





# **YJ Carat and Gold Scales**

## **Instruction Manual**

## YJ Scale

Mark	Standard
	This product conforms to the EMC Directive 2004/108/EC, the Low Voltage Directive 2006/95/EC and the Non-Automatic Weighing Directive 2009/23/EC.
	AS/NZS4251.1 Emission; AS/NZS4252.1 Immunity



### Disposal

In conformance with the European Directive 2002/96/EC on Waste Electrical and Electronic Equipment (WEEE) this device may not be disposed of in domestic waste. This also applies to countries outside the EU, per their specific requirements.

Please dispose of this product in accordance with local regulations at the collecting point specified for electrical and electronic equipment.

If you have any questions, please contact the responsible authority or the distributor from which you purchased this device.

Should this device be passed on to other parties (for private or professional use), the content of this regulation must also be related.

Thank you for your contribution to environmental protection.

NOTE: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference in which case the user will be required to correct the interference at his own expense.

This Class B digital apparatus complies with Canadian ICES-003.

Cet appareil numérique de la classe B est conforme à la norme NMB-003 du Canada.

## 1. INTRODUCTION

This manual contains installation, operation and maintenance instructions for the YJ Series. Please read the manual completely before using the scale.

### 1.1 Safety Precautions

Please follow these safety precautions:

- Use the scale only in dry locations.
- Do not operate the scale in hostile environments.
- Do not drop loads on the pan.
- Do not place the scale upside down on the pan.
- Service should be performed only by authorized personnel.
- If using the optional power adapter, verify that the power adapter input voltage matches the local power supply voltage.

### 1.2. Controls

**TABLE 1-1. CONTROL FUNCTIONS.**

Key Name	Function
On/Off	<ul style="list-style-type: none"> <li>• Primary function – If scale is Off, turn On. If scale is On, turn Off</li> </ul>
Light	<ul style="list-style-type: none"> <li>• Primary function – Enters scale menu</li> </ul>
	<ul style="list-style-type: none"> <li>• Menu Function – Advances to next menu item</li> </ul>
Units	<ul style="list-style-type: none"> <li>• Primary function – Advances to next available unit</li> </ul>
	<ul style="list-style-type: none"> <li>• Menu Function – This key is used to reject the displayed setting and advance to next available setting</li> </ul>
Tare	<ul style="list-style-type: none"> <li>• Primary function – Perform Tare/Zero function</li> </ul>
	<ul style="list-style-type: none"> <li>• Menu function – This key is used to accept the currently displayed setting</li> </ul>

## 2. INSTALLATION

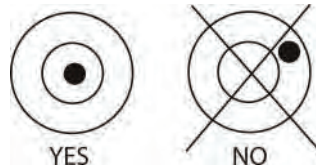
### 2.1 Package Contents

- Scale
- Pan
- Instruction Manual
- 4 alkaline AAA batteries
- Calibration weight (only for specific models. See Table 6-1)
- Gem Scoop (only for specific models. See Table 6-1)

## 2.2. Location

Use the scale on a firm, steady surface. Avoid locations with excessive air current, vibrations, heat sources, or rapid temperature changes. Adjust the leveling feet so the bubble is centered in the circle.

Level Bubble

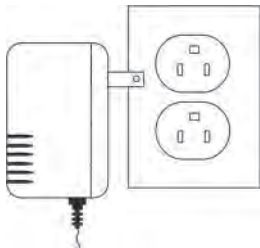


## 2.3 Battery Installation

The scale is powered by four alkaline AAA (LR6) type batteries. Remove the battery cover and install the batteries.

## 2.4 Connecting Power

If using the optional power adapter, connect the power adapter to the power outlet (see Figure 2-1) and the input jack to the back of the scale (see Figure 2-2)



Figures 2-1

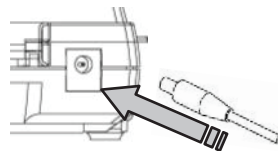


Figure 2-2



For use with CSA Certified (or equivalent approved) power source, which must have a limited circuit output.

## 2.5 Initial Calibration

Have the appropriate calibration masses available before beginning calibration (See Table 6-1). Power on the scale by pressing **On**. Press **Light** button and *SCALE* is displayed. Press **Tare** and span mass\* is displayed. Press **Tare** the span mass value flashes. Put the indicated calibration mass on the pan. When calibration is complete, scale returns to weigh mode.

\*Alternate span mass can be selected by pressing **Units**

## 3. OPERATION

### 3.1 Weighing Units

Press **Units** to advance to next available weighing Unit.

Press **Tare** to zero the scale and then place objects to be weighed on the pan

## 4. SETTINGS

The Settings allows the user to customize the scale.

### 4.1 Menu Structure

Table 4-1 illustrates the menu structure.

