

Trench MOS Barrier Schottky Rectifier

DO-201AD
TSA12L100



Cathode   Anode

Features

- Advanced trench technology
- Low forward voltage drop
- Low power losses
- High efficiency operation
- Lead Free Finish, RoHS Compliant

Applications

- DC/DC Converters
- AC/DC Adaptors
- Switching Power Supplies
- Freewheeling Diodes

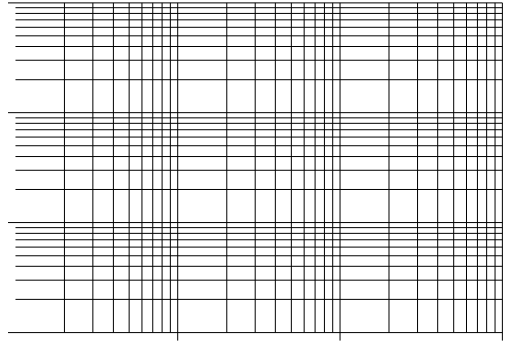
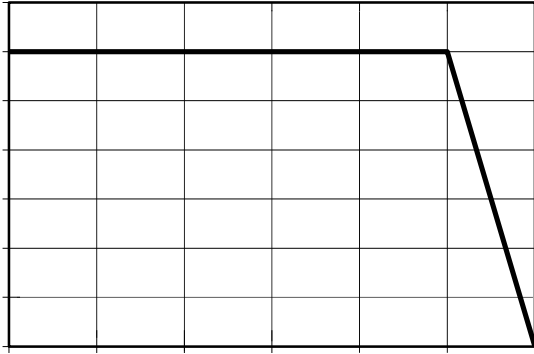
Maximum ratings and electrical characteristics (T_J = 25°C unless otherwise noted)

Parameter		Symbol	Limit		Unit
Maximum repetitive peak reverse voltage		VRRM	100		V
Maximum average forward rectified current		IF(AV)	12		A
Peak forward surge current 8.3 ms single half sine- wave superimposed on rated load per diode		IFSM	200		A
Operating junction and storage temperature range		TJ, TSTG	-5 to +150		°C
Typical thermal resistance per leg		R _{JC}	22		°C/W
Instantaneous forward voltage per diode			TYP.	MAX.	V
	IF=2A	TJ=25°C	0.41	0.44	
	IF=2A	TJ=125°C	0.36	-	
	IF=12A	TJ=25°C	0.62	0.67	
	IF=12A	TJ=125°C	0.57	-	
Instantaneous reverse current per diode at rated reverse voltage		TJ=25°C	20	80	uA
		TJ=125°C	-	20	mA

Notes:

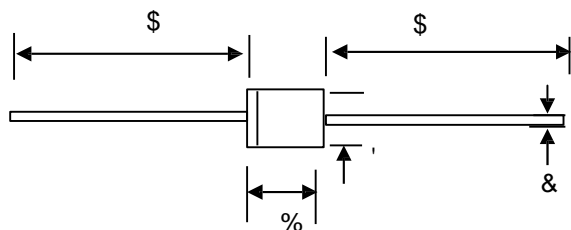
- (1) Pulse test: 300 μs pulse width, 1 % duty cycle
 (2) Pulse test: Pulse width 40 ms

RATINGS AND CHARACTERISTICS CURVES (TA = 25 °C unless otherwise noted)



PACKAGE OUTLINE DIMENSIONS

DO-201AD

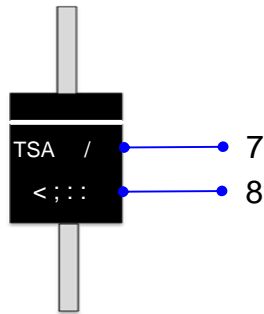


'2 \$' PHFKD QLFWD

8 1,7		\$	%	C	'
PP	PD[1.4	
	PLQ			1.1	
PLO	PD[5.1	
	PLQ				

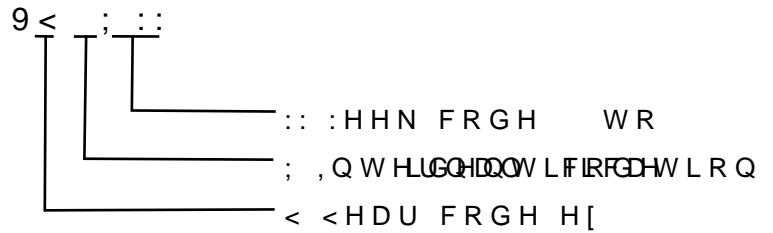
0DUNLQJ ,QIRUPDWLRQ

&DWKRGH



73URGXFW PRGH

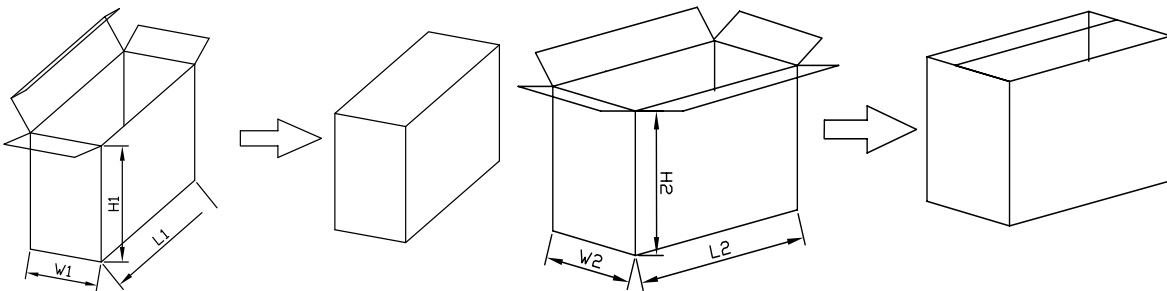
83' & LQIRUPDWLRQ



3DFNDJLQJ ,QIRUPDWLRQ

,QVLGH %R[

2XWVLGH %R[



3DFNDJLQJ ,QIRUPDWLRQ

12	81,7	,QVLGH %R[2XWVLGH %R[
		/	:	+	/	:	+
6L]H	PP			4			
47<	3&6	6PDO SDVWDJH3&6 FDUWRQ			3&6 FDUWRQ HWRWDO		
1RW	7ROHUDQFH	PP" PP		PP" PP	PP" PP		