



Healthweigh™

DIGITAL VETERINARY SCALES

MODEL H741-00; H740-00



OPERATION MANUAL

Cat No. AA0370-3
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HEALTHWEIGH™ DIGITAL SCALES

DIGITAL VETERINARY SCALE

Congratulations on purchasing the Healthweigh™ Digital Veterinary Scale, Model H740-10. This versatile scale is designed for weighing medium sized to small animals. The scales are equipped with movement compensation weighing technology to eliminate involuntary movement of the animal.

Before attempting to operate the scale, please read this manual carefully and keep it handy for future reference.

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CAUTION AND WARNING

- To prevent injury, never leave an animal unattended while on the scale.
- To prevent injury, do not transport the scale while the animal is in the weighing tray.
- For accurate animal weighing, the scale must be placed on a flat, stable surface.
- For accurate weighing, verify proper operation according to the procedure described in this manual before each use.
- Do not use in the presence of flammable materials.
- Operating at other voltages and frequencies than specified could damage the equipment.
- If the "LO BAT" indicator activates, for accurate weighing, connect the scale to an AC power source as soon as possible.

PRECAUCIONES Y ADVERTENCIAS


- Para evitar lesiones, nunca deje al animal solo mientras esté en la balanza.
- Para evitar lesiones, no traslade la balanza mientras el animal está en la bandeja de pesaje.
- Para un pesaje exacto del animal, la balanza debe ser colocada en una superficie plana, estable.
- Para un pesaje exacto, verifique antes de cada uso la apropiada operación según los procedimientos descritos en este manual.
- No use en presencia de materiales inflamables.
- Operando en otros voltajes y frecuencias que los especificados puede hacer daño al equipo.
- Si el indicador de "LO BAT" se activa, para un pesaje exacto, cambie las baterías o conecte la balanza a una fuente de energía CA, lo más pronto posible.

PRECAUTION ET PREVENTION

- Pour prévenir toute blessure accidentelle, ne laissez jamais un animal sans surveillance sur la balance.
- Pour prévenir toute blessure accidentelle, ne transportez jamais la balance avec l'animal sur le plateau.
- Pour obtenir une lecture du poids exacte, placez la balance vétérinaire sur une surface plane et stable.
- Pour obtenir une lecture du poids exacte, vérifiez le bon fonctionnement de la bascule en appliquant la procédure décrite dans ce manuel avant chaque utilisation.
- Ne pas utiliser en présence de substances inflammables.
- Le fonctionnement sous d'autres tensions et fréquences que celles spécifiées dans ce manuel est susceptible d'endommager l'appareil.
- Si l'indicateur « LO BAT » est actif, remplacez les piles ou connectez dès que possible la balance à une source d'alimentation AC pour obtenir une lecture du poids exacte.

CERTIFICATION

Healthweigh™ products are the result of 30 years technology experience and are quality confirmed by authorities, institutes and the legal system as follows:

ISO 9001:2000	In 1995 the manufacturer was audited and certified for ISO 9001:2000. ISO 9001 Certification recognizes the manufacturer's quality system conforms to international standards for quality management and assurance. Repeat audits are conducted periodically to check the quality system is operated in the proper manner with consistent business processes being applied.
ISO 13485:2003	The manufacturer was audited and certified in 2007 for ISO 13485:2003 conformity. The primary objective of ISO 13485:2003 is to facilitate harmonized medical device regulatory requirements for quality management systems.
	Healthweigh™ complies with the European Union's Restriction of Hazardous Substances directive.

SPECIFICATIONS

H740-10	
Capacity & Graduation	485lb/0.2lb / 220kg/0.1kg
Power Requirements	Adaptor 120VAC-9VDC-50Hz / 230VAC-9VDC-50Hz
Environmental	Operating temperatures: 50°F to 95°F / 10°C to 35°C Storage temperatures: 32°F to 122°F / 0°C to 50°C Humidity: 85%
Product Dimensions	42" x 22" x 2" / 1066 mm x 568 mm x 50mm

FEATURES

Features:

Movement compensation technology
Tare Function (automatic & manual)
Updatable firmware
Hold function
RS232 Port for data transmission

Power:

Auto Power-off
Low battery indication
Rechargeable battery
120V AC adaptor

Options:

230V AC adaptor
(Model H740-xx mark as '0')



SPECIFICATIONS

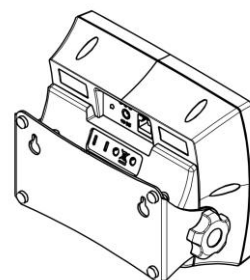
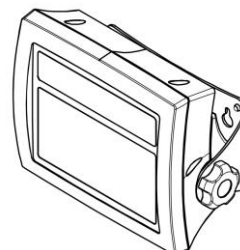
GENERAL

The Digital Veterinary Scale, model H740-10, uses sophisticated microprocessor technology. Each precision instrument is designed to provide accurate, reliable and repeatable weight measurements with features that make the weighing process simple, fast and convenient.

