



Troubleshooting Scale Systems Worksheet

With Scale indicator "On", press [On] to go into self-test. Write down the setup and calibration numbers for reference. Setup _____. Calibration _____.

1. Disconnect the Junction box from the scale indicator. Watch what happens to the weight. The weight should decrease as the junction box is disconnected. You should see a negative weight on the display. If the weight does not change when the junction box is disconnected there is something wrong with the scale indicator.
2. Press [Net/gross] and [Zero] to zero balance the scale with the J-box disconnected. The weight should stay at zero. If weight is unstable, check scale connector for moisture. This is your zero reference for the rest of the testing. No need to re-zero between load cell tests.
3. Re-connect the J-box and see what happens. Note the weight on the display _____. Should see a positive weight. It should be the weight of the mixer, cart, etc plus whatever weight is in it. If scale indicator says *+RANGE*, and the weight is at capacity check setup number to make sure gain setting is correct. A *+RANGE* or *-RANGE* could mean a bad load cell.
4. Open up the junction box. Check for any loose wires, or any wires with insulation in the connector instead of bare wire. To start the load cell troubleshooting, disconnect all load cells from the junction box. All 5 colored wires of all load cells have to be disconnected. Leave the cable to the indicator connected.
5. What is the weight on the display? _____. It should be within a few counts of the zero we had in step 2. If not there may be a problem with the junction box cable or junction box board. Disconnect J-box cable from junction box to see if problem is with cable or junction box. Weight should be stable, if not check for any moisture in the junction box, or check cable for any cuts or pinched spots.
6. Next check each load cell. Connect back up the 5 colored wires of one load cell. Weight should be a positive stable weight. When weight is added over the load cell that is connected it should go up 3 to 4 times the actual weight. Tap on the load cell to see if weight moves more than a count or two. Disconnect that load cell and test the next one.
7. Note the weight on the display when each cell is first connected up in J-box.

1. _____ 2. _____ 3. _____ 4. _____

and weight on the display goes to when weight is added over each cell.

1. _____ 2. _____ 3. _____ 4. _____

Each load cell should go up the same amount. If one load cell does not respond to weight changes it could be bad. *+RANGE*, *-RANGE* or unstable weights also mean a bad load cell.