# Single-In-Line, Coated, 4 Bits to 8 Bits <br> R/2R Ladder Networks 



## APPLICATIONS

R/2R Ladder networks for D/A and A/D converter with bi-polar or CMOS switches.

## ELECTRICAL SPECIFICATIONS

Ladder Network Accuracy on Linearity: $\pm 1 / 2$ LSB.
Ladder Network Resistance Tolerance: $\pm 2 \%$.
Temperature Coefficient of Resistance: $\pm 100 \mathrm{PPM} /{ }^{\circ} \mathrm{C}$.
Operating Temperature Range: $-55^{\circ} \mathrm{C}$ to $+125^{\circ} \mathrm{C}$.
Power Dissipation Rating at $+70^{\circ} \mathrm{C}$ Ambient:
$50 \mathrm{~mW} /$ element.
Standard Resistance Values (R): 5 kilohms, 10 kilohms, 25 kilohms, 50 kilohms and 100 kilohms.

## SCHEMATIC

n Bits:
n = 4 thru 8


## DIMENSIONAL CONFIGURATIONS [Numbers in brackets indicate millimeters]

|  | NUMBER OF PINS | $\begin{gathered} \mathrm{A} \\ \text { (Max.) } \end{gathered}$ | $\begin{gathered} \text { B } \\ \pm .005[.127] \end{gathered}$ | $\underset{\text { (Max.) }}{\text { C }}$ |
| :---: | :---: | :---: | :---: | :---: |
|  | 6 | $\begin{gathered} .590 \\ {[14.99]} \end{gathered}$ | $\begin{gathered} .500 \\ {[12.70]} \end{gathered}$ | $\begin{gathered} .350 \\ {[8.89]} \end{gathered}$ |
|  | 7 | $\begin{gathered} 690 \\ {[17.53]} \end{gathered}$ | $\begin{gathered} .600 \\ {[15.24]} \end{gathered}$ | $\begin{gathered} .350 \\ {[8.89]} \end{gathered}$ |
|  | 8 | $\begin{gathered} .790 \\ {[20.07]} \end{gathered}$ | $\begin{gathered} .700 \\ {[17.78]} \end{gathered}$ | $\begin{gathered} .350 \\ {[8.89]} \end{gathered}$ |
|  | 9 | $\begin{gathered} .890 \\ {[22.61]} \end{gathered}$ | $\begin{gathered} .800 \\ {[20.32]} \end{gathered}$ | $\begin{gathered} .350 \\ {[8.89]} \end{gathered}$ |
|  | 10 | $\begin{gathered} .990 \\ {[25.15]} \end{gathered}$ | $\begin{gathered} .900 \\ {[22.86]} \end{gathered}$ | $\begin{gathered} .350 \\ {[8.89]} \end{gathered}$ |

## HOW TO ORDER



| $\frac{104}{} \frac{1}{\text { RESISTANCE VALUE (Ohms) }}$ |
| :---: |
| First two digits are significant, third digit <br> signifies number of zeros to follow. |

EXAMPLE: $104=\mathrm{R}=100$ kilohms. REFERENCE: $2 R=200$ kilohms.

