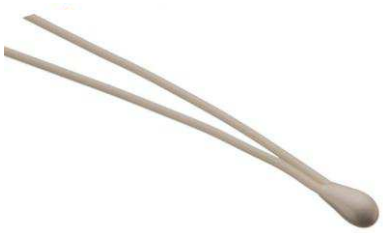


30K5A1I SERIES II

Thermistor

SPECIFICATIONS

- **Thermally conductive epoxy coating**
- **Ø 2.4 mm Maximum Diameter**
- **30 AWG Solid Silver Plated Copper Leads with White PTFE Insulation**
- **Choice of 4 temperature tolerance classifications**
- **RoHS Compliant**

The BetaCURVE Chip is Soldered to 30 AWG Solid Silver Plated Copper Leads with White PTFE Insulation Device is Encapsulated in Stycast Epoxy Resin.

FEATURES

- Interchangeability
- Proven Stability and Reliability
- Rapid time response
- PTFE Insulated lead Wires
- Thermally Conductive Epoxy Coating
- Temperature range -40ºC to +125ºC

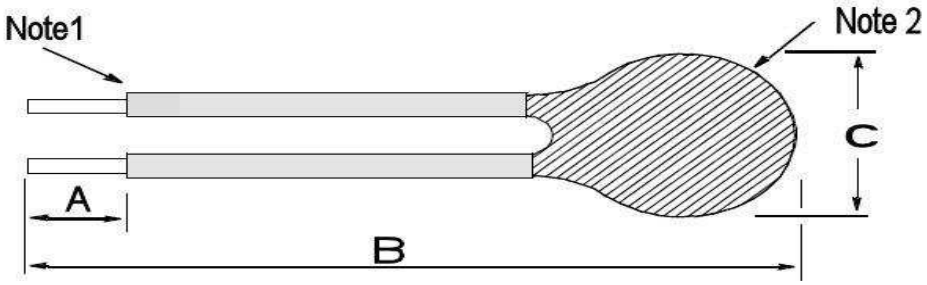
APPLICATIONS

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

PERFORMANCE SPECS

Parameters	Units	Value
Nominal Resistance at +25°C	Ohms	30000
30K5A1iA Resistance tolerance from 0°C to +70°C	°C	± 0.1
30K5A1iB Resistance tolerance from 0°C to +70°C	°C	± 0.2
30K5A1iC Resistance tolerance from 0°C to +70°C	°C	± 0.5
30K5A1iD Resistance tolerance from 0°C to +70°C	°C	± 1.0
Alpha Value at +25°C	%/°C	4.30
Beta Value 25/85	K	3942
Tolerance on Beta Value 25/85	%	± 0.5
Time response in Liquids	Seconds	<1
Dissipation Constant in still air	mW/°C	0.85

MECHANICAL DETAILS



	Dimensions		
	A	B	C
	10 ± 2mm	76 ± 2mm	2.4mm Max
Note 1	30AWG Solid Silver Plated Copper Leads with White PTFE Insulation		
Note 2	White Stycast 2850ft Epoxy		

RESISTANCE V TEMPERATURE TABLE

Temp. °C	Ohms
-40	884198
-39	830463
-38	780301
-37	733457
-36	689693
-35	648790
-34	610546
-33	574773
-32	541299
-31	509964
-30	480620
-29	453130
-28	427367
-27	403213
-26	380560
-25	359305
-24	339357
-23	320627
-22	303035
-21	286506
-20	270969
-19	256362
-18	242622
-17	229694
-16	217526
-15	206069
-14	195278
-13	185111
-12	175529
-11	166495
-10	157975
-9	149937
-8	142352
-7	135191
-6	128429
-5	122041
-4	116006
-3	110301
-2	104907
-1	99806
0	94980

Temp. °C	Ohms
1	90413
2	86090
3	81996
4	78119
5	74445
6	70964
7	67663
8	64534
9	61565
10	58749
11	56076
12	53539
13	51129
14	48841
15	46667
16	44601
17	42637
18	40769
19	38993
20	37303
21	35696
22	34166
23	32709
24	31321
25	**30000**
26	28741
27	27541
28	26398
29	25307
30	24268
31	23276
32	22329
33	21426
34	20564
35	19741
36	18955
37	18204
38	17487
39	16801
40	16146
41	15519

Temp. °C	Ohms
42	14920
43	14347
44	13799
45	13274
46	12772
47	12292
48	11831
49	11391
50	10968
51	10564
52	10176
53	9805
54	9449
55	9107
56	8780
57	8466
58	8164
59	7875
60	7597
61	7331
62	7075
63	6829
64	6593
65	6366
66	6148
67	5939
68	5738
69	5544
70	5358
71	5179
72	5007
73	4841
74	4682
75	4528
76	4381
77	4239
78	4102
79	3970
80	3843
81	3721
82	3603
83	3489

Temp. °C	Ohms
84	3380
85	3274
86	3172
87	3074
88	2979
89	2888
90	2800
91	2715
92	2633
93	2554
94	2477
95	2403
96	2332
97	2263
98	2197
99	2132
100	2070
101	2010
102	1952
103	1896
104	1842
105	1789
106	1739
107	1690
108	1642
109	1596
110	1552
111	1509
112	1467
113	1427
114	1388
115	1350
116	1314
117	1278
118	1244
119	1211
120	1178
121	1147
122	1117
123	1087
124	1059
125	1031

ORDERING INFORMATION

Part Number	Description	Ω @25ºC	MOQ
30K5A1iA	Series II Thermistor (Tol. ± 0.1ºC from 0ºC to +70ºC)	30000	1000*
30K5A1iB	Series II Thermistor (Tol. ± 0.2ºC from 0ºC to +70ºC)	30000	1000*
30K5A1iC	Series II Thermistor (Tol. ± 0.5ºC from 0ºC to +70ºC)	30000	1000*
30K5A1iD	Series II Thermistor (Tol. ± 1.0ºC from 0ºC to +70ºC)	30000	1000*

* For quantities less than Minimum Order Quantity – Contact Distribution

NORTH AMERICA

Measurement Specialties, Inc.,
a TE Connectivity Company
910 Turnpike Road
Shrewsbury, MA 01545
Tel: 1-508-842-0516
Fax: 1-508-842-0342
Sales:
temperature.cs.amer@meas-spec.com

EUROPE

Measurement Specialties (Europe), Ltd.,
a TE Connectivity Company
Ballybrit Business Park
Galway Ireland
Tel: +353-91-753238
Fax: +353-91-770789
Sales:
temperature.cs.emea@meas-spec.com

ASIA

Measurement Specialties (China), Ltd.,
a TE Connectivity Company
No. 26 Langshan Road
Shenzhen High-Tech Park (North)
Nanshan District, Shenzhen 518057
China
Sales:
temperature.cs.asia@meas-spec.com

TE.com/sensorsolutions