Pricing Indicator

User Manual

Table of Contents

1. Introduction

This manual contains installation and operation instructions for the JWI-700P Series Price computing indicator. Please read the manual completely before installation and operation.

2. Precautions

◎ Place the indicator on a flat and stable surface.

◎ Verify that the input voltage and the plug type match the local AC power supply, see 3-4.

◎ Warm up for 15 minutes before using it the first time.

◎ Keep the scale away from EMI noise, strong wind and vibration, which might cause incorrect reading.

◎ Avoid sudden temperature changes (suitable operating temperature is between -5℃~ 40℃.)

◎ Disconnect the power supply when cleaning the scale.

◎ Do not immerse the scale in water or other liquids.

◎ Service should be performed by authorized personnel only.

3. Product Introduction

3-1 Specifications & Features

Specifications

Model	JWI-700P
Input sensitivity	0.13uV/DIV
Input voltage range	-0.5mV to 16.5mV
Load cell excitation	DC 5V ,Up to 8 ×350 ohm load cells
System linearity	0.003% of full capacity
Input impedance	10M ohm or more
A/D conversion mode	△-Σ
A/D internal resolution	700,000 count
A/D conversion speed	8 times/second
External display resolution	300-30000
Display	6 digits
Power supply	AC 110V/220V (AC±10%) or Rechargeable battery (6V/4A)

Features

◎ LCD display 6/5/6, LED backlight

◎ Up to 1/30000 resolution

◎ Supports up to eight 350 ohm analog load cells

◎ Adjustable capacities, resolutions and parameters

◎ Full range tare, pre-tare, auto-zero tracking

◎ Up to 99 data accumulation and 25 data recall

◎ Change / Pricing/Accumulation/Price look up functions

◎ Auto power off selection, save battery life

◎ Suitable for a wide range of bases and load cells

◎RS-232 optional with RTC function, connecting PC / TDP / SH-24 / ZEBRA / GODEX

3-2 Front Panel
3-2-1 Display
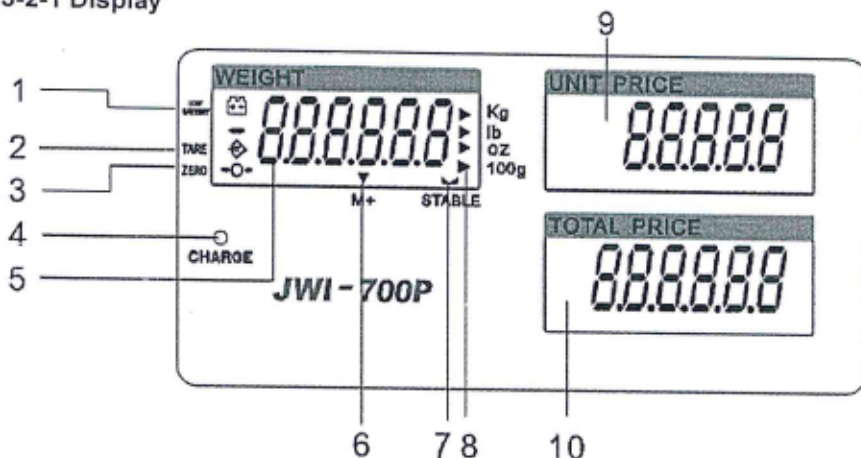
(1) ▇▇ Low battery indication

(2) ⟫T⟩ Tare indication

(3) ⇥O⇤ Center of Zero Indication (The zeroing range is ±2% of weighing capacity.)

(4) Charge lamp

(5) Weight window

(6) **M+** Symbol "▼" points at **M+** when scale is in accumulation mode.

(7) **STABLE** Stable indication, Symbol "◥◤" appears at the top of **STABLE** when
scale is in stable condition.

(8) ▶ Symbol "▶" points to the unit being used.

(9) Unit Price window

(10) Total Price window

3-2-2 Keyboard

| 0 | ~ | 9 | Numeric keys to enter Unit Price, price lookup number and other data.

⊙ Decimal point (press once)

CLEAR Clears the Unit Price

Note: No need to press CLEAR button if the previous unit price is entered more than 2 seconds.

