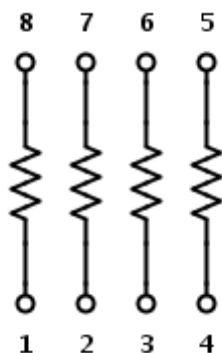


Silicon 0603 Flip Chip Resistor Network

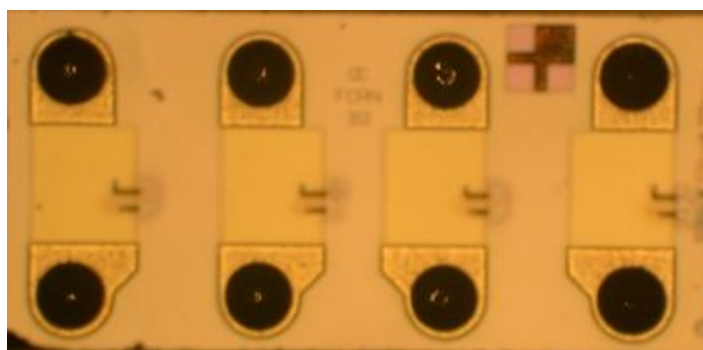
OnChip's FCRN312 flip chip resistor offers a precise 4 channel resistor network using advanced Thin Film manufacturing technology. The 0603 chip package allows for direct placement of the resistor onto external circuitry by means of solder reflow. The package offers a 0.4mm pitch that is designed to mount according to IPC-7351 SMD and Land Pattern Standard. This device is RoHS compliant.

Electrical Characteristics	
Resistance Range	10Ω – 500Ω
Operating Temperature Range	-55°C to 150°C
Maximum Power Rating	100mW
Voltage	100V
Noise, Maximum (MIL-STD-202, Method 308)	-25dB
Absolute Tolerance at 25°C (optional)	± 0.1%
Ratio Match at 25°C (optional)	± 0.05%
Temperature Coefficient of Resistance, ppm/°C	± 25
Typical Tracking TCR, ppm/°C	± 5
Power Dissipation @ 70°C	1W

Electrical Schematic



4-ch Network



FCRN 312 Flip Chip

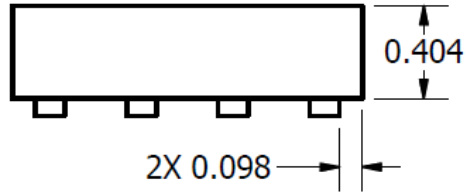
Mechanical Characteristics	
Package Type	8 Lead Flip Chip
Substrate Material	Silicon
Resistor Material	Tantalum Nitride
Flammability	UL94V-0
Bump Material	SnAgCu

Ordering Information

Part Number Designation				
Series	Resistor Value	Tolerance	TCR	Ratio Match
FCRN312-	First 3 digits are significant value. Last digit represents number of zeros. (Ex: 1001 = 1k Ω). R indicates decimal point. (Ex: 10R0 = 10 Ω)	C = $\pm 0.1\%$	No Letter = $\pm 250\text{ppm}/^\circ\text{C}$	No Letter = $\pm 1\%$
		D = $\pm 0.5\%$	H = $\pm 100\text{ppm}/^\circ\text{C}$	P = $\pm 0.5\%$
		F = $\pm 1\%$	A = $\pm 50\text{ppm}/^\circ\text{C}$	Q = $\pm 0.2\%$
		G = $\pm 2\%$	B = $\pm 25\text{ppm}/^\circ\text{C}$	R = $\pm 0.1\%$
		J = $\pm 5\%$		S = $\pm 0.05\%$
		K = $\pm 10\%$		
		M = $\pm 20\%$		

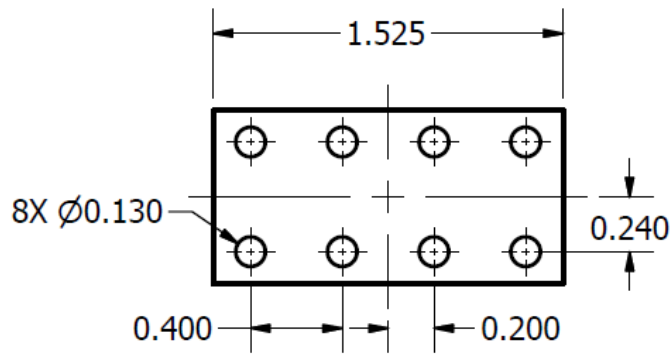
Example Part Number: FCRN312-4701GBR is a 4700 Ω resistor with $\pm 2\%$ tolerance, $\pm 25\text{ppm}/^\circ\text{C}$ TCR, and $\pm 0.1\%$ ratio match.

Device Dimensions

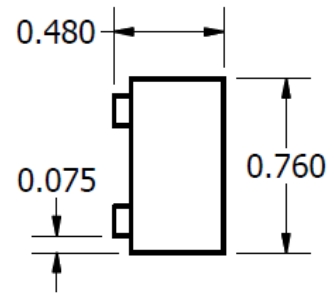


SIDE VIEW

ALL DIMENSIONS IN MM



BOTTOM VIEW



RIGHT VIEW