



MPKit Applications



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MPKit

MP406

Moisture Probe with 4.5 m cable

MPM160

Moisture Probe Meter
(Uses common 9v battery)

MPExt Rod

2 Extension Rods each 35cm
(Total length 70 cm)

MP Case

Aluminium carry case



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MPKit Applications

Engineering and Industrial
Concrete Pre mixture
Mine Tailings
Sand Stock Piles
Building Foundations
Fly Ash - Power Station
Mine Cover Laboratory Studies
Landfill Cover Monitoring

Soil Moisture
Irrigation Management
Sport Fields
Parks and Gardens

Ecology and Catchments
Soil Profile Studies
Catchment and Hydrology Studies
Plant Ecology Studies



Checking irrigation of turf



Checking watering effectiveness in parks and gardens



Checking damp in building foundations



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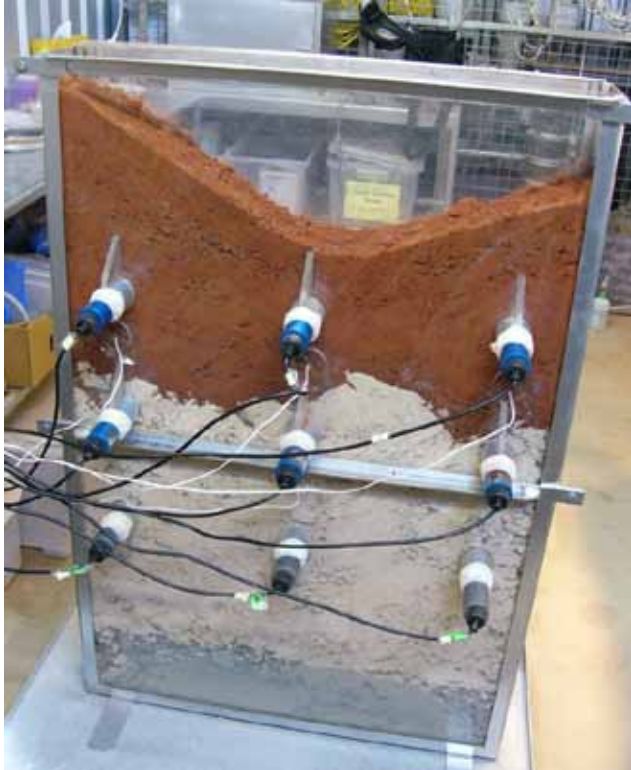


MP406

Soil Moisture Sensor



Laboratory assessment of mine cover materials



Catchment and hydrology studies



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Landfill store and release cover monitoring



Monitor in situ water use of introduced and native grasses



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Applications

SMD4-P + MP406

- Irrigation Scheduling
- Soil Moisture Research
- Hydrology of Catchments
- Fly Ash – Power Station
- Landfill Cover Monitoring

