## Feature

- Excellent flame retardant coating
- High stability even in bad environment
- High purity ceramic core
- Meet EIA-RC2655A requirements

- High safety standard


## Dimension (mm)



Derating Curve


Heat Rise Chart


## Specification

| Part No. | Type | Power <br> Rating $70^{\circ} \mathrm{C}$ | Dimension (mm) |  |  |  |  | MAX. <br> Working Voltage | MAX. <br> Overlaod Voltage | Dielectric Withstanding Voltage | Resistance Range |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | D | L | $\mathrm{d} \pm 0.05$ | $\mathrm{H} \pm 3$ | PT |  |  |  |  |
| MOROW4 | MOR-25 | 1/4W | $2.2 \pm 0.5$ | $6.5 \pm 1.0$ | 0.54 | 28 | 52 | 250 V | 400 V | 250 V | $0.1 \Omega \sim 470 \mathrm{~K} \Omega$ |
| MOROS2 | MOR-50-S | 1/2W-S | $2.2 \pm 0.5$ | $6.5 \pm 1.0$ | 0.54 | 28 | 52 | 250 V | 400 V | 250 V | $0.1 \Omega \sim 470 \mathrm{~K} \Omega$ |
| MOROW2 | MOR-50 | 1/2W | $3.0 \pm 0.6$ | $9.5 \pm 1.0$ | 0.54 | 28 | 52 | 250 V | 400 V | 250 V | $0.1 \Omega \sim 560 \mathrm{~K} \Omega$ |
| MOR01S | MOR-100-S | 1W-S | $3.5 \pm 0.6$ | $9.5 \pm 1.0$ | 0.54 | 28 | 52 | 350 V | 600 V | 350 V | $0.1 \Omega \sim 560 \mathrm{~K} \Omega$ |
| MOR01W | MOR-100 | 1W | $4.5 \pm 0.6$ | $11.5 \pm 1.0$ | 0.70 | 25 | 52 | 350 V | 600 V | 350 V | $0.1 \Omega \sim 560 \mathrm{~K} \Omega$ |
| MOR02S | MOR-200-S | 2W-S | $4.5 \pm 0.6$ | $11.5 \pm 1.0$ | 0.70 | 25 | 52 | 350 V | 600 V | 350 V | $0.1 \Omega \sim 560 \mathrm{~K} \Omega$ |
| MOR02W | MOR-200 | 2W | $5.0 \pm 0.6$ | $15.5 \pm 1.0$ | 0.70 | 28 | 64 | 350 V | 600 V | 350 V | $0.1 \Omega \sim 560 \mathrm{~K} \Omega$ |
| MOR03S | MOR-300-S | 3W-S | $5.0 \pm 0.6$ | $15.5 \pm 1.0$ | 0.70 | 28 | 64 | 350 V | 600 V | 350 V | $0.1 \Omega \sim 560 \mathrm{~K} \Omega$ |
| MOR03W | MOR-300 | 3W | $6.0 \pm 0.6$ | $17.5 \pm 1.0$ | 0.75 | 28 | 64 | 500 V | 800 V | 500 V | $0.1 \Omega \sim 560 \mathrm{~K} \Omega$ |
| MOR05S | MOR-500-S | 5W-S | $6.0 \pm 0.6$ | $17.5 \pm 1.0$ | 0.75 | 28 | 64 | 500 V | 800 V | 500 V | $0.1 \Omega \sim 560 \mathrm{~K} \Omega$ |
| MOR05W | MOR-500 | 5W | $8.0 \pm 0.6$ | $24.5 \pm 1.0$ | 0.75 | 38 | 90 | 750 V | 1000V | 750 V | $0.1 \Omega \sim 680 \mathrm{~K} \Omega$ |
| MOR07W | MOR-700 | 7W | $8.0 \pm 0.6$ | $29.5 \pm 1.0$ | 0.75 | 38 | B/B | 750 V | 1000V | 750 V | 20 $\sim \sim 150 \mathrm{~K} \Omega$ |
| MOR08W | MOR-800 | 8W | $8.0 \pm 0.6$ | $39.5 \pm 1.0$ | 0.75 | 38 | B/B | 750 V | 1000 V | 750 V | $30 \Omega \sim 200 \mathrm{~K} \Omega$ |
| MOR09W | MOR-900 | 9W | $8.0 \pm 0.6$ | $52.5 \pm 1.0$ | 0.75 | 38 | $B / B$ | 750 V | 1000V | 750 V | 50 $2 \sim 200 \mathrm{~K} \Omega$ |

- Standard E-24 Series $\pm 5 \%$ tolerance
- Standard Gray base color for Normal Size product,Blue color for Small Size product
- Standard Non-Flammable coating
- Non-Inductive type available case by case

