**Standard Hand-held pH Meter** 



# CyberScan

PH

Cyber)can pH 110 PHIMVI°CI°F Meter with RS232

MEAS

READY

# pH 11/110

for pH & mV

**CyberScan pH 11 Meter** pH/mV/°C

CyberScan pH 110 Meter pH/mV/°C/°F/RS 232C

MODE

SETUP



- Microprocessor Based
- 5-point Push Button Calibration
- Auto Buffer Recognition
- User Customisable Setup
- Stores/Recalls 100 Data Sets
- Large, Easy-to-read Display
- Choice of pH Buffer sets: USA, NIST, DIN, Low Ionic
- RS 232C Communication Port







The CyberScan pH 11 / 110 meters are equipped with new generation Application Specific Integrated Circuits (ASIC) that provide many advanced features and user customisable options while maintaining a user-friendly interface. Battery or AC mains powered, these meters are ideal for lab and field pH measurements.

#### USER CUSTOMISATION OPTIONS

Among the several user customisable options are: • pH resolution • READY indication • Auto-Off • User reset • Memory • pH buffer standards.

#### **MULTI-POINT CALIBRATION**

Up to 5-point calibration with standard pH buffer options maximises full range accuracy. Autobuffer recognition minimises calibration errors. Built-in Automatic Temperature Compensation (ATC) ensures reliability of measurements under fluctuating temperature conditions.

#### MULTI-PARAMETER MEASUREMENT

Besides pH and temperature measurement modes , the meter can be set to millivolt mode for  ${\sf ORP}$  (Redox) or indirect ion concentration measurements.

#### EASY-TO-READ DUAL DISPLAY

The custom designed dual LCD (Liquid Crystal Display) is extremely easy to read. It displays primary and secondary modes simultaneously complete with units of measure. Graphical icons and self-diagnostic message codes provide user comprehensive information for easy operation.

#### **MEMORY AND COMPUTER INTERFACE**

Up to 100 data sets can be stored in a non-volatile memory which prevents data loss even when meter is powered off. A RS232 port (pH 110) at the bottom of the instrument enables transfer of data (via cable) to a printer or a computer for analysis. Data Acquisition Software and cables are included.

#### SELF DIAGNOSTIC MESSAGES

Examples of Self-diagnostic information are: • Electrode Characteristics (pH Slope & Offset) • Relative mV Offset • Calibrated Values.

#### INNOVATIVE DESIGN

The pH 11 / 110 meters are innovative and ergonomic in design. Meters are designed for convenient one-hand field operation and table top laboratory use. Keypad is splash-proof and designed for easy finger touch operation. Aesthetic attachments include electrode holders for pH and temperature electrodes and a built-in meter stand for table top measurements. A rugged carrying case enables compact and convenient storage of meter, electrode, calibrating solutions and accessories helpful for field testing.

#### WARRANTY .

Eutech Instruments warrants its meters to be free from manufacturing defects for 3 years and electrodes for 6 months.

Eutech Instruments also provides meter accessories and calibration standards. Refer to separate brochures for information.

The CyberScan series meters are registered under U.S. Patent #354,921. Patents outside U.S. are pending.

Note: Eutech Instruments reserves the right to make changes, improvements and modifications to products shown.

