Value Each Gram A professional weighing products manufacturer and supplier

WHEEL WEIGHING INDICATOR XM6

User Manual

v.201811

HiWEIGH Weighing system & solution
An ISO9001 registered company
@No.335 Haishen, Xingxin Road, Huinan Town, Pudong District, Shanghai 201301, China

Value Each Gram

HiWEIGH
Weighing system & solution

Content

1. Product Introduction

Thanks for choosing HIWEIGH Axle Weighing System. This system is based on the WIM (Weigh-In-Motion) technology and NTEP (from National Conference on Weights and Measures) standard.

WIM (Weigh-In-Motion) is the top technology in weighing field. We have long been engaged in research, development and production of the axle load WIM system. We are one of the few firms who have the intellectual property right of their own. This system is more reliable with high accuracy and can be used in portable vehicle scales and other axle load WIM systems.

The National Conference on Weights and Measures from United States of America issues an NTEP Certificate of Conformance following successful completion of an evaluation of a device. It indicates that the device(s) described in the Certificate is/are capable of meeting applicable requirements of the NIST Handbook 44.

Please read and understand this manual thoroughly before using the system and in case of any problem, please contact our local distributor for technical support.

2. Features

- For Static Weighing & In-Motion Weighing.
- High-definition Touch Screen.
- High speed thermal Printer.
- Standby working 40 hours battery with auto switch off function.
- Unlimited Records stored.
- Running on Windows CE 6.0 system with good compatibility.
- FREE Program upgrade.
- 2 Channels system as default.
- 4 / 6 / 8 channels system are optional.
- RS232, USB 2.0 as default (on Wireless edition USB 2.0 & Wireless as default). Blue tooth & USB 3.0 are optional.
- 10 meters working distance for wireless version.
- Each Wheel Weight.
- Each Axle Weight.
- Total truck weight.
- Excel file, Text file or Database file output.
- Multiple Languages Supported (English as default but other languages are optional if required)
- SMS message, iOS application, Android application are optional.
- 3G/4G network support is optional before order.

3. Main Technical Index

(1) full-scale temperature coefficient: 5ppm/℃

(2) Sampling speed: 200times/sec

(3) The speed of display renewal: 12.5times/sec

(4) System non-linearity ＜0.01%

(5) Impulse source of sensor: DC 5V±2%

(6) Operating temperature range: 0℃--40℃

(7) Power supply sink (without the sensor): 70mA (no printing and no back lighting), 1000mA (printing)

4. Operation

A. Start System

Please turn on the Power Supply Unit first.

Then switch on the system.

LOAD CELL CONNECTION:

