



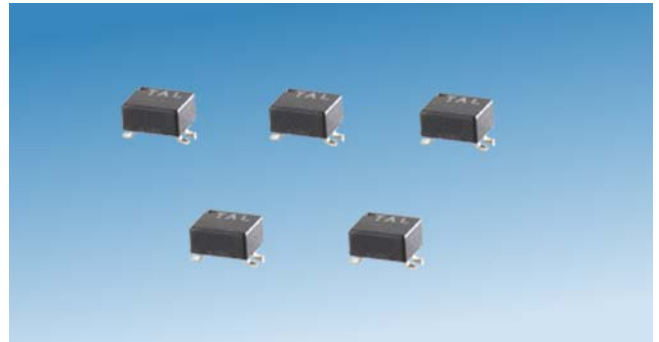
## CTJ-2 Series • Miniature SMD Common Mode Double Chokes

### Features

- Miniature, low cost SMD for pick and place compatibility while providing consistent and reliable coplanarity
- Extended Operating Temperature Range: -40° to +125°C
- Other inductance values and special types for operation at 150°C ambient are available upon request
- High attenuation over a wide frequency range - CAN bus types to 500MHz
- Available in Bifilar and Sector winding (Suffix SE)
- Materials: UL94-VO
- Manufactured in an ISO-9001:2000, TS-16949:2002 and ISO-14001:2004 certified Talema facility
- Fully RoHS compliant and meets lead free reflow level J-STD-020C

### Electrical Specifications @ 25°C

Nominal Voltage: 42Vac (50/60Hz), 80Vdc  
 Operating Temperature: -40° to +125°C  
 Storage Temperature: -40° to +125°C  
 Climatic category: according to IEC68-1 40/125/56  
 Test voltage between windings: 500 Vrms



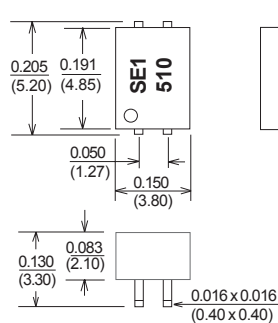
### Test frequency

Nominal Inductance: measured @ 100kHz/20 mVrms  
 Leakage Inductance: measured @ 100kHz, 100mVrms  
 Test Equipment: HP4192A

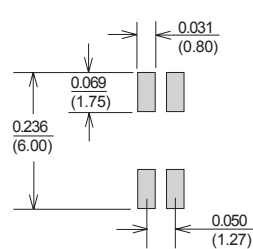
Weight: ~ 0.1 gram  
 Packaging: Tape & Reel

Part Number	$L_N$ ( $\mu$ H)	$I_N$ (mA)	$R_{CU}$ (mOhms)	$V_T$ (Vrms)	Number of Data Lines
<b>Sector Winding for CAN bus and similar applications</b>					
CTJ-2-110SE	11	250	160	500	2
CTJ-2-220SE	22	250	195	500	2
CTJ-2-330SE	33	200	260	500	2
CTJ-2-510SE	51	200	300	500	2
<b>Bifilar Winding for Data and Signal Lines</b>					
CTJ-2-110	11	300	160	500	2
CTJ-2-101	100	300	180	500	2
CTJ-2-221	220	200	250	500	2
CTJ-2-471	470	200	380	500	2
CTJ-2-102	1000	150	660	500	2
CTJ-2-222	2200	150	840	500	2
CTJ-2-332	3300	150	1500	500	2
CTJ-2-472	4700	150	1800	500	2

