SEMITEC®
Ishizuka Electronics Corporation

KT Thermistors ML Type

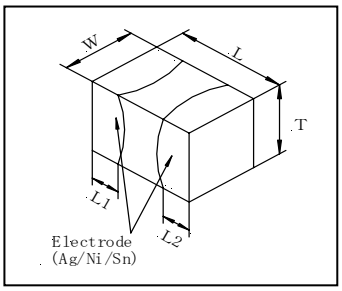
The electrodes of the KT thermistors ML type are part of its internal structure and thus ensure high reliability. The KT thermistors ML type also exhibits low capacitance (<3pF) at high frequencies. The multilayer design allows a wide range of resistance values suitable for temperature measurement and compensation.

Type Number

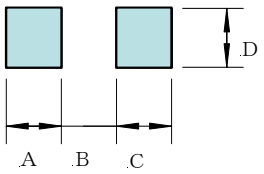
103 KT M 1608 □ 410 H

- Tolerance of B Value (H:±3%)
- B Value (ex.410:4100K,275:2750K)
- Tolerance of Zero-power resistance (H: ±3%,J: ±5%)
- Size code (Fig.1)
- Type name (Temperature Compensation ML Type)
- SMD Chip Thermistor
- Zero-power resistance at 25℃ (ex.103:10×10³ Ω)

Dimensions



Recommended land dimension for PCB



Unit(mm)

Size	A	B	C	D
1005 (EIA:0402)	0.6	0.5	0.6	0.6
1608 (EIA:0603)	1.0	1.0	1.0	1.2

Unit(mm)

Size	L	W	T	L1,L2
1005 (EIA:0402)	1.00±0.05	0.50 ±0.05	0.50±0.05	0.10~0.30
1608 (EIA:0603)	1.60±0.10	0.80 ±0.10	0.80±0.10	0.20~0.50

Package

Paper Taping	1005size	10,000pcs/reel (Minimum quantity of purchase)
	1608size	4,000pcs/reel (Minimum quantity of purchase)

Ratings

Part No.	Zero-power resistance at R25		B Value B25/85	Dissipation factor	Thermal time constant	Rated power at 25℃	Operating temperature
102KTM1005□410H	1k Ω	±3% ±5%	4100K ±3%	Approx. 0.7mW/℃	Approx. 2.2s	Approx. 70mW	-40~125℃
152KTM1005□410H	1.5k Ω						
202KTM1005□410H	2k Ω						
222KTM1005□410H	2.2k Ω						
302KTM1005□410H	3k Ω						
332kTM1005□410H	3.3k Ω						
472KTM1005□410H	4.7k Ω						
682KTM1005□410H	6.8k Ω						
103KTM1005□410H	10k Ω						
102KTM1608□410H	1k Ω	±3% ±5%	4100K ±3%	Approx. 0.9mW/℃	Approx. 5s	Approx. 90mW	-40~125℃
152KTM1608□410H	1.5k Ω						
222KTM1608□410H	2.2k Ω						
332KTM1608□410H	3.3k Ω						
472KTM1608□410H	4.7k Ω						
682KTM1608□410H	6.8k Ω						
103KTM1608□410H	10k Ω						

*R25:Rated Zero-Power Resistance Value at 25℃.
*B Value:Determined by Rated Zero-Power Resistance R25 and R85.
*Thermal Time Constant:Measured in the air.

*For details , please ask.

Date 2002.10.22