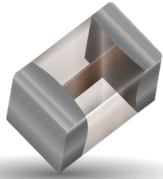


# HR02 Series

## High Value Resistors



### GENERAL DESCRIPTION

The HR Series is the next generation of surface mount High Value Resistors. This product was designed with our proprietary Glass Sandwich FLEXITERM<sup>®</sup> Technology. The FLEXITERM<sup>®</sup> is a surface mountable automotive and medically qualified termination that adds an extra margin against damage due to flexure during installation. The HR Series has been designed with high quality selected materials that yield excellent performance in a small size. Resistor is designed to be embedded in glass sandwich to avoid environmental conditions. This product is ideal for use in applications requiring surface mountable small outline EIA resistors.

### FEATURES

- EIA 0201 & 0402 Size
- Power Rating: 125 mW
- Low Current Consumption
- High Voltage
- Operating Temperature  
-40°C to +125°C

### APPLICATIONS

- Multi Chip Module (MCM)
- Bias Networks
- Test and Measurement Equipment
- Aerospace
- Medical
- Automotive

### HOW TO ORDER

#### HR02

**Size**  
HR02 = 0402  
HR01 = 0201

#### A

**TCR**  
A = ±100 ppm/°C  
B = ±50 ppm/°C\*  
C = ±250 ppm/°C  
D = ±25 ppm/°C\*  
E = ±200 ppm/°C  
\*Non-standard TCR values per special request

#### 5R1

**Resistance (Ohms)**  
1R1 = 1.1 Ω  
100 = 10 Ω  
101 = 100 Ω  
102 = 1,000 Ω  
103 = 10,000 Ω  
104 = 100,000 Ω  
105 = 1,000,000 Ω  
106 = 10,000,000 Ω

#### D

**Tolerance**  
D = ±0.5%\*  
F = 1%  
G = 2%  
J = 5%  
\*Non-standard tolerance values per special request

#### Z

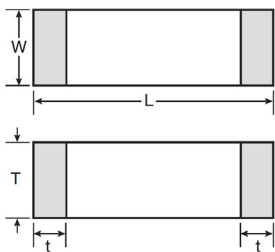
**Termination**  
7 = Nickel Gold\*  
Z = Nickel Tin  
\*Non-standard termination per special request

#### TR

**Packaging**  
TR = Tape & Reel  
W = Waffle Pack

### MECHANICAL DIMENSIONS

mm (inches)



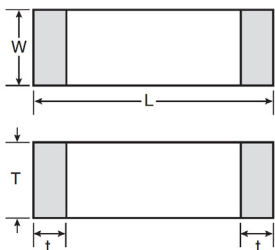
<b>Length (L)</b>	1.00±0.10 (0.039±0.004)
<b>Width (W)</b>	0.50±0.10 (0.020±0.004)
<b>Thickness (T)</b>	0.50±0.10 (0.020±0.004)
<b>Terminal (t)</b>	0.25±0.15 (0.010±0.006)

### 0402 SPECIFICATIONS

Resistor	Detail
Outline	EIA 0402
Package	Glass wafer sandwich
Maximum Voltage	1 KV
Resistance Value Range	From 200 Ohms to 30 MOhms
Termination	FLEXITERM <sup>®</sup> (Ag/Epoxy), plated
Power Rating	125 mW
Operating Temperature Range	-40°C to +125°C
Tolerances	0.5%, 1%, 2%, 5%

### MECHANICAL DIMENSIONS

mm (inches)



<b>Length (L)</b>	0.60±0.050 (0.024±0.010)
<b>Width (W)</b>	0.325±0.050 (0.024±0.010)
<b>Thickness (T)</b>	0.325±0.050 (0.020±0.004)
<b>Terminal (t)</b>	0.150±0.050 (0.006±0.010)

### 0201 SPECIFICATIONS

Resistor	Detail
Outline	EIA 0201
Package	Glass wafer sandwich
Maximum Voltage	1 KV
Resistance Value Range	From 200 Ohms to 5 MOhms
Termination	FLEXITERM <sup>®</sup> (Ag/Epoxy), plated
Power Rating	125 mW
Operating Temperature Range	-40°C to +125°C
Tolerances	0.5%, 1%, 2%, 5%

### RESISTOR MATERIAL (SiCr) PROPERTIES

Sheet Resistance (Ohms per Square)	TCR ppm/°C
300 to 1300	±25, ±50, ±100, ±250

