Avery Weigh-Tronix

ZM223
Checkweigher System

Checkweighing

Solutions for food processing
and beyond

Robust, accurate checkweighers

Built to meet the fast-paced demands of the food industry

The NSF approved ZM223 Checkweigher is the latest innovation in checkweighing from Avery Weigh-Tronix. Featuring IP69K food-grade, stainless steel construction, an easy to view color-changing backlight aids the operator to quickly identify when the weight is in the required accept weight window.

Designed for speed and efficiency, the ZM223 Checkweigher comes with a wide range of dedicated checkweigher apps programmed, including stats packages to help meet your full process requirements and maximize performance and profitability while meeting the strictest legislative requirements.
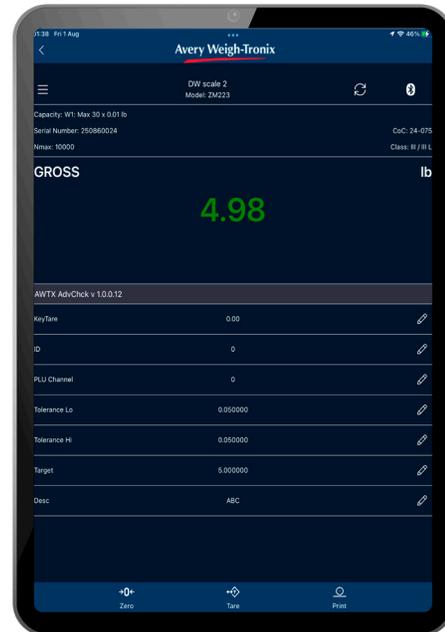
ZM223 Checkweigher Features

- Certified by NSF to NSF/ANSI Standard 3-A
- P69K washdown stainless steel enclosures
- Remote Assist™ Mobile App to help view data from a distance and allow fast indicator setup
- 5000d NTEP (3000d OIML) approved
- Rounded corner design minimizes food trap areas
- Rugged bases with up to 500% overload protection
- Larger HTN display with 1.5" (38 mm) high digits and color-changing backlight (Green, Red and Orange)
- Multi-connectivity; RS232, Ethernet, USB, Bluetooth and Wireless
- Stabilizes in less than half a second, much faster than an operator can work.
- AC or battery powered when used with external ZQ-BAT option
- Several applications pre-installed
- PLU storage
- ID user control
- Web browser control to allow supervisors to view live weight and make key parameter change from a distance
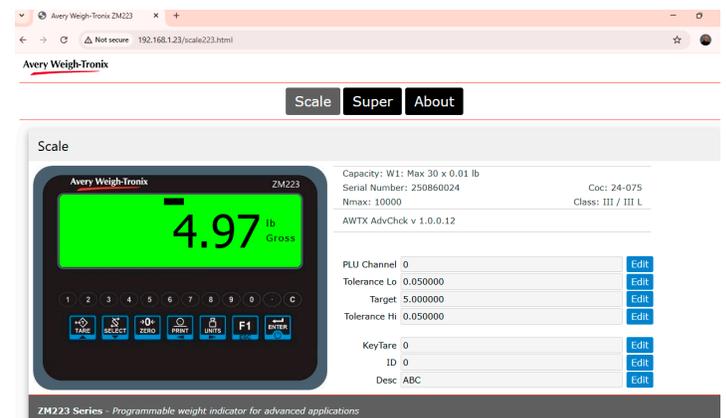
Remote assist™ mobile app

The ZM223 Checkweigher can be configured to suit your business process, from fast and simple standalone checkweighing, to PLU controlled statistical data collection devices.

When using the Free Remote assist Bluetooth tablet app alongside a ZM223 checkweigher, this can provide a supervisor or quality inspector the ability to view live weight of a scale from a distance, view or adjust the scales check parameters remotely and provide the ability to upload stored weight data files without stopping or slowing down the operator to retrieve it.

Web browser page

The ZM223 Checkweigher has the ability to display its own web browser page to allow data to be seen from any PC on the same network. Perfect for full visibility of a line's performance.