Semic Trade, s.r.o., Volutová 2521/18, 15800 Praha 5

## Performance Specification

```
\begin{tabular}{|c|c|}
\hline 1/4W, 1/2WS: & \[
\begin{aligned}
& \leq 100 \mathrm{~K} \Omega: \pm 350 \mathrm{PPM} /{ }^{\circ} \mathrm{C} ; \\
& 100 \mathrm{~K} \Omega<R \leq 470 \mathrm{~K} \Omega: 0 \sim-700 \mathrm{PPM} /{ }^{\circ} \mathrm{C}
\end{aligned}
\] \\
\hline 1/2W, 1WS: & \[
\begin{aligned}
& \leq 120 \mathrm{~K} \Omega: \pm 350 \mathrm{PPM} /{ }^{\circ} \mathrm{C} ; \\
& 120 \mathrm{~K} \Omega<\mathrm{R} \leq 560 \mathrm{~K} \Omega: 0 \sim-700 \mathrm{PPM} /{ }^{\circ} \mathrm{C}
\end{aligned}
\] \\
\hline \[
1 \mathrm{~W}, 2 \mathrm{~W}, 2 \mathrm{WS},
\] & \[
\begin{aligned}
3 W, 3 W S, 5 W S: & \leq 150 \mathrm{~K} \Omega: \pm 350 \text { PPM } /{ }^{\circ} \mathrm{C} ; \\
& 150 \mathrm{~K} \Omega<R \leq 560 \mathrm{~K} \Omega: 0 \sim-700 \mathrm{PPM} /{ }^{\circ} \mathrm{C}
\end{aligned}
\] \\
\hline 5W: & \[
\begin{aligned}
& \leq 180 \mathrm{~K} \Omega: \pm 350 \mathrm{PPM} /{ }^{\circ} \mathrm{C} ; \\
& 180 \mathrm{~K} \Omega<R \leq 680 \mathrm{~K} \Omega: 0 \sim-700 \mathrm{PPM} /{ }^{\circ} \mathrm{C}
\end{aligned}
\] \\
\hline 7W, 8W, 9W: & \(\pm 350\) PPM \(/{ }^{\circ} \mathrm{C}\) \\
\hline
\end{tabular}
\begin{tabular}{|c|c|}
\hline Short-time Overload & Normal size, \(\Delta R / R \leq \pm(1 \%+0.05 \Omega)\), with no evidence of mechanical damage Small size, \(\Delta R / R \leq \pm(2 \%+0.05 \Omega)\), with no evidence of mechanical damage \\
\hline Dielectric withstanding voltage & No evidence of flashover, mechanical damage,arcing or insulation breakdown \\
\hline Pulse Overload & Normal size, \(\Delta R / R \leq \pm(2 \%+0.05 \Omega)\), with no evidence of mechanical damage Small size, \(\Delta R / R \leq \pm(5 \%+0.05 \Omega)\), with no evidence of mechanical damage \\
\hline Terminal strength & No evidence of mechanical damage \\
\hline Soldering heat & \(\Delta R / R \leq \pm(1 \%+0.05 \Omega)\), with no evidence of mechanical damage \\
\hline Solderability & Coverage must be over \(95 \%\). \\
\hline Resistance to solvent & No deterioration of protective coating and markings \\
\hline Rapid change of temperature & \begin{tabular}{l}
\[
\Delta R / R \leq \pm(2 \%+0.05 \Omega)
\] \\
with no evidence of mechanical damage
\end{tabular} \\
\hline Humidity ( Steady State) & \begin{tabular}{l}
\[
\triangle R / R \leq \pm(2 \%+0.05 \Omega)
\] \\
with no evidence of mechanical damage
\end{tabular} \\
\hline Load life in humidity & \[
\begin{aligned}
& <100 \mathrm{k} \Omega: \pm(5 \%+0.05 \Omega) \\
& \geq 100 \mathrm{k} \Omega: \pm(10 \%+0.05 \Omega)
\end{aligned}
\] \\
\hline Load life & \[
\begin{aligned}
& <100 \mathrm{k} \Omega: \pm(5 \%+0.05 \Omega) \\
& \geq 100 \mathrm{k} \Omega: \pm(10 \%+0.05 \Omega)
\end{aligned}
\] \\
\hline
\end{tabular}
Flame retardant Resistor insulation is self-extinguishing within 10 seconds after externally applied flame is removed
```

Ordering Procedure (Example: MOR 1W-S 5\% 8.2 T/B-1000)


Semic Trade, s.r.o., Volutová 2521/18, 15800 Praha 5

