

1. Applicable Scope:

This type resistor is non inductive.  
It is customer order made.

Remark: Milli OHM WIRE RESISTORS are RoHS Compliant.

2. Part Number:

It is composed by Type, Wire Diameter, Pitch, Nominal Resistance, Tolerance and Forming. e. g.

WOR	1.0	10	10mR	G	MG
Type	Wire Diameter	Pitch	Nominal Resistance	Tolerance	Forming

2.1 Type:

Milli ohm wire resistors are called "WOR".

2.2 Wire Diameter:

The range is 0.6mm ~2.6mm.

2.3 Pitch:

According to mounting requirements, there are 5mm, 10mm, 15mm..... etc.

2.4 Nominal Resistance:

mΩ is its unit which be in accordance with JIS-C6409 article 6 (EIA RS-196A) series. Letter "10mR" indicates resistance value 10mΩ.

2.5 Tolerance:

It is measured by Bridge-method at room temperature and expressed by a capital letter.

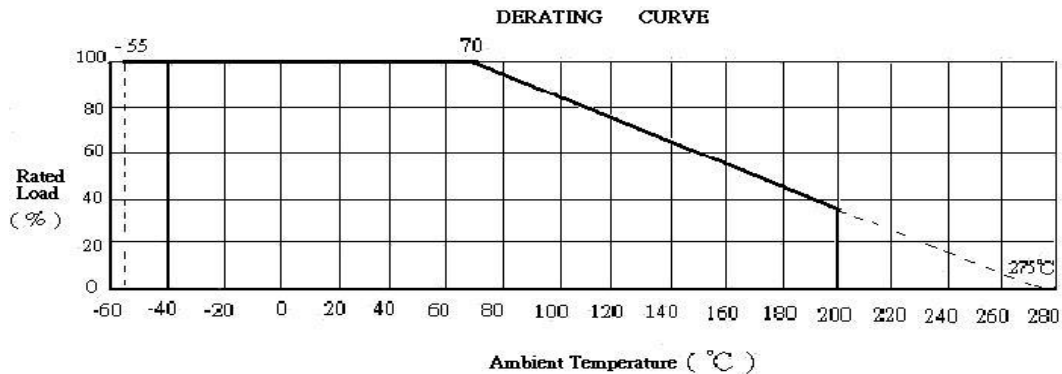
G:±2%.

2.6 Forming:

Upon the shape of forming, there are "MG" form, "MS" form ..... etc.

3. Rated Power:

Rated power is the value of Max load power specified at the ambient temperature of 70°C, and shall meet the functions of electrical and mechanical performance. When the ambient temperature surpasses above mentioned temperature, the value declines as per following DERATING CURVE.



4. Operating Temperature Range:  $-55^{\circ}\text{C} \sim 200^{\circ}\text{C}$

5. Electrical and mechanical specifications:

Characteristics	Condition		Test methods
Resistance and Tolerance	10mΩ	±2%	JIS-C-5201
Temperature coefficient	CMW	±50ppm/°C	JIS-C-5201
Power rating load	Temperature 200°C MAX ΔR/R ≤ 1%		JIS-C-5201
Short-time overload	No evidence of mechanical damage ΔR/R ≤ 2%		JIS-C-5201
Terminal strength	No evidence of mechanical damage Wire dimension over 1.0mm 5KG/10sec Wire dimension below 0.8mm以下 2KG/10sec		JIS-C-5201
Vibration	No evidence of mechanical damage (Insert in the PCB state)		JIS-C-5201
Soldering heat	No evidence of mechanical damage (260°C 10sec) ΔR/R ≤ 1%		JIS-C-5201
Solder-ability	95% coverage MIN (235°C 2sec)		JIS-C-5201

6. Environmental specifications:

Characteristics	Condition	Test methods
Heat resistor	No deterioration(200°C 2Hrs)	JIS-C-5201
Heat shock	No deterioration(power rating load 30min→-55°C 15min) ΔR/R ≤ 2%	JIS-C-5201
Temperature cycling	No evidence of mechanical damage (-55°C/200°C 5 cycles) ΔR/R ≤ 1%	JIS-C-5201
Load life in humidity	10%rate power load (90min ON 30min OFF 40°C 95%RH 250Hrs) ΔR/R ≤ 2%	JIS-C-5201
Load life	100%rate power load (90min ON 30min OFF 1,000Hrs) ΔR/R ≤ 3%	JIS-C-5201

7. Dimension:

$\phi D$ $\pm 0.03(\text{mm})$	P $\pm 0.2(\text{mm})$	h $\pm 0.3(\text{mm})$	H Max. (mm)	C $\pm 0.2(\text{mm})$	Center resistance ( $\text{m}\Omega$ )	Wire material
1.0	10	3.2	6	1.4	$10 \pm 2\%$	CMW

8. Figure:

