

# NEWSBYTES

INNOVATIVE PRODUCTS PROCESSES AND APPLICATIONS FOR INDUSTRY

## AUTOMATION NOV 19 & 20, 2008



# ROUND UP



## AF08 NASHVILLE, TENNESSEE

### Automation Fair 2008—It's just Around the Corner

Automation Fair is the largest single exposition of automation hardware, software, services, and support in North America. There will be many targeted industrial forums and labs to make Automation Fair 2008—held in Nashville—a fantastic educational experience for professionals at all levels. The complete program includes over 50 technical sessions, 20 hands-on labs, and more than 100 exhibitors... and it's all free!

Attend one of Automation Fair's popular learning opportunities to help you succeed today and in the future. Sharing knowledge with customers to create better automation solutions is important, and nowhere is that collaborative spirit more evident than at Automation Fair 2008. Featuring the products, programs, and partners of Rockwell Automation, this exposition is a must-attend event if you're interested in industrial automation.

Take advantage of McNaughton-McKay's convenient travel and hotel packages, contact us today.

While music is the lifeblood of Nashville, visitors will also find a city of culture and history, cuisine, pro sports, outstanding academics, natural beauty, and pure Southern charm. Nashville is a place where the past and the future peacefully coexist and build on each other. This city is alive! You can feel its pulse when you walk down its sidewalks, and fortunately, you can hear it almost everywhere you go.

Let McNaughton-McKay be your host November 19 and 20 for Rockwell Automation's Automation Fair and our hospitality event at the Wildhorse Saloon (more details on the back cover). Book your pre-arranged hotel and travel packages now to guarantee your reservation: [www.afair.mc-mc.com/overview](http://www.afair.mc-mc.com/overview)

### Table of Contents

Hoffman HMI Enclosure.....	2
Hoffman T4 Air Conditioners.....	3
Ferraz Shawmut Finger-Safe Distribution Blocks.....	3
Hoffman WeatherFlo Vented Enclosures.....	4
Cooper Bussmann Compact Circuit Protection.....	4
Panduit Panther Printer—Perfect Labels.....	5
Panduit Reel Smart Crimping Tools.....	5
Ferraz Shawmut UltraSafe Fuse Module.....	6
Datalogic DS4800—Compact Laser Scanner.....	6
Wittenstein TPM+ Actuator.....	7
Panduit StructuredGround Direct Burial System.....	7

◆ Continued on next page



## Table of Contents

Acme Electric AC Line Reactors.....	8
Roxtec-RG M63.....	8
Ferraz Shawmut Overvoltage Protection.....	9
Magnetic Solutions from Acme Electric.....	9
Amphenol Sine Systems miniBOSS and microBoss Connectors.....	10
Amphenol Sine Systems PowerBOSSlite.....	10
Datalogic Matrix 200 2D Imager.....	11
Hirschmann BAT54-F WLAN System.....	11
Post Glover-Pulsar Plus Pro.....	12
Spectrum Controls Universal Inputs.....	13
Cognex In-Sight Micro Vision System.....	13
Spectrum Controls HART Protocol.....	13
Brady IP Printers Simplify Labeling.....	14
Crouse-Hinds LED Tasklight.....	14
Hirschmann Mach 100 Switch.....	15
Powerohm Variable Braking Resistor.....	15
Fluke True RMS Multimeter.....	16
Thomas & Betts BlueKote Conduit Outlet Bodies.....	16
Hubbell LINKOSITY Wiring System.....	16
TCI H5 Active Line Conditioner.....	17
GridAlert Power Notification.....	18
Belden VFD Cables.....	18
Secure Crossing Zenwall 10.....	19
Automation Fair Hospitality.....	back cover



## Hoffman's CC3000 Enclosures Provide Attractive, User-Friendly HMI Protection

Hoffman's CC3000 enclosures provide human machine interface (HMI) protection that is both attractive and user-friendly. CC3000 enclosures are designed to protect operator interface terminals and electronic monitors in UL Type 12 industrial environments. The job of controlling a single machine or an entire processing line is made easier when protected by a CC3000 enclosure.

The CC3000's modular platform allows for maximum flexibility. Four standard models are available that can be sized to fit popular HMI



tools, such as flat screen devices, lights, meters, and gauges. CC3000 enclosures can be customized to fit a wide variety of flat screen operator interface devices. Or, the CC3000 can be customized to specific enclosures in millimeter increments from 250 by 250 mm to 600 by 600 mm.

Another unique feature of the modular HMI enclosure is its thermal efficiency. The CC3000's single-wall aluminum construction has been designed to dissipate heat efficiently and eliminate

thermal buildup inside the enclosure. This feature allows the CC3000 to reduce excess heat, which can often lead to diminished equipment performance and reduced equipment lifespan. In addition, the single-wall aluminum construction often eliminates the need for active cooling. Internal fan installation is available if additional cooling is required.

The CC3000 can be used in numerous applications, such as:

- Process control
- OEM/system integrators
- Robotic applications
- Material handling equipment
- Wastewater processing
- Oil and gas processing

CC3000 enclosures that are UL-rated for indoor use help to protect equipment from dust, dirt, dripping water, and noncorrosive liquids. The enclosures are also compatible with current Hoffman pendant and pedestal offerings. A 55 mm hinged door extension is available for the front or rear enclosure openings. Rear doors can be hinged on the right or left side for easy access. All CC3000 enclosures include a USB connector accessory to allow keyboard and mouse access plus software upgrades.

In addition, CC3000 enclosures deliver an aesthetically pleasing solution in 120 mm and 200 mm solid-body depth profiles. Handle extrusions and end caps are available in blue, red, and turquoise to match popular interface color schemes.

CC3000 enclosures offer the consumer a number of options that will provide optimum equipment protection.





## T4 Line Indoor and Outdoor Air Conditioners Offer High-Efficiency Cooling

Because of the increasing number of installed outdoor control cabinets, Hoffman's T4 line air conditioners have been developed to provide optimum thermal environment management. T4 air conditioners provide high-efficiency cooling for wall-mount and stand-alone enclosures. They are designed for both indoor and outdoor applications that require a UL Type 4 rating.

T4 air conditioners have been designed and tested to maintain a UL50-rated separation of the external ambient from the sealed cabinet interior. This feature protects the electronic controls and equipment from potential shutdowns caused by heat, humidity, dust, and other contaminants. T4 air conditioners are available in six sizes with a voltage range from 800 to 20,000 BTUs, making them ideal for industrial and communication applications requiring the protection and maintenance of Type 12, 3R, or 4 ratings on similarly rated sealed enclosures.

T4 air conditioners also come equipped with head-pressure control for low ambient operation, compressor heater, coated condenser coil, and thermostat. Another standard feature on all units is an EMI/RFI noise suppressor. In addition,

the units offer a broad operating range of  $-40^{\circ}\text{F}$  to  $131^{\circ}\text{F}$ . The unit's high performance, industrial grade, and efficiency fans provide maximum heat transfer.

Whether used for indoor or outdoor applications, T4 air conditioners provide you with efficient thermal environment management.



## Finger-Safe Power Distribution Blocks Offer Effortless and Economical Panel Safety

Ferraz Shawmut meets your panel's safety needs with its line of finger-safe power distribution blocks (FSPDBs). Splicing cables, splitting primary power into secondary circuits, and providing fixed-junction tap-off points has never been safer or more convenient. The finger-safe design fully covers blocks, ensuring fingers will not touch live parts. These FSPDBs provide an IP20 level of finger-safe protection with easy snap-on installation. Costly custom Plexiglas sheets and special covers to protect your panels are no longer necessary. FSPDBs come in four sizes and simply snap on to a 35 mm DIN rail for hassle-free installation.



Multiple features are guaranteed to meet your needs.

- Superior finger safety includes a fully insulated block to isolate live parts, and recessed termination screws and wire openings qualify as finger-safe per IEC 529.
- Modular design provides a compact footprint for single- and multiple-pole configurations.
- Captive termination screws with unique channel design ensure screws are never lost.
- Multiple wire ratings allow for multiple conductors in #2 and 2/0 openings.