ZERO
1. Zeros the weight display (The zeroing range is ±2 of weighing capacity)
2. Cancels Tare

TARE
1. Inputs the weight of the object on the weighing pan as a Tare value
2. Cancels Tare

MC 1. Clears total accumulation data in the weighing mode, 2. Clears certain accumulation record while it's displayed, 3. Exit from the accumulation mode.

CHANGE Press key *CHANGE*, total price window displays the total price of all the items, key-in the sum total paid from customer; the Unit Price display shows the change balance.

MR Recalls and displays the total Accumulation data (total price, number of items) and each records in details.

+ 1. Adds total price of non-weighing items into accumulation memory, 2. Output and clear accumulation data.

M+ Adds the total price of weighing items into accumulation memory.

Q'TY Activates the by-count operation to calculate the price of non-weighing items

3-3 Rear Panel
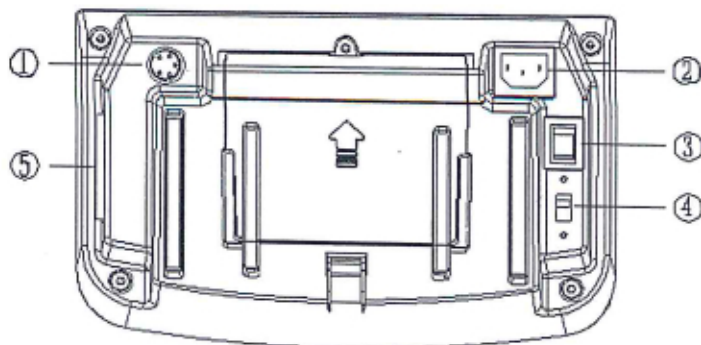
1). Port for connecting load cell.

2) power socket

3) power ON/OFF switch

4) Two-stage switch(110V or 220V)

5) RS-232 port: Serial interface port (computer, printer and Light Tower)

3-4 Power supply

Please verify the local AC power source and switch the two-stage switch to the proper place before plugging into the power outlet.

Alternative power supply

1) AC 110V/220V (AC±10%)

2) (6V/4A) Internal Rechargeable Battery

Power Consumption

About 300mW, 80hrs (without backlight)

About 380mW, 65hrs (with backlight)

Low battery warning

When "▆▆" appears in the upper left corner of the weight window, the battery power requires recharging. The charge lamp turns green from red when the recharging is completed (which takes about 8 hours). Disconnect the scale from power supply when it is fully charged. Note: Battery is to replace only by an authorized service dealer .Risk of explosion can occur if replaced with the wrong type or connected improperly.

4. Installation

4-1 Load Cell Connection
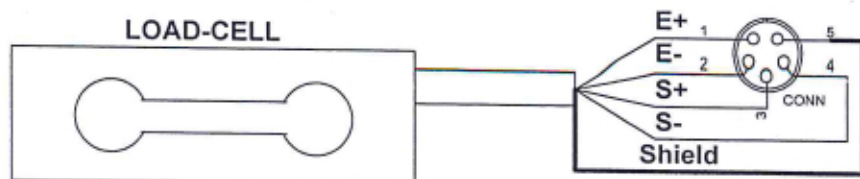
	PIN	SIGNAL
LOAD CELL	1	E+
	2	E-
CONNECTION	3	S+
	4	S-
	5	SHIELD

4-2 Assembly Description of Upright Pole

(1) Rod seat

(2) Upright pole

(3) Bracket

(4) Indicator

(5) Screw (for fixing the upright pole)

(6) Screw (for fixing the Bracket)

(7) Knob pole

(8) Bracket slot

(9) Load cell wire
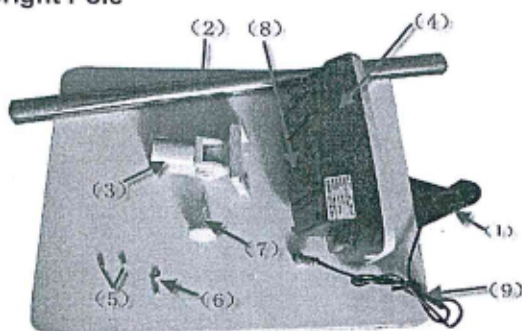
Step 1: Thread the wire of the Load Cell (9) on the rod seat (1) through the upright pole (2), insert the upright pole into the rod seat and then lock it with two screws (5).

