

# Plant Sap Conductivity Meter

Plant sap conductivity is essentially a measure of the presence, availability or oversupply of nutrients. It can be used as a direct guideline for ideal fertiliser timing.

The Plant Sap Conductivity Meter is a Japanese manufactured specialist conductivity meter featuring flat sensor technology which allows measurement of a very small volume of liquid. This makes it ideal for plant sap measurements. The meter can also be used to measure the conductivity of soil and fertiliser solutions as well as for general water quality testing.

# **BENEFITS**

- $-\ \mbox{Range}\ \mbox{O}-19.9\ \mbox{mS/cm}.$
- Automatic temperature compensation.
- Waterproof.
- 3 sampling methods available depending on sample volume.
- Auto hold and auto power off.
- Note: Published crop specific data is unavailable as this is a relatively new research area. However, comparing data in your crop from season to season while noting yields and insect pressure, as well as making comparisons on sap nutrient status between healthy and suboptimal crops/plants, and comparing young and old leaves, can provide valuable information for fine tuning fertiliser inputs and correcting imbalances.

#### **PACKAGING:**

350 g Product Code: MFTCONHOR MONITORING METERS AND EQUIPMENT





# **Plant Sap Conductivity Meter**

#### **OPERATION GUIDE**

Follow the steps for moistening and calibrating the meter in the meter instruction manual.

NTS stock replacement standard solution in 120 mL volumes for ongoing calibration requirements. Recalibrate before each use (once only if performing several measurements).

# SAP TESTING PROCEDURE

Apply a few drops of freshly extracted sap solution to the electrode chamber ensuring that both electrodes are covered with solution. Wait for a stable reading.

#### SOIL TESTING PROCEDURE

Wearing gloves to avoid contamination take samples from 15-20 sites within the test area. Sample to a depth of 15 cm. Remove any plant matter from the top of the sample. Combine samples in a clean container and mix thoroughly.

Take a small subsample of the mixed soil and mix one part soil with five parts deionised water. Shake thoroughly for 5 seconds. Allow the contents to sit for 30 minutes. Swirl the solution then transfer a few drops to the electrode chamber using a pipette. The same soil solution can be used for testing pH. The ideal soil conductivity when prepared as a 1:5 solution is  $0.1-1.0\,$  mS/cm. However, ideal EC values are dependent on soil clay content and crop specific salt tolerance.

#### **IMPORTANT**

- If the meter has not been used for an extended period of time it may be necessary to repeat moistening of the electrode.
- When not in use keep the unit free from dust inside the storage case with the plastic cap in place.
- Warning: The electrode chamber has a thin glass backing – take care while using and cleaning to avoid damage.

### **PACK INCLUDES:**

- Meter
- Sensor
- Storage case
- Batteries
- Standard solution 1.41 mS/cm
- Moistening solution
- Pipette
- Full instruction manual

# **ACCESSORIES AVAILABLE:**

Replacement Electrode
Product Code: METERCON

Standard Conductivity Solution 1.14 mS/cm 120 mL
Product Code: METCONS1413-120

**Disclaimer:** Any recommendations provided by Nutri-Tech Solutions Pty Ltd (NTS) or its Distributors are advice only. As no control can be exercised over storage, handling, mixing, application or use, or weather, plant or soil conditions before, during or after application (all of which may affect the performance of our program), no responsibility for, or liability for any failure in performance, losses, damages, or injuries (consequential or otherwise), arising from such storage, mixing, application, or use will be accepted under any circumstances whatsoever. NTS recommend you contact an Agronomist prior to product application. The Buyer assumes all responsibility for the use of any NTS products.

YOUR LOCAL NTS DISTRIBUTOR: