

MAX251C

Chemical Composition

	Nominal Wt.% C64725
Copper	96.0
Nickel	2.0
Silicon	0.50
Tin	0.50
Zinc	1.0

Physical Properties

	US Customary Unit
Density	0.322 (lbs/in ³ @68°F)
Electrical Conductivity (Annealed)	37 (%IACS @ 68°F)
Thermal Conductivity (Annealed)	92(Btu•ft/ft ² •hr•°F) @68°F
Modulus of Elasticity (Tension)	18,800ksi
Fatigue Resistance 10 ⁶	59 ksi
*Stress Relaxation resistance % remaining at 200°C for 1,000 hrs	70%

Mechanical Properties (US Customary Units)

	Temper				
	TM02	TM04	TM06	TM08	TM08S
Tensile Strength (ksi)	70-93	87-101	92-107	101-113	110 min
Yield Strength (0.2% Offset, ksi)	69-91	78-100	84-106	95-113	107 min
Elongation (%)	8 min	5 min	3 min	2 min	1 min

Bend Properties

	Temper				
Bends at .690" wide 90 degree	TM02	TM04	TM06	TM08	TM08S
Goodway – (min. R/T)	0	0	.25	1	2
Badway – (min. R/T)	0	0	.8	1.5	4

*Note stress relaxation resistance similar to Beryllium copper alloy C17510

Details released herein are believed to be accurate at the time of issue and are considered for general information only. Use of this information is to be at the consumer's discretion.

