



Solid State Devices, Inc.

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Designer's Data Sheet

Part Number/Ordering Information ^{1/}

SDAD10 1

Screening ^{2/}

— = Not Screened

TX = TX Level

TXV = TXV Level

S = S Level

Reverse Recovery Time

F = Fast Recovery Time

Voltage 2.5 = 2.5kV, 5 = 5kV,
 7.5 = 7.5kV, 10 = 10kV, and
 15 = 15kV

Power Rating (See Below)

Package Size = 1 Inch Diameter

SDAD101 F Series

2,500 to 15,000 VOLTS

FAST RECOVERY

STACKABLE HIGH VOLTAGE RECTIFIER

FEATURES:

- Stackable to 600 kV+
- PIV 2.5 kV to 15 kV
- Fast Reverse Recovery Time
- Only Hermetically Sealed Rectifiers Used
- Controlled Avalanche Rated
- Modular Design for Easy Stacking
- Storage and Operating Temps -65 °C to +150 °C
- Available in Standard, Ultra Fast and Hyper Fast Versions
- TX, TXV, and S-Level Screening Available ^{2/}
- Replacement Upgrade – Microsemi / Unitrode Types UFB2.5 Through UFS10

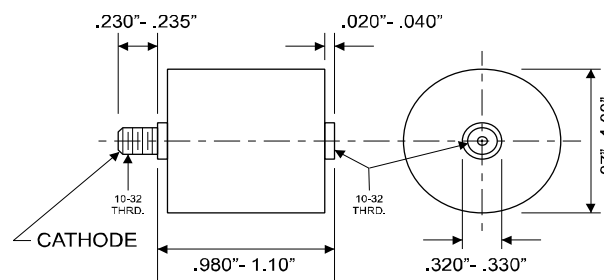
ELECTRICAL CHARACTERISTICS ^{3/}

Part Number	Peak Inverse Voltage	Reverse Recovery Time ^{5/}	Average DC Output Current ^{4/}		Surge Non-repetitive	Maximum Forward Voltage Drop		Maximum Leakage Current @PIV	Replacement Part Number
	PIV (KV)	Max (ns)	If(avg)		Ifsm	Vf (V)	If (A)	Ir (uA)	
	25 °C	25 °C	75 °C	50 °C	100 °C	25 °C		25 °C	
SDAD101 B 2.5 F	2.5	500	0.90	2.00	70	6.0	0.90	10	UFB-2.5
SDAD101 B 5.0 F	5.0	500	0.58	1.30	70	12.0	0.60	10	UFB-5
SDAD101 S 5.0 F	5.0	500	0.50	0.90	20	12.0	0.50	5	UFS-5
SDAD101 B 7.5 F	7.5	500	0.45	1.00	70	18.0	0.40	10	UFB-7.5
SDAD101 S 7.5 F	7.5	500	0.38	0.75	20	18.0	0.40	5	UFS-7.5
SDAD101 S 10 F	10	500	0.30	0.58	20	23.0	0.30	5	UFS-10
High Current Versions									
SDAD101 H 2.5 F	2.5	500	1.80	4.00	150	3.6	1.8	10	---
SDAD101 H 5.0 F	5.0	500	1.06	2.60	150	6.1	1.1	10	---
SDAD101 H 7.5 F	7.5	500	0.90	2.00	150	9.0	0.9	10	---
SDAD101 H 10 F	10	500	0.76	1.50	150	11.8	0.8	10	---
SDAD101 H 15 F	15	500	0.60	1.06	30	17.2	0.5	10	---

SDAD101 Package:

NOTES:

- 1/ For Ordering Information, Price, Curves, and Availability- Contact Factory.
- 2/ Screening based on MIL-PRF-19500. Screening flows available on request.
- 3/ Unless Otherwise Specified, All Electrical Characteristics @25°C.
- 4/ Tc = 50 °C typical operation in oil.
Tc = 75 °C is typical ambient Ta = 25 °C unheatsunk.
- 5/ Recovery Conditions: I_F = 0.5 Amp, I_R = 1.0 Amp rec. to .25 Amp.



NOTE: All specifications are subject to change without notification.
 SCD's for these devices should be reviewed by SSDI prior to release.

DATA SHEET #: RA0041B

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