

Tables of thermocouple and RTD tolerance limits

Tolerance classes for thermocouples (reference joint at 0 °C)
(IEC 60584-2 1982 amendment)

Type	Limits and tolerances	Special (Class 1)	Standard (Class 2)
T	Temperature limits	-40 ... +125 °C	-40 ... +133 °C
	Tolerance Value	± 0.5 °C	± 1 °C
	Temperature limits	+125 ... +350 °C	+133 ... +350 °C
	Tolerance Value	±0.004*[t] °C	± 0.0075*[t]
E	Temperature limits	-40 ... +375 °C	-40 ... +333 °C
	Tolerance Value	±1.5 °C	±2.5 °C
	Temperature limits	+375 ... +800 °C	+333 ... +900 °C
	Tolerance Value	±0.004*[t] °C	± 0.0075*[t]
J	Temperature limits	-40 ... +375 °C	-40 ... +333 °C
	Tolerance Value	±1.5 °C	±2.5 °C
	Temperature limits	+375 ... +750 °C	+333 ... +750 °C
	Tolerance Value	±0.004*[t] °C	± 0.0075*[t]
K o N	Temperature limits	-40 ... +375 °C	-40 ... +333 °C
	Tolerance Value	±1.5 °C	±2.5 °C
	Temperature limits	+375 ... +1000 °C	+333 ... +1200 °C
	Tolerance Value	±0.004*[t] °C	± 0.0075*[t]
R o S	Temperature limits	0 ... +1100 °C	0 ... +600 °C
	Tolerance Value	±1 °C	±1.5 °C
	Temperature limits	+1100 ... +1600 °C	+600 ... +1600 °C
	Tolerance Value	±[1+0.003*(t-1100)] °C	±0.0025*[t]
B	Temperature limits		+600 ... +1700 °C
	Tolerance Value		±0.0025*[t]

Tolerance classes for RTDs according to EN 60751

Temperature	Tolerance ± °C		
°C	Class AA	Class A	Class B
-200	0,44	0,55	1,30
-100	0,27	0,35	0,80
0	0,10	0,15	0,30
100	0,27	0,35	0,80
200	0,44	0,55	1,30
300	0,61	0,75	1,80
400	0,78	0,95	2,30
500	0,95	1,15	2,80
600	1,12	1,35	3,30