| Meter Specifications:                       |   |   |          |                           |               |            |  |
|---|---|---|----------|---------------------------|---------------|------------|--|
|   | pH 11                                   |   |          | рН 110                    |               |            |  |
|   | Range                                   | Resolution  | Accuracy | Range                     | Resolution    | Accurac    |  |
| pН  | -2.00 to 16.00                          | 0.01  | ±0.01    | -2.00 to 16.00            | 0.01          | ±0.01      |  |
| mV<br>Extended                              | -1999 to +1999                          | 1   | ±2       | -1999 to +1999            | 1             | ±2         |  |
| mV  | -199.9 to +199.9                        | 0.1   | ±0.2     | -199.9 to +199.9          | 0.1           | ±0.2       |  |
| Temp.<br>° C                                | -10 to 110                              | 0.1   | ±0.5     | -10 to 110                | 0.1           | ±0.5       |  |
| Temperature<br>° F                          | —                                       | —   |          | 14 to 199.9<br>200 to 230 | 0.1<br>1      | 0.9<br>0.9 |  |
| Relative<br>mV Offset<br>Display            | _                                       |   |          | Yes                       |               |            |  |
| Slope %                                     | 80 to 120                               |   |          | 80 to 120                 |               |            |  |
| Memory                                      | 50                                      |   |          | 100                       |               |            |  |
| Output                                      |   |   |          | RS 232C                   |               |            |  |
| Auto-hold                                   | —                                       |   |          | Yes                       |               |            |  |
| pH Buffer                                   | USA : pH 1.68,4.01,7.0                  |   |          | 00, 10.01,12.45           |               |            |  |
| Sets  | NIST : pH 1.68, 4.01, 6.86, 9.18, 12.45 |   |          |                           |               |            |  |
|   | DIN :                                   |   | -        | pH 1.09, 3.06, 4.6        | 65, 6.79, 9.2 | 23, 12.75  |  |
|   | Low Ionic :                             |   | -        | pH 4.10                   | ) and 6.97    |            |  |
| Temperature Compensation Automatic / manual |   |   |          | anual (from 0 to 10       | 0 °C)         |            |  |
| No. Of Calibra                              | ation Points                            | 2 to 5 (up to 6 for pH 110 using DIN)                         |          |                           |               |            |  |
| pH Slope & O                                | Offset Display                          | Yes   |          |                           |               |            |  |
| Hold Functio                                | n                                       | Yes   |          |                           |               |            |  |
| Auto Power-c                                | off                                     | After 20 minutes (selectable)                                 |          |                           |               |            |  |
| Averaging / S                               | Stability (READY)                       | Selectable  |          |                           |               |            |  |
| Inputs                                      |   | BNC, 2.5 mm phono jack, power jack                            |          |                           |               |            |  |
| Display                                     |   | Custom Dual LCD   |          |                           |               |            |  |
| Power Require                               | ements                                  | 4 'AAA' alkaline batteries, AC / DC adapter 9V, 200 mA        |          |                           |               |            |  |
| Battery Life                                |   | > 700 hours   |          |                           |               |            |  |
| Dimensions /                                | Weight                                  | Meter : 18.7 x 9 x 4cm ; 290g<br>Boxed : 24 x 23 x 7cm ; 650g |          |                           |               |            |  |

## ORDERING INFORMATION

| Order No.      | ltem   |
|----------------|--|
| EC-PH11/01     | CyberScan pH 11 meter with temperature probe (EC-PH5TEM01P)    |
| EC-PH110/01    | CyberScan pH 110 meter with temperature probe (EC-PH5TEM01P),  |
|                | software and RS232C cable                                      |
| EC-PH11/02K    | CyberScan pH 11 meter with temperature probe (EC-PH5TEM01P),   |
|                | pH electrode (EC-FC72521-01B), and pH calibration solutions in |
|                | rugged carrying case kit                                       |
| EC-PH110/02K   | CyberScan pH 110 meter with temperature probe (EC-PH5TEM01P),  |
|                | pH electrode (EC-FC72522-01B), software, RS232C cable and pH   |
|                | calibration solutions in rugged carrying case kit              |
| EC-FC72521-01B | Plastic body single junction pH electrode                      |
| EC-FC72522-01B | Plastic body double junction pH electrode                      |
| EC-FC79601-01B | Plastic body single junction ORP electrode                     |
| EC-FC79602-01B | Plastic body double junction ORP electrode                     |
| EC-POUCH02     | Carrying pouch for portable meter                              |
|                |  |

Electrodes are supplied with 1-metre cable length and BNC termination



### Eutech Instruments Pte Ltd

55, Ayer Rajah Crescent, #04-16/24, Singapore 139949 Tel: (65) 6778 6876 Fax: (65) 6773 0836 E-mail:marketing@eutechinst.com Website: http://www.eutechinst.com

FROST & SULLIVAN Market Engineering Award Recipient Protecture Strategy 2001

# Eutech Instruments Europe B.V.

P.O.Box 254, 3860 AG Nijkerk Netherlands Tel: (31) 33-2463887 Fax: (31) 33-2460832 E-mail: info@eutech.nl Website: http://www.eutech.nl Distributed By: