

# FRONT PANEL FEATURES

## BATTERY COMPARTMENT on rear

- i. One 9 V PP3 battery gives approximately six months use.
- ii. **WARNING:** Disconnect the DIGITELL PLUS from the telephone line before changing the battery.
- iii. If all the LEDs on the bar graph become illuminated, it's time to replace the battery.

**PHONE LEAD SOCKET**      **HEADPHONE SOCKET (3.5mm jack)**      **DIP SWITCHES**

## DISPLAY

Two line display scrolls up to 32 characters giving dialled digits and status.

## BAR GRAPH

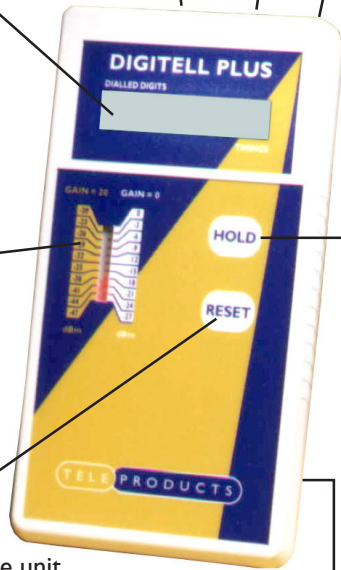
Measures speech or signal level in dBm over a 50 dB range.

## RESET

Press Reset to start the unit. DIGITELL PLUS will Auto-power down under two minutes to conserve battery power. To restart the unit press Reset. Pressing the button whilst the unit is on will restart the timer. Press Reset at any time to reset the display.

## AC Adaptor

If used, this will override the timeout.

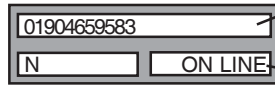


**AC ADAPTOR SOCKET**

## HOLD

Pressing Hold freezes the display, which then flashes. Press Hold again and the display resumes scrolling.

# DISPLAY FEATURES

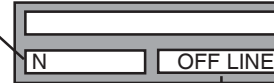


**DIGIT BAR**, shows the digits dialled, 16 at a time

**STATUS BAR**, provides information on the line, the digit timings and type of digit

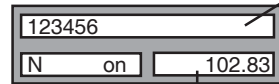
## LINE POLARITY

N indicates B Pos wrt A  
P indicates A Pos wrt B  
□ means there is no line connected



## LINE CONDITION

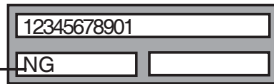
It changes to On-line when the line is looped; this clears when it is not connected to a line



**DIGITS DISPLAY**, listed from the left; up to 32 digits can be stored and scrolled

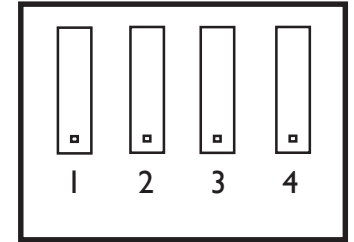
**TIMINGS** of the last digit dialled is shown as:

on/off      Tone digits  
mke/brk/idp      Pulse digits



**GRABBER MODE**, indicated by the character G shown next to the polarity

# DIP SWITCH FEATURES



A diagram to illustrate the Factory Default settings of the dip switches located at the top of the DIGITELL PLUS.

## SWITCH 1 DIGIT GRABBER MODE

In this mode the DIGITELL PLUS will detect all digits on the line, regardless of whether line current is being drawn or not. The selection of this mode is indicated by a G on the Mode Bar and Grabber on the Status Bar. Factory Default is Down with the Digit Grabber mode Off.

## SWITCH 2 EXTENDED AUTO POWER DOWN TIME

In the Down position of Switch 2, the time of the Auto-power down is 2 minutes (Factory Default). In the Up position the time is extended to 4 minutes. The selection of the extended Auto-power down is indicated by a T on the Mode Bar.

## SWITCH 3 FEED VOLTAGE SELECTOR

This enables the user to choose the correct feed voltage for the system they are testing. This is important when measuring the timings for Pulse digits and for correct On/Off-line status. The Up position of Switch 3 sets this to 24 V. The Down position selects 48 V (Factory Default).

## SWITCH 4 LOW LEVEL MONITOR

In this mode the DIGITELL PLUS introduces extra amplification and shifts the range of the bar graph to assist with the measuring of low level signals, typically <-20 dBm. This mode is selected by putting Switch 4 to the Up position. Factory Default is Down.

# SPECIFICATION

## PULSE DIALLING

Make .....	25-41 mS
Break .....	50-82 mS
IDP .....	>200 mS
Off-line .....	>300 mS
On-line .....	>200 mS
TBR .....	80-110 mS

## TONE DIALLING

Time .....	>40 mS
Frequency .....	$\pm 1.5\%$

## BAR GRAPH DISPLAY

Reference.....	Top LED $0 \pm 1$ dBm
Range .....	0 to -50 dB
Step size .....	3 dB per LED $\pm 1$ dB

## MAIN DISPLAY

LCD .....	2 x 16 digit dot matrix
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## LINE IMPEDANCE

AC IMPEDANCE .....	A-B $>100$ k $\Omega$
DC RESISTANCE .....	A-B $>1$ M $\Omega$

## TOLERANCE (unless otherwise specified)

Timing .....	$\pm 10\%$
Level .....	$\pm 3$ dB

## POWER

Battery .....	1 x 9 V PP3
AC Adaptor (optional) .....	230 V Input 12 V, 500 mA Output

# SAFETY

Read this manual completely before using the instrument.

- 1 When the DIGITELL PLUS is connected to a PSTN line, due consideration must be paid to any hazard involved.
- 2 The DIGITELL PLUS is designed for use by a competent engineer only.
- 3 The DIGITELL PLUS does not have any user serviceable parts. Under no circumstances should the user attempt to open the unit. If opened, the warranty will be invalidated.
- 4 Disconnect from the telephone line before changing the battery.

Your Crucible Technologies product is guaranteed for one year from the date of purchase. Please keep your invoice as proof of purchase.

Should a problem arise with the product, please contact; [tech@crucible-technologies.co.uk](mailto:tech@crucible-technologies.co.uk) for technical assistance.

If you wish to return your product please contact; [returns@crucible-technologies.co.uk](mailto:returns@crucible-technologies.co.uk) to receive a returns authorisation number, and instructions for returning the product.

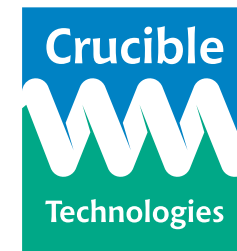
You will be advised of costs prior to any work commencing.

This guarantee does not affect your statutory rights.

# DIGITELL PLUS

## PORTABLE DIGIT ANALYSER AND LINE MONITOR

### USER MANUAL Issue 1.5



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