Don't Get Weighed Down With Inferior Load Cells

Oil, gas and offshore companies in particular are constantly striving to be more cost effective and energy efficient, while constantly trying to minimize downtime. The results are in: more and more companies need reliable and often customized solutions to solve their processes. Eilersen Electric A/S specializes in offering both robust weighing systems and customized weighing solutions based on the patented digital load cell technology.

Eilersen today is the leading supplier of digital weighing solutions, which offers many applications related to the oil and gas industry. Among their diverse boutique of industrial offerings and these products provide full connectivity with PCs, PLCs, MES and ERP systems. The company also offers a complete range of weighing terminals with software for standard weighing applications or with customised software developed by the company's in-house team of experienced engineers.

Trusted Worldwide

Since its foundation in 1969, the Eilersen companies in Denmark and Switzerland have been dedicated to the development, manufacture and supply of high quality robust industrial sensors based on capacitive technology for the measurement of force and weight. This worldwide patented technology are found among leading companies in more than 85 countries worldwide and the dedication to technology, development, quality, and customer support has led to a very high level of customer loyalty. The solutions which are particularly interesting for the oil, gas and offshore industries are their robust weighing solutions for installation in offshore applications (weighing P-tanks, water mist systems, force measurement and weight measurement of skids etc.)

plus many special applications for oil and gas such as center of gravity (COG) measurement, tank and vessel weighing, force measurement, and gravimetric level measurement.

Eilersen Digital Load Cells

All Eilersen load cells are developed, manufactured and individually calibrated at the Eilersen facilities in Denmark and Switzerland to ensure that the load cells are meeting the highest quality standards on the market. Eilersen load cells are produced in stainless steel and hermetically sealed (IP68/ IP69K) by laser welding to ensure superb waterproof protection for tough industrial applications. Furthermore, Eilersen load cells are available in capacities up to 500t. The load cells are based on a patented capacitive measurement principle where a robust ceramic sensor is mounted inside the load cell body.

Simple Electrical and Mechanical Installation

When working with an Eilersen load cell, the client can enjoy the benefits of easy electrical and mechanical installation. For example when reviewing the mechanical installation we see that mechanical overload protection devices are not necessary when installing the Eilersen load cells as the products are based on a measuring principle containing no moving parts while the ceramic sensor is not in contact with the load cell body - this patented principle allows overloads of up to 1.000% of the rated load cell capacity and tolerates very high sideloads, and torsion. This is an important cost and maintenance saver.

As for electrical installation the digital load cells feature true plug-and-play installation, as the load cells are pre-calibrated. This is an important feature in high capacity applications where it is difficult to find calibration weights, which saves a tremendous amount of time during commissioning. Also it's worth noting that the simple mechanical installation of the Eilersen load cells without overload protection devices ensures a trouble-free installation minimizing the need for maintenance.

Furthermore, a damaged load cell can be changed without the need for re-calibration.

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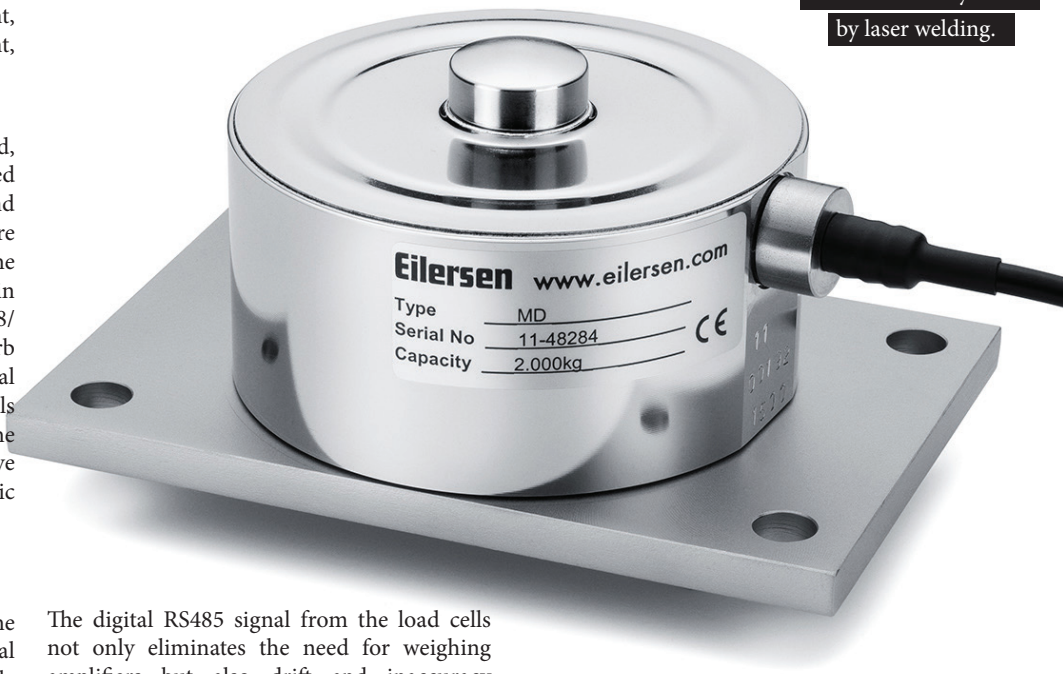