Step 2: After threading the Load Cell wire through the bracket (3), attach the bracket to the upright pole and then lock it with the screw (6).

Note: if the load cell connector is too big to thread through the bracket, separate the bracket by removing the Knob pole (7), see the following pictures.
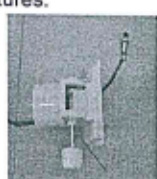
Step 3: Install the Indicator (4) on the bracket, with the bracket aligning with the bracket slot (8) of the indicator.

Step 4: After connecting load cell connector to load cell port, the installation is completed.

Note: Use the knob pole (7) to adjust the inclination angle of indicator and the screw (6) to adjust direction of the indicator. After adjusting the indicator to an optimal position, lock with the screw.

5. Setting Mode

5-1 Maximum Weighing Capacity & Division Setting

1) Turn on the power while pressing key **CHANGE**
to enter the setting mode.

`SEt`	`0`
	`0`

2) Input number 1120 by pressing numeric key, and
press key **CHANGE** again

`30.000`	`h9`
	`rAnGE`

3) Press key **CLEAR** to clear the current capacity.

`0`	`h9`
	`rAnGE`

4) Use numeric keys together with key • to enter
new capacity.

`60.000`	`h9`
	`rAnGE`

5) Press key **CHANGE** to display the current
division.

`0.002`	`h9`
	`d iu`

6) Press key • to select division.

`0.005`	`h9`
	`d iu`

7) Press key **CHANGE** to confirm, the current
accuracy is displayed.

`PrE`	`12000`

8) 2 Second later, the procedure is completed with a symbol of "`PASS`".

9) Press key **CHANGE** to save , and then press key **ZERO** to exit and return to normal
weighing mode.

Note: Capacity 0.1-999950kg, accuracy 300-30000 is available.

5-2 Function Setting

Turn on the power while pressing key **ZERO** to initiate user setting.

1) Press numeric key **0** to shift backlight modes.
Options are ON,OFF, AUTO and AUTO-T .

`SEt0`	`L iGHt`
	`AUto-t`

on= Backlight

off= No backlight

AUto= Auto-on with items greater than 9d placed on the pan.

AUto-t = Backlight goes off after N seconds. (N=02 · 04 · 06 · 08 · 10 · 12 · 14 · 16 · 18 ·

20 seconds)

2) Press numeric key **1** to set Decimal Place of Total Price. Options are 0, 1, 2 and 3.

SEt 1	dot
	-0-

3) Press numeric key **2** to set the level in which the stable indication turns on (filtering). The lower the setting, the faster stabilization time .Options is 1, 2, 4 and 8(level).

SEt2	F iLt
	- 1-

4) Press numeric key **3** to set the period of inactivity before the scale automatically turns off. Options are OFF(Non power-off) 、 5、 10、 30 and 60 (minutes)

SEt 3	oFFt
	60

5) Press numeric key **4** to set the range in which the Zero indication turns on .Options are d0, d1, d2, d3, d4 and d5. (d= scale division)

SEt4	PEro
	d3

6) Press numeric key **5** to select serial transmission rates. Options are 9600, 4800 and 2400.

SEt5	bAUd
	2400

7) Press numeric key **6** to select external devices. Options are PC , EZ-110 ,SH-24 , TDP and ZEBRA.

SEt6	Pr int
	tdP

8) Press numeric key **7** to switch on/off RTC function. Options are ON, OFF.

SEt 7	rtC
	oFF

9) Press numeric key **8** to set print modes. Options are Prt.Co(continuous print) and Prt.St(Stable print).

SEt 8	Pr int
	PrtSt

10) Press numeric key **9** to set whether to save the previous unit price value.

SEt9	Pr iCE
	on

on= Previously set unit price value is retained when the unit is turned on.
oFF=Previously set unit price value is not retained when the unit is turned on.

11) Press key **+** set the period of Inactivity before the backlight turns off. Options 2s , 4s , 6s , 8s , 10s , 12s , 14s , 16s , 18s and 20s , (s=second)

SEt	SCALE
	FUnC

Note: This function is only available when the AUTO-T is selected under the backlight mode.

12) Press **ZERO** to save the settings and go back to weighing mode.