Sanitation and hygiene

When it comes to the food processing industry, hygiene is paramount. Certified by NSF to NSF/ANSI Standard 3-A, the ZM223 Checkweigher has been specifically designed to meet the needs of this demanding environment:

IP69K rating

A durable, stainless steel, IP69K rated enclosure and base ensures that this product is completely resistant to dust and water ingress, making the ZM223 ideal for use in high pressure and heavy washdown applications.

Hygienic enclosure

We recognize that good hygiene is vital to business success in the food industry. In line with USDA and other sanitation and hygiene standards, this NSF certified piece of equipment guarantees hygiene safety at all times. The ZM223 Checkweigher has been designed for ease of cleaning. A smooth pickled and polished surface finish helps to stop microorganisms from growing on the surface of the scale. Curved corners and the easy-to-remove cover make thorough cleaning simple, fast and effective, minimizing food trap areas where bacteria could thrive. All threads are hygienically covered with domed nuts to aid and speed up cleaning processes.

Easy to remove base cover for thorough cleaning

IP69K breathable cable gland

In food applications, checkweighers may be subject to rapid temperature change, whether due to operating conditions or washdown procedures. Extremes of temperature inside and outside the enclosure can result in expansion and contraction of gases, which in turn can lead to moisture and humidity becoming trapped inside. To avoid this issue, the Avery Weigh-Tronix IP69K certified ZM223 Checkweighers are fitted with a specifically designed breathable cable gland, which allows the checkweigher to breathe without compromising the IP69K enclosure. This industrial food grade technology guarantees no down time due to water ingress.

Two rugged IP69K base designs

The ZM223 Checkweigher is available in a range of capacities, two base sizes and three column sizes.

Low capacity: Torsion Base

Able to withstand up to 500% shock loading, our breakaway load transfer system helps to guarantee accuracy and reliability at all times. This specialized base automatically transfers shock loads and overloads away from the load cell back to the base frame, ensuring that the scale's accuracy and performance is not affected. Unlike other designs used to reduce shock loading, this food grade stainless steel design offers a clean and uncomplicated solution that is fully NSF certified and washdown resistant.

High capacity: Diamond Base

Torsion base features 500% shock loading protection
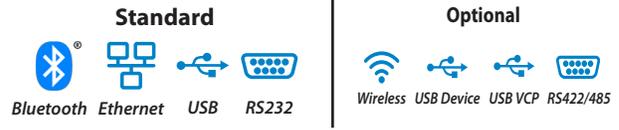

Torsion Base

The IP69K Diamond Series Base has set a standard for high performance. With 150% overload protection, this tough and dependable design is low maintenance, with an extremely reliable single load cell design and no moving parts.

Diamond Base

Muliti-Connectivity

Offering the advantage of the built-in interface, Ethernet 10/100, USB , RS232, Bluetooth or HTTPS cloud base data collection, the indicator is ideally suited for sharing information, giving you all you need for complete data management and process control. Available with Ethernet and USB connectivity as standard, the ZM223 Checkweigher can be hard-wired in to the indicator or through an optional washdown USB or Ethernet gland to allow a fast and simple option for disconnecting the cable prior to cleaning. Wireless option For fast, efficient data transfer, ease of cleaning and the ability to remove all unwanted cabling, the ZM223 Checkweigher offers a wireless option with a 200 ft (60 m) workable distance between receivers subject to working environments.

Standard

Bluetooth   Ethernet   USB   RS232

Optional

Wireless   USB Device   USB VCP   RS422/485

USB with optional waterproof gland

Ease of use

Display visibility

The ZM223 Checkweigher features a highly visible, low power draw HTN 1.5" (38 mm) high digit display with configurable color changing backlight display. This display offers ease of viewing in all lighting conditions, from direct sunlight to low lit areas. This easy to read display has a 13-segment checkweigh bargraph along with a color changing backlight to provide quick visual identification when the scale is in the under/overweight or accept weight bands providing the operator with a fast visual indication when the product weight is getting close to the required acceptable target tolerance. This visual display can be reinforced by an external audible alarm, resulting in an incredibly user friendly, yet highly accurate piece of equipment.

