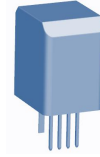


LTJ-XM-006 Series



Features

- a) High sensitivity and excellent gap characteristics.
- b) Output voltage is independent of scanning speed.
- c) Excellent CMRR performance due to differential design.
- d) Sensor has detection width of 6 mm.

Applications

- a) Bank note validator.
- b) Magnetic ink document reader.

Absolute parameters

| Item | | Value | Unit |
|---------------------|-------------------|-----------|------|
| Max. Supply Voltage | $V_a \text{ max}$ | 6 | V |
| Isolation Voltage | V_I | 200 | V |
| Working Temperature | T_{opg} | -10 ~ +65 | °C |
| Storage Temperature | T_{stg} | -30 ~ +85 | °C |
| Working Humidity | H_{Rh} | 10% ~ 90% | |
| ESD Level (HBM) | | 2 | kV |

Electrical specifications (Ta = 25°C)

| Item | | Condition | Min | Typ | Max | Unit |
|--------------------------|------------------|---------------------|-----|-----|-----|------|
| Supply Voltage | V_{cc} | | 1 | 5 | 5.5 | V |
| Resistance | R | | | 2 | | kOhm |
| Offset | V_d | $V_a = 5 \text{ V}$ | | 2.5 | | V |
| Sensitivity ^① | $V_{\text{P-P}}$ | $V_a = 5 \text{ V}$ | | 1.5 | | mV |
| Noise | V_{nw} | $V_a = 5 \text{ V}$ | | | 50 | uV |

① The sensitivity can be calculated by using the testing method described below (Fig. 1).

Physical parameters

| Item | | Part Number | Min | Typ | Max | Unit |
|----------------------------|-------|-------------|-----|------|-----|------|
| Detection Width | W_d | LTJ-XM-006 | | 6 | | mm |
| Surface Field ^② | H | LTJ-XM-006 | | 1000 | | Gs |
| Channel width | W_c | LTJ-XM-006 | | 6 | | mm |

② The magnetic field on the surface of the sensor along the width direction.

Dimensions

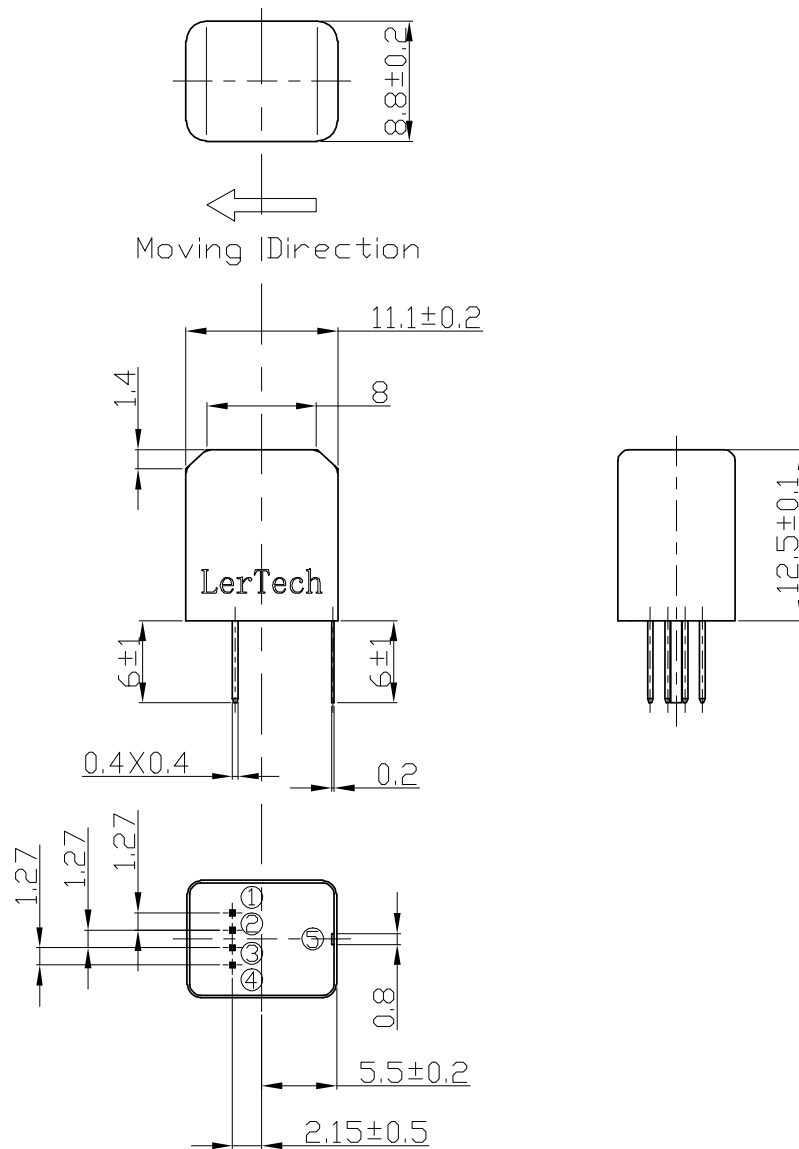


Table for wiring

| Terminal No. | Wiring |
|--------------|--------|
| ① | S- |
| ② | GND |
| ③ | S+ |
| ④ | VCC |
| ⑤ | F.G |

n : channel No.

Case : Cu thickness 0.2

Magnet : NdFeB

Unit : mm

