



Formulas:

Resistance as function of temperature:

$$R = R_{ref} * \exp(A + B/T + C/T^2 + D/T^3)$$

Temperature as function of resistance

$$T = 1 / (A_1 + B_1 * \ln(R/R_{ref}) + C_1 * (\ln(R/R_{ref}))^2 + D_1 * (\ln(R/R_{ref}))^3)$$

- R_{ref} resistance @ 25°C = 2700ohm
- T absolute temperature in [K]
- A -14.6337
- B 4791.842 K⁻¹
- C -115334 K⁻²
- D 3730535 K⁻³

- A_1 3.354016 • 10⁻³ K⁻¹
- B_1 2.569355 • 10⁻⁴ K⁻¹
- C_1 2.626311 • 10⁻⁶ K⁻¹
- D_1 0.675278 • 10⁻⁷ K⁻¹

°C	-1.0	-0.9	-0.8	-0.7	-0.6	-0.5	-0.4	-0.3	-0.2	-0.1	-0.0	°C
-26	39371	39134	38898	38663	38430	38199	37969	37741	37514	37289	37065	-26
-25	37065	36843	36622	36402	36185	35968	35753	35540	35328	35117	34907	-25
-24	34907	34700	34493	34288	34084	33881	33680	33480	33282	33085	32889	-24
-23	32889	32694	32501	32309	32118	31928	31740	31553	31367	31182	30999	-23
-22	30999	30817	30636	30456	30277	30099	29923	29748	29574	29401	29229	-22
-21	29229	29058	28889	28720	28553	28386	28221	28057	27894	27732	27571	-21
-20	27571	27411	27252	27094	26937.1	26781.2	26626.3	26472.5	26319.6	26167.6	26016.7	-20
-19	26016.7	25866.7	25717.7	25569.7	25422.6	25276.4	25131.2	24986.9	24843.5	24701.0	24559.5	-19
-18	24559.5	24418.8	24279.1	24140.2	24002.2	23865.1	23728.9	23593.5	23459.0	23325.4	23192.6	-18
-17	23192.6	23060.6	22929.5	22799.2	22669.8	22541.1	22413.3	22286.2	22160.0	22034.6	21909.9	-17
-16	21909.9	21786.1	21663.0	21540.7	21419.2	21298.4	21178.4	21059.1	20940.6	20822.9	20705.9	-16
-15	20705.9	20589.6	20474.0	20359.2	20245.0	20131.6	20018.9	19906.9	19795.6	19685.0	19575.1	-15
-14	19575.1	19465.9	19357.3	19249.4	19142.2	19035.7	18929.8	18824.6	18720.0	18616.1	18512.8	-14
-13	18512.8	18410.2	18308.1	18206.8	18106.0	18005.9	17906.4	17807.5	17709.2	17611.5	17514.4	-13
-12	17514.4	17417.9	17322.1	17226.7	17132.0	17037.9	16944.3	16851.4	16758.9	16667.1	16575.8	-12

2k7 1% NTC thermistor - resistance in ohms vs temperature in degrees Celsius

-11	16575.8	16485.1	16394.9	16305.3	16216.2	16127.7	16039.7	15952.2	15865.3	15778.9	15693.0	-11
-10	15693.0	15607.6	15522.8	15438.5	15354.7	15271.4	15188.6	15106.3	15024.5	14943.2	14862.4	-10
-9	14862.4	14782.1	14702.3	14622.9	14544.0	14465.6	14387.7	14310.2	14233.2	14156.7	14080.6	-9
-8	14080.6	14005.0	13929.9	13855.2	13780.9	13707.1	13633.7	13560.8	13488.3	13416.2	13344.6	-8
-7	13344.6	13273.4	13202.6	13132.2	13062.3	12992.8	12923.7	12855.0	12786.7	12718.8	12651.3	-7
-6	12651.3	12584.2	12517.5	12451.2	12385.4	12319.8	12254.7	12190.0	12125.6	12061.7	11998.1	-6
-5	11998.1	11934.9	11872.0	11809.5	11747.4	11685.7	11624.3	11563.3	11502.6	11442.3	11382.4	-5
-4	11382.4	11322.8	11263.5	11204.6	11146.1	11087.9	11030.0	10972.5	10915.3	10858.4	10801.9	-4
-3	10801.9	10745.7	10689.8	10634.2	10579.0	10524.1	10469.5	10415.2	10361.3	10307.6	10254.3	-3
-2	10254.3	10201.3	10148.6	10096.2	10044.0	9992.2	9940.7	9889.5	9838.6	9788.0	9737.7	-2
-1	9737.7	9687.6	9637.9	9588.4	9539.2	9490.3	9441.7	9393.4	9345.3	9297.5	9250.0	-1
0	9250.0	9202.8	9155.8	9109.1	9062.7	9016.5	8970.6	8925.0	8879.6	8834.5	8789.6	0
°C	-1.0	-0.9	-0.8	-0.7	-0.6	-0.5	-0.4	-0.3	-0.2	-0.1	-0.0	°C

