

INSIDE

Training schedule	2
Dates for training and ECA meetings	
FAQs	2
Reverse feeding circuit breakers and Daros handles on exposed enclosures	
Supporting future engineers	2
CBI donates <i>Application Guides</i> to Pretoria University Students	
SABS recognises CBI	2
Recognition of a long association	
Factory tours	2
A busload of customers are treated to an action packed two-day tour of all three factories	
The Mustang and Mitsubishi Electric	3
Ford chooses Mitsubishi automation technology to build the legendary Mustang	
Bar none club	4
Over R30 000 of rewards	
CBI Switch SMS Promotion	4
Take advantage of great prizes	
Did you Know?	4
Most automation products have high altitude limitations	

EXHIBITIONS

■ **18 November**
Dakota electrical – Harrismith

A Nissan Hardbody could be yours!

Increase your chances of winning each time you purchase CBI Switch Advantage products!

See page 4 for more details.



CBI launches the QDC



The QDC is a dedicated DC circuit breaker, with an impressive maximum operating voltage of 125VDC per pole and is capable of interrupting a 20kA fault level. It is uniquely identifiable by its grey handle, and in a first for rail-mounted circuit breakers, it is available in current ratings from 100mA to 150A with a full spread of international and local approvals.

The QDC employs the well-proven and reliable hydraulic-magnetic principle of operation. The operating principle is advantageous to users, as the performance of the circuit breaker is not affected by ambient temperature. The circuit breakers are available in a 13mm width and offer installers and users considerable space savings. As a result of its compact design, operating voltage and interrupting capacity, it is set to revolutionise DC power distribution.

Telecommunications service providers in South Africa, Europe, North America and the Far East have

welcomed the introduction of this innovative and reliable product into the market.

Application expertise is provided at no extra cost in support of CBI's comprehensive range of DC products.

Contact

For more information call
Bradley Smith
Tel: +27 11 928 2325
Fax: + 27 11 392 2354
cbi@cbi.co.za
www.cbi.co.za



TRAINING SCHEDULE

For any further training requirements please contact Janos Toth on 082 560 6089, or jtoth@cbi.co.za.

■ 1 November
ESCOM/Council – Kimberley

NB: At the following ECA meetings CBI will be doing a CBI presentation on Definitions, Circuit breaker technology, Cascading and discrimination for the contractors attending. Please join us at these meetings if you are interested.

■ 22 October – Vaal Triangle
■ 3 November – Johannesburg
■ 8 November – Klerksdorp
■ 22 November – Ermelo



CBI donates Application Guides to Pretoria University Students

On the 29th July CBI lived up to its pledge to support future engineers by donating Application Guides to second year Electrical Engineering students at Pretoria University. 'The Application guide for the protection of LV Distribution Systems' authored by Viv Cohen has been prepared to guide all involved in either the design or application of electrical products in low voltage distribution systems.

Questions • Frequently Asked Questions • Frequently

Q Can I reverse feed my circuit breaker?

A According to paragraph 6.8.2.3 of SANS 10142-1:2003 Edition 1.1, "any deviation from the convention of connecting line to the top and load to the bottom of switchgear is not recommended. Reverse connection

is allowed only if:

- it is specifically allowed by the manufacturer
 - 'load' and 'line' are so marked that they are clearly visible during maintenance, and
 - any contradictory marking is not visible after installation"
- Clearly, for reasons of safety

and conformance to SANS 10142 as stated above, products suitable for reverse connection that are marked with Line (top) and Load (bottom) should, when reverse fed, be relabelled accordingly

Q Can I fit a Daros handle to an enclosure that is exposed to

nature's elements, without undermining the panel's IP integrity?

A The Daros handle kit is supplied with a rubber gasket, otherwise a gasket can be ordered on request. The rubber gasket should be fitted between the handle body and the panel door. This will ensure that the panel's IP integrity is maintained.

RECOGNITION OF A LONG ASSOCIATION

SABS recognises CBI

CBI's long association with the South African Bureau of Standards was recognised recently at the SABS 60th anniversary dinner held in Pretoria. The award for 50 years of loyalty, commitment and compliance to the SABS Mark scheme was presented to CBI's managing director, Helmuth Fischer, by Mr M Kuscus of the SABS.