The scale is set up to use motion-sensing weighing technology to determine the actual weight of an active animal. Weight is displayed on the indicator in either pounds or kilograms.

The scale includes a specially designed removable rubber mat for easy cleaning.

Healthweigh™ Indicator



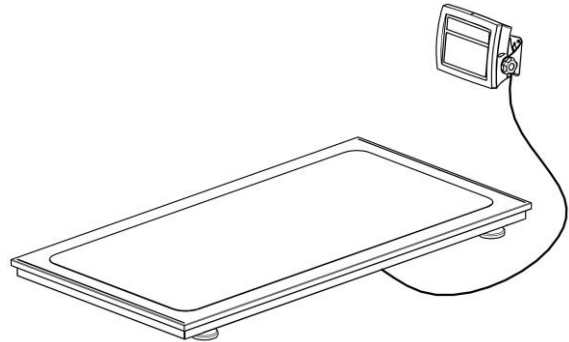
Power supply:

The scales operate either on a rechargeable battery or an AC adaptor.

SET UP

This H710-10 digital veterinary scale has been calibrated at the factory. It is shipped in four parts: the base assembly, display assembly, rubber mat and rubber feet.

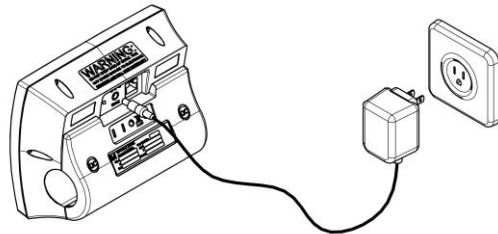
1. Take the H740-10 Veterinary scale out of the packaging. Remove each piece from its packing material and unwrap carefully to prevent scratching the unit's parts.
2. Tilt scale on its side and screw in the four legs into the base of the scale
3. Turn the base assembly right side up.
4. Place the display unit on a table or mount it on the wall.



5. Place the rubber mat on the base assembly, inside the designated frame. .
6. To operate using the AC adaptor, insert the AC adaptor cable into the back of the indicator and the AC adaptor plug in to a power source.





The rechargeable batteries automatically go into recharge mode when the AC adaptor is connected to the power source.

When the cable is inserted into the power source the LED lights up red (to the left-hand side of the cable on the back of the indicator). When the battery is completely recharged the LED changes from red to green.



OPERATION INSTRUCTIONS



Item	Item	Operation	Function
	On-Off	For On – one short push For Off – one long push	Turns scale ON and OFF
	Zero	When scales are turned on, one short push	Zeros the scale prior to weighing
	Tare	Hold the key down for 3 long seconds	Prompts entry of TARE value
	Reweight	Short push	For repeat reweighs of patients without stepping off the scale
	Down Arrow	Short push when in "mode"	To decrease value
	Kg-Lb	Short push	Toggles between kilograms or pounds
	Up Arrow	Short push when in "mode"	To increase value

Weighing

1. To turn on the scale, press the ON-OFF/ZERO key, and 0.0 lb/kg will appear on the display.
2. Place the animal to be weighed on the scale. The display will show "WEIGH," then the animal's weight. Two arrows will appear on either side of the display and the scale will beep to indicate the end of the weighing process.
3. To reweigh the animal, press the REWEIGH key.
4. To change the display from pounds to kilograms, and vice versa, press the kg-lb key.
5. To turn off the scale, press and hold the ON-OFF/ZERO key for at least three seconds.

Using the Tare Function

The Tare function is used to deduct accompanying weight (such as collar or bandaging attached to the animal). Tare function can be set either manually or automatically:

1. Manual mode:

The scale display must show 0.0lb/kg on the right hand side of the display and **ZERO** in the upper left hand corner.

Press the BMI/tare key for 3 seconds and **release immediately** once the **tArE** (tare) message flashes on the display.



A 33lb /15.0 kg default value will appear which can be increased or decreased (according to the weight of the product) by pressing on the last two keys. The upward arrow increases the value; and the downward arrow decreases value.

