## : ©hipsmall

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

## Microsemi

## FEATURES

- 8 Isolated lines
- Standard SOIC 16 pin Surface Mount Package
- UL 94V-0 Flammability Classification


## MECHANICAL

- Molded SOIC 16 Pin
- Weight: 2.5 grams (approximate)
- Marking: Logo, device number, date code
- Pin \#1 defined by DOT on top of package
- 8 Pin pairs


## MAXIMUM RATINGS

- Operating Temperatures: $-55^{\circ} \mathrm{C}$ to $+150^{\circ} \mathrm{C}$
- Storage Temperature: $-55^{\circ} \mathrm{C}$ to $+150^{\circ} \mathrm{C}$
- Forward Surge Current: 2.0Amps ( 8.3 mSec )


## PACKAGING

- Carrier tubes 25 per (standard)

ELECTRICAL CHARACTERISTICS PER LINE Characteristics @ $25^{\circ} \mathrm{C}$ Unless otherwise specified

| $\begin{gathered} \mathrm{S} 16-4148 \\ \text { And } \\ \mathrm{S} 16-4150 \end{gathered}$ <br> Switching Diode Array |
| :---: |
|  |
| CIRCUIT DIAGRAM |


| Part Number | $\begin{gathered} \mathrm{Vbr} \\ @ \mathrm{Ibr}=100 \mu \mathrm{~A} \\ \mathrm{~V} \\ \text { MIN } \end{gathered}$ | $\begin{gathered} \text { Ir } \\ +25^{\circ} \mathrm{C} \end{gathered}$ |  | $\begin{gathered} \text { Ir } \\ 150^{\circ} \mathrm{C} \end{gathered}$ |  | $\begin{gathered} \text { CAP } \\ @ 0 \mathrm{~V} \\ \mathrm{pF} \\ \mathrm{MAX} \end{gathered}$ | trr <br> (nS) <br> MAX |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{array}{r} \mu \mathrm{A} \\ \mathrm{MAX} \end{array}$ | $\begin{gathered} \mathrm{V} \\ @ \mathrm{Vr} \end{gathered}$ | $\begin{array}{r} \mu \mathrm{A} \\ \mathrm{MAX} \end{array}$ | $\begin{gathered} \mathrm{V} \\ @ \mathrm{Vr} \end{gathered}$ |  |  |
| S16-4148 | 100 | $\begin{aligned} & .025 \\ & .100 \end{aligned}$ | $\begin{aligned} & 20 \\ & 50 \end{aligned}$ | $\begin{aligned} & 50 \\ & 100 \end{aligned}$ | 20 50 | 4.0 | 5.0 |
| S16-4150 | 75 | . 500 | 75 | 100 | 75 | 2.5 | 4.0 |


| Part Number | $\begin{gathered} \mathrm{Vf} \\ \text { @ If }=1.0 \mathrm{~mA} \\ \mathrm{~V} \end{gathered}$ |  | $\begin{gathered} \mathrm{Vf} \\ @ \mathrm{If}=10 \mathrm{~mA} \\ \mathrm{~V} \end{gathered}$ |  | $\begin{aligned} & \mathrm{Vf} \\ & \text { @ If }=50 \mathrm{~mA} \\ & \mathrm{~V} \end{aligned}$ |  | $\begin{aligned} & \mathrm{Vf} \\ & \text { @ If = } 100 \mathrm{~mA} \\ & \mathrm{~V} \end{aligned}$ |  | $\begin{aligned} & \mathrm{Vf} \\ & \text { @ If }=200 \mathrm{~mA} \\ & \mathrm{~V} \end{aligned}$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | MIN | MAX | MIN | MAX | MIN | MAX | MIN | MAX | MIN | MAX |
| S16-4148 | ----- | ------ | ------ | 1.00 | ------ | ------ | ----- | 1.20 | ----- | ----- |
| S16-4150 | 0.54 | 0.62 | 0.66 | 0.74 | 0.76 | 0.86 | 0.82 | 0.92 | 0.87 | 1.00 |



|  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  INCHES  MILLIMETERS  <br> DIM MIN MAX MIN MAX <br> A 0.358 0.398 9.09 10.10 <br> B 0.150 0.158 3.81 4.01 <br> C 0.053 0.069 1.35 1.75 <br> D 0.011 0.021 0.28 0.53 <br> F 0.016 0.050 0.41 1.27 <br> G 0.050 BSC 1.27 BSC   <br> J 0.006 0.010 0.15 0.25 <br> K 0.004 0.010 0.10 0.20 <br> L 0.189 0.206 4.80 5.23 <br> P 0.228 0.244 5.79 6.19 |  |  |  |  |

