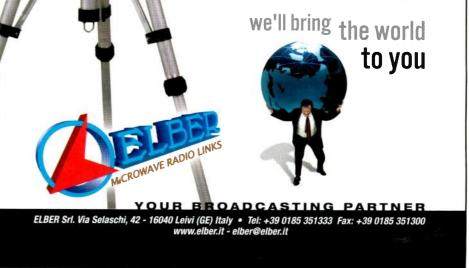
can be installed on the base plate can be (depending on the application) single Transmitting or Receiving Head (Simplex), two Transmitting or two Receiving Heads (Double Simplex) or a Transmitting and a Receiving Head (Duplex).

Elber also offers a wide range of accessories that help in the transportation and installation of its mobile links: antennas, carrying cases, cable drums, etc.



Department reflect the ambition to keep the leader position between its competitors as well on national as on international level. Elber also broadens its proper interest to the DENG device market which is the newest and most fascinating challenge at this moment that will allow Elber to design personalized solutions and exceed the nearly 10000 links installed around the world.

In the past years, Elber has focused its resources on the mobile microwave link



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AUDIO PROCESSOR

LINEAR ACOUSTIC OCTIMAX 5.1



The DTV audio processor combines a sophisticated multichannel, multiband dynamic range-processing engine with professional audio metadata capability and advanced local audio insertion functionality; produces a clean, consistent and appropriately dynamic audio signal that is perfect for Dolby Digital (AC-3), MPEG, or Windows Media encoding and transmission to all consumers.

888-292-3117; www.linearacoustic.com

HEADSET RIEDEL AIR



The ultra lightweight, single-ear headset is designed for digital intercom applications; the Coolmax exchangeable ear cushions provide comfort for long hours; the rotatable gooseneck allows the mic to be worn on either the left or right side.

818-563-4100; www.riedel.net

AUTOMATION SYSTEM SUNDANCE DIGITAL FASTBREAK NXT V3.0

Runs four active playlists simultaneously on a single Air Control Station; features greater visibility, an enhanced manual, automated join-in-progress functionality, streamlined GUI, and operator interfaces in French, German, Italian and Spanish; database standardization uses the Microsoft SQL platform; enables the user to view or edit the on-air playlist from anywhere within a facility. **972-444-8442; www.sundancedigital.com**

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