

# TM7100 Handheld Flux Meter



### 1. Summary

The **TM7100** is a portable measuring instrument, designed with a high speed microprocessor and a low drift electronic integrator. It's applied for measuring spatial magnetic field or permanent magnet flux  $\Phi$  with types of coils.

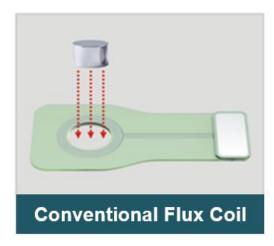
### 2. Features

- Range:0.2 mWb~2 Wb.
- Accuracy: class1 or 2.
- Drift after zeroing ≤ 2 μWb/min
- 4-digits display, minimum resolution 1 μWb
- Unit switch: mWb, Mx
- Maximum hold function
- One-key reset and zero drift
- Display support backlight and battery power.
- Lithium battery power supply.
- Small size, light weight.
- Support various of measuring coil.



#### 3. Coil for Measurement

#### **☆ Various Measurement Coils**









- Conventional Flux Coil: Applied for measuring the magnetic flux of a single sample.
- Skateboard Coil: Applied for testing batch samples on the production line.
- Helmholtz Coil: Applied to the magnetic moment of the sample.
- Stator Coil: Applied for fast measurement of the magnetic flux of the stator core.
- Remark: The above coils are all options and can be customized.



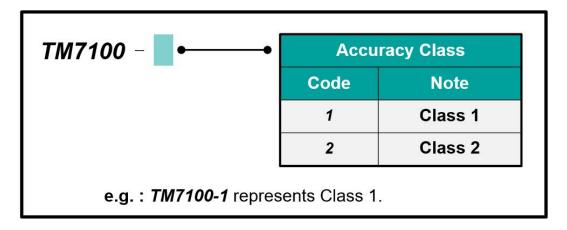
### 4. Specifications

| Range           |         | 2 mWb  | 20 mWb | 200 mWb | 2 Wb  |  |
|-----------------|---------|--|--------|---------|-------|--|
| Resolution      |         | 1 µWb  | 10 μWb | 0.1 mWb | 1 mWb |  |
| Measuring Range |         | 0.2 mWb~2 Wb                                       |        |         |       |  |
| Accuracy        | Class 1 | ±(1%*RD + 10 μWb)                                  |        |         |       |  |
|                 | Class 2 | ±(2%*RD + 10 μWb)                                  |        |         |       |  |
| Zero Drift      |         | Max(2 μWb/min, 0.05%*RG <sup>②</sup> /min )        |        |         |       |  |
| Remark          |         | ① RD is the reading value, ② RG is the range value |        |         |       |  |

## 5. General Specifications

| Power Supply            | Lithium battery                               |  |
|-------------------------|---|--|
| Tompovotuve Doufovmenos | Operating temperature:0°C~45°C                |  |
| Temperature Performance | Storage temperature:-20°C~70°C                |  |
| Hamidita Desferance     | Working humidity: 20%∼80% R·H, Non-condensing |  |
| Humidity Performance    | Storage humidity: < 85% R·H, Non-condensing   |  |
| Weight                  | About 350 g                                   |  |
| Interface               | Magnetic flux coil input, USB interface       |  |
| Dimensions              | 90 mm(W) × 40 mm(D) × 165 mm(H)               |  |

## 6. Ordering Information





### 7. Coil Selection

| Serial<br>Number | Picture                                  | Name                                     | Specification          | Quantity | Remark                |
|------------------|--|--|------------------------|----------|-----------------------|
| 1                | 6  | TM1410 Magnetic Flux<br>Measurement Coil | Conventional Flux Coil | 1        | Optional<br>Accessory |
| 2                | TM1420 Magnetic Flux Sk Measurement Coil |  | Skateboard Coil        | 1        | Optional<br>Accessory |
| 3                |  | TM1430 Magnetic Flux<br>Measurement Coil | Helmholtz Coil         | 1        | Optional<br>Accessory |
| 4                | • •                                      | TM1440 Magnetic Flux<br>Measurement Coil | Stator Coil            | 1        | Optional<br>Accessory |

Note: The above accessories need to be purchased separately and indicated in the order contract.