



Global Certification Scheme Smooths the Path for Electrical Equipment

Chris Agius, Secretary IECEX Scheme

The growing emergence of a single global certification scheme for equipment used in hazardous environments such as oil refineries, grain storages and underground coal mines is great news for world-wide manufacturers of electrical equipment destined for those industries.

In the past they have had to work their way through a convoluted maze of country-by-country requirements in order to get essential electrically powered equipment installed into the hazardous areas of their workplaces.

Now the International Electrotechnical Commission, which was formed in 1906, has developed a single global Certification Scheme covering Electrical equipment for use in explosive atmospheres (commonly known as Ex equipment). This scheme now covers a global area of nearly all major industrial countries and involves a relatively straightforward process that includes the issuing of a Test Report by an accredited testing and certification body, combined with a Quality Assessment Report (which is designed to assess and audit a manufacturer's quality system). On-going surveillance of the production process is also an essential component of the scheme and ensures that the equipment being produced complies with internationally recognised explosion protection standards.

With the globalisation of manufacturing and the need to meet stringent safety requirements (particularly for entry into EU, USA and Australia) the advent of this Scheme has now enabled products with IEC Ex Certificates of Conformity that are manufactured

in a particular country to be readily sold and delivered to clients in another country. This can now be done without the costly and time-consuming requirement of re-testing and re-certification of the product.

Some countries have specific regulations for the installation of products in such areas as underground coalmines, and this global scheme provides a "fast-track" arrangement to enable compliance to be speedily determined.

| Country | Certifying Body | Country | Certifying Body |
|---------------------|-----------------|-------------------------------|-----------------|
| Australia (AU) | SIMTARS | Hungary (HU) | BKI |
| | TestSafe | | |
| Canada (CA) | CSA | Korea (KR) | KGS |
| | | | KOSHA |
| Germany (DE) | EXAM | Norway (NO) | NEMKO |
| | PTB | | |
| | TUV Nord | | |
| Denmark (DK) | UL/DEMKO | Russia (RU) | NANIO CCVE |
| France (FR) | LCIE | Sweden (SE) | SP |
| United Kingdom (GB) | Baseefa | Slovenia (SI) | SIO |
| | Intertek | United States of America (US) | FM |
| | SIRA | | UL |

TestSafe Australia is a strong supporter of the IECEx Scheme and while accredited as a Testing and Certification Body within Australia, it is also a prominent member of a network of certification bodies worldwide that have been approved to operate the Scheme.

It is accepted that ISO 9001 provides a universal model set of requirements for all quality management systems. Likewise IECEx has aligned its quality system with those of ISO9001, but has also included requirements that are specific to the production and manufacture of Ex products.

Lighting gets Australian safety approval from UK

'Engineering Talk' - Company news from SIRA, United Kingdom



'The reciprocal agreement that exists between Sira Certification Service in the UK and TestSafe Australia has enabled Birmingham-based lighting manufacturer, PFP to obtain Australian Certification for their Series 7 AS hazardous area lighting product range.'

As part of this agreement Sira Certification Service conducted assessment and testing to the appropriate Australian Standards, the findings were reported to TestSafe Australia providing them with the necessary technical justification required for certification. The certificates have been issued to Thorn Lighting, who market the Series 7 AS in Australia. Sira handles the hazardous area certification of all nine PFP lighting products and recently issued ATEX Certification for the European version of the 7 AS Range.

Quality and Development Director Geoff Nicholls explains, "We find Sira easy to deal with and flexible, they always helps us to achieve our objectives. In this instance, we had to undertake some modifications to the product to meet the different requirements of the Australian Standards, and Sira helped to guide us through that process."

As a result of successfully obtaining Australian Certification, PFP has also applied for approval to Brazilian Standards, providing Sira reports as technical justification. PFP's Petrel range of Sira certified ATEX products consists of 8w, 18w, 36w, 58w and 70w single or twin fluorescents and includes emergency luminaires up to 58w. Compact fluorescents are also included and the complete range is now certified to Australian Standards through Sira Certification Services and TestSafe Australia. Sira Test and Certification Ltd has produced a free wallchart about equipment for use in potentially explosive atmospheres.