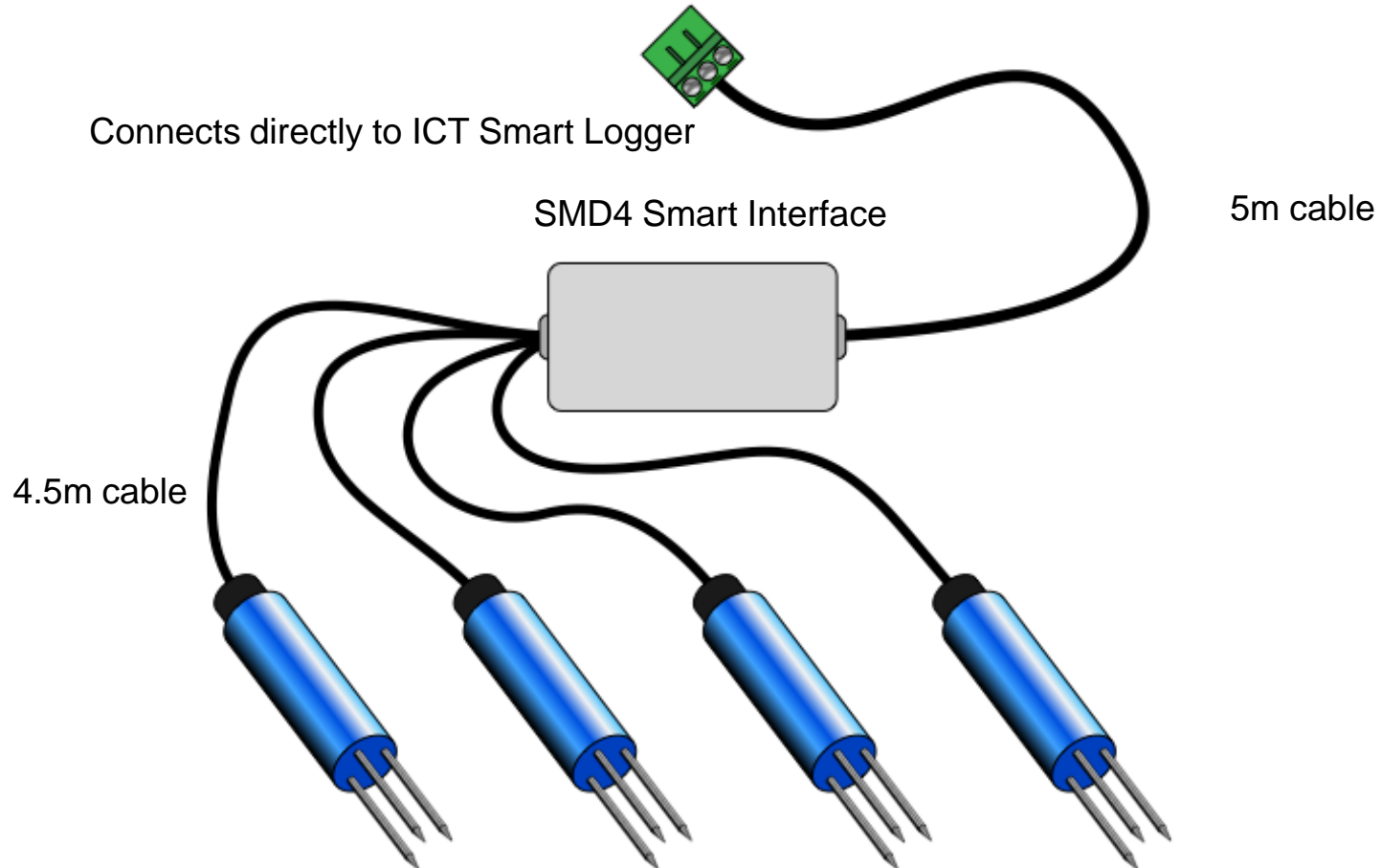


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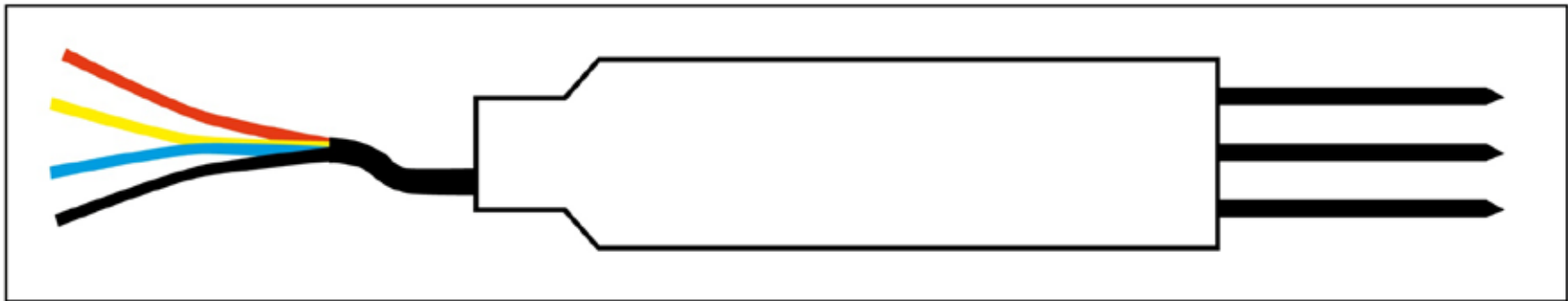
ICT Smart Logger Option



Analogue Datalogger Option

The connections are:

- n RED 9-18 volts (+ve supply) = switched or power up
- n YELLOW signal output (+) millivolts
- n BLUE signal ground (-)
- n BLACK DC ground (-ve supply)



4-20mA Output Option

Applications

- § Irrigation Controllers
- § PLC

MP406 Wiring Connections:

Model	Red	Yellow	Black	Blue
MP406C-12V	Power 11-16v DC	4-20mA output	DC Ground	Analogue Ground
MP406C-24V	Power 16-24v DC	4-20mA output	DC Ground	Analogue Ground



Lookup Table

VSW%	mV MP406	VSW%	mV MP406
0.00	0	55.00	1015
2.00	120	60.00	1025
5.00	210	65.00	1035
10.00	310	70.00	1045
15.00	415	75.00	1055
20.00	510	80.00	1065
25.00	610	85.00	1075
30.00	720	90.00	1085
35.00	825	95.00	1105
40.00	895	100.00	1160
45.00	955		
50.00	1005		

