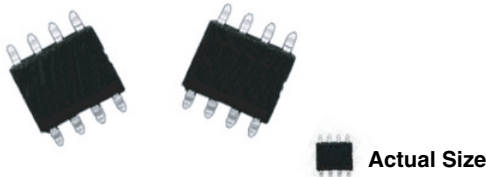


SMD Molded, 50 Mil Pitch, Dual-In-Line Thin Film Resistor Networks



FEATURES

- Tight TCR tracking down to 5 ppm/°C
- Monolithic reliability
- Low noise < -35 dB
- SMD precision networks
- SO08, SO14, SO16 cases
- MSL 1 to JEDEC J-STD-020C specification



DESIGN SUPPORT TOOLS AVAILABLE



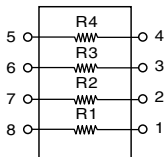
The RMKM series of small outline surface mount style molded package can accommodate resistor network to your particular application requirements in compact circuit integration. The resistor element is a special nickel chromium film formulation on oxidized silicon.

Utilizing those networks will enable you to take advantage of parametric performances which will introduce in your circuitry high thermal and load life stability (0.05 % absolute, 0.02 % ratio, 2000 h at +70 °C at Pn) together with the added benefits of low noise and rapid rise time.

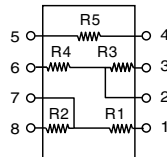
SCHEMATIC

RMKM S408

Case SO08

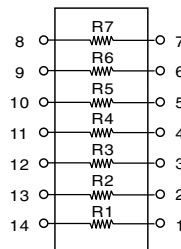


RMKM S508

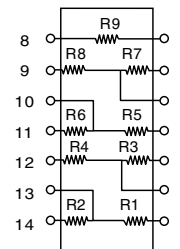


RMKM S714

Case SO14

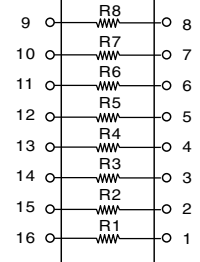


RMKM S914



RMKM S816

Case SO16



For other configurations, please consult factory.

STANDARD ELECTRICAL SPECIFICATIONS

MODEL	SIZE	RESISTANCE RANGE Ω	POWER RATING PER RESISTOR W	POWER RATING PER PACKAGE $P_{70^{\circ}\text{C}}$ W	ABSOLUTE TOLERANCE ± %	RATIO TOLERANCE (2) ± %	ABSOLUTE TCR (1) ± ppm/°C	RATIO TCR ± ppm/°C
RMKMS	SO08	500 to 200K	0.050	0.250	0.1, 0.5, 1	0.05, 0.1, 0.5	10, 15	5
RMKMS	SO14	500 to 200K	0.050	0.500	0.1, 0.5, 1	0.05, 0.1, 0.5	10, 15	5
RMKMS	SO16	500 to 200K	0.050	0.500	0.1, 0.5, 1	0.05, 0.1, 0.5	10, 15	5

Notes

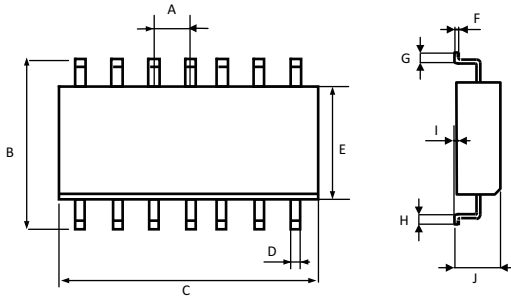
(1) ± 10 ppm/°C at 0 °C to +70 °C; ± 15 ppm/°C at -55 °C to ± 125 °C

(2) 0.02 % upon request

PERFORMANCES

TEST	SPECIFICATIONS	CONDITION
Stability: ΔR Absolute	0.05 %	2000 h at +70 °C at P
Stability: ΔR Ratio	0.02 %	2000 h at +70 °C at P
Voltage coefficient	< 0.1 ppm/V	
Working voltage	50 V _{DC} maximum	
Operating temperature range	-55 °C to +125 °C	
Storage temperature range	-55 °C to +155 °C	
Noise	-35 dB (typical)	MIL-STD-202, meth. 308
Thermal EMF	0.1 μV/°C	
High temp. storage Shelf life stability	0.075 %	2000 h at +125 °C
	0.025 %	2000 h at +125 °C

DIMENSIONS AND IMPRINTING



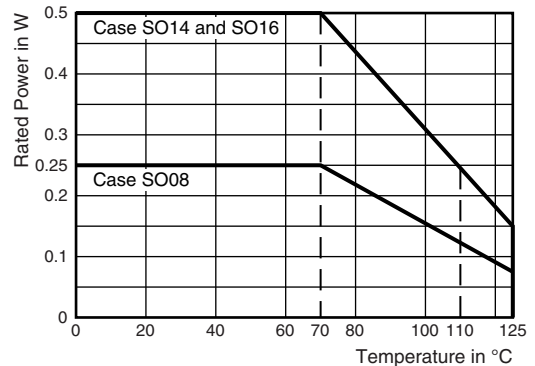
Imprinting:

