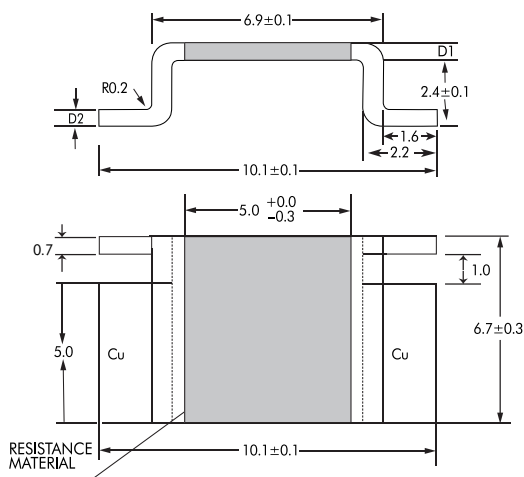




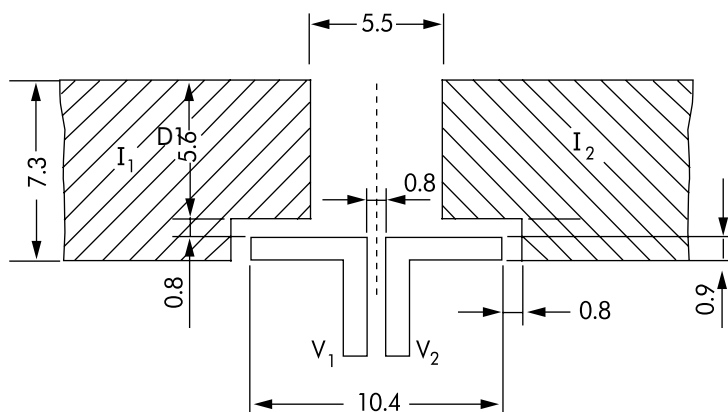
1. Ideal for Current sense and High Current application.
2. Sulfur free copper connection.
3. Max. Solder temp. upto 350 ° C

● Dimensions



Type	HI-Techpart Name	Resistive Material	Dimensions		Internal Heat Resistance (R _{thi})	Typical Weight Per PC (gms)
			D1 (MM)	D2 (MM)		
1	HRE5W* R0005 F	MANGNIN	0.60 ± 0.10	0.60 ± 0.10	8° K/ W	0.45
2	HRE5W* R0003 F	MANGNIN	1.21 ± 0.10	1.21 ± 0.10	5° K/W	0.91
3	HRE5W* R001 F	MANGNIN	1.71 ± 0.10	1.71 ± 0.10	4° K/W	1.30
4	HRE4W* R002 F	MANGNIN	0.44 ± 0.10	0.44 ± 0.10	12° K/W	0.33
5	HRE4W* R001 F	MANGNIN	0.27 ± 0.10	0.27 ± 0.10	14° K/W	0.27
6	HRE4W* R002 F	ISAOHM / FeCr8020	0.55 ± 0.10	0.55 ± 0.10	14° K/W	0.40
7	HRE3W* R003 F	ISAOHM / FeCr8020	0.36 ± 0.10	0.36 ± 0.10	21° K/W	0.27

● Proposal Configuration



● Ordering Information

Example:

HRE	5	F	T	R047
(1)	(2)	(3)	(4)	(5)
Series Name	Power Rating	Resistance Tolerance	TCR	Resistance

(1)Type: HRE SERIES

(2)Power Rating: 3=3W,4W=4W,5=5W

(3)Tolerance: F $\pm$ 1%

(4)TCR:<100 ppm/°C (Depainding on Resistance Value)

(5)Resistance Value:10R0=10R、R10=0.1Ω、47R0=47Ω

● Applications And Ratings

Type	Rated Power (W)	Resistance Range (Ω)	TCR(PPM/°C)	Tolerance Range	Operating Temperature
HRE	3W	R0002 to R003	<100 ppm/°C	F $\pm$ 1%	- 55°C to +170°C
	4W				
	5W				

● Performance Characteristics

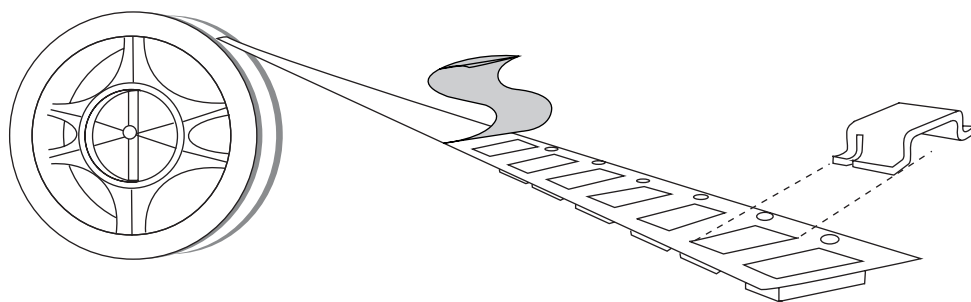
Paeameter/Performance Test & Test Method	Performance Requirements
Power Rating - 5W (Rated Ambient Temperature)	Full power dissipation at 85°C and linearly derated to zero at + 140°C
Insulation	Not Insulated
Resistance Tolerance	$\pm$ 1% (0.5% and other tolerance available on request)
Temperature Range	- 55° C to +170° C
Voltage Rating / Limiting Voltage / Max. Working Voltage	$\sqrt{P \times R}$
Short time Overload (5 x Rated Power for 5 Secs.)	$\Delta R \pm [1.25 \% R0 + R0005]$
Resistance Temperature Characteristics	<100 ppm/° K (Depainding on Resistance Value)
Damp Heat(Steady State)(40°C at 93 % R.H.for 1000 Hrs.-no load applied)	$\Delta R \pm [0.5 \% R0 + R0005]$ - Average
Endurance-Load Life [70°C with limiting voltage -1.5 hours on / 0.5 hours off for 1000 hours]	$\Delta R \pm [\leq 2.75 \% R0 + R0005]$ - Average
Resistance to Soldering heat - (350° for 30 Secs)	$\Delta R \pm [0.2 \% R0 + R0005]$ -Typical
Solderability (As per IEC pub. 60068-2-20)	Must meet the requirements laid down

● Packaging

A. BULK

Resistors shall be packed in sealed plastic packets with silica gel pouch placed in small cardboard cartons (Type 'I' Box) of approximate size 70mmx70mmx70mm - 500pcs. & such 4 Boxes packed in (Type 'A' Box) of approximate size 200mmx150mmx70mm & 8 Boxes in (Type 'B' Box) of approximate size 295mmx140mmx80mm. & such 36 Boxes of Type 'I' or 6 Boxes of Type 'A' packed in Master Carton of approximate size 320mmx245mmx245mm.

B. TAPE & REEL PACKING



SPECIFICATION	TAPEWIDTH	PARTS PER REEL
EIA-481-D	24mm	1400 pcs

Storage Condition (Packed) : Temp 25° C to 35° C, Humidity 30 to 80% RH, Shelf life-12 months
Floor Life (Unpacked) : Temp 25° C to 35° C, Humidity 30 to 80% RH, Floor life-15 days