5-3 Decimal digits setting

1. Press and hold key **CHANGE** while powering on the scale.

| SEt | 0 |

| | 0 |

2. Key in 1167 with the numeric keys. Again press key **CHANGE**

3. Press numeric key 1 to set the decimal digits of unit price. (none, 1, 2, free available)

Note: none=no decimal digit, free= able to input any number (up most to two decimal digits)

6. Single point calibration

1. Press and hold key **CHANGE** while powering on the scale.

| SEt | 0 |
| | 0 |

2. Key in 11 with the numeric keys.

| SEt | 11 |
| | . 0 |

3. Again press key **CHANGE** to enter zero calibration mode, with no load on the scale.

| CAL | PEro |
| | h9 |

4. Zero calibration is completed with a beep sound.

| CAL | 0 |
| | h9 |

5. Key in the calibration value, put the corresponding weights on, then press key **CHANGE** to confirm.

| CAL | 20 |
| | h9 |

1/3 full capacity ≤ input calibration value ≤ full capacity.

6. The calibration procedure ends up with a symbol of "PASS". Please remove all the weights.

7. Press key **CHANGE** to save, then press key **ZERO** to go back to weighing mode.

7. Operation

7-1 Tare

1) Place a container on the pan, then press key **TARE** .The Weight window will show a net value of "0.000", with symbol "⬦" on. Remove the container, and the negative value displayed will be equivalent to the Tare weight.

2) To clear tare, with an empty pan, Press down the key **TARE**.

7-2 Price and accumulate the weighing item

1) Place the item to be weighed on the pan, and then enter the Unit Price via the numeric keypad and key •. The item weight will be shown in the weight window, the unit price in the

Unit Price window, and resulting total price in the Total Price window.

Use the accumulation function to add the total price of several weighings .

2)Press key **M+,** the displayed total price is added to the accumulation memory, and Symbol "▼" points at "M+". The weight window will show the number of weighments, the Unit Price window will show "----", and the Total Price window will show the accumulated total price value.

3) Remove the item.

4) Repeat step 1-3 until all transactions are finished. The corresponding total number of weighments and accumulated price will be displayed.

5) Press key **CLEAR** to return to weighing mode .

Note: Maximum is 99 pieces including the non-weighing items .

7-3 Calculate and accumulate the price of non-weighing items

1) Input the value of Unit Price via the numeric keypad and key ●.

2) Press key **Q'TY** and key in the number of items(1~999) ,the Total Price is calculated .At that moment, press key **+** to store it in "Accumulation", with Symbol "▼" points at "M+".

3) Press key **CLEAR** to return to weighing mode.

7-4 Recall the accumulated records

Press key **MR** to recall and display the total Accumulation data (total price, number of items of both weighing and non-weighing items) and the first 25 records in details.

7-5 Clear the accumulated records

Method 1: To clear the total accumulation data or each accumulation events, Press key **MC** while the data is displayed. Symbol "▼" disappears when the total accumulation data is deleted.

Method 2: Pressing down the key **MC** under weighing mode will clear all records saved in the memory.

7-6 Output the accumulation data

1) In the accumulation data display mode, press key **+** to output the accumulation data. After the accumulation data is printed or transferred to your host computer, the data will be automatically deleted.

The printer will print out a report when total accumulation data or each accumulation record is deleted.

7-7 Change function

1) Press key **CHANGE,** the total price window displays the total price of the deal.

2) Key-in the sum total paid from customer, the Unit Price window displays the change balance for customer.

7-8 PLU function (Price Lookup)

The PLU function can be used for frequently sold goods.

Store or modify a unit price

1) Input the indicated unit price and then long press key **+**. The unit price is stored in numeric key *0* automatically. The unit price window displays "SETP 0".

2) Long press numeric key *0-9* where the Unit Price is stored to recall a PLU. (e.g. press numeric key 1, the unit price window displays "READ 1")

3) Input a new unit price via numeric keys and key ● then long press key **+** to store the unit price into the numeric key which was pressed in step 2.

Recalling a PLU

Long press the numeric key where the Unit Price is stored to recall a PLU. Put the items to be weighed on the pan, the scale will automatically calculate the total price.

7-9 Unit switch operation

Press key ●/*UNIT* twice to initiate unit switch operation. Press numeric keys 1~4 to set the weighing unit.