2k7 1% NTC thermistor - resistance in ohms vs temperature in degrees Celsius

°C	+0.0	+0.1	+0.2	+0.3	+0.4	+0.5	+0.6	+0.7	+0.8	+0.9	+1.0	°C
0	8789.6	8745.0	8700.7	8656.6	8612.7	8569.1	8525.8	8482.7	8439.8	8397.2	8354.8	0
1	8354.8	8312.7	8270.8	8229.1	8187.7	8146.5	8105.5	8064.8	8024.3	7984.0	7944.0	1
2	7944.0	7904.1	7864.5	7825.2	7786.0	7747.1	7708.4	7669.9	7631.6	7593.5	7555.7	2
3	7555.7	7518.0	7480.6	7443.4	7406.4	7369.6	7333.0	7296.6	7260.4	7224.4	7188.6	3
4	7188.6	7153.0	7117.6	7082.4	7047.4	7012.6	6978.0	6943.5	6909.3	6875.3	6841.4	4
5	6841.4	6807.7	6774.3	6741.0	6707.9	6674.9	6642.2	6609.6	6577.2	6545.0	6513.0	5
6	6513.0	6481.1	6449.4	6417.9	6386.6	6355.4	6324.5	6293.6	6263.0	6232.5	6202.2	6
7	6202.2	6172.0	6142.0	6112.2	6082.6	6053.1	6023.7	5994.5	5965.5	5936.7	5908.0	7
8	5908.0	5879.4	5851.0	5822.8	5794.7	5766.8	5739.0	5711.4	5683.9	5656.6	5629.4	8
9	5629.4	5602.3	5575.4	5548.7	5522.1	5495.6	5469.3	5443.2	5417.1	5391.2	5365.5	9
10	5365.5	5339.9	5314.4	5289.1	5263.9	5238.8	5213.9	5189.1	5164.4	5139.9	5115.5	10
11	5115.5	5091.2	5067.0	5043.0	5019.1	4995.4	4971.7	4948.2	4924.9	4901.6	4878.5	11
12	4878.5	4855.5	4832.6	4809.8	4787.2	4764.6	4742.2	4719.9	4697.8	4675.7	4653.8	12
13	4653.8	4632.0	4610.3	4588.7	4567.2	4545.8	4524.6	4503.5	4482.4	4461.5	4440.7	13
14	4440.7	4420.0	4399.4	4379.0	4358.6	4338.3	4318.2	4298.1	4278.2	4258.3	4238.6	14
15	4238.6	4218.9	4199.4	4180.0	4160.7	4141.4	4122.3	4103.3	4084.3	4065.5	4046.8	15
16	4046.8	4028.1	4009.6	3991.2	3972.8	3954.6	3936.4	3918.3	3900.4	3882.5	3864.7	16
17	3864.7	3847.0	3829.4	3811.9	3794.5	3777.2	3759.9	3742.8	3725.7	3708.7	3691.8	17
18	3691.8	3675.0	3658.3	3641.7	3625.2	3608.7	3592.3	3576.0	3559.8	3543.7	3527.7	18
19	3527.7	3511.7	3495.8	3480.0	3464.3	3448.7	3433.1	3417.6	3402.3	3386.9	3371.7	19
20	3371.7	3356.5	3341.4	3326.4	3311.5	3296.6	3281.9	3267.1	3252.5	3238.0	3223.5	20
21	3223.5	3209.1	3194.7	3180.5	3166.3	3152.1	3138.1	3124.1	3110.2	3096.4	3082.6	21
22	3082.6	3068.9	3055.2	3041.7	3028.2	3014.8	3001.4	2988.1	2974.9	2961.7	2948.6	22
23	2948.6	2935.6	2922.6	2909.7	2896.9	2884.1	2871.4	2858.8	2846.2	2833.7	2821.2	23
24	2821.2	2808.8	2796.5	2784.2	2772.0	2759.9	2747.8	2735.7	2723.8	2711.9	2700.0	24
25	2700.0	2688.21	2676.47	2664.80	2653.18	2641.62	2630.11	2618.66	2607.27	2595.94	2584.66	25
26	2584.66	2573.43	2562.27	2551.15	2540.09	2529.09	2518.14	2507.24	2496.40	2485.61	2474.87	26
27	2474.87	2464.18	2453.55	2442.97	2432.44	2421.96	2411.54	2401.16	2390.84	2380.56	2370.34	27
28	2370.34	2360.16	2350.04	2339.96	2329.93	2319.96	2310.03	2300.14	2290.31	2280.52	2270.79	28
29	2270.79	2261.09	2251.45	2241.85	2232.30	2222.79	2213.33	2203.92	2194.55	2185.23	2175.95	29
30	2175.95	2166.72	2157.53	2148.38	2139.28	2130.23	2121.21	2112.24	2103.31	2094.43	2085.59	30
31	2085.59	2076.79	2068.03	2059.32	2050.64	2042.01	2033.42	2024.87	2016.36	2007.89	1999.46	31
32	1999.46	1991.07	1982.73	1974.42	1966.15	1957.92	1949.73	1941.58	1933.46	1925.39	1917.35	32
33	1917.35	1909.36	1901.40	1893.47	1885.59	1877.74	1869.93	1862.16	1854.42	1846.72	1839.06	33
34	1839.06	1831.43	1823.84	1816.28	1808.76	1801.28	1793.83	1786.41	1779.03	1771.68	1764.37	34