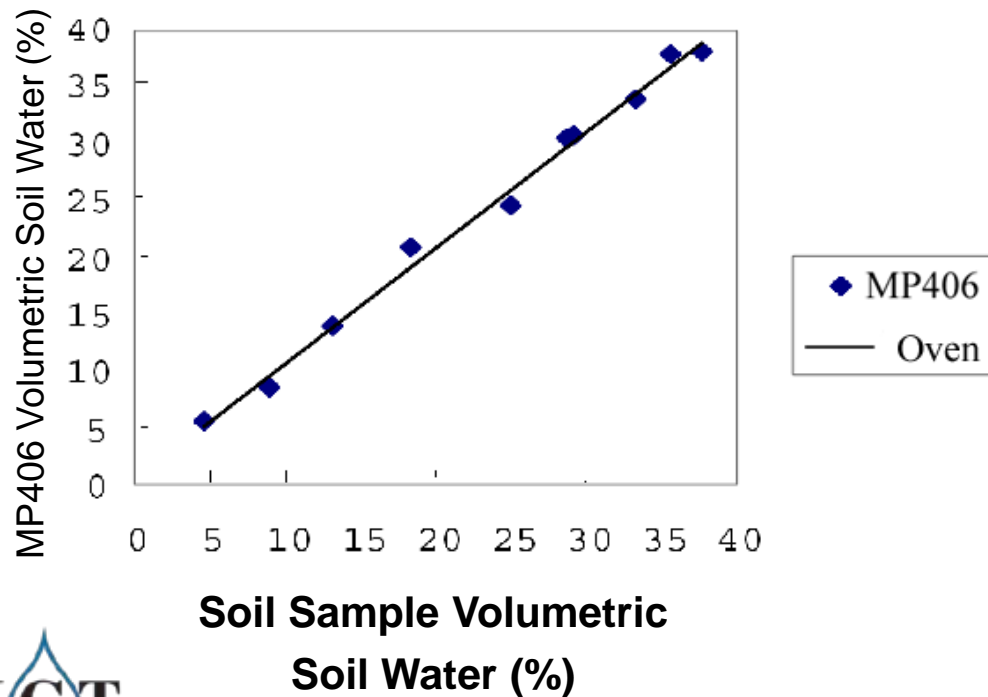
- n Built into SMD4-P Interface
- n Needs programming into analogue datalogger



MP406 Measurement of VSW%

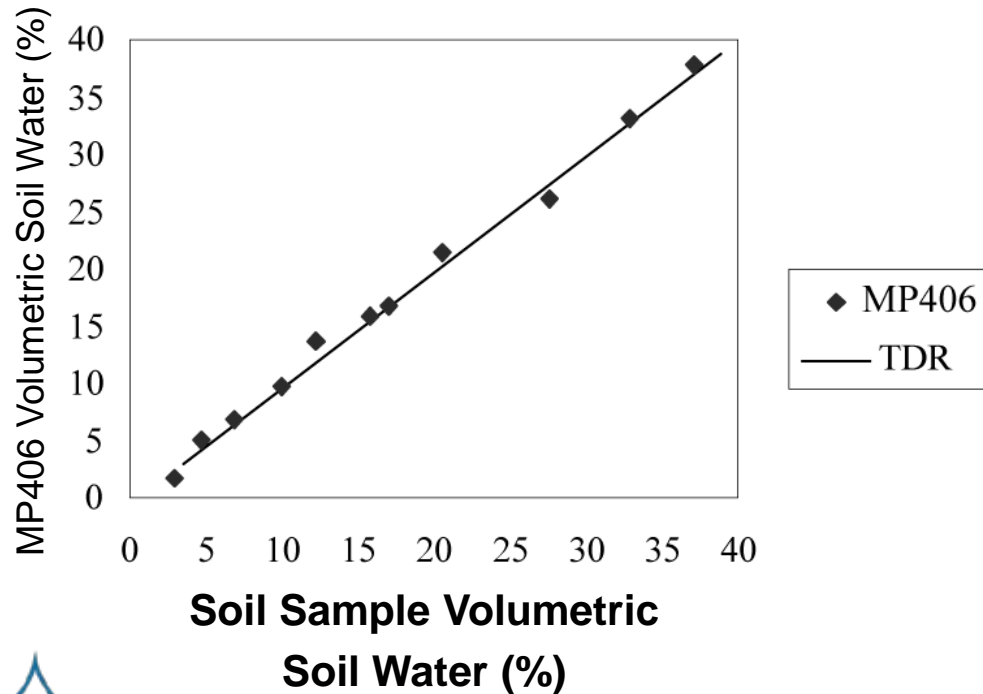
MP406 Measurement of VSW%
using Soil Samples as a standard