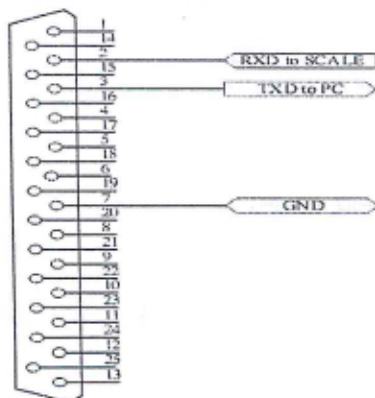| Numeric keys	1	2	3	4
Weighing units	kg	lb	oz	100g

Symbol "▶" will point at the corresponding weighing units and the display return to weighing mode when one of the units is selected.

Note: Press any of the numeric keys to retain to the last used weighing unit.

8. Serial Interface

If external interface is needed, please select the proper RS-232 board.

8-1 RS-232 connector

8-2 Time setting

1) When the scale is in weighing mode and no accumulated data exist, press key **MR** and three windows will display.

2) Press key **M+** to select the position to be altered and the position under alteration will flicker.

3) Press $\boxed{0}\text{--}\boxed{9}$ to alter the Year/Month/Date/Hour/Minute.
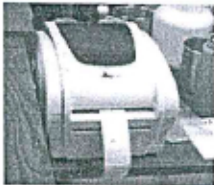
4) Press key $\boxed{\text{MR}}$ to save the settings.

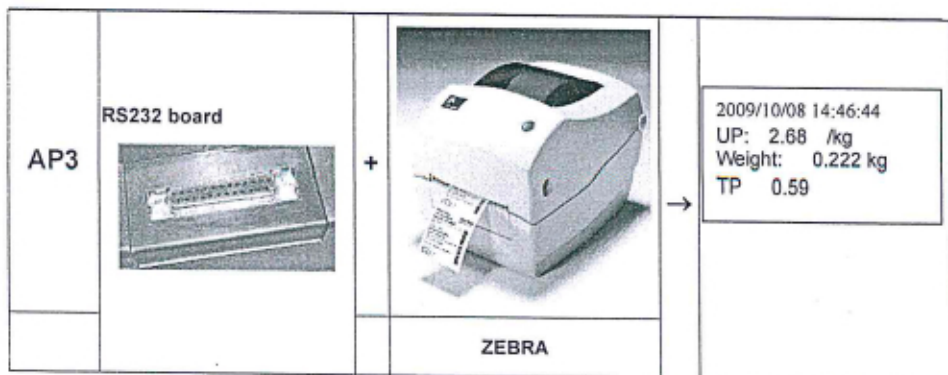5) Press key $\boxed{\text{MC}}$ to return to the weighing mode.

8-3 Single option
1) RS232+ TDP / SH-24 / ZEBRA / EZ-110 printer
2) RS232+ Computer

	Option		External Device	Print out format
AP1	RS232 Board	+	TDP	→	2009/10/08 14:46:44 U.P. : 2.68 /kg Weight: 0.222 kg T.P. : 0.59
		+	GODEX		
AP2	RS232 board	+	SH-24 (TP)	→	2009-10-23 18:12:27 unit price: 10 /kg weight: 2.998 kg amount: 29.98

		+	PC		2009-10-23
					18:12:27
					unit price: 10 /kg
					  weight: 2.998 kg
					  amount: 29.98

| AP3 | RS232 board | + | ZEBRA | → | 2009/10/08 14:46:44
UP: 2.68 /kg
Weight: 0.222 kg
TP   0.59 |

9. Troubleshooting and Error Message

Error message	Problems	Solutions
Err 1	Wrong capacity setting	Please reset the maximum capacity
Err2	Initial zero point exceeds +/-10% (take 10% as reference basis).	1. To check whether there are other alien articles on the scale pan, remove those articles. 2. LOAD CELL failure, which requires contacting our Service.
Err4	EEPROM Check sum failure	Please contact our Service.
Err5	The weighed articles are overload.	Do not load the item exceeds the maximum tolerance.
Err6	Wrong calibration weights	Please recalibrate the scale
Err7	The accumulated number of weighments or total price exceeds display range.	---
ouEr	The weight of the item exceeds display range.	Switch to a different weighing unit or remove the items
🔋	Low battery	Recharge the battery, the indicator can be used while it is charging.