The relationship between CBI and the SABS runs deeper than just years. CBI represents the SABS on the technical committees of the International Electrotechnical Commission (IEC) and has made a major contribution

towards developing international safety standards. Interestingly, there is a familial connection too. A Mr Wilkens, uncle of the first MD of Heinemann Electric (SA) Limited, one of the founding companies of CBI, was instrumental in setting up the electrical arm of the SABS and was also the inventor of the hydraulic-magnetic principle of operation used in most of CBI's circuit breakers.

Helmuth Fischer, on receipt of the award, said that his company looked forward to the next 50 years of close involvement with the SABS.

Ford chooses Mitsubishi automation technology to build the legendary Mustang



Ratigen, 26 January 2005. The Ford Motor Company, the world's third-largest auto manufacturer, is manufacturing the latest version of the legendary Ford Mustang with automation technology from Mitsubishi Electric.

Modular controllers, frequency inverter drives and interactive control panels from Mitsubishi Electric are being used to control the production of the car bodies at the Ford AutoAlliance International plant in Flat Rock, Michigan. Production of the latest successor of the Mustang began there in the autumn of 2004 - a total of eight million Mustangs have been sold since the classic sports car was first introduced in 1964.

The US branch of Mitsubishi Electric has been supplying controller systems for the plant ever since it was opened in 1986. For the current Mustang, Ford has opted for the latest and most powerful technology from Mitsubishi; System Q. This powerful MELSEC automation platform controls robot welding cells, body transfer stations and conveyors, and also supplies production data and con-

ducts error monitoring. A total of 120 System Q programmable logic controllers have been deployed in the ultra-modern factory.

In addition to this, 120 Mitsubishi A900GOT interactive touch screen panels are helping to bring more transparency to the production processes. For example, they automatically inform the staff when scheduled maintenance intervals are coming up, making it possible to utilise the plant to maximum capacity. Furthermore, over 100 frequency inverters from the FR-A500 series are also used to control body shop conveyors, elevators and transfer stations.

Fast and efficient production, without down time, is crucial for the success of modern automotive plants and both the plant management and Ford vehicles operations management are acutely aware of this. Based on this important design objective, an excellent past experience and products that met the exacting standards requested, the management teams chose Mitsubishi Electric's industrial automation systems for the production of the new Mustang.

Factory tours

Situated at the Southern tip of Africa and remote from the technical and industrial hubs of the world, it has always been necessary for CBI to manufacture most of the components, sub-assemblies and requisite tooling locally. The resulting depth of manufacture has afforded CBI full control over the quality of its products.

CBI now has a manufacturing plant located at the head office in Johannesburg and three assembly plants in Puthaditjaba, on the outskirts of Harrismith.

CBI recently held two factory tours of all our factories for customers on a national basis. The busload of customers are treated to an action packed two-day tour of all three factories and in between a fantastic evening of entertainment at the relaxing Mont-Aux-Sources Hotel.

Tours of our factories have always been a big 'eye-opener' for our customers and have definitely added insight to their understanding of all that goes into the manufacturing and assembling processes.





WIN

a Nissan Hardbody

Buy Today, Fax Today, Win Today

CBI has awarded Bar None rewards of over R30 000

In August the rewards included a Fridge freezer combo, microwaves, tumble dryers, blenders, weber portable braais, so send Min your booklets and claim your slice of the Bar None pie.

Remember to enter for the Bar None SMS promotion and you could stand a chance of winning a Nissan Hardbody.



If you are an electrical contractor and would like to win weekly prizes, plus a chance to drive away in a Nissan Hardbody worth R150 000, spend R500 or more on CBI Switch Advantage products.

Simply fax a copy of your invoice to 086 615 0113!

It's that simple, so take advantage now!

These are some of the lucky customers who have already entered and won great weekly prizes such as DVD Home theatre systems, digital camera's, MP3 players, 4x4 courses and more!

WEEK 1 (top). Hendrik Swanepoel, H&S Electrical, receiving his GPS system

WEEK 2 (above). The MP3 player and USB went to Graham Harris of Reform Electrical.

WEEK 3 (right). Dustin Bye from Elektriese Ontwikkeling was lucky enough to walk away with the DVD Home Theatre system!

DID YOU KNOW?

Did you know that most automation products have high altitude limitations?

The maximum altitude is usually 1000 meters above sea level for Servo and Inverter products, for example. (Please refer to the exact product specification for full details).

With the use of electrical goods at higher altitudes there is a drop in the electrical

resistance of air, since the density of the air is less at these high altitudes.

For inverters and servos the de-rating of the power and the input voltage must be considered for these devices in high altitude applications.

Please consult CBI Automation when you have such applications.