### Dimensions



### Suggested Pad Layout



### Bifilar (BE) Winding



### Sector (SE) Winding



### Schematic

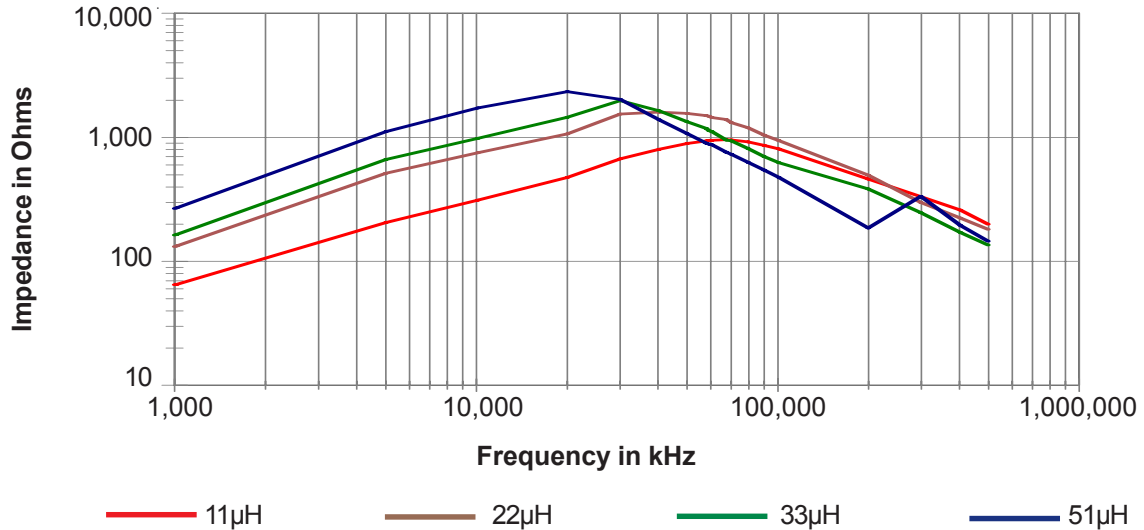


Surface Coplanarity will be 0.004(0.10) maximum  
 Dimensions: Inches (Millimeters)  
 Tolerance:  $\pm$ 0.010 (0.25) unless specified otherwise

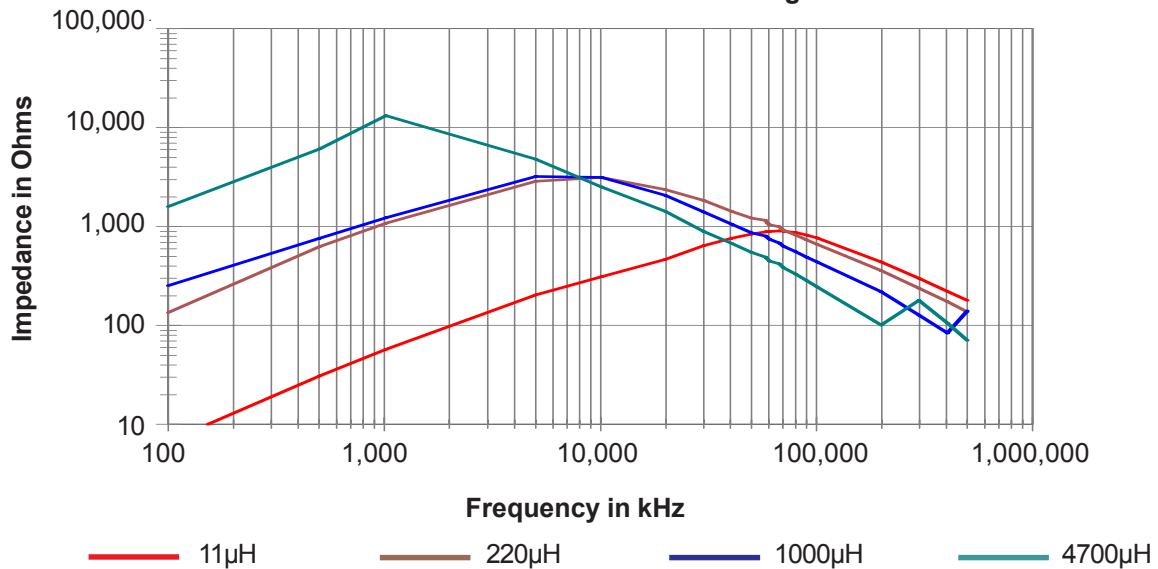
See following page for typical impedance curves

## CTJ-2 Impedance Performance

**Impedance Performance CTJ-2 Series  
Double Chokes with Sector Winding**



**Impedance Performance CTJ-2 Series  
Double Chokes with Bifilar Winding**



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