Additional accessories enhance the FSPDBs for further safety and versatility. The cap plug accessory provides touch safety for unused openings, and the circuit identification marker option quickly snaps into blocks for immediate identification.

### Ratings

- 175 to 840 A
- 600 V
- 100 kA with proper fuse (short circuit current rating)

### Approvals

- UL-recognized component: Guide XCFR2, File E73571
- CSA-certified: Class 6228, File 69363

Ferraz Shawmut makes panel protection convenient, safe, and economical. The superior design and versatility of these FSPDBs makes them among the most reliable on the market today.



## WeatherFlo Type 3R Vented Outdoor Enclosures Help You Beat the Heat



It's a well-established fact that heat buildup can negatively impact the performance and lifespan of equipment. When it's hot outside, chances are that the enclosures protecting your control systems are even hotter. It's estimated that for every 18°F that internal cabinet temperature rises above normal room temperature, the life expectancy of the enclosed electronics is reduced by 50%.

Hoffman WeatherFlo Type 3R vented outdoor enclosures provide one way that you can beat the heat. WeatherFlo makes it easy to keep your equipment cool with its off-the-shelf enclosure that has a tested airflow solution to meet the thermal environment needs of a 3R-rated drive system. WeatherFlo provides an active cooling ventilation system that works through a fan and filter.

The enclosures use an innovative cooling technology called TempGard, which protects sensitive electronics in a number of applications, such as irrigation management, wastewater, HVAC, and other applications with large heat loads. TempGard fights heat buildup in a number of ways: the reflective white polyester exterior finish reduces the solar heat load by up to 70%; additional shielding in

the top and intake cover reduces solar absorption by 25%; hot spots are eliminated by forced air ventilation that draws ambient air from the bottom and exhausts it out the top.



In addition to cooling, Hoffman heater solutions can be incorporated to protect drives from damage due to cold starts.

WeatherFlo enclosures are available in multiple standard sizes and fan configurations to house drives from 3 to 400 Hp. Four models are constructed in 16-gauge or 14-gauge galvanized steel. The largest sizes are offered in aluminum for lightweight strength. Another attractive feature of WeatherFlo enclosures is the adjustable thermostat, which operates only when the fan is needed. A protective gasket and fan help to filter out contaminants. In addition, variable frequency drives move outside to improve reliability, efficiency, and energy savings. These features provide an economical and energy-efficient solution for both HVAC and pumping systems.

WeatherFlo can save you time and protect your heat-sensitive equipment.



## Cooper Bussmann CCP: Smaller, Simpler, Better

The Cooper Bussmann compact circuit protector (CCP) provides up to three times the short circuit current rating (SCCR) at full voltage of a molded-case circuit, and it's one third the size! This innovative CCP provides lockout/tagout capability, open-fuse indication either locally or remotely, and a DIN rail mount for quick installation without tools. The positive visible circuit isolation is easily detectable from the disconnect switch, and you never need to worry about contact with live components because of the finger-safe construction.

Your employees will appreciate the reduced requirements for personal protective equipment that the 200 kA short circuit rating with Class CC fuses allow. You'll find the flexible installation of the full voltage rating up to 600 VAC a real plus. The Cooper Bussmann CCP can perform in panels from around the world, and the optional wired-remote open-fuse indication will even signal a PLC and open a contactor to de-energize all phases, if necessary. This CCP is UL98-disconnect-rated for protection of branch circuits with Class CC fuses, and horsepower-rated for motor circuits with 3-pole Class CC units.



## The Panduit Panther LS8E Creates Perfect Labels

If you are looking to eliminate label waste and trimming time, look no further than the Panduit Panther LS8E hand-held thermal transfer printer. The Panther LS8E offers a partial-cut feature to provide tear-apart strips of labels for quicker installation as well as a cut-to-length function to eliminate label waste and trimming.



With the Panther LS8E, high-quality labels can be achieved on a wide variety of materials for use with electrical and network applications such as wire/cable, components, safety, and facility identification. Changing labels is easy with the fast-loading label cassettes that include both label material and ribbon. The cassettes also contain an integrated memory device for automatic formatting, recall of last legend used, and number of labels remaining. The compact size and rugged design fit comfortably in one hand, and a large backlit display makes the Panther LS8E the perfect

choice for printing labels at a remote job site.

The Panther LS8E also uses a USB interface, which allows for importing data, upgrading systems, and printing labels from a wireless laptop or desktop. This versatile hand-held printer can print self-laminating cable labels, continuous tapes, and die-cut labels for patch panels, faceplates, and other network applications.

The Panther LS8E provides everything needed to make perfect labels every time. Contact the sales engineers at McNaughton-McKay for more information on the Panduit Panther LS8E hand-held thermal transfer printer, and stop wasting time and labels.



## Panduit's Reel Smart Ferrules and Crimping Tools Deliver Solutions

Higher-volume ferrule applications require the speed and reliability of Panduit's Reel Smart continuously molded ferrules and precision crimping tools. Panduit offers a seamless barrel and continuously molded design in the Reel Smart line. These ferrules contain loose wire stands for consistent placement in tools to ensure reliable terminations every time. Ferrules are available in

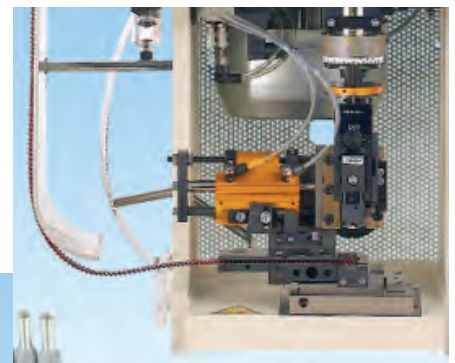


#20 to #14 AWG in strips of 50 for use with lightweight hand tools or in large reels of 3,000 to 5,000 for use with precision applicators.

With an innovative rapid-load design, the semi-automatic CT-1000 crimping tool uses strips of 50 ferrules for medium-volume applications. This multi-use .54-pound controlled cycle tool cuts, strips, and crimps wire to maximize efficiency. The adjustable die setting allows for termination of all continuously molded ferrule sizes with a single tool.

The ferrule applicator CA10 is for use with large reels of continuously molded ferrules. The universal base-plate design allows it to work with the electric bench press CP-871 and other commercially available bench presses and automatic wire-processing machines. The CA10 features precision ferrule indexing for high-volume applications, and the optional quick-change die sets offer fast product changeover with reduced setup time.

Get efficiency, application flexibility, and lower installation cost. Contact McNaughton-McKay for more information on the Reel Smart product line from Panduit.



## UltraSafe Fuse Modules Offer High Quality and Compact Design



Ferraz Shawmut's UltraSafe fuse module (USFM) provides safe, top-quality, cost-effective motor control overcurrent protection. The 45-mm-wide module—the smallest footprint in the industry—is designed to be used with IEC contactors and overload relays of the same size. This uniformity ensures the most efficient function and best fit. The USFM's DIN rail adaptor makes installation and removal simple and quick. UL508 panel shops, original equipment manufacturers, and industrial users will find that the greatest benefits of the USFM are in replacing circuit breakers for higher SCCR ratings. Additional advantages of the USFM over circuit breakers include:

- Short circuit protection capability of fuses
- Type 2 "no damage" protection to motor control components
- Lockout/tagout functionality
- Optional IEC contactor flexible connectors
- Optional remote monitoring of the fuse carrier

Multiple safeguards are included with the USFM to ensure user protection. An auxiliary contact option is a factory- or field-installed microswitch that monitors the status

of the module's fuse cartridge. With this feature, the contactor drops out the load the moment the fuse extractor handle begins to open. Further safety features included in the USFM design are padlocking capability allowing lockout/tagout procedures to be followed, tool-free DIN rail removal, IP20 finger-safe protection, and optional visual blown-fuse indication.

