

GRAIN MOISTURE METER MC-7821

This GRAIN MOISTURE METER is small in size, light in weight, easy to carry. Although complex and advanced, it is convenient to use and operate. Its ruggedness will allow many years of use if proper operating techniques are followed. Please read the following instructions carefully and always keep this manual within easy reach.

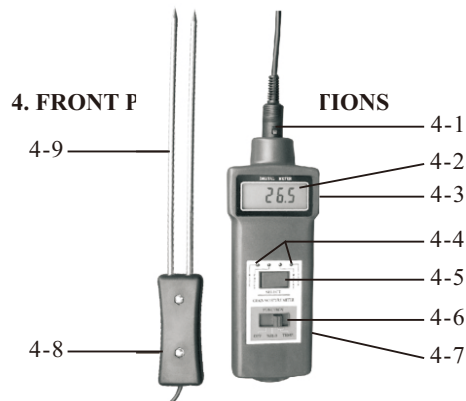


Fig.1

4-1 Plug
4-2 Display

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- 4-3 Spare button
- 4-4 LED
- 4-5 Selection button
- 4-6 Function Switch
- 4-7 Battery Compartment/Cover
- 4-8 Measurer
- 4-9 Needle

5. MEASURING PROCEDURE

- 5.1 Temperature
 - 5.1.1 Insert the PLUG of the measurer into the SOCKET.
 - 5.1.2 Set the FUNCTION SWITCH to TEMP position.
 It takes a few minutes to stabilize after inserting the steel needle into the grains or food stuff before taking readings.
- 5.2 Moisture
 - 5.2.1 Insert the PLUG of the measurer into the SOCKET.
 - 5.2.2 Hold the handle of measurement needles and leave needles in the air, i.e. don't let needles touch anything except air.

1. USAGE

Used for fast and accurate measurement of moisture and temperature in the process of allotment, acquisition, storage, machining of packed grains.

2. FEATURES

- * Used the exclusive one chip of MICROCOMPUTER to offer high accurate measurement and wide range.
- * LCD display gives exact readings with no guessing.
- * Compact, light-weight, and easy operation.
- * Can be applicable to the test of packed grains, foodstuff, feed stuff.
- * The use of durable, long lasting components, including a strong, light weight ABS-plastic housing assures maintenance free performance for many years. The housing has been carefully shaped to fit comfortably in either hand.

3. SPECIFICATIONS

- 3.1 Display: 4 digits 10mm LCD
- 3.2 Range: Moisture content: 8~30%

- 5.2.3 Set the Function Switch to the MC (Moisture Content) position to switch on the power supply. You will hear 2 times of "click" sound. That is self calibration by the instrument.

- 5.2.4 Select the grain to be measured by depressing the SELECTION button.
- 5.2.5 Insert the needles into the grain to be measured. The reading on the display will change if needles stay in grain longer.

6. BATTERY REPLACEMENT

- 6.1 When it is necessary to replace the battery, i.e. battery voltage less than approx. 5v, " " will appear on the Display.
- 6.2 To loose the screw of the battery cover away from the instrument and remove the batteries.
- 6.3 Install the batteries correctly into the case. Permanent damage to the circuit from incorrect installation.
- 6.4 If the instrument is not to be used for

Temperature: -10~55°C

3.3 Resolution: 0.1

3.4 Accuracy: Moisture: ±1%

Temperature: ±0.8°C

3.5 Operation Temp: 0~50°C or 32~122°F

3.6 Operation Humidity: ≤85%

3.7 Battery: 4x1.5 AA(UM-3) battery

3.8 Size: Main Unit: 178x68x38mm

Sensor: 368x44x25mm

Length of Pin: 250mm

Diameter of Pin: 8mm

Distance Between 2 Pins: 17mm

3.9 Weight: about 280g (not including measurer and batteries)

any extended period, remove batteries.

7. ACCESSORIES

- 7.1 Carrying case.....1pc.
- 7.2 Operation manual.....1pc.
- 7.3 Measurer.....1pc.

8. NOTES

- 8.1 This instrument is of very high input resistance. Every part has good insulation. Please keep it in a dry, dust proof place.
- 8.2 It is very, very difficult to accurately measure the moisture content of grains. This is because any grain is of organic body. The same kind of grain in different regions or states, even in the same region or state but in different soils has different characteristics. That is why we first measure the moisture content of grain by the standard method of oven, the most accurate but less efficient method to measure the moisture content, then measure the moisture content using such instruments. By calculating the bias,