



Octal Schottky Diode Network

Features

- Highly effective termination on controlled and uncontrolled line impedances
- 8 terminating lines/package

Applications

- Reduce undershoots and multiple triggering on high speed data lines
- ESD protection

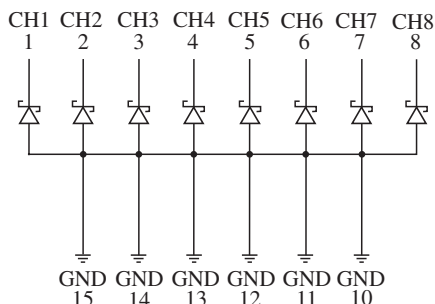
Refer to AP-201 Termination Application Note for further information.

Product Description

Undershoot disturbances on high speed data lines cause multiple triggering and can result in improper system operation. Resistors used for terminating these data lines increase power consumption and can degrade output high levels resulting in reduced noise immunity.

Schottky diodes are recommended for termination. CAMD's PDN003 Integrated Clamp Diode Network minimizes the undershoots and provides effective termination on high speed data lines

SCHEMATIC CONFIGURATION



STANDARD PART ORDERING INFORMATION

Package		Ordering Part Number		Part Marking
Pins	Style	Tubes	Tape & Reel	
16	Narrow SOIC	PDN003/T	PDN003/R	PDN003

STANDARD SPECIFICATIONS

Diode Forward Voltage @ $I_F = 16\text{mA}$ @ $I_F = 50\text{mA}$	0.8V (typ.), 0.9V (max.)
	1.5V
Supply Voltage, $V_P - V_N$	-0.3V to 7V
Operating Temperature Range	0°C to 70°C
Channel Clamp Current (duration $\leq 100\mu\text{s}$, duty cycle $\leq 20\%$)	-50mA
Channel Leakage, 0 $V_{IN} \leq V_{DD}$	0.1 μA (typ), 10 μA (max.)
Input Capacitance @ $V_{IN} = 0\text{V}$, $f = 1\text{MHz}$ @ $V_{IN} = 2\text{V}$	10pF (typical)
	7pF (typical)
Power Dissipation, $I_F \leq 10\text{mA/Channel}$, $T_A = 25^\circ\text{C}$	300mW
Storage Temperature	-65°C to 150°C
Package Power Rating	1.00W, max.