Up to five USFM modules can be ganged with the UltraSafe's comb-wiring bars. These UL-approved components can also be conveniently connected to other manufacturers' motor control equipment using flexible wiring connectors available in 47 mm, 74 mm, and 99 mm lengths.

Ferraz Shawmut is committed to protecting your equipment. The numerous safety features and full line of accessories make the UltraSafe fuse module an obvious choice for first-rate motor control overcurrent protection.



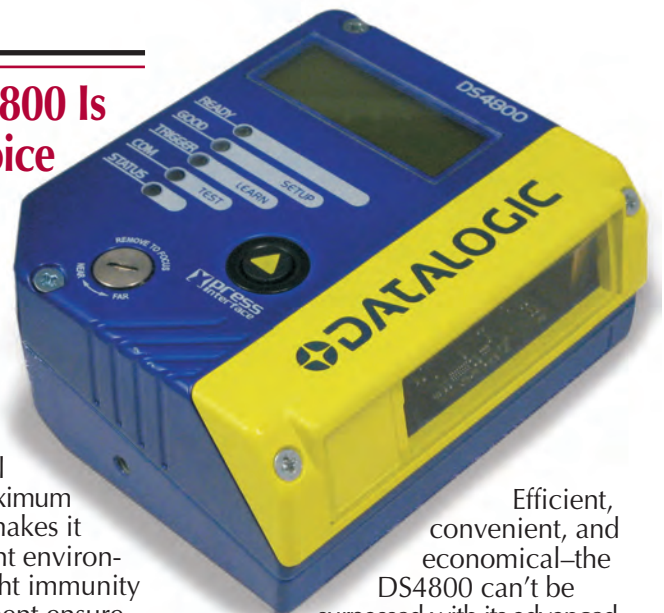
## Datalogic's DS4800 Is an Obvious Choice for a Compact Laser Scanner

The Datalogic DS4800 compact laser scanner is ideal for industrial use with its compact design and sturdy IP65 protection-class full metal construction. Its 50°C maximum operating temperature makes it ideal for even harsh plant environments. Total ambient light immunity and smart focus adjustment ensure optimal label reads and extended reading area. These features make the DS4800 an excellent option for warehousing and shop-floor applications such as medium- or small-conveyor sorting, picking systems,

items and parts tracking, overall production traceability, and much more.

DIGITECH™ technology enhances reading performance on low-quality or low-contrast barcodes as well as maintains superior performance even at high skew angles. ACR4 reconstruction technology also increases the maximum tilt angle and decoding rate on damaged barcodes. The 5-LED bar graph and the multi-function key provide instant access to relevant functions for easy installation and maintenance. Setup and programming are a breeze with the multi-language Genius SW tool, which combines the wizard approach and graphic add-ons for rapid configuration.

The DS4800 guarantees cost-efficient connectivity with its embedded high-speed ID-NET communication interface. Data collection is accomplished without an external multiplexer, making network wiring effortless. A complete range of modular connection boxes are available for extended fieldbus connectivity.



Efficient, convenient, and economical—the DS4800 can't be surpassed with its advanced design and first-rate technology. Contact a McNaughton-McKay sales engineer for more information on how Datalogic's DS4800 compact laser scanner can improve your productivity.



## Wittenstein's TPM+ Pushes the Boundaries of Servo Actuation

Wittenstein's TPM+ offers the customer unparalleled performance and power density in the world of servo actuation. The design of the TPM+ motor gearhead unit is so sleek and compact that you will want the servo actuators out front. The TPM+ servo actuator consists of a high-precision gearhead, a high-pole motor, and feedback all in a single package. This innovative actuator concept eliminates the need for extra components; plus, the size and mass have been reduced by 50% as compared to a standard motor and gearbox combination. TPM+ has the best torque density in its class because of its small size and mass.



In addition to the benefits of TPM+'s reduced size, the actuator design eliminates the need for additional rotating parts often used in conventional solutions (e.g., additional bearings). TPM+'s magnetic power source allows it to get closer to the load, both improving stiffness and resulting in higher dynamics.

Wittenstein continues to provide the most advanced servo solutions in the industry, making machines faster, more efficient and more productive



## Highest Performance in the Industry



### High Performance from Panduit's StructuredGround System

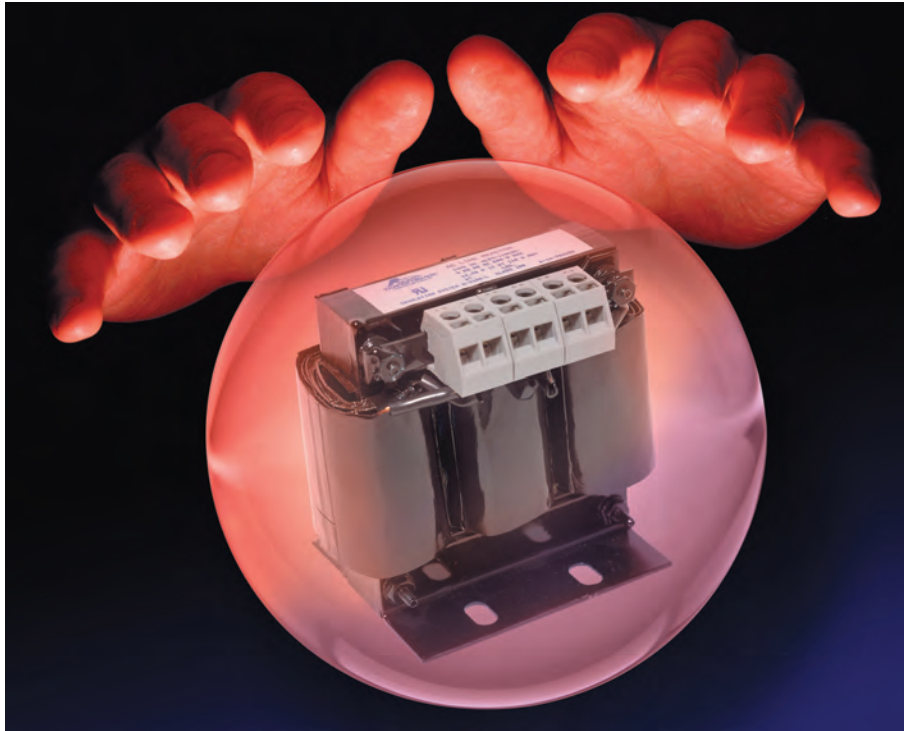
Meeting the stringent performance requirement of IEEE Standard 837-2002 is tough enough. Panduit not only met but exceeded that benchmark with the StructuredGround direct-burial compression-grounding system. Enhanced crimp process is achieved using a patent-pending technology that gives StructuredGround maximum reliability while exceeding UL467 lists and CSA 22.2 certified requirements. StructuredGround provides reliable system performance even in high-vibration environments by complying with MIL-STD-202G (METHOD 201A).

StructuredGround's patented slotted tap design, locator dies, and pre-applied patent-pending conductive antioxidant ensure a high-quality mechanical and electrical bond all while speeding installation time to save money. The addition of the nonflammable compression-connection process promotes

safety during installation in any weather condition. Parts requirements are minimized due to the wide range-taking ability and universal multi-conductor design, further reducing overall costs.

Reduce installation time, promote safety, and get the most reliable compression connection in the industry with panduit's StructuredGround system!





## Roxtec RG M63 Glands: High Technology for Superior Sealing

The Roxtec RG M63 solution for cabinets combines the traditional sealing method of glands with multi-diameter technology, and the result is a line of gland seals with improved capacity and functionality. The RG M63 protects against a variety of exposure risks, including water, dust, insects, and rodents, and its compact design makes it ideal for applications in tight spaces.



Available in three standardized kit configurations that can seal between one and nine pre-terminated cables whose diameters range from 0.138 in. to 1.280 in., the M63 is UL-67 rated and meets UL/NEMA standards 4, 4X, 12, and 13. This gland seal comes in either stainless steel or nickel-plated brass, and it attaches by means of a counter ring nut.



