

Mettler-Toledo Redesigns C2 High-load Checkweighing Portfolio to Improve Productivity

Enhanced smarter design of checkweighing systems will help to lower Total Cost of Ownership, combat rising costs and time, provide weighing accuracy and future proof manufacturers' production lines

Giesen, Germany, UK. 25th September 2023 – [Mettler-Toledo Product Inspection](#) has redesigned its [C2 High-load Checkweighing portfolio](#), capable of weighing heavy loads of up to 35kg. The portfolio is positioned to help manufacturers combat rising costs, plus increase reliability and serviceability. This mechanical re-engineering applies to the Mettler-Toledo C21 StandardLine and C23 PlusLine checkweighing systems for precision weighing and completeness checks of packaged food, pharma, cosmetics and pet food products.

The primary objective behind the redesign is to boost productivity for manufacturers, and to better address the specific requirements of those seeking robust, reliable and cost-effective checkweighing solutions for heavy loads. C2 High-load checkweighers are typically installed at the end of the production line, where they perform quality assurance operations such as case completeness checks by verifying the presence of the correct number of bottles in a case. This addresses machine reliability and cost-effectiveness, which are key concerns for manufacturers.

Smarter Cost Management & Total Cost of Ownership: The newly re-designed C2 High-load Checkweighing portfolio, now better meets customer requirements, while also offering several additional benefits that lead to reduced run costs and enhanced performance. With a 50% reduction in motor power consumption, the new design brings significant energy savings, reducing operational expenses. Additionally, the portfolio helps minimise stock costs by reducing different wear parts by 50%, simplifying maintenance and improving inventory management thereby lowering Total Cost of Ownership (TCO). Integration with ProdX™ and Open Platform Communications (OPC) facilitates increased automation, reducing manual work and optimising overall costs.

Data & Digitalisation: ProdX™, data and quality management software from Mettler-Toledo, integrates data from multiple applications, devices and processes, enabling more informed decision-making. With a wealth of data related to quality control, contamination detection and package integrity, ProdX™ empowers manufacturers to optimise energy consumption, identify environmental influences and create predictive maintenance schedules, which enhances overall efficiency in the food industry. Its seamless integration with existing systems and applications opens up exciting possibilities for comprehensive data analysis and informed decision-making.

Increased Serviceability: The C2 Checkweighing portfolio's enhanced serviceability and design provide maximum efficiency and reliability. The system's easy and fast belt and roller replacement capabilities minimise downtime and maintenance efforts, helping to deliver uninterrupted operations. The reduced number of different wear parts also simplifies maintenance procedures and lowers operational costs. With an average three times higher bearing lifetime in the conveyor rollers, the system's reliability is significantly improved, helping to further enhance its overall performance.

Optimized Performance: The redesigned C2 Checkweighing portfolio excels in robustness and ease of cleaning, for optimal performance. Featuring an optimised frame design with fewer horizontal surfaces, the system enables easier cleaning and minimises dust accumulation, maintaining cleanliness and helping to comply with hygiene standards. This streamlined design enhances the efficiency and accuracy of the checkweighing process.

Consistently Precise Results: Reliability and accuracy are at the forefront of the C2 Checkweighing portfolio. The integration of the latest filter technology enhances the system's ability to deliver accurate and reliable weighing results, for quality control and compliance with stringent standards.

Sustained Support: Service support is also available with all product inspection equipment from Mettler-Toledo. With a global network of skilled service technicians and technical experts, Mettler-Toledo customers have access to prompt and reliable support whenever and wherever it's needed. Whether it's installation, training, maintenance,

calibration or troubleshooting, the dedicated service team supports customers to maximise their production uptime and equipment performance.

Future Proof Technology: The C2 Checkweighing portfolio also offers exceptional application flexibility. Designed to accommodate diverse product handling needs, the portfolio includes large conveyor sizes capable of supporting belt widths up to 600mm. This expanded capacity allows for the inspection of even larger products, providing flexibility and versatility. With a wide range of conveyor sizes available which are tailored to specific application requirements, the C2 Checkweighing portfolio can adapt to various product dimensions and configurations, facilitating seamless integration into production lines.

To meet different operational conditions, the C2 Checkweighing systems are available in both IP54 and IP65 designs, providing the necessary protection against environmental factors such as dust, moisture and other contaminants. This versatility enables the systems to thrive in a wide range of operating environments while maintaining optimal performance and accuracy.

"We are very excited to be announcing our redesigned C2 Checkweighing portfolio, which sets a higher degree of precision and efficiency in high load checkweighing. With enhanced accuracy and improved user-friendly features, the C2 series allows seamless integration into production lines while delivering reliable and consistent weight measurement," said Dirk Bettels, Senior Project Manager at Mettler-Toledo. *"We believe this enhancement shows our commitment to continuous innovation and providing our customers with the most advanced checkweighing solutions in the industry."*

The systems benefitting from this redesign are:

[The C23 PlusLine Checkweigher](#) – a compact and versatile solution for precise weight control of heavy loads. With its modular design and customisable features, it offers seamless integration in challenging environments. The checkweigher provides high accuracy, meeting Measuring Instruments Directive (MID) requirements and reducing product waste. Its intuitive operation, multi-language support, and clear machine messages enhance usability. Equipped with strain gauge technology and supported by a global service network, the C23 PlusLine delivers reliable and scalable performance.

Connectivity options for IoT and Industry 4.0 initiatives enable real-time data access and analysis. Overall, the C23 PlusLine combines accuracy, flexibility and reliable performance for optimal checkweighing operations.

[The C21 StandardLine Checkweigher](#) – a robust solution designed for heavy loads, offering seamless integration into any production line. With its user-friendly operation and clear machine messages, it provides efficient and easy operation, requiring minimal training. The checkweigher has various connectivity options, allowing effective data communication for centralised system control. Its robust design, powered by the Mettler-Toledo strain gauge weighing technology, delivers accurate weighing results. The C21 StandardLine is a cost-effective choice for end-of-line completeness checks, providing reliability and accuracy for product weighing and simple MID-approved checkweighing applications.

To learn more about these products, please click [here](#) or visit www.mt.com/cw-c2series-pr

About METTLER TOLEDO

METTLER TOLEDO is a global manufacturer of precision instruments and a service provider. The company ranks highly in a number of market segments and is a global market leader in many areas. METTLER TOLEDO is a large provider of weighing systems and analysis instruments for use in laboratories and in-line measurement within demanding industrial and food production processes.

The Product Inspection division of METTLER TOLEDO designs stand-alone and fully integrated automated inspection technologies to help food, pharma, chemical and other non-food manufacturers boost productivity and improve product quality and safety. The division includes METTLER TOLEDO Safeline Limited, manufacturing metal detection solutions that automate essential processes and reduce recall risks. Safeline X-ray inspection designs x-ray technologies that go beyond contamination detection to help improve product quality and enhance brand protection. Garvens and Hi-Speed Checkweighing provide advanced precision weighing technologies to reduce costly overfills and improve production line efficiency. CI-Vision designs label inspection solutions to detect label defects, thereby reducing the risk of rework and product recalls. PCE Track & Trace solutions help pharmaceutical manufacturers to support compliance with innovative, automated and proven technology. For food manufacturers, data management software ProdX™ monitors all product inspection data in real-time to digitalize food safety compliance.

In summary, METTLER TOLEDO smart product inspection solutions help manufacturers to boost productivity and offer consistently high product quality and safety, thereby working to protect consumers, and the brand reputation of manufacturers as well as their products.

For more information, please visit: www.mt.com/pi-pr