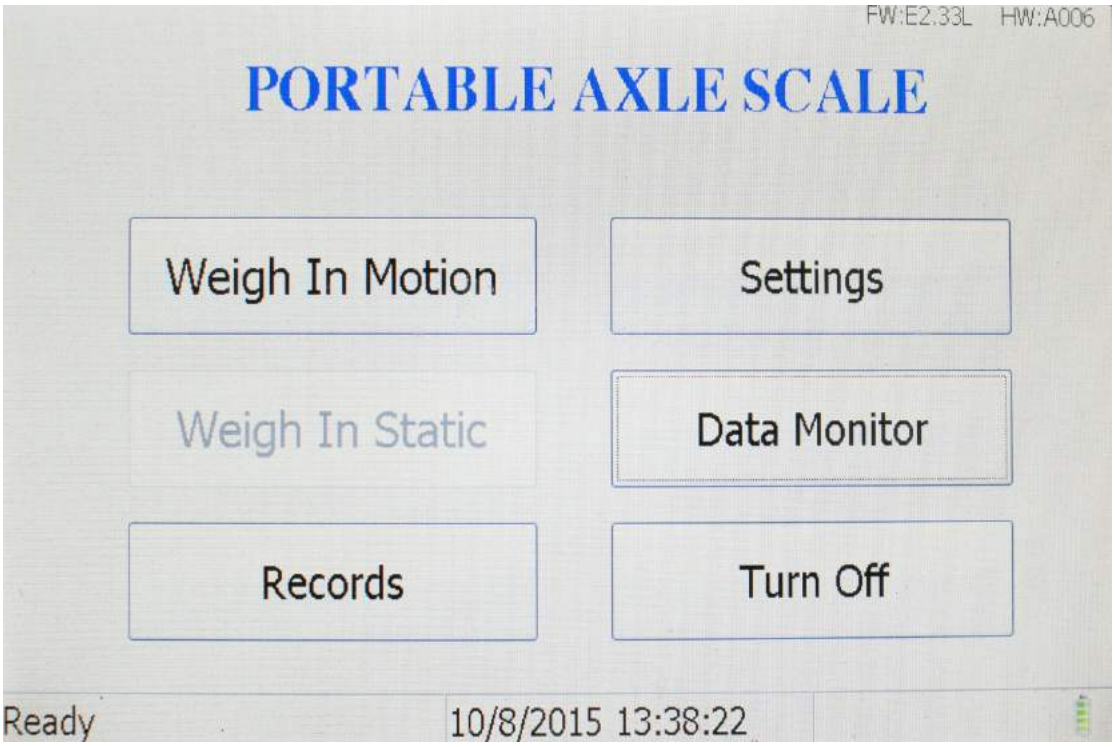
Pin1 - S+	Pin2 – S-
Pin3 – E+	Pin4 – E-

Warning: If there is no battery inside, the system can be connected to the AC power supply by an adapter in the tool box of the indicator. But in this case the printer will NOT work. If "Print" button is pressed, the system will automatically reboot.

A company LOGO will be displayed during system starting up and it usually takes 30~50 seconds for the whole system to be loaded.

After the system is ready, the system will load the main menu.

B. Function Explain:



If you are using **In-Motion Weighing System**, above main menu would be displayed.

"***Weigh in Motion***": In this function, there are two weighing modes: ***Manual*** and ***Auto***. This can be selected in "***Settings***" menu.

If you are using **Static Weighing System**, above main menu would be displayed.

"***Static Weighing***": It is to weight the axles of the truck in static which means the truck has to stop on the scale every time when an axle is on the scale. In this way, it is used as normal axle scale and there must be at least 2 operators. One of them would guide the truck driver to stop on the scale and at the meantime the other one would press "Weigh" button on the screen to record the weight. Please press "Weigh" button only when the system locks the weight.

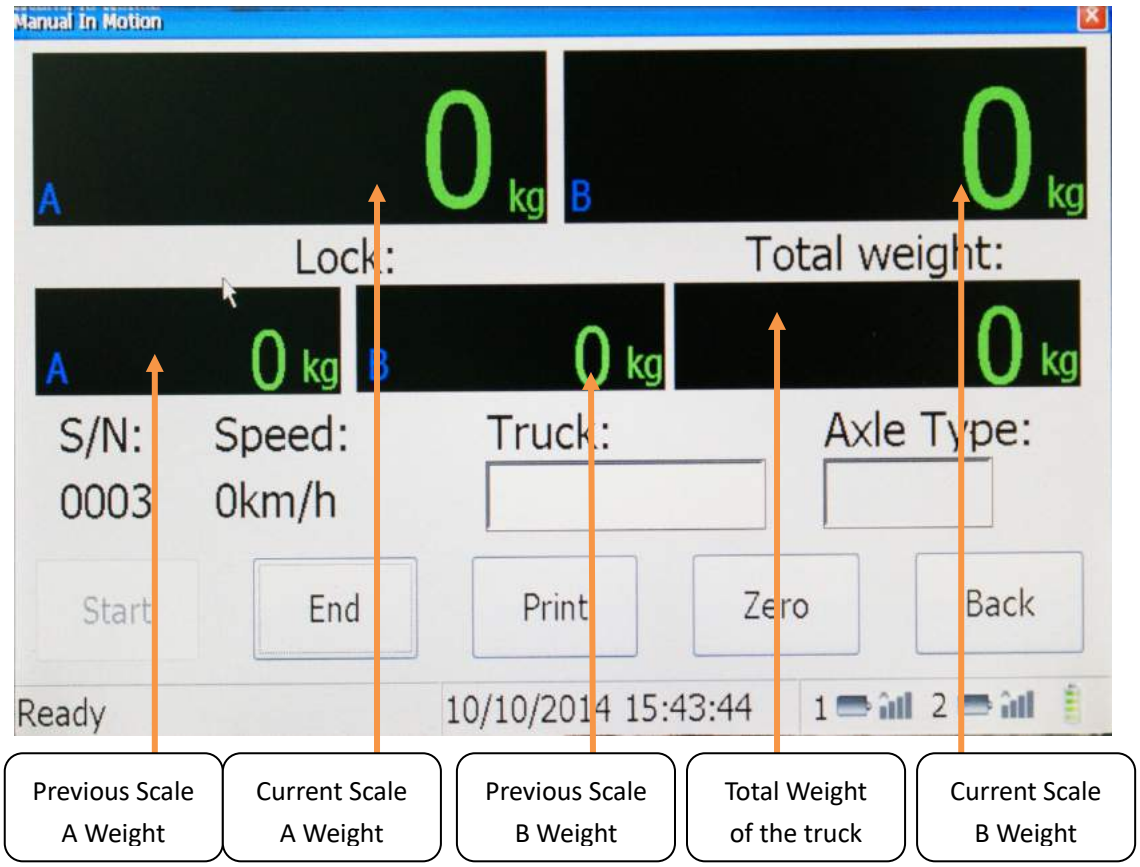
"***Records***": This is the data records of all weighing data including valid and invalid. Please note this data is stored in the system by CVS file. Operator can export it to computer and access it through a USB disk. Also the records could be able to review, re-print and check.