## Acme Electric AC Line Reactors: Protection for Critical Motor Control and Drive Applications

In today's cost-conscious world, we are all looking for ways to improve our efficiency and limit our costs. Acme Electric AC line reactors can provide one way to accomplish this goal. By absorbing potentially damaging line disturbances, the reactors can prevent failures and extend the life of your equipment. Your motors and drives will be protected from power conditioning problems, downtime will be reduced, and productivity will be enhanced. After installing Acme Electric AC line reactors, your company will realize a number of benefits:

- Protection from damaging voltage drop
- Elimination of nuisance tripping of drives or circuit breakers
- Reduction of motor current surges and power line spike currents
- Reduction of output voltage dv/dt
- Improvement in true power factor of capacitor input drives
- Reduction of harmonic distortion

- Cooler, quieter motor operation
- Longer life for motors and solid-state components

Acme Electric offers a full line of line reactors from 2 to 600 amps for use in 208-, 240-, 480-, and 600-volt environments. The reactors are available in either 3% or 5% impedance options. You can select an open-core design (for interior enclosure mounting) or encapsulated design (for mounting outside the enclosure) in either steel or stainless steel. Both designs are covered by Acme Electric's famous 10-year limited warranty.

Acme Electric's three-phase AC line reactors can be used as input filters for adjustable-speed DC drives or as input or output filters for AC pulse-width-modulated variable frequency drives. They are bi-directional protection filtering devices and can be applied in numerous configurations.

Consult with your McNaughton-McKay specialist on this and other Acme transformer solutions for your industrial motor control applications. Your bottom line will thank you!



## Surge Trap TVSS Provides Transient Overvoltage Protection

Transient overvoltage at a facility is the sudden change in the steady-state voltage. This spike in voltage can occur at any time. To ensure your equipment is protected, Ferraz Shawmut has created the Surge Trap TVSS (transient voltage surge suppressor) to enhance their existing TPMOV (thermally protected metal oxide varistor) product line. The Surge Trap's unique, thermally protected MOV doesn't require additional overcurrent protection despite its high interrupting (100 kA) rating. This flexible unit can be connected individually or ganged together, and provides status to critical control circuits via a built-in visual and remote indicator. It's 35 mm DIN rail mountable and IP20 finger-safe. The Surge Trap TVSS is available for use with the following applications: transient voltage surge suppressors, AC/DC distribution, high voltage power supplies, telecom, motor control systems, PLC applications, and power transfer equipment.

The features available with the Surge Trap TVSS are a huge advantage because transient overvoltage is unpredictable and can happen without notice. It is sometimes caused by lightning, but can also occur as a result of load switching or power disturbances within a plant. Kent Walker, Director of Technical Sales and Services for Ferraz Shawmut, states, "It is estimated that nearly 80% of today's overvoltage problems are caused by other equipment and power disturbances throughout the plant." Other internal and external sources that can cause transient overvoltage include motor loads that are being turned on and off, harmonic feedback, inductive coupling from variable frequency drives, close conductor proximity, and utility grid switching.

Protecting the equipment in your plant has never been easier with the safety and reliability that Ferraz Shawmut ensures with the Surge Trap TVSS.



## Magnetic Solutions for Demanding Applications: Acme Electric

Acme Electric and McNaughton-McKay have teamed up to offer the widest selection of magnetic solutions for your most demanding OEM, industrial, and construction applications. No matter how difficult or challenging your situation is, Acme Electric's stock and custom magnetic products can help you find an answer. Consider the following:

- Are you plagued by harsh environmental conditions? Stainless steel enclosed transformers can provide relief.
- Are you looking for increased energy efficiency? Acme's LEED-compliant TPI and C3 transformers can help.

- Is your power quality inconsistent? Nonlinear-load isolation transformers, power conditioning, constant voltage regulators, or I-trap neutral-current reducers could be the answer.
- Do you use heavy-duty equipment? Acme offers a complete line of industrial- and construction-grade dry-type distribution transformers (single and three phase: 50 VA through 1,000 KVA). Encapsulated and ventilated designs, shielded for clean power, are available.
- Do you have an application where power is vital to sustain life? Medical line isolation can deliver complete reliability.
- Do you have a unique application? Acme can provide custom OEM magnetic designs and prototypes.
- Are neon signs part of your life? Acme offers a complete selection of transformers for the neon sign industry.
- Do you need outdoor lighting? Acme has transformers for use near pools and for accent lighting in landscapes and waterscapes.

Acme Electric and McNaughton-McKay have teamed up to offer the widest selection of magnetic solutions for your most demanding OEM, Industrial and Construction applications - most with a limited 10 year warranty.

Please contact your McNaughton-McKay specialist to explore the array of Acme magnetic solutions for your most demanding applications.



## miniBOSS and microBOSS: Products to Meet Your Connection Needs



Amphenol Sine Systems, one of the world's largest manufacturers of interconnection products, is expanding their factory automation offerings to include a line of tool cords. The miniBOSS and microBOSS product lines provide users with the ability to deliver power and signal data to a wide variety of devices in a manner that is both cost-effective and safe.

The miniBOSS is available in 3, 4, 5, and 6 position variations that offer cost-effective power and signal distribution. MiniBOSS works by using both static and high-flex dual-rated TC-ER and STOOO 14-AWG cable. The system also uses thick and thin DeviceNet™ to cover the various demands in the field. In addition, a full complement of receptacles and tees is available to fit every user's needs.

The microBOSS system is available in 3, 4, and 5 pin configurations that cost-effectively deliver signal data to a variety of devices. Cable types include standard 22-AWG STOOO and thin DeviceNet™. Cabling is offered in both static and high-flex versions to serve the needs of every application. The microBOSS line includes a full array of receptacles, tees, and adapters.

With the addition of miniBOSS and microBOSS to an already full line of factory automation assemblies, Amphenol Sine Systems is sure to have a product that will fit your needs. A McNaughton-McKay specialist is available to help you determine how miniBOSS or microBOSS can work for you.



## PowerBOSSlite: Amphenol Sine Systems Expands Its Power Distribution Line

The addition of the PowerBOSSlite product line to the Amphenol Sine Systems overall product line gives users the ability to distribute 600 volts AC up to 25 amps. The PowerBOSSlite product line offers users a safe and cost-effective method for distributing primary power.

The PowerBOSSlite is a 10-AWG dual-rated TC/ER and STOOO trunk with 10-AWG or 14-AWG drops to provide interconnection of various equipment types. This system provides the ability to control power and is a replacement for pipe and wire or hard-cord wiring. The PowerBOSSlite system is designed to eliminate costly

field-wiring mistakes. The design also helps keep time spent on startup and debug to a minimum. All cable accessories are tested before they leave the manufacturing plant to ensure problem-free installation.

In addition, all PowerBOSSlite systems are UL- and CA-listed. PowerBOSSlite products are also fully interchangeable with the Woodhead Bradpower, Rockwell ArmorConnect, and Cooper SOFTPower product lines. In addition, the PowerBOSSlite system carries an IP67 rating that prevents dust and water from entering the connection when coupled to a tee. Each product line has a full array of receptacles, tees, and cables with standard cable lengths of 1, 2, 3, 4, 5, 7, and 10 meters to allow for a custom fit for your application.

With the addition of the PowerBOSSlite product line, Amphenol Sine Systems now offers three scalable sizes of power distribution that are sure to fit your needs.



## Matrix 200 2D Imager Packs Powerful Performance in a Compact Design

The Datalogic Matrix 200 2D imager ensures uncompromised reading performance and convenience in its space-saving design. Ideal for tight-fitting spaces, this compact unit allows for flexible mounting in the narrowest of locations. Straight and 90° reading window models are both available to offer you



even more versatility. The rugged construction, IP65 protection class, 50°C maximum operating temperature, and 10 to 30 VDC power supply make the Matrix 200 an excellent choice for a variety of environments, including those in:

- Electronics
- Pharmaceutical and chemical manufacturing
- Original equipment manufacturing (chemical and biomedical analysis machines, access control systems, self-service systems, print and apply systems, and document handling).