Once you have reached the weight value required press the BMI/tare key and the programmed value will appear with a minus sign next to it.

Continue with the weighing process as required. To cancel the manual tare operation, remove all weight from the scale and press the Tare key for 3 seconds and release immediately.

2. Automatic mode:

1. With the scale set to 0.0lb/kg, place the extra load on the scale. The display shows "WEIGH," and then the weight of the load.
2. Press and hold the TARE key for three seconds. The display returns to 0.0lb/kg and "TARE" appears on the left side of the display.
3. Remove the load from the scale. The weight of the load appears with a minus symbol to the left.
4. Place the animal on the scale with the load. The display then shows the animal's weight without the weight of the load.
5. The weight of the load remains stored in memory, so you can continue to weigh animals with the same tare weight..
6. To cancel the tare weight, remove all weight from the scale, and press the TARE key again. "TARE" then disappears from the display. The tare weight is also cancelled when the scale is turned off.

MAINTENANCE

GENERAL

This section provides instructions for maintenance, cleaning, troubleshooting and operator replaceable parts for the Digital Veterinary Scale Model H740-10. Maintenance operations other than those described in this section should be performed by qualified service personnel.

MAINTENANCE

Before first use and after periods of non-use, check the scale for proper operation and function. If the scale does not operate correctly, refer to qualified service personnel.

1. Check overall appearance of the total scale for any obvious damage, wear and tear.
2. Inspect AC adaptor for cord cracking or fraying or for broken or bent prongs.

CLEANING

Proper care and cleaning is essential to ensure a long life of accurate and effective operation.

Before you begin cleaning, disconnect the scale from the AC power source.

1. Clean all external surfaces with a clean damp cloth or tissue. Mild soap and water solution may be used. Dry with a clean soft cloth.
2. Do not immerse the scale into cleaning or other liquid solution.
3. Do not use Isopropyl Alcohol or other solutions to clean the display surface.

TROUBLESHOOTING

Refer to the following instructions to check and correct any failure before contacting service personnel.

SYMPTOM	POSSIBLE CAUSE	CORRECTIVE ACTION
Scale does not turn on	Dead battery	Connect scale to power source
	Faulty electrical outlet	Use a different outlet
	Bad power supply	Replace adaptor
Questionable weight or the scale does not zero	External object interfering with the scale	Remove interfering object from the scale
	The display did not show "0.0"lb/kg before weighing	Ask the patient to get off the scale, zero the scale and begin weighing process again
	Scale is out of calibration	Check weight with known weight value
	Improper Tare	Place the item on the scale. Press REWEIGH. Once the weight of the item is displayed, press TARE. Place the patient and the item back on the scale. Press REWEIGH again.
Weighing is performed but the display shows "WEIGH" and "REWEIGH" every few seconds; the weighing process takes too long and no weight is displayed.	The animal is extremely active	Hold the animal so that it is still
The display shows "STOP" message	The load on the scale exceeds the capacity 6700lb (270kg)	Remove the excess weight and use the scale according to its limits
The display shows "LO Bat" message	The battery is low	Recharge the battery
The display shows "Err" message, as detailed in the table below.		

ERROR LIST

ERROR NO.	DEFINITION	CHECK/REPLACE
Err 2	Low saturation state (Low A/D)	The load cell is not connected properly. Check the cables, and mechanical connection. If the problem persists, replace the set of load cells
Err 3	High saturation state (High A/D)	See Err 2
Err 6	Unstable weight. Cannot calibrate	Check the load cells' mechanical surroundings and see that nothing touches them and that the cables are properly welded
Err 7	Mathematical error; division by zero. Cannot calculate calibration factor	Will show when trying to calibrate with no calibration weight.