"***Settings***": It is the core of the system to setup. Please do NEVER change any settings unless your local distributor authorized.

"***Data Monitor***": It is to monitor the data and this function is only for engineer to check the status of the whole system and calibration in case of necessary.

"***Turn Off***": This is to switch off the system. But please note even the system is switched off; the power supply unit is still working before operator turn off the physical button on the indicator.

a) Weigh In Motion:



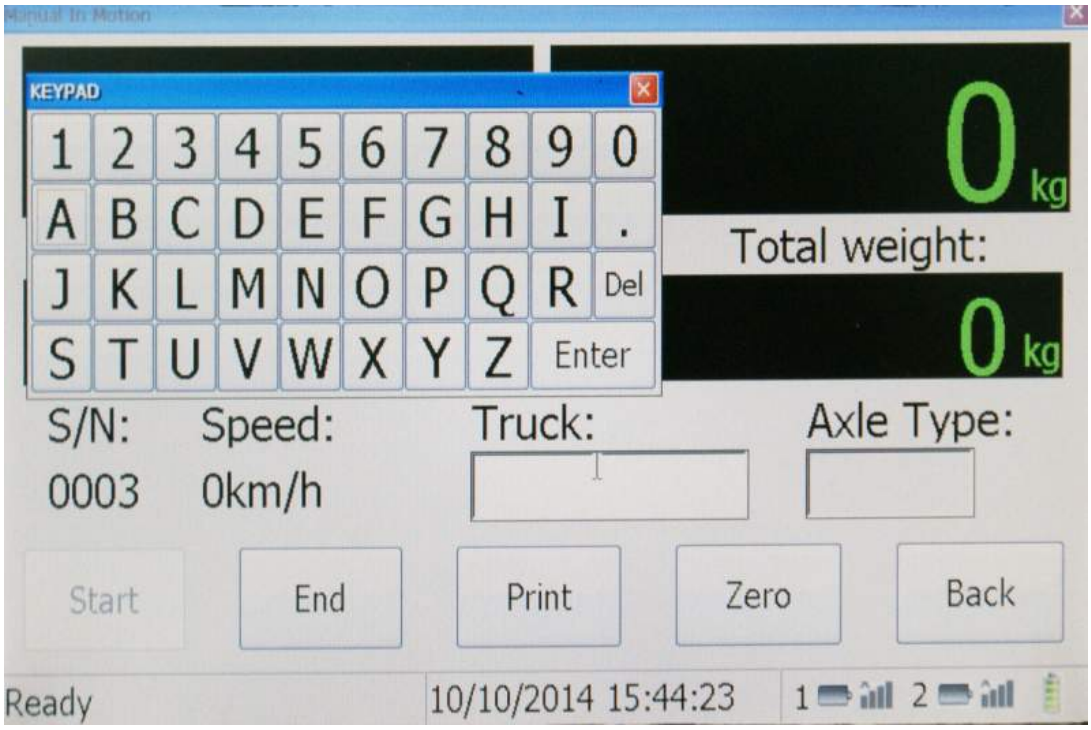
In ***Manual*** weighing mode, the "Axle Type" inputting is required and it is valid.

In ***Auto*** weighing mode the "Axle Type" filed is invalid.

The weighing mode could be set in "***Settings***" in the main menu.