The cutting-edge technology used in the optical and lighting systems combines wide field of view at short reading distances with excellent illumination pattern. Other optical specifications include a maximum reading distance of 200 mm and reading of near-distance ultra-high-density 2D codes up to 0.076 mm (3 mils).

Damaged and low-quality code are no match for the built-in WVGA



image sensor with an acquisition rate up to 60 frames per second and extensive decoding libraries. Reading 10 mils codes in moving applications at speeds of up to 2 m per second guarantees fast performance.

Installation and maintenance couldn't be easier with the 5-LED bar graph and multi-function key. These features provide instant access to functions such as:

- Aiming
- Setup (for automatic imager calibration)
- Learn (for automatic code setting)
- Test mode (for bar graph activation)

In addition to easy installation and maintenance, connectivity just got easier. The embedded high-speed ID-NET communication interface makes data collection and network wiring easier than ever before. The USB interface models also allow direct connection to a PC.

Datalogic is your imaging solution with the Matrix 200 2D imager. Outstanding performance in a compact design makes this imager the only one you will ever need. Contact McNaughton-McKay today to learn more.



## Hirschmann Delivers Multiple Features with its BAT54-F

The Hirschmann BAT54-F is a comprehensive WLAN system designed to meet your needs even in the most punishing environments. From rail to petrochemical, the BAT54-F's durable construction is waterproof and can stand up to harsh temperatures (-20°C to 55°C). Built-in shock and vibration protection make the BAT54-F one of the toughest devices on the market. Hirschmann takes security seriously with encryption, user authentication, access-control lists, WLAN port and protocol filter, built-in firewall with QoS, port filter, protocol filter, IDS and DoS protection, PMK caching, and pre-authentication for fast roaming with IEEE 802. The operating system LAN interface is usable for simultaneous DSL over LAN, IP router, and NAT/reverse.

Wall or mast-mounted, the Bat54-F is appropriate for a broad range of stationary or mobile (AGV, train, etc.) applications requiring wireless connectivity, even those that are outdoors or lacking a convenient housing. Wireless range can reach 12 miles depending on environment and antenna use. Fast roaming provides uninterrupted connection during transitions between wireless cells while background scanning detects rogue AP. Maximum throughput of 108 Mbps using Super A/G with Turbo Mode makes the Bat54-F speedy and efficient.



Hirschmann combines premier technology and a wide array of features to make the Bat54-F one of the best systems in the industry. High security and extensive wireless features give you the freedom to design your WLAN system without the threat of a security breach.



## Post Glover's PulserPlus Pro Reduces Risk of Arc Flash by 98%

The electrical industry generally accepts that 98% of all electrical system failures begin as ground faults. Such failures typically require that equipment be taken offline, creating lost productivity (and profits) due to unplanned downtime. Post Glover's PulserPlus Pro keeps plants running 24/7/365.

High-resistance grounding (HRG) limits the fault current so that ground faults do not develop into more serious equipment problems or potentially deadly arc flashes. With a high-resistance-grounding system:

- There is no need to immediately trip the system, allowing continued process operation and orderly management of downtime.
- Thermal damage to equipment is dramatically limited due to the low fault current.
- Overall plant safety is improved since arc flash hazard is reduced by 98%.
- Ground faults are easy to locate and repair, saving maintenance time and money.

The PulserPlus Pro further enhances this already proven technology by adding features not available in many existing systems:

- Both under-voltage and under-current detection and alarm—you don't need to choose between them anymore.
- Pulse rate adjustable from 10 to 50 pulses per minute, allowing for custom setup within your system, which lets you differentiate between noise and leakage currents.
- Two separate, adjustable time-delay settings, one fundamental and one for third harmonics, to prevent nuisance alarms or trips.



- Alarm and form C contacts to allow remote monitoring and alarm for ground fault, high harmonics, loss of ground, and discretionary contact. Three sets of dry contacts are included for indication of system changes. One set each is provided for ground fault, high harmonic content, and loss of ground indication.
- Full generator-winding protection provides third-harmonic trip to allow protection of the generator. All generators produce a small amount of third harmonics caused by fractional-pitch windings. In the event of a fault near the neutral of a wye generator, these values will drop. Separate set points for third-harmonic under-current and under-voltage levels can be used to alarm this condition.
- High harmonics filtering and detection with third-harmonic over-voltage and over-current trip.
- Factory-installed communications features, including the ability to integrate into network monitoring and protection systems via RS232, Modbus, or Ethernet protocols.
- Data-logging for fault isolation and trending data.

The PulserPlus Pro is available in either a full-height, free-standing enclosure or a smaller unit suitable for wall-mounting. Standard designs are manufactured for limiting fault levels up to 10 amps, with the ability to be adjusted in the field by the customer to a lesser value (if the system charging current permits).

Post Glover's PulserPlus Pro is the only digital high-resistance grounding system with pulsing available today. Engineered for use up to 600 V and available in indoor or outdoor enclosures, Post Glover HRG systems can be used to protect either wye or delta-connected systems. The third-generation PulserPlus Pro represents the state of the art in network-grounding protection. Talk to a McNaughton-McKay specialist to learn more and see how PulserPlus Pro HRG systems can enhance your application.



## Spectrum Controls' Expansion of Universal Inputs Offers the Customer More Options



The options for customers looking to maximize flexibility and value from Logix-based automation systems have increased. Spectrum Controls, a global Encompass partner of Rockwell Automation, offers two eight-channel universal input modules for Rockwell's I/O and MicroLogix controller platforms.

The 1762sc-IF8U model is an eight-channel universal analog input for MicroLogix 1100 and 1200 programmable controllers. The inputs are available in mix-and-match of eight voltage, current, thermocouple inputs, and four RTD inputs. The performance of the 1762sc-IF8U model is comparable to many existing dedicated analog modules. It's also compatible with the RSLogix 500 programming software.

The second model, the 1794sc-IF8IU, is an eight-channel universal analog input for Flex I/O applications. The 1794sc-IF8IU is also available in mix-and-match of eight voltage, current, thermocouple inputs, and RTD inputs. It is also compatible with RSLogix 5000 programming software.

The universal modules allow users to combine voltage, current, thermocouple, and RTD inputs on one module. This eliminates the need for expensive dedicated I/O modules. Another attractive feature of the universal inputs is the ability to use multiple inputs simultaneously on one module, providing the customer with unparalleled flexibility. The universal inputs may also reduce the total cost of ownership.

Spectrum Controls is a global Encompass partner of Rockwell Automation, and all products are fully supported through Rockwell's

TechConnect program, offering peace of mind for customers wishing to enhance their investments in Rockwell Automation systems.



## In-Sight Micro Provides the Smallest Vision System Available



Imagine a complete vision system in a package that measures 30 mm by 20 mm by 60 mm, that's what the Cognex In-Sight Micro offers. The full vision system is the size of a remote-head camera, and it provides flexible mounting capability that enables mounting at angles up to 45° by using a distinctive nonlinear calibration tool.

There are five In-Sight Micro models to provide customers with a wide range of performance, price, and resolution levels, including a two-mega-pixel model. These models provide amazing performance in the smallest package on the market.

The Cognex vision tool library is provided with all In-Sight Micro models to handle numerous vision applications for your industry. The simple point-and-click EasyBuilder software makes In-Sight Micro a snap to set up and run. The software will walk you through all the steps of setting up your vision system. There is no need for programming. EasyBuilder gives you the flexibility to tailor your applications to your needs.

In-Sight Micro can provide you with a vision system that fits anywhere and is easy to deploy.



## FieldPort I/O Modules Feature HART Protocol and Ethernet Connectivity

Enjoy the benefits of traditional in-rack analog+HART I/O for your legacy control systems with FieldPort by Spectrum Controls. FieldPort enables you to use the power of your existing HART instruments by obtaining real-time data for use in your control system, while operating an enterprise asset-management network. And, this is accomplished without any additional wiring.



