SV1040

SCHOTTKY BARRIER RECTIFIER

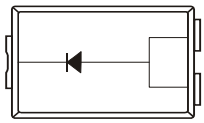
VOLTAGE	40 Volt	CURRENT	10 Ampere

FEATURES

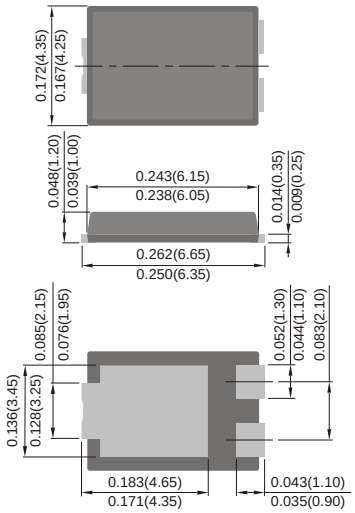
- Ideal for automated placement
- High efficiency Operation
- Low thermal resistance
- Lead free in compliance with EU RoHS 2011/65/EU directive
- Green molding compound as per IEC61249 Std. . (Halogen Free)

MECHANICAL DATA

- Case : TO-277, Plastic
- Terminals : Solderable per MIL-STD-750, Method 2026
- Weight: 0.0037 ounces, 0.1073 grams
- Marking:SV1040



TO-277 Unit : inch(mm)



ABSOLUTE MAXIMUM RATINGS (T_A=25°C unless otherwise noted)

PARAMETER	SYMBOL	VALUE	UNIT
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	40	V
Maximum RMS Voltage	V_{RMS}	28	V
Maximum DC Blocking Voltage	V_R	40	V
Average Rectified Output Current @T_L=125°C	$I_{F(AV)}$	10	A
Peak Forward Surge Current : 8.3ms Single Half Sine-Wave Superimposed On Rated Load	I_{FSM}	300	A
Typical Thermal Resistance, Junction to Ambient (Note 1) Junction to Lead	$R_{\Theta JA}$ $R_{\Theta JL}$	60 4	°C/W
Operating Junction Temperature and Storage Temperature range	T_J,T_{STG}	-55 to + 150	°C

Notes :

1. Mounted on 2cm^2 FR-4 PCB.
2. Mounted on 50cm^2 copper pad area.

Downloaded from Arrow.com.

SV1040

ELECTRICAL CHARACTERISTICS (T_A=25°C unless otherwise noted)

PARAMETER	SYMBOL	TEST CONDITIONS		MIN.	TYP.	MAX.	UNIT
Breakdown voltage	V_{BR}	I_R=1mA	T_A=25°C	40	-	-	V
Instantaneous forward voltage	V_F	I_F=5A I_F=10A	T_A=25°C	- -	0.44 0.47	- 0.51	V
		I_F=5A I_F=10A	T_A=125°C	- -	0.31 0.40	- -	V
Reverse current	I_R	V_R=32V	T_A=25°C	-	32	-	μA
		V_R=40V	T_A=25°C T_A=125°C	- -	- 32	0.7 -	mA

Downloaded from Arrow.com.

