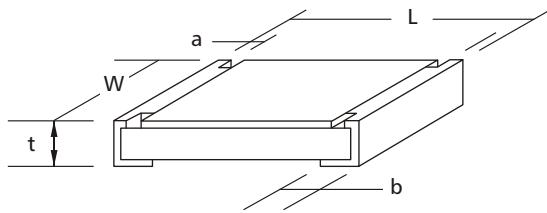


## THICK FILM CHIP RESISTORS

Thick film resistors with a high power to size ratio, ideally suited to industrial and general purpose use. A range from 1 ohm to 10 Mohms and tolerances of 1% and 5%. Also including zero ohm links.

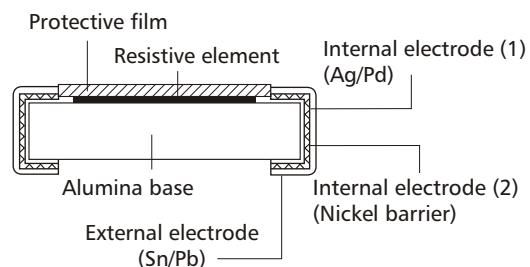
### Outline Diagram



### Technology and suggested applications

Precious metal terminations are screen printed onto a ceramic base and fired. The resistive element is screen printed and fired and the passivation layer added. Each resistor is trimmed to tolerance by laser. The pre-scribed tile is broken into strips, the end plating is fired on and the strips broken into individual components. Final termination is made by electroplating.

CRG chip resistors are suitable for most applications, including high frequency operation, owing to the short lead structure and low capacitance.



Ratings and Characteristics											
		UNITS	0402			0603			0805		
Rated Power @ 70 °C		Watts	0.063			0.1			0.125		
Resistance range	Min	ohms	10	1	10	10	1	10	10	1	10
	Max		1M0	9R1	3M3	1M0	9R1	10M	1M0	9R1	10M
Tolerance	%		1	5	5	1	5	5	1	5	5
Code Letter			F	J	J	F	J	J	F	J	J
Selection Series			E24	E24	E24	E24	E24	E24	E24	E24	E24
						E96			E96		
Temperature Coefficient	ppm/°C		±100	±350	±200	±100	±350	±200	±100	±350	±200

		UNITS	1206			2010			2512		
Rated Power @ 70 °C		Watts	0.25			0.5			1		
Resistance Range	Min	ohms	10	1	10	10	1	10	10	1	10
	Max		1M0	9R1	10M	1M0	9R1	10M	1M0	9R1	1M0
Tolerance	%		1	5	5	1	5	5	1	5	5
Code Letter			F	J	J	F	J	J	F	J	J
Selection Series			E24								
			E96			E96			E96		
Temperature Coefficient	ppm/°C		±100	±350	±200	±100	±350	±200	±100	±350	±200

		UNITS	0402	0603	0805	1206	2010	2512
Working Voltage	Volts	50	75	150	200	200	200	
Maximum Overload Voltage	Volts	100	150	300	400	400	400	
Operating Temperature Range	°C	-55 to +125						
Climatic Category		55/125/56						
Insulation Resistance Dry Min	Mohms	1,000						
Stability	%	3						
Surface Temp Rise Max	°C/W	400						
Zerohm CurrentMax	Amps	1	1	2	2	2	2	
Resistance Max		<20 mohm						

Dimensions						
STYLE	L	W	t	a	b	
0402	1.0 ± 0.1	0.5 ± 0.1	0.35 ± 0.05	0.2 ± 0.1	0.25 ± 0.1	
0603	1.6 ± 0.1	0.8 ± 0.1	0.45 ± 0.1	0.3 ± 0.2	0.2 ± 0.1	
0805	2.1 ± 0.2	1.3 ± 0.1	0.5 ± 0.1	0.4 ± 0.2	0.3 ± 0.2	
1206	3.1 ± 0.2	1.55 ± 0.1	0.55 ± 0.1	0.45 ± 0.2	0.4 ± 0.2	
2010	5.0 ± 0.2	2.5 ± 0.2	0.6 ± 0.1	0.6 ± 0.2	0.6 ± 0.2	
2512	6.4 ± 0.2	3.2 ± 0.2	0.6 ± 0.1	0.7 ± 0.2	0.7 ± 0.2	