Integration is easy when used with Connects, Spectrum Controls' connectivity solution for device-management tools. Connects gives FieldPort the same functionality as Spectrum's field-proven ControlLogix and CompactLogix HART I/O products. No special programming tools or protocol knowledge are necessary.

FieldPort can help you combine the power of your HART instrumentation with your legacy controllers thus reducing the total cost of ownership through enterprise asset management.



## Brady IP Printers Simplify Labeling Chores



As a finalist for *Plant Engineering Magazine's* Product of the Year, the Brady IP printer is receiving considerable recognition—and for good reason! This series of thermal-transfer label printers is amazingly easy to use. Using SmartCell technology, the printer “knows” what materials and software are being used, and, more importantly, monitors the entire process and tells the user (via an LCD display) the job’s status. It will even tell the user how much time is left before its supplies run out.

In addition to its ease of use, the Brady IP printer gives its users more reasons to love it. It is small (11.0” H by 9.4” W by 17.0” D) and lightweight (13 pounds), and features top-loading of materials. It can accommodate a wide range of labels sizes and types. Its computer connectivity options include serial, USB, and Ethernet 10/100.

The IP printer is part of Brady’s extensive line of printing solutions, and is designed for use with Bradysoft or Labelmark labeling software, IP printer-enabled materials

and ribbons, and IP printer-compatible material and ribbons. Just load, click, and print—it’s simple!



## Get Targeted Illumination with Cooper Crouse-Hinds’ LED Tasklights

The Cooper Crouse-Hinds LED tasklight is specifically designed to provide additional lighting in equipment or walkway areas where low-light conditions might negatively impact safety or productivity. This compact fixture provides a solution when general lighting is insufficient (or has been reduced to conserve energy) but critical equipment and control panels still need to be viewed with clarity.

The LED tasklight delivers up to 60,000 hours of bright white light while consuming only 46 watts of power. In addition to providing energy savings, LED technology

also delivers cost efficiency through its durability. The LED tasklight has an expected life of more than 10 years, making it ideal for use in areas needing continuous light or in hard-to-reach applications. In fact, many difficult situations can be remedied with this fixture: it is vibration-resistant; it is watertight; and it contains no hazardous substances, making it environmentally friendly. LED lighting is also especially useful in cold environments, where it performs reliably and requires no warmup.

The Cooper Crouse-Hinds LED tasklight’s applications include:

- Tanks
- Instrument panels
- Switch racks
- Storage areas
- Motors/generators
- Pathways
- Security areas



This versatile fixture just might provide the solution to your specific lighting problem. McNaughton-MacKay offers a wide variety of lighting solutions; give us a call, and we’ll help you meet your challenge.



## Hirschmann Delivers Another Quality Switch with the Mach 100

The Hirschmann Mach 100 is a 19-inch rack-mountable switch. Ideal for office and control room environments, this fan-less unit can operate in temperatures from 0°C to 50°C. The Mach 100 has superior compatibility with other Hirschmann networking hardware, as well as Industrial HiVision and EtherNet/IP and Profinet profiles. Redundant 100–240 VAC power supplies, a fault relay output, and USB configuration flash adapter (ACA) support makes this switch a market leader.



Hirschmann's top-quality security is also available with the Mach 100. Port security (MAC- and IP-based), SNMP V3, SSH, and authentication (802.1x) ensure your system's safety. The Mach 100 provides substantial filtering options, including:

- QoS 4 classes
- Port priority 802.1D/p
- VLAN
- Multicast (IGMP, GMRP)
- Broadcast-unicast-multicast limiter

Offering a host of management features, the Mach 100 includes the CLI and web interfaces to give it the same look and feel as other Hirschmann devices.

Additional features include:

- Full-feature set of L2P firmware
- DHCP option 82; HiDiscovery; ACA
- HiPer-Ring, MRP, redundant ring coupling
- RSTP, disable learning, SNTF
- Industrial profiles (GSDML files)
- Full integration into Industrial HiVision

The Mach 100 is available in both modular-port and fixed-port versions. The modular-port version provides:

- Fixed ports: eight 10/100 RJ45 and two Gig RJ45/SFP combo ports

- Modular ports: two eight-port hot-swap media modules with RJ45 or fiber (SC/SFP)

The fixed-port versions are either:

- Eight fixed FE RJ45 ports and two Gig RJ45/SFP combo ports
- 24 fixed FE RJ45 ports and two Gig RJ45/SFP combo ports

Hirschmann quality is evident in the Mach 100. For further details contact a McNaughton-McKay sales engineer.



## Powerohm VBR Helps With Your Braking Resistor Needs

Spending too much time trying to determine what braking resistor you need for a specific application? Powerohm's variable braking resistor (VBR) load unit can provide you with all the necessary information to determine a braking resistor that



matches your application, before you leave the job site!

The Powerohm VBR is a portable test unit that walks you through

selectable steps of resistance for analyzing the correct braking requirements for a range of drive horsepower. The VBR connects to your drive or braking module and determines what braking resistor it needs. After you've determined the optimal resistance value for peak performance, the VBR's digital read-out will display the true duty cycle as you run the application.

The Powerohm VBR can also be used as a temporary solution if you're starting up and realize that your application needs a braking resistor. The VBR can provide instant braking for your installation, and you can keep the unit in place until you get your permanent braking resistor.

If you need any more reason to look at the Powerohm VBR, consider its ability to determine whether a braking resistor can improve your process times. The VBR will determine which improvements can be made with the simple addition of a resistor.

Give us a call—let's discuss the Powerohm VBR and other drive-related products that are available to improve your operations.



## Increase Productivity with the Fluke 289 True RMS Industrial Logging Multimeter

If you're an industrial or field service professional who's responsible for troubleshooting and predictive maintenance activities, you need to check out the Fluke 289 true RMS industrial logging multimeter with TrendCapture. It comes with a built-in data logger to record measurements unattended, and recorded data can be viewed on the meter's 50,000-count 1/4 VGA dot matrix display or transferred to a PC with optional FlukeView Forms software.



This multimeter allows you to plot measurements as a single line, storing up to 10,000 readings. The Fluke 289 will allow you to log multiple sessions or log data continuously over 200 hours, and the events and trends recording will be a big help for troubleshooting intermittent problems or profiling loads in the toughest industrial settings. The Fluke 289 can solve problems on motor drives, in-plant automation, power distribution, and electro-mechanical equipment. The 50-ohm range is useful for measuring and comparing differences in motor-winding resistance, low ohm measurements, or other contact issues. And the Fluke 289 allows you to upgrade as other capabilities become available.

The Fluke 289 true RMS industrial logging multimeter with TrendCapture can help you meet the challenges of difficult applications that require serious RMS accuracy with a large graphic display.



## BlueKote Makes Wire Pulling Faster and Easier!

Thomas & Betts' BlueKote Form 7 and Form 8 conduit outlet bodies feature a Teflon-based BlueKote interior finish, making it easier and faster to pull wires by eliminating rough inside surfaces that can cause damage to the cable jacket, insulation, and conductors. This finish provides a slick internal surface that reduces the amount of force necessary to pull wires, thereby reducing installation time. After a seven-day 5% salt-fog chamber test, Thomas & Betts' BlueKote still retained its glossy sheen and showed no evidence of salt adhesion or penetration.



The Thomas & Betts conduit outlet bodies incorporate three layers of protection—including two layers of epoxy coating—to protect against corrosion. The exterior layer is electro-zinc-plated with a dichromate finish, and is an industry standard for corrosion resistance.

Both steel and iron covers come standard with an integral gasket, to help reduce your inventory and provide up-front cost savings.

For faster, easier wire pulling and extra corrosion resistance, consider Thomas & Betts' BlueKote Form 7 and Form 8 conduit outlet bodies.



