

Vishay Dale Thin Film

Molded, 50 mil Pitch, Dual-In-Line Thin Film Resistor, Surface-Mount Network

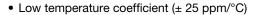


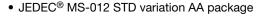


ORN series resistor networks feature 4 isolated resistors or 7 bussed resistors with standard 50 mil pitch lead spacing. The networks feature close TCR tracking and tight ratio tolerance and are ideally suited for unity gain operational amplifier circuitry. The standard resistance offering listed are available for immediate delivery.

FEATURES

- 0.068" (1.73 mm) maximum seated height
- Rugged molded case construction with no internal solder







 Material categorization: for definitions of compliance please see <u>www.vishav.com/doc?99912</u>

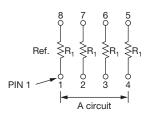
Note

* This datasheet provides information about parts that are RoHS-compliant and / or parts that are non RoHS-compliant. For example, parts with lead (Pb) terminations are not RoHS-compliant. Please see the information / tables in this datasheet for details

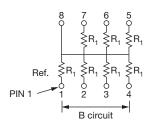
TYPICAL PERFORMANCE

	ABSOLUTE	TRACKING
TCR	25	5
	ABSOLUTE	RATIO
TOL.	0.1	0.05

SCHEMATIC



The A circuit provides a choice of 4 nominally equal resistors with each resistor isolated from all others and wired directly across.



The B circuit provides 7 nominally equal resistors, each connected between a common lead (8) and a discrete PC board pin.

STANDARD RESISTANCE OFFERING (R ₁ =)		
49.9 Ω	10 kΩ	
100 Ω	20 kΩ	
500 Ω	50 kΩ	
1 kΩ	100 kΩ	
2 kΩ	200 kΩ	
4.99 kΩ	500 kΩ	
5 kΩ		

Note

Consult factory for additional values and schematics

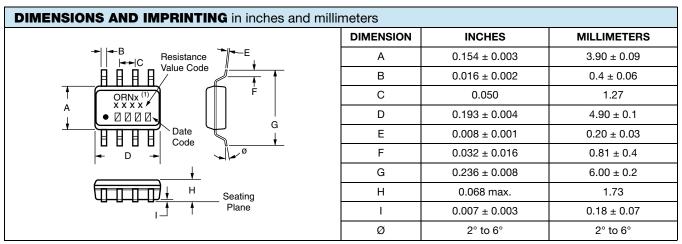


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STANDARD ELECTRICAL SPECIFICATIONS		
TEST	SPECIFICATIONS	CONDITIONS
Material	Passivated nichrome	-
Pin/Lead Number	8	-
Resistance Range	33 Ω to 500 k Ω (isolated) per resistor 33 Ω to 250 k Ω (bussed) per resistor	-
Resistance for Jumper	≤ 50 mΩ	-
TCR: Absolute	± 25 ppm/°C	-55 °C to +125 °C
TCR: Tracking	± 5 ppm/°C	-55 °C to +125 °C
Tolerance: Absolute	± 0.05 % to ± 1.0 %	+25 °C
Tolerance: Ratio	± 0.01 % to ± 0.5 %	+25 °C
Power Rating: Resistor	100 mW	Maximum at +70 °C
Power Rating: Package	400 mW	Maximum at +70 °C
Stability: Absolute	ΔR ± 0.05 %	2000 h at +70 °C
Stability: Ratio	ΔR ± 0.015 %	2000 h at +70 °C
Voltage Coefficient	0.1 ppm/V (typical)	-
Working Voltage	100 V max. not to exceed √P x R	-
Operating Temperature Range	-55 °C to +125 °C	-
Storage Temperature Range	-55 °C to +150 °C	-
Noise	< -30 dB	-
Thermal EMF	0.08 μV/°C	-
Shelf Life Stability: Absolute	ΔR ± 0.01 %	1 year at +25 °C
Shelf Life Stability: Ratio	ΔR ± 0.002 %	1 year at +25 °C

Note

• TCR and TCR tracking are not available for parts with zero ohm jumpers



Notes

- Marking Vishay symbol, part number from ordering information
- (1) A for isolated or B for bussed

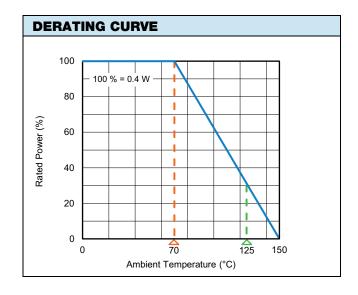


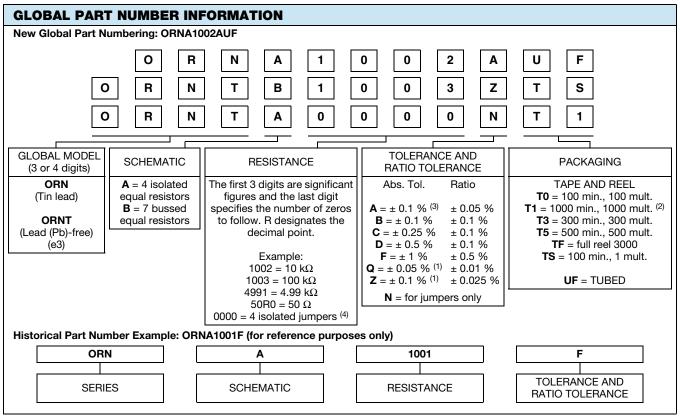


www.vishay.com

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MECHANICAL SPECIFICATIONS			
Resistive Element	Passivated nichrome		
Substrate Material	Silicon		
Body	Molded epoxy		
Terminals	Copper alloy		
Lead (Pb)-free Option	100 % matte tin		
Tin Lead Option	Sn90		
Tin Lead and Lead (Pb)-free Finish	Plated		





Notes

- (1) Tol. available 1K and up
- (2) Preferred packaging code
- $^{(3)}$ Ratio tolerance available 250 Ω and up
- (4) Jumpers only available in A schematic



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