- n MP406 measurement of Absolute Volumetric Soil Water Percent (VSW%) from prepared independent soil samples



Comparing MP406 & TDR

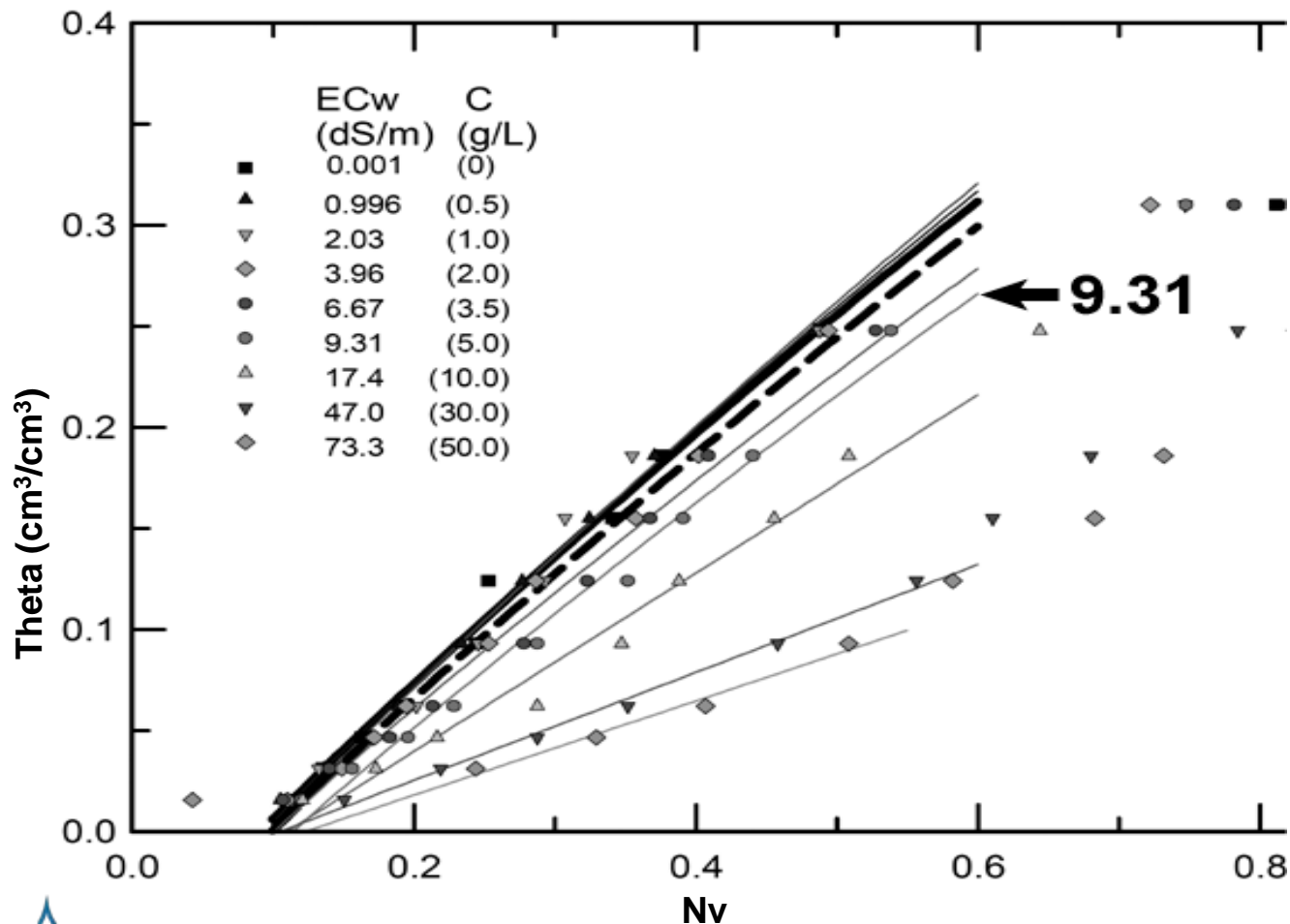
**MP406 Measurement of VSW%
using TDR as a standard**



The MP406 in comparison to “Trase” TDR measurement of Absolute Volumetric Soil Water Percent (VSW%) from prepared independent soil samples



Effect of Salt Concentration on Calibration



From: Inoue, M "Effect of salt concentration on measurement of soil water content based on dielectric constant", Japanese Journal of Soil Physics. www.soc.nii.ac.jp/jssp3/45thSympo/45abstract_list.htm



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