



# ▶ SM02 Strain Gauged Rockbolt Portable Reader & Logger



The **SM02 SGMETER** is designed to read and record data automatically from multiple single arm strain gauges, as used in Golder RMT's instrumented rock bolts. Its rugged construction makes it ideal for use in the mining and civil engineering industries.

The SM02 can be used simply to take individual readings for writing down in a notebook or it can be used as an electronic notebook to store readings from several instrumented bolts or gauge sets in succession for direct downloading to a PC and subsequent processing by RMT's Exbolt for Windows software. Readings are taken in Microstrain units, quickly and simply, through an interactive dialogue using the keypad and high visibility LCD screen. The SM02 will read and store the data from up to 18 120 ohm resistive strain gauges (one instrumented rockbolt) in less than one second. Battery voltage and previously recorded data, can also be checked during operation.



The SM02 is powered by a rechargeable Nickel – Metal Hydride battery powerpack giving over 8 hours continuous use between charges. The battery charger supplied is an "intelligent" unit which will not overcharge the powerpack. It should be noted that the SM02 does not have ATEX approval and should only be used where there is a possibility of an explosive atmosphere, under a special precautionary procedure, such as covered by Regulation 19 (2) g of the UK Electricity at Work Regulations 1989. An independent assessment and example of such a procedure is provided in the SM02 handbook.

#### The SM02 Strain Gauge Meter Offers:

- ▶ Measurement of 120 ohm resistive strain gauges in quarter bridge configuration
- ▶ Liquid Crystal Display giving microstrain units with a range of +/- 20,000
- ▶ Rechargeable Nickel-Metal Hydride battery
- ▶ Ability to read up to 18 strain gauges automatically
- ▶ Hand-held graphite filled glass fibre antistatic case with shoulder strap

#### Specification

High visibility 8 character numeric Liquid Crystal Display. 12v NiMH rechargeable batteries providing over 8 hours continuous use. Temperature Range – 0 to +50° C operating temperature, -20 to + 50° C transport and storage temperature. Excitation Voltage – 2.5v. Dimensions – 270 x 240 x 180mm, weight 3.6kg.

#### Accessories included with unit:

- ▶ Multi-voltage a.c. "intelligent" battery charger
- ▶ User manual and plasticised instruction sheet
- ▶ USB cable and drivers for PC interface
- ▶ Exbolt for Windows software package including manual



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RMT015-S/11-09

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