Manual Weighing mode means the operator must input the axle type of the truck before weighing. After that the truck goes pass the scale by as low as 5km/h speed. After the whole truck passed the printer would automatically print the weighing report.

Auto Weighing mode means unattended weighing. The operator does NOT do anything on indicator. The sensor in the scale would automatically detect the axles and make mathematics calculation. After the whole truck passed, please leave 20 seconds for the system to make calculation and printing. During this period, please make sure there will be no more truck goes onto the scale and there is nothing on the scale because the system would also set the Zero Point during this period. If anything is on the scale, it would seriously damage the accuracy and system calculation.



"***Truck***" filed is for the operator to input the Truck License Plate number. Please enter the Truck License Plate Number from the small key pad. After it is entered, please press "Enter" button for the system to record.

"***Speed***" would be automatically detected by the sensor. If the speed is over 6km/h, the data could be invalid or having more than 3% difference than actual weight.

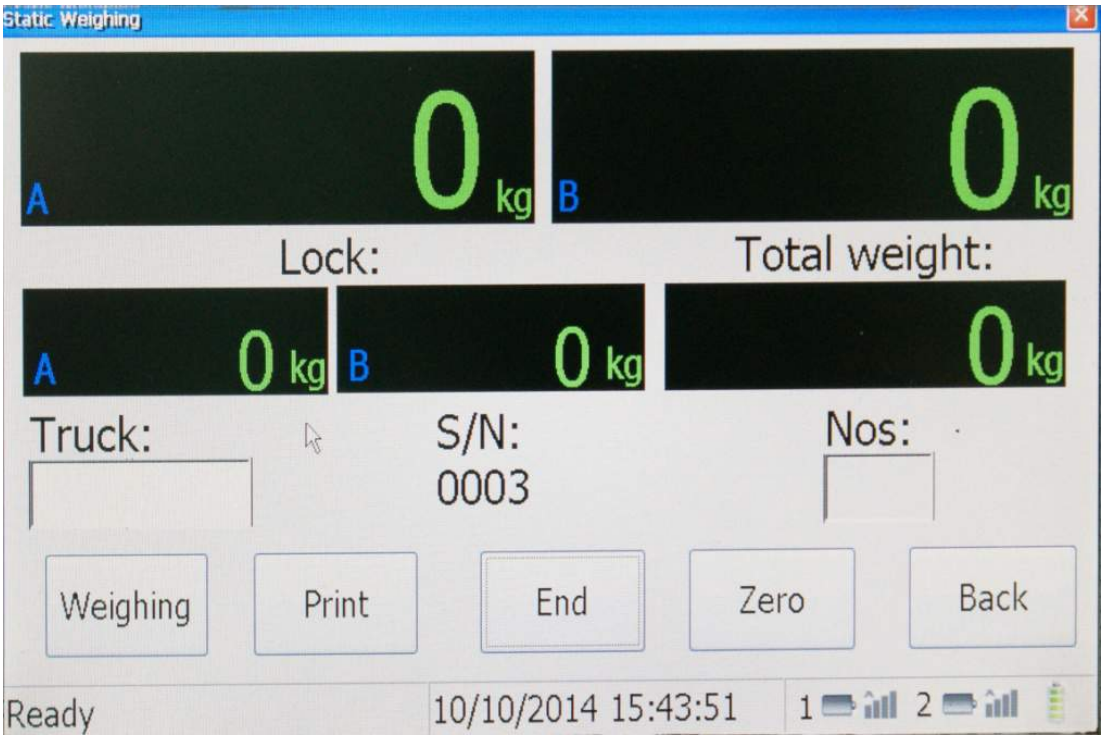
"***Start***" is to start weighing working and it can be pressed only when every filed is filled.

"***Print***" is to print the current weight. Please note the printer will print if in settings "Printing Mode" is set to "Auto mode". Otherwise it will not print until "Print" button is pressed. ""***Print***" button is only valid when data is recorded.

"***Zero***" is when all weighing and printing work has been done while there is any base number still on the screen, press this button to set the new "Zero" point.

"***Back***" is to back to the main menu.

b) Static Weighing:



"***Truck***" filed is for the operator to input the Truck License Plate number. Please enter the Truck License Plate Number from the small key pad. After it is entered, please press "Enter" button for the system to record.

"***Nos***" filed is the axles which has been weight and recorded. It is auto added by system.

"***Weighing***" button has to be pressed every time when the truck stops an axle on the scale and the weight is locked.