## Hubbell Offers Plug-and-Play Wiring Technology

Hubbell's LINKOSITY power system is a modular plug-and-play wiring system that gives you fast installation and high performance for 20 A and 30 A circuits up to 600 VAC power distribution. Because this system is so easy to install, it is a cost-effective alternative to conventional wiring methods. Originally designed by Lockheed Martin, this system has a high level of quality built into its components and method.



LINKOSITY can dramatically reduce the cost of ownership of electrical power systems. The control integration is a flexible, modular plug-n-play wiring and interconnect solution for industrial power, control, and communication applications. The connectivity ranges from a nominal 3 A to 300 V and 10 A up to 600 VAC. The system works with standard NEMA wiring devices allowing you to use common NEMA connections for your convenience power or peripheral equipment.

Basic components include distribution components (cables, receptacles, tees, and pass-thrus), NEMA-configured point-of-use devices, and self-contained power supplies. This allows assembly of modular components at the job site with minimal interpretation of the electrical wiring requirements.

LINKOSITY control integration components can be used wherever NFPA, IEC, and SAE standards are preferred.



## Improve System Efficiency with TCI's H5 Active Line Conditioner



The H5 active line conditioner from TCI can increase your system's overall efficiency by actively monitoring the load current and immediately responding to fluctuations to return the true power factor to near unity. The ability of the versatile and powerful H5 to adjust to a dynamic load eliminates the need for costly pre-installation harmonic studies. Plus, no commissioning process is required once the filter is in place; simply install the filter and apply power, and the H5 will automatically configure to the system and begin working toward near-unity power.

When a nonlinear current is demanded, as with variable frequency drives, the H5 uses a state-of-the-art high speed digital signal processing (DSP) controller for virtual real-time correction. This feature also allows the filter to control the synchronization of the current and voltage waveforms, resulting in the H5's continuous attempts to achieve unity power while never allowing for leading power factor.

Harmonic currents cannot overload the H5, and additional modular units can be added—in-line or parallel—to increase correction capability. By choosing the H5 active line conditioner as your harmonic-mitigation solution, your system will maintain:

- A time division duplexing (TDD) reduction to 5% or better at full load.
- A power factor correction to less than or equal to .98 lagging.
- A response time of less than 8 ms to step-load changes.
- Harmonic cancellation to the 50th harmonic.

If you'd like more information on how the TCI H5 active line conditioner can help you achieve optimum system efficiency, the sales engineers at McNaughton-McKay are always ready to help.



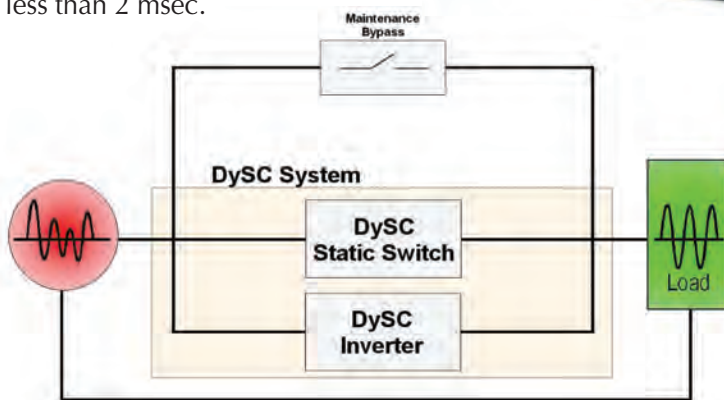
## GridAlert Gives You Immediate Power Event Notifications

Disruptions in voltage, current, or frequency can wreak havoc on your productivity and profit. GridAlert, the latest update in the iGrid program from SoftSwitching Technologies, allows you to receive immediate event notifications, monthly and quarterly summary reports, and corroboration reports to identify and resolve operations impacted by dirty power.

GridAlert event notifications, with or without the DySC battery-free UPS, can help you diagnose and reduce or eliminate power-related downtime. The DySC protects critical processes from downtime due to sags as well as prevents the sag/inrush condition that can shorten the life of your automation systems. Since the DySC platform doesn't run on batteries, it is 99% energy-efficient and has no maintenance requirements.

Consider the following facts:

- High-speed detection (pVdT)—Power quality requires fast detection. The DySC's proprietary power DSP monitors the line at over 3,500 samples per second to detect any power deviations in less than 1 msec.
- High-speed response (pVrT)—Sustaining a sinusoidal output requires fast response time. The power DSP allows the DySC to detect and correct voltage in less than 2 msec.



- Adaptive frequency management (aFM)—This fluctuates constantly. The aFM algorithm allows the DySC to compensate for fluctuations.
- True sinusoidal reconstruction (tSR)—The power DSP monitors the utility power and controls the DySC to compensate for voltage sags, as well as reconstructs a true sinusoidal output.

The DySC platform is manufactured in the United States, and comes in a wide range of voltage and amperage (12 amps to 2,400 amps) to best suit your needs.



## Belden VFD Cables Improve Performance in Harsh Environments

Belden variable-frequency-drive cables offer superior construction for easier installation, lower costs, and improved performance in harsh environments. Designed specifically for AC motor-drive applications, VFD cables carry power from the AC-drive systems of a wide range of manufacturers to various AC motors.

The Belden VFD cable series of 1,000-V UL flexible motor-supply cables with ER (exposed run) and tray-cable approvals includes XLPE (cross-linked polyethylene) insulation and foil/braid or copper-tape shielding. These features allow the cables to withstand harsh operating environments with high voltage spikes, high noise levels, and adverse environmental conditions where standard tray cables would fail. These highly shielded VFD cables protect surrounding equipment and instrumentation from radiated noise. Available in gauges from 16 to 4/0 AWG, Belden VFD cables are extremely reliable; in addition they are less costly and easier to install than metal-clad cables or lead wire in conduit. Belden also offers VFD products with an additional signal pair for brake or other applications.

### The Challenge of VFD Applications

VFD cables must handle not only the overall high power levels of pulse-width modulated (PWM) signals, but also the extremely high voltage that can occur when standing waves develop on the conductors. This high voltage can create corona discharge between the conductors of conventional cables, damaging not only the cabling itself, but also the motors, bearings, drives, and related equipment. In turn, this damage can cause failure of the entire drive system, resulting in costly production downtime.

### Limitations of Conventional VFD Cables

In addition to being susceptible to failures due to corona discharge and adverse environmental conditions, conventional VFD cabling is difficult and expensive to install. Armored

◆ Continued on next page

## Belden VFD Cables Improve Performance in Harsh Environments

◆ Continued from previous page

cable and lead wire in conduit are cumbersome and heavy, and they require extremely large installation bending radii, making installation both time-consuming and labor-intensive. Yet they still do not solve noise and corona-discharge problems, and they do not effectively address the high levels of noise generated by VFDs.



### The Belden Solution

Belden's VFD cables feature industrial-grade XLPE insulation, which offers more stable performance than traditional PVC. The thicker XLPE insulation produces lower capacitance within the cable, enabling longer cable runs, reducing the likelihood of corona discharge, reducing the magnitude of standing waves, and increasing power-transfer efficiency.

Belden conductors are high-strand tinned copper, which makes the cable more flexible for easier installation and better vibration resistance. Cable jackets are made of industrial-grade PVC that is both sunlight- and oil-resistant for longer cable life.

Belden offers its variable-frequency-drive cables in various standard lengths and armored versions and for encoder applications. Encoder cables help feed information regarding both the speed and the position of the rotor to the microprocessor. Now, with Belden's VFD cables being offered in a wider range of gauges, drive manufacturers have more options than ever before to choose sizes for specific applications.

Belden VFD cables can help reduce the costs and increase the reliability of your application.



## Zenwall 10 Provides Industrial Networking Solutions

Secure Crossing's Zenwall 10 is a rugged, compact embedded computer designed specifically for industrial applications. Because of its lower power consumption and fan-less operation, it gives you greater reliability and a longer system life.

