

RMH-301B

Digital Strain Recorder



Suitable for long-term measurement in the absence of personnel under the environment without external power supply

- Small & lightweight
- Equipped with a display used to confirm setting conditions and measured values
- Easy to collect data by USB memory

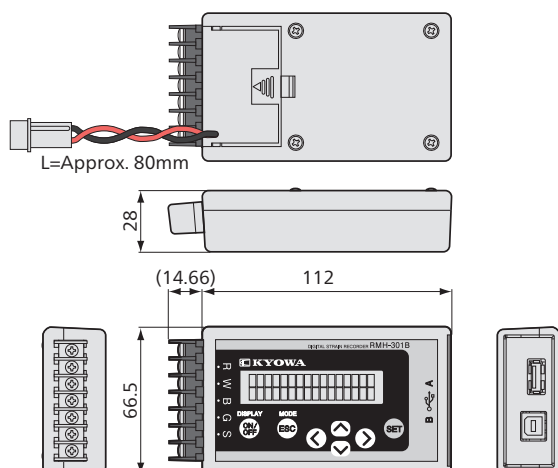
RMH-301B is a battery-powered data collection device with low power consumption, suitable for long-term measurement in the absence of personnel at the places without external power supply such as long-distance mountainous and heavy-snowfall area.

Enables to strain-gage civil engineering transducers and civil engineering transducers with a thermal sensor and of single-channel measurement.

Equipped with operation panel and display enables operation relating to measuring condition setting and measurement.

The optional software (RMH-390A) can be used to control and collect data via USB interface.

■ Dimensions



● Collects data by USB memory.

Specifications

■ Hardware	
Channels	1
Applicable Transducers	Strain-gage transducers Strain-gage civil engineering transducers Civil engineering transducer with a thermal sensor
Compatible Bridge Resistance	350 Ω (Full-bridge system)
Cable Length	Max. 2.0 km (4-conductor (0.5 mm ²) shielded cable)
Gage Factor	2.00 fixed
Bridge Current	Approx. 2.19 mA DC (Constant current)
Temperature Measurement Current	Approx. 0.24 mA DC (Constant current)
Measuring Range	Strain: ±20000 × 10 ⁻⁶ strain Temperature: -30.0 to 70.0°C
Resolution	Strain: 1 × 10 ⁻⁶ strain Temperature: 0.1°C
Measuring Accuracy	Strain: ±0.1%FS Temperature: ±0.5°C
Data Storage	Strain: 30720 times Temperature: 30720 times Strain + temperature: 20475 times
Clock	Year (2 digits of the Gregorian calendar), month, date, hour, and minute
Measuring Interval	1 to 59 minutes (1 minute/step) 1 to 99 hours (1 hour/step)
Display	LCD (16 digits×2 lines)
Operation	Arrow keys, ON/OFF, SET, ESC
Interface	USB1.1*
Power Supply	6 to 15 VDC, optional battery pack
Current Consumption	During operation: 100 mA or less Standby status: 100 μA or less
Input Specifications	Bolt (M3) Applicable press-fitted terminal: RAV, 1.25-3 or equivalent
Operating Temperature	-20 to 50°C (0 to 50°C for data collection)
Operating Humidity	10 to 95% (Non-condensing)
Operating Environment	Dust or the inductive noise of a bulk motor must not be present.
Dimensions	112 W × 28 H × 66.5 D mm (Excluding protrusions)
Weight	Approx. 180 g
■ Control Software RMH-390A (Optional Accessories)	
OS	Windows Vista® (32 bits, Japanese version)
Interface	USB Interface (RMH-301B) CD-ROM or DVD (For software installation)
CPU	PentiumIII, 1 GHz or advanced
Memory Required	RAM 512 MB or more
Hard Disk	Hard disk capacity: 20 MB or more (For installation, excluding that for data) Spare capacity: 10 MB or more (Excluding that for saving measuring data)
Graphic	High resolution video (Super VGA): 800 × 600 or more Adapter and monitor: 1024 × 768 Full-color or more
Others	Keyboard and Microsoft Mouse or compatible pointing devices

Standard Accessories Instruction manual (CD-R)

Optional Accessories USB cable N-38 (1 m), N-39 (2 m)
Battery Pack RB-5A (5 Ah), RB-10A (10 Ah)
Control Software RMH-390A

* Some models of USB memory may not collect data correctly.
For recommended models, please contact us.

* Control Software RMH-390A is Japanese version only.



Data Loggers