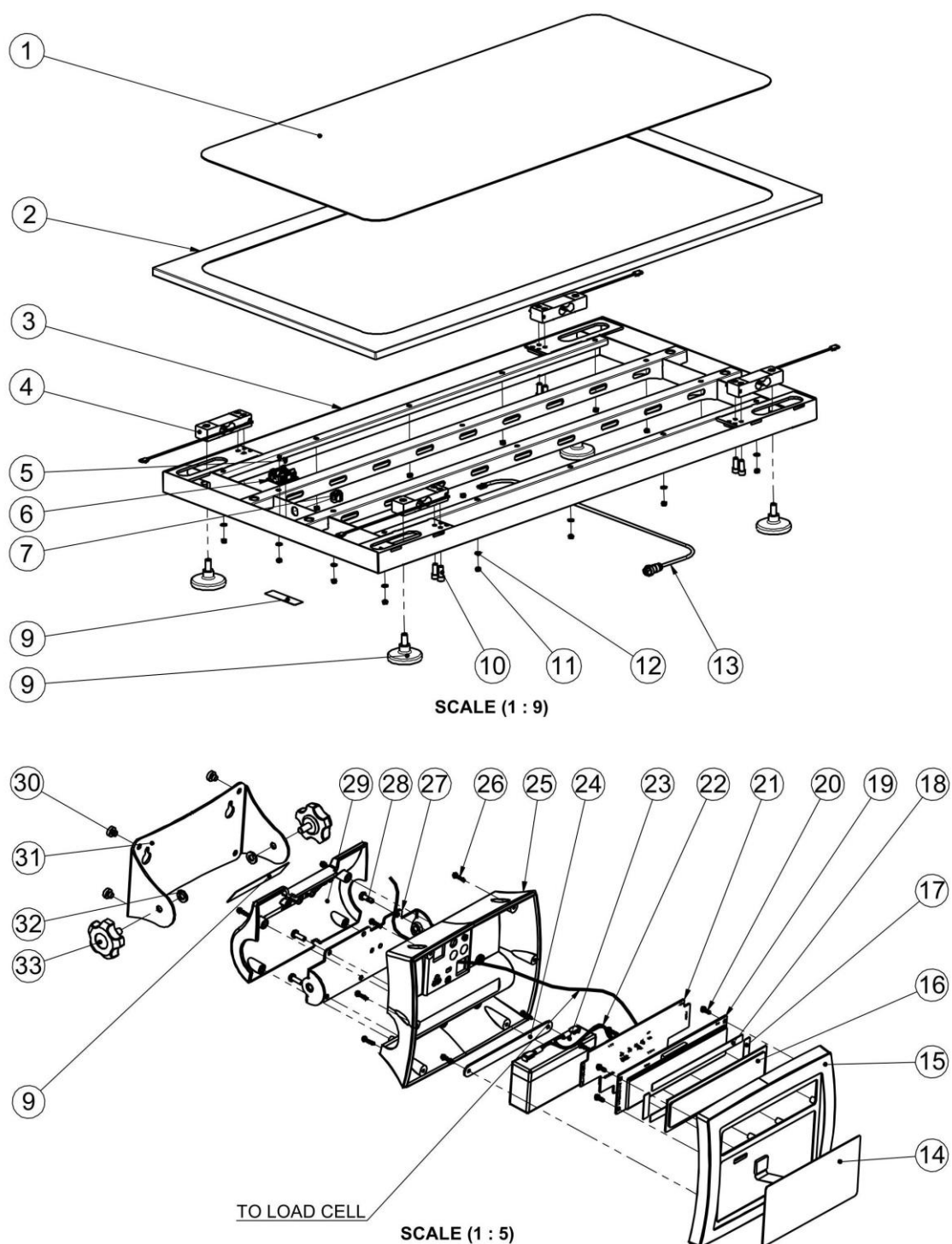
CALIBRATION PROCEDURE

Important: Scales with OIML Class III compliance have a seal to prevent any unauthorized person performing calibration.

The calibration sequence is conducted as follows:

The calibration procedure is performed using a known dead weight in either kg's or lbs		
To turn on the scales > Press the On-Off /Zero key	ON-OFF/ZERO	
Press the Reweigh and kg-lb keys simultaneously and hold	REWEIGH + kg-lb	
Then CAL appears on the display	CAL	
until the LCD displays LOAd = xxx.x kg (the default is 100.0kg; 200.0lb)	LOAd — xxx.xxkg xxx.xlb	
This default value can be changed as follows: Press on the kg-lb key until the right digit begins to roll up. When it reaches the required value release the key. By pressing twice on the kg-lb key the cursor will move over to the left digit. Keep the key depressed and the digit will roll up until the required value is achieved.	kg-lb	
Press the Reweigh key and the LCD will display CLEAr Remove all weights (objects) from the weigh platform.	REWEIGH — CLEAr	
Press the Reweigh key and the LCD will display a hyphenated line representing Zero calibration	REWEIGH —	
Wait until PUT xxx.xkg (xxx.xlb) appears on the LCD display	PUT — 100.0kg 200.0lb	
Place the calibration weight equal to the value appearing on the display on the weighing platform	Place calibration weight on scale	
Press the Reweigh button and release, the display will show CAL and will conduct calibration calculation.	REWEIGH — CAL	
FACTOR = x.xxxxx will appear on the LCD display	FACTOR — X.XXXX	
Press the Reweigh key and SAVE will appear on the LCD display	REWEIGH — SAVE	
Press Reweigh again and dOnE will appear on the LCD display	REWEIGH — dOnE	
Note: If kg/lb is pressed at this stage the calibration sequence is completely cancelled		
StArt appears on the LCD display and the scale returns to regular weighing mode.	StArt	
Remove the calibration weight from the scale and wait until the 0.0 Zero appears on the LCD.	Remove weight from the scale — 0.0	
Note: To cancel the sequence at any time during the calibration process push on the Reweigh and kg-lb keys simultaneously		