"***Print***" button will be valid only when "End" button is pressed and the whole information is recorded.

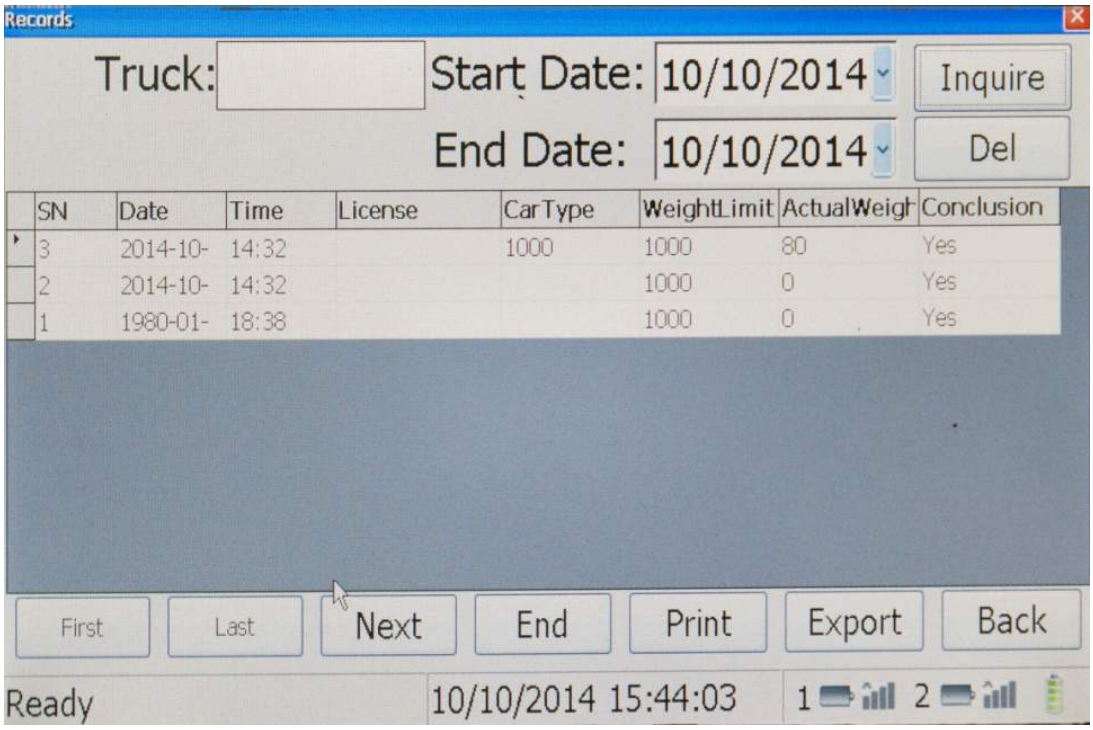
"***End***" button will be pressed ONLY when the whole truck passed and all axle weight is recorded. After it is pressed, "***Print***" button will be valid and the records will be saved into the system database. If it is pressed before the whole truck passed, the rear axle weight will not be recorded for present truck.

"***Zero***" is when all weighing and printing work has been done while there is any base number still on the screen, press this button to set the new "Zero" point.

"***Back***" is to back to the main menu.

c) Records:

The records could be inquired by date and Truck license number.



Operator also can export the records to USB device and access the data from PC.

CAUTION: Data would be deleted forever and there is NO WAY to recover after clicking on "Del" button.

d) Settings & Data Monitor:

It is for approved engineer only. Please contact your local distributor.

5. User Attention:

A. Two scales must be on the same ***parallel*** line .
B. The longitudinal separation must up to 1.5-2 times than the distance of vehicle length.
C. There must be no turning action within 10 Meters (33 feet) away from the scale.
D. There must be no accelerating or braking action when vehicle passes the scales.
E. In-motion speed must be ***NO MORE THAN*** 10km/h (6 MPH).
F. The scale must be placed at the hard and clean flat pavement.
G. The system and the build-in printer only works while axle weight is more than 500kg and total weight is more than 1, 000kg.
H. Make sure the scales are stabled on the ground without any shaking or raising.
I. Make sure there is no small stones on the bottom of the scales.
J. Make sure the vehicle wheels are passing the scale from the approximate middle of the scale.

The user manual ends here. If you have any question, please contact your local distributor to get help. Thank you to choose HIWEIGH Scale.

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