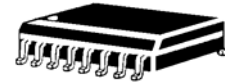




8700 E. Thomas Road  
 Scottsdale, AZ 85251  
 Tel: (480) 941-6300  
 Fax (480) 947-1503

**S16-4148, e3**  
 and  
**S16-4150, e3**  
 Switching Diode Array



**FEATURES**

- 8 Diode Array
- SOIC 16 pin Surface Mount Package
- UL 94V-0 Flammability Classification
- RoHS compliant by adding "e3" suffix (S16-4148e3 or S16-4150e3)

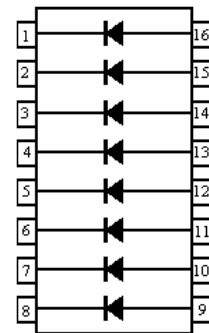
**MECHANICAL and PACKAGING**

- Molded SOIC 16 Pin
- Terminals: Tin-Lead or RoHS compliant annealed matte Tin
- Weight: 0.128 grams (approximate)
- Marking: Logo, device part number, date code
- Pin #1 defined by DOT on top of package
- Tape & Reel option: Standard per EIA-481-B  
 13 inch reel 2,500 pieces (add "TR" suffix to part number)
- Carrier tube 48 pcs per (STANDARD)

**MAXIMUM RATINGS**

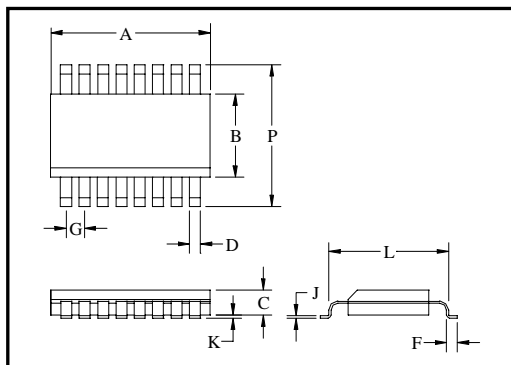
- Operating Temperatures: -55°C to +150°C
- Storage Temperature: -55°C to +150°C
- Forward Surge Current: 2.0 Amps (8.3 ms)
- Working Peak Reverse Voltage  $V_{RWM}$ : 75 V for S16-4148 and 50 V for S16-4150
- Continuous forward current  $I_F$ : 400 mA (each diode)
- Power dissipation ( $P_D$ ): 1500 mW (total package)

**CIRCUIT DIAGRAM**



**ELECTRICAL CHARACTERISTICS @ 25°C Unless otherwise specified**

Part Number	$V_{BR} @ I_{BR}$ =100µA		$I_R$ +25°C		$I_R$ 150°C		CAP @ 0V pF		$t_{rr}$	
	V MIN	V MAX	µA MAX	V@Vr	µA MAX	@Vr	MAX pF	MAX pF	MAX (ns)	MAX (ns)
S16-4148	90		.025 .500	20 75	50 100	20 50	4.0		5.0	
S16-4150	75		.1	50	100	50	2.5		4.0	
Part Number	$V_F$ @ $I_F = 1.0$ mA		$V_F$ @ $I_F = 10$ mA		$V_F$ @ $I_F = 50$ mA		$V_F$ @ $I_F = 100$ mA		$V_F$ @ $I_F = 200$ mA	
	V MIN	V MAX	V MIN	V MAX	V MIN	V MAX	V MIN	V MAX	V MIN	V MAX
S16-4148	-----	-----	-----	100	-----	-----	-----	1.20	-----	-----
S16-4150	0.54	0.62	0.66	0.74	0.76	0.86	0.82	0.92	0.87	1.00



DIM	INCHES		MILLIMETERS	
	MIN	MAX	MIN	MAX
A	0.385	0.398	9.09	10.10
B	0.150	0.158	3.81	4.01
C	0.053	0.069	1.35	1.75
D	0.011	0.021	0.28	0.53
F	0.016	0.050	0.41	1.27
G	0.050 BSC		1.27 BSC	
J	0.006	0.010	0.15	0.25
K	0.004	0.010	0.10	0.20
L	0.189	0.206	4.80	5.23
P	0.228	0.244	5.79	6.19