



SERIES IV THERMISTORS

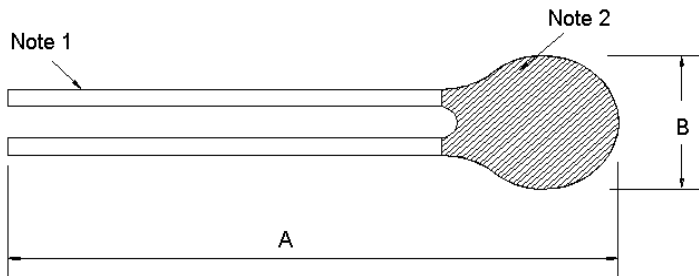
SPECIFICATIONS

- 2.2 to 100K Ohms Resistance @25°C
- Thermally Conductive Epoxy Coating
- Available in Custom Tolerances
- 28 AWG Solid Tin Plated Copper Leads

Dimensions

SERIES IV THERMISTORS

The BetaCURVE chip is soldered to 28 AWG tin plated copper leads and encapsulated in Stycast epoxy resin



FEATURES

- 2.2 to 100K Ohms Resistance @25°C
- Proven Stability and Reliability
- 28AWG Solid Tin Plated Copper Leads
- Thermally Conductive Epoxy Coating
- Temperature Range -40°C to +125°C
- RoHS Compliant

APPLICATIONS

- Tight tolerance instrumentation
- Temperature sensing, control and compensation
- Assembly into probes for a wide variety of applications
- General instrumentation applications

	Dimensions	
	A	B
	46 ± 5mm	2.8mm Max
Note 1	28 AWG Solid Tin Plated Copper Leads	
Note 2	Stycast 2850ft Epoxy	

SERIES IV THERMISTORS

PRODUCT DEFINITION

Part Number	Color Coding	Resistance [Ω] @ +25°C	Tolerance from 0 to +70°C	Alpha Value @ +25°C	Beta Value 25/85	Beta Tolerance	Dissipation Constant in still air @ +25°C	Time response (Stirred Oil)
2.2K3A1W3	Brown	2,252	±0.2°C	-4.39 %/ °C	3976	±0.5%	3 mW/°C	<1.5 second
3K3A1W3	Red	3,000	±0.2°C	-4.39 %/ °C	3976	±0.5%	3 mW/°C	<1.5 second
5K3A1W3	Orange	5,000	±0.2°C	-4.39 %/ °C	3976	±0.5%	3 mW/°C	<1.5 second
10K3A1W3	Yellow	10,000	±0.2°C	-4.39 %/ °C	3976	±0.5%	3 mW/°C	<1.5 second
10K4A1W3	Black	10,000	±0.2°C	-4.04 %/ °C	3694	±0.5%	3 mW/°C	<1.5 second
30K5A1W3	White	30,000	±0.2°C	-4.30 %/ °C	3942	±0.5%	3 mW/°C	<1.5 second
30K6A1W3	Green	30,000	±0.2°C	-4.68 %/ °C	4261	±0.5%	3 mW/°C	<1.5 second
50K6A1W3	Blue	50,000	±0.2°C	-4.68 %/ °C	4261	±0.5%	3 mW/°C	<1.5 second
100K6A1W3	Violet	100,000	±0.2°C	-4.68 %/ °C	4261	±0.5%	3 mW/°C	<1.5 second

RELIABILITY DATA

Test	Standard	Test conditions	ΔR25/R25	Remarks
Storage in dry heat	IEC 60068-2-2	High temperature storage @+100°C. Duration: 1000 h	<0.5%	No mechanical damage
Storage in dry heat	IEC 60068-2-2	High temperature storage @+125°C. Duration: 1000 h	<1%	No mechanical damage
Storage in damp heat, steady state	IEC60068-2-78	Ambient Conditions: Temperature: +40°C. Relative humidity 93% Duration: 56 days	<1%	No mechanical damage
Rapid temperature cycling	IEC60068-2-14	Lower test temperature: -40°C Upper test temperature: +125°C Number of cycles: 1000	<1%	No mechanical damage
Endurance		Pmax: 60mW Duration: 1000 h	<2%	No mechanical damage

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