Simple operation, powerful capabilities

The ZM223 Checkweigher can be configured to suit your business process, from fast and simple stand-alone checkweighing, to PLU controlled statistical data collection devices. The ZM223 Checkweigher features three levels of authorization, allowing the supervisor to quickly lock down keys and functionality to specific operators or open it up to allow access to other functions of the ZM223 Checkweigher.

Backlight color along with checkweigh bargraph, helps the operator to quickly identify when the weight is in the accept weight window

Applications

Designed to be efficient and simple to use, the ZM223 Checkweigher can be set up in a number of different ways:

Quick check setup

A fast and efficient way to quickly setup a simple production line at the touch of a single button, using a known target sample weight and pre-programmed under and over limits.

Entered target limits

Target tolerances can quickly be entered through the indicator front panel or changed directly from the Remote Assist™ Mobile App or web browser page

Positive and negative checkweighing

Designed to work in a number of different ways to help maximize efficiencies within the production line, the ZM223 Checkweigher has the functionality for both positive and negative checkweighing and displaying in both ± the target deviation or just in Gross/Net weight.

Percentage weight gain program

Ideal for use alongside any brine water injection machine for spot checking and tracking the actual percentage weight gain of the meat that passes through the brine water injection machine.

Meat grading program

Suitable for any fast moving cutting floor to help provide a fast visual aid to the operator when grading meat cuts by weight. Band-accumulated transaction can also stored and easily viewed from the web browser or Remote Assist™ Apps.

Statistical data packages

The ZM223 Checkweigher offers you complete visibility of weighing data, with a range of statistical data packages built into the scale. This helps monitor and control process line efficiencies directly on the line or via feedback to a central PC database.

Target weight PLU storage

The ZM223 Checkweigher has the ability for over 500 PLUs to store individual target weights, upper and lower tolerances, units of measure and other statistical data requirements to help speed up production line setup.

Remote setup

The ZM223 Checkweigher can also be remotely set up to receive target weights and tolerances for pack line consistency and to help speed up production line setup.

Standard deviation

Used to monitor and improve efficiencies or to record a list of data. For example: number of samples that were over, under or fell within the accept band; the average sample weight; the highest and lowest weight recorded and the overall standard deviation of that pack run.

X/R data collection

Ideal for quality control, the built-in software provides you with a standard X-bar data detailing changes in the mean or average over time, while the R chart shows how the range of the subgroup changes over time.

Custom statistical data

Outside the fixed statistical data packages provided within the ZM223 Checkweigher, a wide range of individual statistical information can be transmitted separately to meet most customers' requirements.

Programmable / configurable

The ZM223 Checkweigher is fully programmable allowing it to be customized to fully fit your process needs.

Alibi internal / memory data storage

The ZM223 Checkweigher comes standard with the ability to store and recall up to 100,000 Alibi weight transactions.

Check-Count

Allows you to checkweigh products by a required quantity of items.

```
RESET
0.300 LB
0.312 LB
0.310 LB
0.210 LB
0.510 LB

OVER = 0.010 LB
UNDR = 0.020 LB
ACPT = 0.300 LB

OVER = 2
UNDR = 1
ACPT = 2
AVG = 0.3284 LB
HIGH = 0.510 LB
LOW = 0.210 LB
SD = 0.110
CV = 33.5%  SS = 5

RESET
```

Options

Analog Output Option

RS422/485 Module

USB Device Card
Provides USB interface to PC

Watertight Gland
Ethernet or USB

Light Stack
Provides extra visibility to operator or supervisor. Mounts neatly to the side of the indicator stand.

USB Device Module

IP69K External Battery Pack
Mounts neatly inside column. Toggle on/off. Recharging takes place away from the scale to allow multiple batteries to be used.

WiFi Module

Geographic agency approvals

With Avery Weigh-Tronix, there's no need to worry about official approvals. The ZM223 Checkweigher has been approved for use in numerous locations across the globe.

NSF | NTEP | **Measurement Canada Approved** AM-5841C | OIML | CE | c UL us LISTED | IP69K | NOM

More online

- Technical specifications
- User manuals
- News and information

Avery Weigh-Tronix

www.averyweigh-tronix.com

Avery Weigh-Tronix is an ITW company