EXPLODED VIEW OF SCALE H740-10



DWG NO.	TITLE: DIGITAL VETERINARY SCALE
BC3312	MODEL NO: H741-00; H740-00

PARTS LIST H740-10

ITEM	DESCRIPTION	QNT.	CAT No.
1	RUBBER PLANE	1	464114
2	NEW COVER PLANE	1	504529
3	SCALE BASE ASSEMBLY	1	504519
4	LOAD CELL 1028 75Kg	4	234168
5	PAN CROSS HEAD SCREW NC6X1/4	2	401496
6	JUNCTION BOX	1	213832
7	STRAIN RELIEF BUSHING SR-5L-1	1	407621
8	MODEL LABEL 270kg USA RICE LAKE	1	251923
9	RUBBER LEG NC3/8"	4	462037
10	SOCKET HEAD CAP SCREW NC5/16-18X3/4	8	400642
11	PREVAILING TORQUE NIT M5	16	403603
12	FLAT WASHER M5	16	404062
13	JUN. BOX <-> MAIN BOARD CABLE	1	203711
14	PLATINUM (INBAR2) IND. KEYPAD USA RICE LAKE	1	254002
15	FRONT COVER	1	464319
16	LCD WINDOW	1	464323
17	LCD WINDOW LEKSAN 0.5 SHORT + TWO-SIDED STICK.	2	440504
18	LCD WINDOW LEKSAN 0.5 LONG + TWO-SIDED STICK.	2	440503
19	FALCON 3 BOARD	1	213888
20	EJOT CROSS HEAD SCREW KA 30XL8	6	401504
21	FALBACK BOARD	1	214011
22	CHARGER CABLE <-> BATTERY	1	203781
23	BATTERY 1.3AH 6V	1	414319
24	BATTERY BRACKET	1	461840
25	HOUSE	1	464320
26	EGOT CROSS HEAD SCREW KA 30XL12	12	401503
27	TABLE/WALL BRACKET ADAPTOR	1	461839
28	PAN HEAD CROSS RECESS SCREW M4X10	4	401508
29	BACK COVER	1	464322
30	WHITE RUBBER NAIL	4	407842
31	TABLE/WALL BRACKET	1	461838
32	FLAT NYLON WASHER M6 D-125	2	404038
33	STAR KNOB WITH TREAD BOLT M6	2	403033

LIMITED WARRANTY

Shekel Healthweigh™ scales are warranted from date of purchase against defects of materials or of workmanship for a period of one (1) year. The warranty does not cover the movable parts: batteries, cables, mains unit, rechargeable batteries or any other movable part.

The original purchaser of the product must have proof of purchase to receive warranty service. Shekel dealers or retail stores selling Shekel products do not have the right to modify or in any way change the terms and conditions of this warranty.

Your warranty does not cover normal wear of parts or damage resulting from any of the following: negligent use or misuse of the product; use on improper voltage or current; use contrary to the operating instructions; abuse including tampering; damage in transit; or unauthorized repair or alterations.

The warranty does not cover repairs necessitated by any damage to or destruction of the system where such damage or destruction is: a result of "Force Majeure" such as (fire or explosion of any origin; riot; civil commotion; aircraft; war; including: Acts of God such as lightning, hail, flood, earthquakes, hurricanes, tornadoes etc.); damage or caused by customers misuse or abuse of the system.

Call your local dealer for warranty conditions and service.

To obtain warranty service, make sure you keep your sales receipt or document showing proof of purchase.

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Kibbutz Beit Keshet, MP Lower Galilee, Israel 15247
Tel: +972 4 662 9100

www.shekelonline.com

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MP Lower Galilee, Israel 15247
Tel: +972 4 662 9100
www.shekelonline.com

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All the weigh!