Calibration Menu	Backlight Menu	Auto Off Menu
SCALE	-F1-	<b>off</b>
LinE	-F2-	60 S
	-F3-	120 S
		180 S
		240 S
		300 S
		360 S
		420 S
		480 S
		540 S

**TABLE 4-1 MENU**

**Note:** Default settings are shown in bold.

### 4.2 Menu Navigation

**Enter Menu:** Press and release **Light**. The **SCALE** menu will be displayed. Each menu is entered by pressing **Tare**. Advance to the next main menu by pressing **Light**.

**Changing Settings:** Press **Units** to reject the displayed setting and advance to next available setting. Press **Tare** to accept the currently displayed setting

**Menu Exit:** Press Off to quickly exit menu

## 4.3 Balance Menus

**Span Calibration** [*SCALE*]: Uses two weight values: Zero and at or near the full capacity of the scale. Span calibration should be performed if the scale is repositioned or when the room temperature changes.

**Linearity Calibration** [*line*]: Uses three weight values: Zero, 50% of capacity and full capacity. Generally this calibration is not required unless testing shows that the linearity error exceeds the linearity tolerance in the specification table. Accuracy of weights is important to maintain weighing integrity.

**Backlight** [*-F1-*]:  
 -F1- Backlight on when displayed value is  $> \pm 10d$   
 -F2- Backlight always on  
 -F3- Backlight always off

**Auto-Off** [*oFF*]: Will automatically turn the scale off if no activity is detected. Set between 60-540 seconds.

## 5. MAINTENANCE

### 5.1 Troubleshooting

The following table lists common problems and possible causes and remedies. If the problem persists, contact Ohaus or your authorized dealer.

**TABLE 5-1. TROUBLESHOOTING.**

Symptom	Possible Cause	Remedy
Cannot turn on	<ul style="list-style-type: none"> <li>No power to scale</li> <li>Empty or incorrectly installed batteries</li> </ul>	<ul style="list-style-type: none"> <li>Verify AC adapter connections and voltage</li> <li>Replace batteries, check polarity</li> </ul>
Poor accuracy	<ul style="list-style-type: none"> <li>Improper calibration</li> <li>Unstable environment</li> <li>Debris touching the pan</li> <li>Draftshield is touching the pan or sample</li> </ul>	<ul style="list-style-type: none"> <li>Perform calibration</li> <li>Move scale to suitable location</li> <li>Clean any debris next to or under the pan</li> <li>Check that pan is fully seated, check sample height</li> </ul>
Cannot calibrate	<ul style="list-style-type: none"> <li>Unstable environment</li> <li>Incorrect calibration mass</li> </ul>	<ul style="list-style-type: none"> <li>Move the scale to a suitable location</li> <li>Use correct calibration masses</li> </ul>

Err 0	• Under-load condition	• Verify pan is installed
Err 1	• Over-load condition	• Verify excess load is removed from pan

## 5.2 Service Information

If the troubleshooting section does not resolve or describe your problem, contact your authorized Ohaus service agent. For service assistance or technical support in the United States call toll-free 1-800-526-0659 between 8.00 AM and 5:00 PM EST. An Ohaus product service specialist will be available to provide assistance. Outside the USA, please visit our web site, [www.ohaus.com](http://www.ohaus.com) to locate the Ohaus office nearest you.

## 6. TECHNICAL DATA

### 6.1 Specifications

**TABLE 6-1.SPECIFICATIONS.**

Model No.	YJ103*	YJ152*	YJ102	YJ301	YJ501
Capacity	100ct 20g	150ct 30g	100g	300g	500g
Readability	0.005ct 0.001g	0.01ct 0.002g	0.01g	0.1g	0.1g
Linearity	+/- 1 d				
Repeatability	+/- 1 d				
Operating Temperature Range	10° to 30° C				
Weighing Units	Gram, Carat, Grain, Ounce, Ounce Troy, Pennyweight				
Tare Range	To capacity by subtraction				
Stabilization Time (seconds)	3				
Recommended Span Point	20g	30g	100g	300g	500g
Display (mm)	Backlit LCD (13)				
Battery Life	1.5 hours min				

\* Cal weight and gem scoop included in package

## **LIMITED WARRANTY**

Ohaus products are warranted against defects in materials and workmanship from the date of delivery through the duration of the warranty period. During the warranty period Ohaus will repair, or, at its option, replace any component(s) that proves to be defective at no charge, provided that the product is returned, freight prepaid, to Ohaus. This warranty does not apply if the product has been damaged by accident or misuse, exposed to radioactive or corrosive materials, has foreign material penetrating to the inside of the product, or as a result of service or modification by other than Ohaus. In lieu of a properly returned warranty registration card, the warranty period shall begin on the date of shipment to the authorized dealer. No other express or implied warranty is given by Ohaus Corporation. Ohaus Corporation shall not be liable for any consequential damages.