35	1764.37	1757.10	1749.85	1742.65	1735.47	1728.33	1721.22	1714.15	1707.11	1700.10	1693.12	35
36	1693.12	1686.18	1679.27	1672.39	1665.54	1658.73	1651.94	1645.19	1638.47	1631.78	1625.12	36
37	1625.12	1618.50	1611.90	1605.33	1598.80	1592.29	1585.82	1579.37	1572.96	1566.57	1560.22	37
38	1560.22	1553.89	1547.59	1541.33	1535.09	1528.88	1522.69	1516.54	1510.41	1504.32	1498.25	38
39	1498.25	1492.21	1486.19	1480.21	1474.25	1468.32	1462.41	1456.54	1450.68	1444.86	1439.06	39
40	1439.06	1433.29	1427.55	1421.83	1416.14	1410.48	1404.84	1399.22	1393.63	1388.07	1382.53	40
41	1382.53	1377.02	1371.53	1366.07	1360.63	1355.22	1349.83	1344.46	1339.12	1333.81	1328.52	41
42	1328.52	1323.25	1318.00	1312.78	1307.59	1302.41	1297.26	1292.14	1287.03	1281.95	1276.89	42
43	1276.89	1271.86	1266.85	1261.86	1256.89	1251.94	1247.02	1242.12	1237.24	1232.38	1227.55	43
44	1227.55	1222.73	1217.94	1213.17	1208.42	1203.69	1198.98	1194.30	1189.63	1184.99	1180.36	44
45	1180.36	1175.76	1171.18	1166.62	1162.07	1157.55	1153.05	1148.57	1144.11	1139.66	1135.24	45
46	1135.24	1130.84	1126.46	1122.09	1117.75	1113.42	1109.11	1104.83	1100.56	1096.31	1092.08	46
47	1092.08	1087.87	1083.67	1079.50	1075.34	1071.20	1067.08	1062.98	1058.89	1054.83	1050.78	47
48	1050.78	1046.75	1042.73	1038.74	1034.76	1030.80	1026.86	1022.93	1019.02	1015.13	1011.26	48
49	1011.26	1007.40	1003.56	999.73	995.92	992.13	988.36	984.60	980.86	977.13	973.42	49
50	973.42	969.73	966.05	962.39	958.74	955.11	951.50	947.90	944.32	940.75	937.20	50
51	937.20	933.66	930.14	926.63	923.14	919.67	916.21	912.76	909.33	905.91	902.51	51
52	902.51	899.12	895.75	892.39	889.05	885.72	882.40	879.10	875.81	872.54	869.28	52
53	869.28	866.04	862.81	859.59	856.39	853.20	850.02	846.86	843.71	840.57	837.45	53
54	837.45	834.34	831.24	828.16	825.09	822.03	818.99	815.96	812.94	809.94	806.94	54
55	806.94	803.96	801.00	798.04	795.10	792.17	789.25	786.35	783.45	780.57	777.70	55
56	777.70	774.85	772.00	769.17	766.35	763.54	760.74	757.96	755.19	752.42	749.67	56
57	749.67	746.93	744.21	741.49	738.79	736.09	733.41	730.74	728.08	725.43	722.79	57
58	722.79	720.17	717.55	714.95	712.35	709.77	707.20	704.64	702.09	699.55	697.02	58
59	697.02	694.50	691.99	689.49	687.00	684.52	682.06	679.60	677.15	674.71	672.29	59
60	672.29	669.87	667.46	665.07	662.68	660.30	657.93	655.58	653.23	650.89	648.56	60
61	648.56	646.24	643.93	641.63	639.34	637.06	634.78	632.52	630.27	628.02	625.79	61
62	625.79	623.56	621.35	619.14	616.94	614.75	612.57	610.40	608.23	606.08	603.93	62
63	603.93	601.79	599.67	597.55	595.44	593.33	591.24	589.15	587.08	585.01	582.95	63
64	582.95	580.90	578.85	576.82	574.79	572.77	570.76	568.76	566.76	564.78	562.80	64
65	562.80	560.83	558.86	556.91	554.96	553.02	551.09	549.17	547.25	545.34	543.44	65
66	543.44	541.55	539.67	537.79	535.92	534.05	532.20	530.35	528.51	526.68	524.85	66
67	524.85	523.03	521.22	519.42	517.62	515.83	514.05	512.27	510.50	508.74	506.99	67
68	506.99	505.24	503.50	501.77	500.04	498.32	496.61	494.90	493.20	491.51	489.82	68
69	489.82	488.14	486.47	484.80	483.14	481.49	479.84	478.20	476.57	474.94	473.32	69
70	473.32	471.71	470.10	468.50	466.90	465.31	463.73	462.15	460.58	459.02	457.46	70
°C	+0.0	+0.1	+0.2	+0.3	+0.4	+0.5	+0.6	+0.7	+0.8	+0.9	+1.0	°C