The software design is perfect for network communication based applications, like an interconnect between SCADA and PLCs through the Internet. The Zenwall 10 provides real-time data access, a secure network gateway, and an SSL/VPN router. The Zenwall 10 can be used as a web-enabled simple GUI gateway for accessing, monitoring, and

performing control functions from any location.

The Zenwall 10 provides you with the following features:

- Intel XScale IXP-425, 533-MHz processor
- Onboard 128 MB RAM, 32 MB flash
- Dual 10/100 Mbps Ethernet ports
- Compact flash socket for mass-storage disk expansion
- PCMCIA supporting WLAN, GPRS, UMTS, HSDPA
- Hardware-level data encryption engine supporting AES, DES, and 3DES
- SSL, SSH, TLS security function
- Deep-packet inspection firewall, remote backup, SSL/VPN, protocol filter, IDS/IPS and router or transparent bridging function
- DIN rail or wall-mount installation

Zenwall 10 is the perfect choice for your network applications.



# Automation Fair Hospitality—Automation Roundup



In conjunction with Automation Fair 2008, McNaughton-McKay Electric cordially invites customers who buy our travel packages to the "Automation Roundup" on Wednesday, November 19, 2008 from 6:00 PM to 10:00 PM. The event is being held at the Wildhorse Saloon, Nashville's number-one dining and entertainment destination and a Mecca of entertainment in America. McNaughton-McKay is saddled up at the Wildhorse Saloon for a great Automation Roundup with the best employees, customers, suppliers, and entertainment!

McNaughton-McKay would like to thank our RA Automation Fair Hospitality Supplier Sponsors for their support of Automation Roundup.

Please be sure to visit these suppliers while attending Automation Fair 2007.

#### Gold Sponsors

- Hoffman Enclosures • Panduit Corporation • Ferraz Shawmut

#### Silver Sponsors

- Acme Electric • Datalogic Automation • Hirschmann Electronics • Spectrum Controls

#### Bronze Sponsors

- Amphenol Sine Systems • Belden • Brady Corporation • Cognex Corporation • Cooper Bussmann
- Cooper Crouse-Hinds • Fluke Corporation • Hubbell Wiring Devices • Post Glover Resistors • Powerohm Resistors
- Roxtec Inc. • Soft Switching Technology • Thomas & Betts • Trans-Coil Inc • Wittenstein, Inc.



[www.mc-mc.com](http://www.mc-mc.com)

#### Corporate Officers:

Donald D. Slominski, Jr., *President and CEO*  
Jack McNaughton, *Executive Vice President, Chief Operations Officer*  
Richard M. Dahlstrom, *Executive Vice President, Sales and Marketing*

#### Corporate Vice Presidents:

Gregory H. Chun, *Vice President, Information Technology*  
Kathleen M. Gollin, *Vice President, Human Resources*  
John D. Kuzmanski, *Vice President, Finance*  
Scott Sellers, *Vice President, Operations*

**Ann Arbor, MI:** 4670 Runway Blvd., Ann Arbor, MI 48108  
(734) 995-9515, WATS (800) 392-3808; Marc Kuiper, *Regional Operations Mgr.*

**Carrollton, GA:** 102 Cable Industrial Way, Carrollton, GA 30117  
(678) 291-1100, WATS (800) 244-9516; Helen Sampson, *Operations Manager.*

**Cartersville, GA:** 329 Industrial Park Road, Suite B, Cartersville, GA 30121  
(770) 248-3930, WATS (800) 244-5837; Chuck Paige, *Operations Manager.*

**Charleston, SC:** 464 Deanna Lane, Charleston, SC 29492  
(843) 856-7700; Doug Cooper, *General Manager.*

**Charlotte, NC:** 4527 Dwight Evans Road, Charlotte, NC 28217  
(704) 527-6555, WATS (800) 521-0917; Chris Majni, *General Manager.*

**Columbus, OH:** 2255 CityGate Drive, Columbus, OH 43219  
(614) 476-2800, WATS (800) 837-3392; Bill Parsons, *General Manager.*

**Covington, GA:** 9120 Old City Pond Road, N.E., Covington, GA 30014  
(678) 291-2420, WATS (800) 273-3928; Fred Fisk, *Branch Manager.*

**Defiance, OH:** 188 Fox Run Drive, Defiance, OH 43512  
(419) 784-0295, WATS (800) 695-0295; James W. Drewes, *Branch Manager.*

**Fayetteville, NC:** 830 Tom Starling Road, Fayetteville, NC 28306  
(910) 307-7380; Tim Curtis, *Branch Manager.*

**Findlay, OH:** 1950 Industrial Drive, Findlay, OH 45840  
(419) 422-2984, WATS (888) 296-2984; Timothy J. Krucki, *Branch Manager.*

**Flint, MI:** 1011 East Fifth Avenue, Flint, MI 48503  
(810) 238-5611, WATS (800) 383-0945; Marc Kuiper, *Regional Operations Mgr.*

**Gastonia, NC:** 1408 Castle Court, Gastonia, NC 28052  
(704) 853-2444; Chris Majni, *General Manager.*

**Greenville, SC:** 35 Old Mill Road, Greenville, SC 29607  
(864) 281-0572, WATS (800) 537-4855; Chris Majni, *General Manager.*

**Hebron, OH:** 107 Capital Drive, Hebron, OH 43025  
(740) 929-2727, WATS (800) 686-3626; Jeff Robinson, *Branch Manager.*

**Madison Heights, MI:** 1357 E. Lincoln Avenue, Madison Heights, MI 48071; 1401 E. Lincoln Avenue, Madison Heights, MI 48071  
(248) 399-7500, WATS (800) 572-5033; Marc Kuiper, *Regional Operations Manager.*

**Mansfield, OH:** 1733 Nussbaum Parkway, Mansfield, OH 44906-1909  
(419) 529-4400, WATS (800) 589-2547; Bill Parsons, *General Manager.*

**New Bern, NC:** 1000 Newman Road, New Bern, NC 28562  
(252) 633-4929; Tim Curtis, *Branch Manager.*

**Norcross, GA:** 6685 Best Friend Road, Norcross, GA 30071  
(770) 825-8600, WATS (800) 353-6225; Bryan Hays, *General Manager.*

**Savannah, GA:** 165 Knowlton Way, Suite 101, Savannah, GA 31407  
(912) 963-0011; Jim Willis, *Branch Manager.*

**Spartanburg, SC:** 9115 Warren H. Abernathy Road, Spartanburg, SC 29301  
(864) 574-0350, WATS (800) 922-9789; Chris Majni, *General Manager.*

**Toledo, OH:** 355 Tomahawk, Maumee, OH 43537  
(419) 891-0262, WATS (800) 695-0262; Timothy J. Krucki, *Branch Manager.*

**Wilmington, NC:** 6719 Amsterdam Way, Wilmington, NC 28405  
(910) 392-5600; Tim Curtis, *Branch Manager.*

#### Subsidiaries:

**Mc-Mc GmbH:** Am Zettachring 8A, 70567 Stuttgart, Germany  
Tel, +49 (711) 7287-3390, Fax +49 (711) 7287-338; Matthias Kistler, *Business Manager.*

#### S&D Service & Distribution GmbH:

Bischofstrasse 113, D - 47809 Krefeld, Germany  
Tel (from US): 011+49/2432/8913-0 Fax (from US): 011+49/2432/8913-22  
Werner Schuepfer, *General Manager.*

Industry types and concentrations vary by geographic region. To best serve customers, each McNaughton-McKay location tailors their inventory and product lines. Thus, not all products discussed in *NewsBytes* are available at all locations.

*NewsBytes* is published by McNaughton-McKay Electric Company. Articles may be reprinted without permission. Credit would be appreciated. All correspondence concerning *NewsBytes* should be directed to: Linda Thielholdt, Editor, 800-436-1267 e-mail [lindat@devlingroup.com](mailto:lindat@devlingroup.com)  
Please contact your local branch for subscription additions and deletions as well as all address changes.