VISHAY logo, series, ohmic value, tolerance, manufacturing date

DIMENSION	INCHES	MILLIMETERS
A	Pitch 0.05	Pitch 1.27
B	0.230/0.244	5.84/6.2
C (SO08)	0.189/0.196	4.80/4.98
C (SO14)	0.337/0.344	8.56/8.74
C (SO16)	0.386/0.393	9.80/9.98
D	0.014/0.020	0.35/0.51
E	0.150/0.157	3.81/3.99
F	0.007/0.010	0.17/0.254
G, H	0.016/0.035	0.40/0.89
I	0.004/0.010	0.10/0.254
J	0.061/0.068	1.55/1.73

MECHANICAL SPECIFICATIONS	
Mechanical protection	Epoxy molded assembly
Terminal leads	100 % tin
Resistive element	Passivated nichrome
Unit weight: Case SO08	0.070 g
Cases SO14, SO16	0.146 g

DERATING CURVE



MARKING				
TOLERANCE CODING				
A	B	D	F	X
0.1 %	0.1 %	0.5 %	1 %	0.1 %
0.05 %	0.1 %	0.1 %	0.5 %	0.02 % (on request only)

GLOBAL PART NUMBER INFORMATION																
New Global Part Numbering: RMKMS408-10KFDT99 (preferred part number format)																
R	M	K	M	S	4	0	8	-	1	0	K	F	D	T	9	9
GLOBAL MODEL		VALUE		ABS. TOLERANCE		RATIO TOLERANCE		PACKAGING		OPTION						
RMKMS408 RMKMS508 RMKMS816 RMKMS714 RMKMS914		Decimal: R or K		B = 0.1 % D = 0.5 % F = 1.0 %		D = 0.5 % B = 0.1 % W = 0.05 % P = 0.02 %		Blank = tube T ⁽¹⁾ = tape		Leave blank if no option						
Custom Design: CNM 1138																
CNM		1138														
GLOBAL MODEL		REFERENCE														
RMKMS 408		10K		1 % abs 0.5 % ratio		T		R0099								
HISTORICAL MODEL		VALUE		ABS. TOLERANCE AND RATIO TOLERANCE		PACKAGING		OPTION								
						Blank = tube T ⁽¹⁾ = tape		Leave blank if no option								

Note

- For more information see "Codification of Packaging" table



CODIFICATION OF PACKAGING	
CODE 18	PACKAGING
PLASTIC TAPE (in standard for all sizes)	
T	100 min., 1 mult
TA	100 min., 100 mult
TB	250 min., 250 mult
TC	500 min., 500 mult
TD	1000 min., 1000 mult

HISTORICAL PART NUMBER EXAMPLES

- RMKMS816-10KBWT250 (tapes of 250 pieces)
- RMKMS816-1KDBT250 (tapes of 250 pieces)
- CNM1138T250 (tapes of 250 pieces)
- CNM1490T250 (tapes of 250 pieces)

Historical part numbers are not recommended, but can still be used for ordering.



Disclaimer

ALL PRODUCT, PRODUCT SPECIFICATIONS AND DATA ARE SUBJECT TO CHANGE WITHOUT NOTICE TO IMPROVE RELIABILITY, FUNCTION OR DESIGN OR OTHERWISE.

Vishay Intertechnology, Inc., its affiliates, agents, and employees, and all persons acting on its or their behalf (collectively, "Vishay"), disclaim any and all liability for any errors, inaccuracies or incompleteness contained in any datasheet or in any other disclosure relating to any product.

Vishay makes no warranty, representation or guarantee regarding the suitability of the products for any particular purpose or the continuing production of any product. To the maximum extent permitted by applicable law, Vishay disclaims (i) any and all liability arising out of the application or use of any product, (ii) any and all liability, including without limitation special, consequential or incidental damages, and (iii) any and all implied warranties, including warranties of fitness for particular purpose, non-infringement and merchantability.

Statements regarding the suitability of products for certain types of applications are based on Vishay's knowledge of typical requirements that are often placed on Vishay products in generic applications. Such statements are not binding statements about the suitability of products for a particular application. It is the customer's responsibility to validate that a particular product with the properties described in the product specification is suitable for use in a particular application. Parameters provided in datasheets and / or specifications may vary in different applications and performance may vary over time. All operating parameters, including typical parameters, must be validated for each customer application by the customer's technical experts. Product specifications do not expand or otherwise modify Vishay's terms and conditions of purchase, including but not limited to the warranty expressed therein.

Hyperlinks included in this datasheet may direct users to third-party websites. These links are provided as a convenience and for informational purposes only. Inclusion of these hyperlinks does not constitute an endorsement or an approval by Vishay of any of the products, services or opinions of the corporation, organization or individual associated with the third-party website. Vishay disclaims any and all liability and bears no responsibility for the accuracy, legality or content of the third-party website or for that of subsequent links.

Except as expressly indicated in writing, Vishay products are not designed for use in medical, life-saving, or life-sustaining applications or for any other application in which the failure of the Vishay product could result in personal injury or death. Customers using or selling Vishay products not expressly indicated for use in such applications do so at their own risk. Please contact authorized Vishay personnel to obtain written terms and conditions regarding products designed for such applications.

No license, express or implied, by estoppel or otherwise, to any intellectual property rights is granted by this document or by any conduct of Vishay. Product names and markings noted herein may be trademarks of their respective owners.