



GA10K4A1 SERIES I THERMISTORS

Thermally Conductive Epoxy Coating

Ø 2.4 mm Maximum Diameter

32 AWG Alloy 180 Leads

Four Temperature Tolerance Classifications Available

RoHS Compliant

BetaCURVE series I thermistors are small epoxy coated devices with solid tin-plated lead wires. The series I offers a choice of precision temperature tolerance classifications for a wide variety of customer applications, such as temperature measurements, temperature indication, temperature control, and thermal compensation.

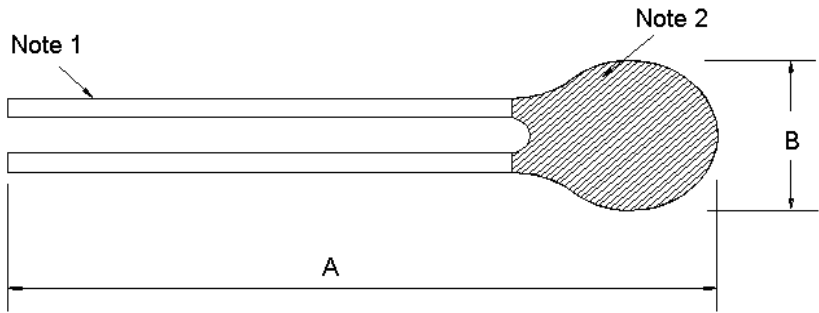
FEATURES

- Interchangeability
- Proven stability and reliability
- Rapid time response
- Alloy lead wires for reduced thermal conductivity ("stem effect")
- Thermally conductive epoxy coating
- Temperature range -40°C to +125°C
- Custom probe assemblies available

APPLICATIONS

- Temperature sensing, control and compensation
- Tight tolerance instrumentation
- General instrumentation applications

MECHANICAL DETAILS



DIMENSIONS

A	B
76 ±2 mm	2.4 mm max.

Note 1: 32 AWG Solid Alloy 180 Leads

Note 2: Black Stycast 2850ft Epoxy

PERFORMANCE SPECS

Parameters	Units	Value
Nominal Resistance at +25°C	Ohms	10,000
GA10K4A1A Resistance Tolerance from 0°C to +70°C	°C	±0.1
GA10K4A1B Resistance Tolerance from 0°C to +70°C	°C	±0.2
GA10K4A1C Resistance Tolerance from 0°C to +70°C	°C	±0.5
GA10K4A1D Resistance Tolerance from 0°C to +70°C	°C	±1.0
Alpha Value at +25°C	%/°C	4.04
Beta Value 25/85	K	3694
Tolerance on Beta Value 25/85	%	±0.5
Time Response in Liquids	Seconds	<1
Dissipation Constant in Still Air	mW/°C	0.75

RESISTANCE V TEMPERATURE TABLE

Temp. °C	Ohms	Temp. °C	Ohms	Temp. °C	Ohms	Temp. °C	Ohms
-40	239828	1	28157	42	5195	84	1293
-39	226103	2	26891	43	5007	85	1255
-38	213243	3	25689	44	4828	86	1218
-37	201188	4	24547	45	4656	87	1183
-36	189885	5	23462	46	4490	88	1149
-35	179282	6	22431	47	4332	89	1116
-34	169331	7	21450	48	4180	90	1084
-33	159991	8	20518	49	4034	91	1053
-32	151219	9	19631	50	3893	92	1023
-31	142978	10	18787	51	3759	93	994
-30	135233	11	17983	52	3629	94	967
-29	127952	12	17219	53	3505	95	940
-28	121104	13	16490	54	3386	96	913
-27	114661	14	15797	55	3271	97	888
-26	108598	15	15136	56	3160	98	864
-25	102889	16	14506	57	3054	99	840
-24	97513	17	13906	58	2952	100	817
-23	92448	18	13334	59	2854	101	795
-22	87675	19	12788	60	2760	102	774
-21	83174	20	12268	61	2669	103	753
-20	78930	21	11771	62	2582	104	733
-19	74926	22	11297	63	2498	105	713
-18	71148	23	10845	64	2417	106	694
-17	67581	24	10413	65	2339	107	676
-16	64212	25	10000	66	2264	108	658
-15	61031	26	9606	67	2191	109	641
-14	58024	27	9229	68	2122	110	624
-13	55182	28	8869	69	2055	111	608
-12	52495	29	8525	70	1990	112	592
-11	49954	30	8196	71	1928	113	577
-10	47549	31	7882	72	1868	114	562
-9	45274	32	7581	73	1810	115	548
-8	43119	33	7293	74	1754	116	534
-7	41079	34	7018	75	1700	117	521
-6	39147	35	6754	76	1648	118	507
-5	37316	36	6501	77	1598	119	495
-4	35580	37	6260	78	1550	120	482
-3	33935	38	6028	79	1503	121	470
-2	32375	39	5806	80	1458	122	459
-1	30895	40	5594	81	1414	123	448
0	29490	41	5390	82	1372	124	437
				83	1332	125	426

ORDERING INFORMATION

Part Number	Description	Ω @25°C	MOQ*
GA10K4A1A	Series I thermistor	10,000	1,000
GA10K4A1B	Series I thermistor	10,000	1,000
GA10K4A1C	Series I thermistor	10,000	1,000
GA10K4A1D	Series I thermistor	10,000	1,000

* For quantities less than MOQ (Minimum Order Quantity) contact Distribution

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