



Accredited quality for colorimetric quantities

As a premiere at the Light + Building 2018 trade fair, Instrument Systems will be presenting its light measurement solutions of accredited quality for colorimetric quantities, with unique measurement accuracy and future-proof service.

Munich, January 2018 – Since 2009 Instrument Systems has received accreditation to DIN EN ISO / IEC 17025 for photometric tests and now offers its certified measurement solutions with the flexible scope of application of Category III. Customers are thus assured of the security of their long-term investment. Recently the company's test laboratories were also accredited to ISO 11664 for the measurement of colorimetric quantities. For determining the latter, Instrument Systems offers measurement solutions with a uniquely high level of accuracy. At Light + Building 2018 in Frankfurt visitors to Stand 4.1/ K89 will be able to experience large-format measuring stations for spectroradiometric and photometric measurement tasks. In combination with the ISP 2000 integrating sphere the CAS 140D high-end spectrometer is ideal for the highly accurate measurement of correlated color temperature CCT and the color rendering index CRI.

The accreditation of test laboratories is enormously important for photometric technology customers. They can be certain that their measuring instruments deliver reliable and traceable results. Following certification of the measuring equipment often used in production, the final products achieve a higher quality and generate greater confidence among customers. With the new Category III "flexible scope accreditation" the Instrument Systems test laboratories can apply new testing and examination methods within the accredited range in the existing portfolio and refer to these as accredited procedures. The accredited quality of Instrument Systems is thus future-proof, for even in the event of reissue of standardized test procedures they can be applied immediately.

In the light of the increasing importance of the assessment of color stimulus, the test laboratories of Instrument Systems have also been accredited to ISO 11664 for colorimetric quantities. This international standard permits the comparison of chromaticity values at different times and at different places. The Instrument Systems measurement solutions determine colorimetric quantities with unsurpassed measurement accuracy. The traceable measurement uncertainties are only ± 0.0015 on the standard chromaticity coordinates of white LEDs and are reliably estimated using state-of-the-art validated Monte Carlo calculations.

Further application setups at the Instrument Systems stand are devoted to the following current topics:

(1) Energy-efficient lighting solutions in buildings call for highly accurate and speedy testing of medium-sized LED modules according to the EU Ecodesign Directive. Instrument Systems presents its LGS 1000 goniophotometer that enables extensive ErP tests for generating test reports with an add-on module of the established SpecWin Pro software.

(2) A live demonstration of the calculation of the unified glare rating will be provided using the smaller LGS 350 goniospectroradiometer, with which the angle-dependent spatial radiation properties of small to medium-sized SSL luminaires and LED modules can be determined. At this measuring station visitors will also have an opportunity to test the new DSP 200 photometer for ultrafast "on-the-fly" measurements of spatial light distribution.

(3) With the stray light corrected CAS 140D Instrument Systems – as a technical pioneer
– is the first to offer an array spectrometer that can reliably assess the blue light hazard from light sources within the prescribed limiting values.

The sales engineers of Instrument Systems will be demonstrating measurement solutions at Light + Building, Stand 4.1 / K89.

Further product information can be found at the website of Instrument Systems:

www.instrumentsystems.com



Figure 1: The ISP 2000 integrating sphere combined with the CAS 140D is ideal for measurement of the correlated color temperature CCT and color rendering index CRI.

Company portrait of Instrument Systems GmbH

Instrument Systems GmbH, founded in Munich in 1986, develops, manufactures and markets all-in-one solutions for light measurement applications. Its core products are array spectrometers and imaging colorimeters. The company's main fields of activity are LED/SSL and display metrology, spectral radiometry and photometry, where today Instrument Systems is one of the world's leading manufacturers. The Optronik line of products for the automotive industry and traffic technology is developed and marketed at its Berlin facility. Since 2012 Instrument Systems has been a wholly-owned subsidiary of the Konica Minolta Group.

For further information or photos / illustrations:

Dr. Karin Duhnke, Instrument Systems GmbH Tel. +49 (0)89-45 49 43-426 Fax. +49 (0)89-45 49 43-11 E-mail: <u>duhnke@instrumentsystems.com</u> www.instrumentsystems.com

File copy requested to: Instrument Systems GmbH, Dr. Karin Duhnke, Neumarkter Str. 83, 81673 Muenchen