



Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from,Europe,America and south Asia,supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of “Quality Parts,Customers Priority,Honest Operation,and Considerate Service”,our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip,ALPS,ROHM,Xilinx,Pulse,ON,Everlight and Freescale. Main products comprise IC,Modules,Potentiometer,IC Socket,Relay,Connector.Our parts cover such applications as commercial,industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



## Contact us

Tel: +86-755-8981 8866 Fax: +86-755-8427 6832

Email & Skype: info@chipsmall.com Web: www.chipsmall.com

Address: A1208, Overseas Decoration Building, #122 Zhenhua RD., Futian, Shenzhen, China



# NPS 2-T126

Power SMD Resistors



- Resistances from 0.025Ohm to 10kOhms
- Power Rating to 25Watt
- Resistance Tolerances to  $\pm 1\%$
- TCR to  $\pm 100\text{ppm}/^\circ\text{C}$
- Load Stability to 0.5%
- TO-126 Housing (D-Pak)
- Solder Reflow Secure at  $260^\circ\text{C} / 20\text{s}$



## SPECIFICATIONS

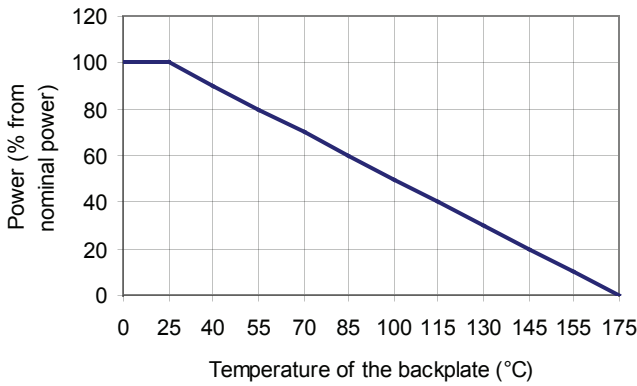
Type	NPS 2-T126			
Terminals	2			
Resistance Range	0.025 to 0.049Ohms	0.05 to 0.099Ohms	0.1 to 0.99Ohms	1Ohms to 10kOhms
Power Rating Heatsink	25 W			
Power Rating Simple Pad	0.6 W			
Thermal Resistance Rthj-c	6.0 C / W			
Tolerances (others upon request)	2% / 5%		1% / 2% / 5%	
Stability	0.5%			
Temperature Coefficient (TCR 50ppm upon request)	$\pm 500\text{ ppm}/^\circ\text{C}$	$\pm 400\text{ ppm}/^\circ\text{C}$	$\pm 300\text{ ppm}/^\circ\text{C}$	$\pm 100\text{ ppm}/^\circ\text{C}$
Voltage Proof	2.0 kV DC			
Operating Temperature	$-40^\circ\text{C}$ to $175^\circ\text{C}$			
Resistor Material	Thick Film			
Substrate	$\text{Al}_2\text{O}_3$			
Housing	Epoxy			
Connector Material	Cu / Ni-flash / lead-free tinned			
Reflow soldering	lead-free soldering $260^\circ\text{C} / 20\text{s}$			

## Ordering Information

Part Description: Part Type - Resistance - Tolerance  
NPS 2-T126 1.1 Ohms 1%

**SPECIFICATIONS** (continued)

**Derating**



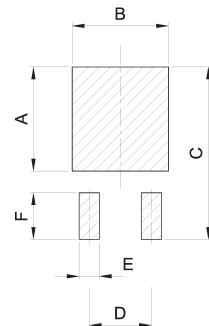
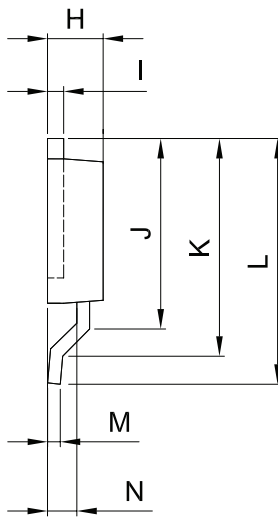
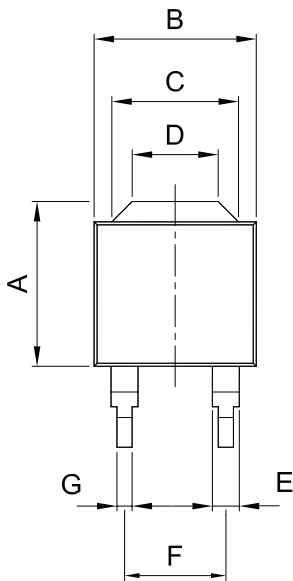
**Power Rating Notes -**

The NPS Series Resistors must be attached to a suitable heat-sink. The maximum internal resistor temperature is 175°C. To specify an appropriate heatsink use the following formula :

$$R_{\theta H} = \frac{T_{MAX} - (P \times R_{\theta R}) - T_A}{P}$$

Where:  $R_{\theta H}$  = Thermal Resistance of Heatsink ( K/W )  
 $R_{\theta R}$  = Thermal Resistance of Resistor ( K/W )  
 $T_{MAX}$  = Maximum Temperature of Resistor  
 $T_A$  = Ambient Temperature of Heatsink ( °C )  
 $P$  = Power Through Resistor ( W )

**Dimensions**



Dimension	mm	tol. (±mm)	inches	tol. (±inches)
A	8.26	0.2	0.33	0.008
B	8.13	0.2	0.32	0.008
C	6.35	0.1	0.25	0.004
D	4.31	0.1	0.17	0.004
E	1.35	0.1	0.05	0.004
F	5.08	0.1	0.20	0.004
G	0.76	0.1	0.03	0.004
H	2.79	0.1	0.11	0.004
I	0.8	0.1	0.03	0.004
J	9.55	0.2	0.38	0.008
K	10.92	0.2	0.43	0.008
L	12.32	0.2	0.49	0.008
M	0.6	0.1	0.02	0.004
N	1.47	0.1	0.06	0.004

Dimension	mm	inches
A	8.51	0.335
B	7.87	0.310
C	14.1	0.555
D	5.08	0.200
E	1.65	0.065
F	3.81	0.150