SV1040

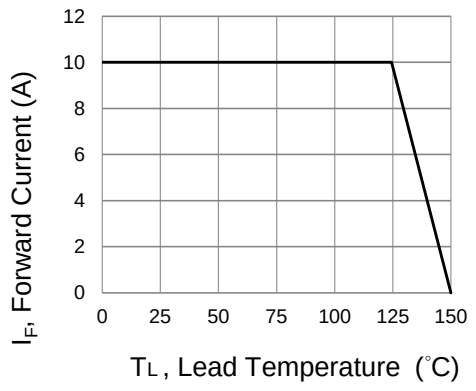


Fig.1 Forward Current Derating Curve

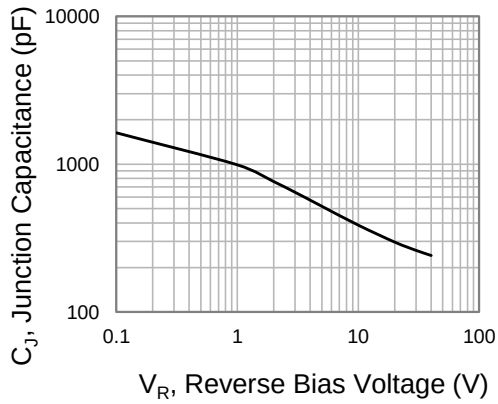


Fig.2 Typical Junction Capacitance

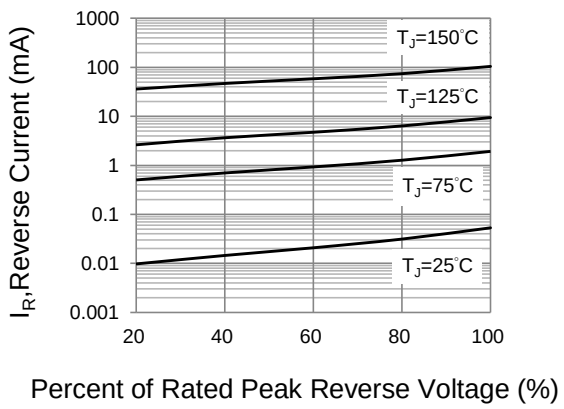


Fig.3 Typical Reverse Characteristics

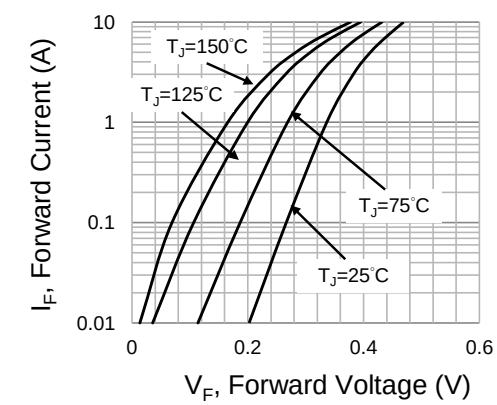


Fig.4 Typical Forward Characteristics

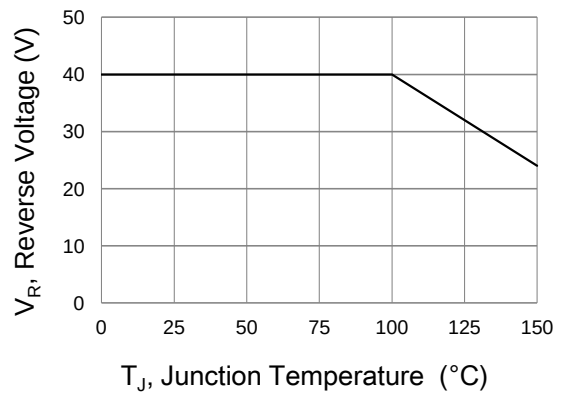


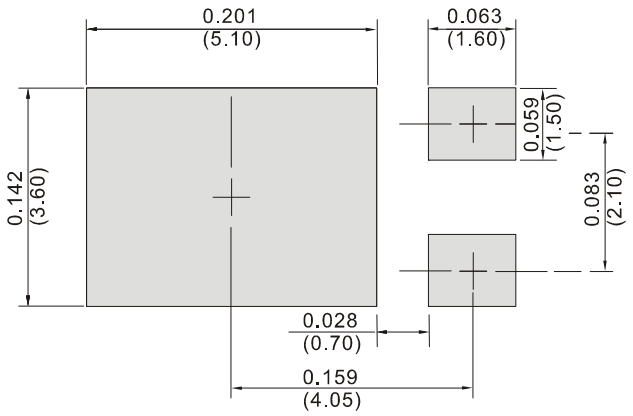
Fig.5 Operating Temperature Derating

Downloaded from Arrow.com.

SV1040

MOUNTING PAD LAYOUT

TO-277 Unit : inch(mm)



ORDER INFORMATION

- Packing information

  T/R - 5K per 13" plastic Reel

Downloaded from Arrow.com.

SV1040

Part No_packing code_Version

SV1040_R2_00001

For example :

RB500V-40_R2_00001

Part No.

Serial number

Version code means HF

Packing size code means 13"

Packing type means T/R

Packing Code XX				Version Code XXXXX		
Packing type	1st Code	Packing size code	2nd Code	HF or RoHS	1st Code	2nd~5th Code
Tape and Ammunition Box (T/B)	A	N/A	0	HF	0	serial number
Tape and Reel (T/R)	R	7"	1	RoHS	1	serial number
Bulk Packing (B/P)	B	13"	2			
Tube Packing (T/P)	T	26mm	X			
Tape and Reel (Right Oriented) (TRR)	S	52mm	Y			
Tape and Reel (Left Oriented) (TRL)	L	PANASERT T/B CATHODE UP (PBCU)	U			
FORMING	F	PANASERT T/B CATHODE DOWN (PBCD)	D			

Downloaded from Arrow.com.

Disclaimer

- Reproducing and modifying information of the document is prohibited without permission from Panjit International Inc..
- Panjit International Inc. reserves the rights to make changes of the content herein the document anytime without notification. Please refer to our website for the latest document.
- Panjit International Inc. disclaims any and all liability arising out of the application or use of any product including damages incidentally and consequentially occurred.
- Panjit International Inc. does not assume any and all implied warranties, including warranties of fitness for particular purpose, non-infringement and merchantability.
- Applications shown on the herein document are examples of standard use and operation. Customers are responsible in comprehending the suitable use in particular applications. Panjit International Inc. makes no representation or warranty that such applications will be suitable for the specified use without further testing or modification.
- The products shown herein are not designed and authorized for equipments requiring high level of reliability or relating to human life and for any applications concerning life-saving or life-sustaining, such as medical instruments, transportation equipment, aerospace machinery et cetera. Customers using or selling these products for use in such applications do so at their own risk and agree to fully indemnify Panjit International Inc. for any damages resulting from such improper use or sale.
- Since Panjit uses lot number as the tracking base, please provide the lot number for tracking when complaining.

Downloaded from Arrow.com.