



Solid State Devices, Inc.

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SSR1640A

Designer's Data Sheet

Part Number / Ordering Information ^{1/}

SSR16 A

L Screening ^{2/} = None

TX = TX Level

TXV = TXV Level

S = S Level

L Voltage

40 = 40 Volts

15 AMP SCHOTTKY RECTIFIER 40 VOLTS

FEATURES:

- Extremely low forward voltage drop: 450 mV max at 5 A
- PIV of 40 V
- High reliability construction
- Surge capability of 300 A
- TJ and TSTG: 175°C
- TX, TXV, and S level screening available ^{2/}

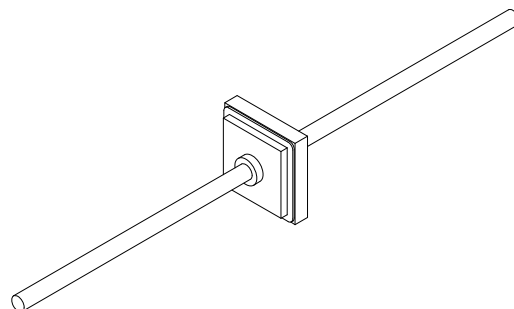
MAXIMUM RATINGS	SYMBOL	VALUE	UNITS
Peak Repetitive Reverse Voltage and DC Blocking Voltage	$V_{RM(rep)}$ V_R	40	V
RMS Reverse Voltage	V_R	28	V
Half Wave Rectified Forward Current Averaged over Full Cycle (Resistive load, 60 Hz, sine wave, $T_C = 25^\circ\text{C}$)	I_O	15	A
Peak Surge Current (8.3 ms pulse, half sine wave superimposed on I_O , allow junction to reach equilibrium between pulses, $T_C = 55^\circ\text{C}$)	$I_{FSM(surge)}$	300	A
Operating Junction Temperature	$T_J (PK)$	-55 to +175	°C
Maximum Thermal Resistance Junction to Case	$R_{\theta JC}$	3.0	°C/W

Notes:

1/ For ordering information, price, operating curves, and availability – Contact factory.

2/ Screening based on MIL-PRF-19500. Screening flows available on request.

SEDPACK 1 with leads



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

DATA SHEET #: SH0020B

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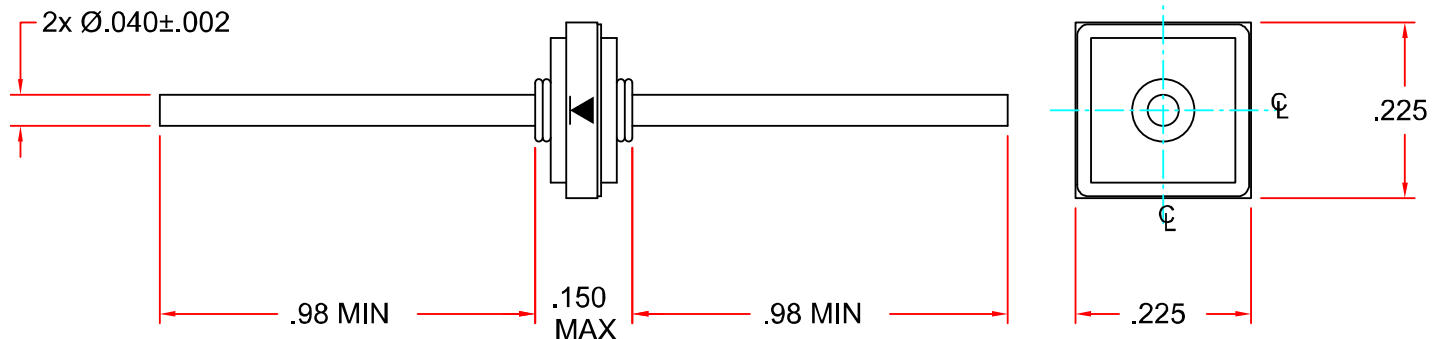
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ELECTRICAL CHARACTERISTICS	SYMBOL	VALUE	UNIT
Instantaneous Forward Voltage Drop ($T_A = 25^\circ\text{C}$, 300 μsec pulse)	$I_F = 5\text{ A}$ V_{F1}	0.45	V
	$I_F = 10\text{ A}$ V_{F2}	0.55	
	$I_F = 15\text{ A}$ V_{F3}	0.62	
Instantaneous Forward Voltage Drop ($I_F = 15\text{ A}$, $T_A = -55^\circ\text{C}$, 300 μsec pulse)	V_{F4}	0.64	V
Reverse Leakage Current (Rated V_R , $T_A = 25^\circ\text{C}$)	I_{R1}	5	mA
Reverse Leakage Current (Rated V_R , $T_A = 100^\circ\text{C}$)	I_{R2}	200	mA
Junction Capacitance ($V_R = 5\text{ V}$, $T_A = 25^\circ\text{C}$, $f = 1\text{ MHz}$)	C_J	800	pF

CASE OUTLINE:



Tolerances (Unless otherwise specified)

XX: $\pm.01$ "

XXX: $\pm.005$ "

For thermal derating and other characteristic curves, please contact SSDI Marketing Department.