The digital RS485 signal from the load cells not only eliminates the need for weighing amplifiers but also drift and inaccuracy found in analog electronics as the complete measurement chain is digital. Especially for oil and gas applications, it's also important to note that the Eilersen digital load cells are equipped with a standard single wire coaxial cable (RG-58) and the cable length has no influence on the calibration. The load cells can be equipped with cable lengths of up to 100 meters and the load cell cable can be changed on-site if necessary. Optionally, the Eilersen load cells can be supplied with Mud resistant and Halogen free cables. Additionally, the digital signal from the load cells is insensitive to EMC.

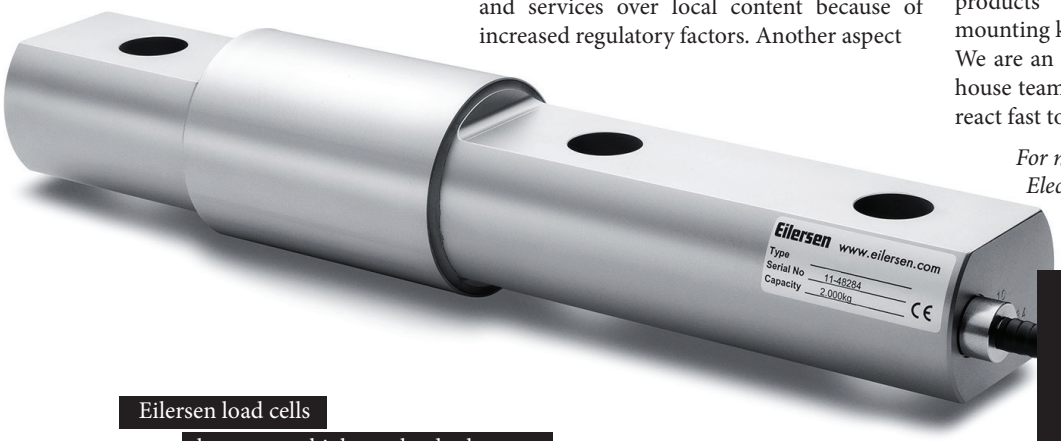
Certified for Ease of Mind

Finally, a developing trend being seen around the world is the prevalence of European style certification being used in developing economies. For example if we are speaking about major international oil companies operating in places such as the Caspian, West Africa and South East Asia, it's worth noting that these companies are opting to import European hazardous area certified products and services over local content because of increased regulatory factors. Another aspect of Eilersen's product portfolio is the prevalence of hazardous area certifiable products, in line with the high European regulatory bodies.

Using Eilersen digital load cells, one can be assured that they can be supplied in accuracies up to OIML C6 which is the highest on the market, and ATEX certified (zone 1, 2, 21, 22) versions while still offering a very high overload tolerance.

CEO, Mr. Frederik Eilersen adds, "The culture of innovation and high quality lives on in our company and we continue to invest heavily in new production technology and advanced calibration equipment. All product development is carried out in-house and our ceramic sensor manufacturing, product testing and assembly is also conducted here in Denmark. However most of the components in our products are manufactured by partner's world-wide under strict quality control and all final calibration is carried out here at our own facilities. The capacitive technology is unique and Eilersen load cells are far more accurate and robust compared to traditional analogue products and don't require mechanical mounting kits to protect them from overloads. We are an independent company and our in-house team of software engineers allows us to react fast to customer demands." •

For more information on how Eilersen Electric can support your operations please contact:



Eilersen load cells have a very high overload tolerance.

Eilersen
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