2k7 1% NTC thermistor - resistance in ohms vs temperature in degrees Celsius

°C	+0.0	+0.1	+0.2	+0.3	+0.4	+0.5	+0.6	+0.7	+0.8	+0.9	+1.0	°C
71	457.46	455.91	454.36	452.82	451.28	449.76	448.23	446.72	445.21	443.70	442.20	71
72	442.20	440.71	439.22	437.74	436.27	434.80	433.33	431.88	430.42	428.98	427.53	72
73	427.53	426.10	424.67	423.24	421.82	420.41	419.00	417.60	416.20	414.81	413.42	73
74	413.42	412.04	410.66	409.29	407.93	406.57	405.21	403.86	402.52	401.18	399.85	74
75	399.85	398.52	397.19	395.87	394.56	393.25	391.95	390.65	389.35	388.06	386.78	75
76	386.78	385.50	384.23	382.96	381.69	380.43	379.18	377.93	376.68	375.44	374.21	76
77	374.21	372.97	371.75	370.53	369.31	368.10	366.89	365.68	364.49	363.29	362.10	77
78	362.10	360.92	359.74	358.56	357.39	356.22	355.06	353.90	352.74	351.59	350.45	78
79	350.45	349.31	348.17	347.04	345.91	344.78	343.66	342.55	341.44	340.33	339.22	79
80	339.22	338.13	337.03	335.94	334.85	333.77	332.69	331.62	330.54	329.48	328.42	80
81	328.42	327.36	326.30	325.25	324.20	323.16	322.12	321.09	320.05	319.03	318.00	81
82	318.00	316.98	315.97	314.95	313.94	312.94	311.94	310.94	309.95	308.96	307.97	82
83	307.97	306.99	306.01	305.03	304.06	303.09	302.13	301.17	300.21	299.25	298.30	83
84	298.30	297.35	296.41	295.47	294.53	293.60	292.67	291.74	290.82	289.90	288.98	84
85	288.98	288.07	287.16	286.25	285.35	284.45	283.56	282.66	281.77	280.88	280.00	85
86	280.00	279.12	278.24	277.37	276.50	275.63	274.77	273.91	273.05	272.19	271.34	86
87	271.34	270.49	269.65	268.80	267.96	267.13	266.29	265.46	264.64	263.81	262.99	87
88	262.99	262.17	261.36	260.54	259.73	258.93	258.12	257.32	256.52	255.73	254.93	88
89	254.93	254.14	253.36	252.57	251.79	251.01	250.24	249.47	248.70	247.93	247.16	89
90	247.16	246.40	245.64	244.89	244.13	243.38	242.63	241.89	241.15	240.41	239.67	90
91	239.67	238.93	238.20	237.47	236.74	236.02	235.30	234.58	233.86	233.15	232.43	91
92	232.43	231.73	231.02	230.31	229.61	228.91	228.22	227.52	226.83	226.14	225.45	92
93	225.45	224.77	224.09	223.41	222.73	222.05	221.38	220.71	220.04	219.38	218.71	93
94	218.71	218.05	217.39	216.74	216.08	215.43	214.78	214.14	213.49	212.85	212.21	94
95	212.21	211.57	210.93	210.30	209.67	209.04	208.41	207.79	207.17	206.55	205.93	95
96	205.93	205.31	204.70	204.08	203.47	202.87	202.26	201.66	201.06	200.46	199.86	96
97	199.86	199.27	198.67	198.08	197.49	196.90	196.32	195.74	195.16	194.58	194.00	97
98	194.00	193.43	192.85	192.28	191.71	191.15	190.58	190.02	189.46	188.90	188.34	98
99	188.34	187.78	187.23	186.68	186.13	185.58	185.04	184.49	183.95	183.41	182.87	99
100	182.87											100
°C	+0.0	+0.1	+0.2	+0.3	+0.4	+0.5	+0.6	+0.7	+0.8	+0.9	+1.0	°C