

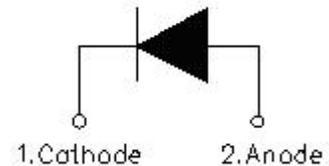
MURF860 ULTRAFAST RECTIFIER

Applications:

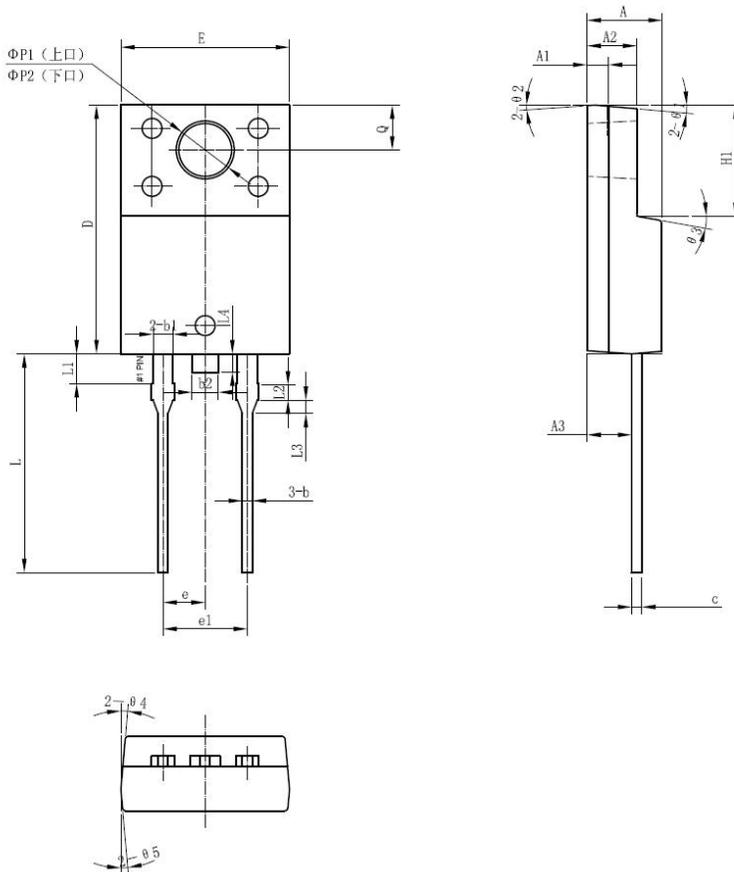
- Switching Power Supply
- Power Switching Circuits
- General Purpose

Features:

- Ultra-Fast Switching
- High Current Capability
- Low Reverse Leakage Current
- High Surge Current Capability
- Plastic Material has UL Flammability Classification 94V-0
- This is a Pb – Free Device
- All SMC parts are traceable to the wafer lot
- Additional testing can be offered upon request



Mechanical Dimensions: In mm

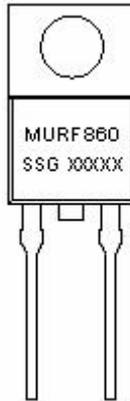


SYMBOL	MIN.	TYP.	MAX.
A	4.30	4.50	4.70
A1	1.10	1.30	1.50
A2	2.80	3.00	3.20
A3	2.50	2.70	2.90
b	0.50	0.60	0.75
b1	1.10	1.20	1.35
b2	1.50	1.60	1.75
c	0.55	0.60	0.75
D	14.80	15.00	15.20
E	9.96	10.16	10.36
e	-	2.55	-
e1	-	5.10	-
H1	6.50	6.70	6.90
L	12.70	13.20	13.70
L1	1.60	1.80	2.00
L2	0.80	1.00	1.20
L3	0.60	0.80	1.00
L4	-	1.10	1.50
$\Phi P1$ (上 \square)	3.30	3.50	3.70
$\Phi P2$ (下 \square)	2.99	3.19	3.39
Q	2.50	2.70	2.90
$\theta 1$		5°	
$\theta 2$		4°	
$\theta 3$		10°	
$\theta 4$		5°	
$\theta 5$		5°	

ITO-220AC(HD)

- China - Germany - Korea - Singapore - United States •
- <http://www.smc-diodes.com> - sales@smc-diodes.com •

Marking Diagram:



Where XXXXX is YYWWL

MUR = Device Type
 F = Package type
 8 = Forward Current (8A)
 60 = Reverse Voltage (600V)
 SSG = SSG
 YY = Year
 WW = Week
 L = Lot Number

Cautions: Molding resin
 Epoxy resin UL:94V-0

Ordering Information:

Device	Package	Shipping
MURF860	ITO-220AC (Pb-Free)	50pcs / tube

For information on tape and reel specifications, including part orientation and tape sizes, please refer to our Tape and Reel Packaging Specification.

Maximum Ratings and Electrical Characteristics @ $T_A=25^\circ\text{C}$ unless otherwise specified

Single Phase, half wave, 60Hz, resistive or inductive load.
For capacitive load, derate current by 20%.

Characteristic	Symbol	MURF860	Unit
Peak Repetitive Reverse Voltage Working Peak Reverse Voltage DC Blocking Voltage	V_{RRM} V_{RWM} V_R	600	V
RMS Reverse Voltage	$V_{R(RMS)}$	420	V
Average Rectified Output Current @ $T_A = 55^\circ\text{C}$	I_o	8.0	A
Non-Repetitive Peak Forward Surge Current 8.3ms Single half sine-wave superimposed on rated load (JEDEC Method)	I_{FSM}	110	A
Forward Voltage (per element) @ $I_F = 8.0\text{A}$, $T_J=25^\circ\text{C}$	V_{FM1}	2.2	V
@ $I_F = 8.0\text{A}$, $T_J=100^\circ\text{C}$	V_{FM2}	2.0	V
Peak Reverse Current @ $T_A = 25^\circ\text{C}$ At Rated DC Blocking Voltage @ $T_A = 100^\circ\text{C}$	I_{RM}	5 50	μA
Maximum Reverse Recovery Time (Note 1)	T_{rr}	50	ns
Max. Voltage Rate of Change	dv/dt	10,000	V/ μs
Typical Thermal Resistance Junction to Ambient (Note 2)	$R_{\theta JA}$	25	K/W
Storage Temperature Range	T_{STG}, T_J	-55 to +150	$^\circ\text{C}$
Approximate Weight	wt	1.6	g
Case Style	ITO-220AC		

Note: 1. Reverse Recovery Test Conditions: $I_F=0.5\text{A}$, $I_R=1.0\text{A}$, $I_{RR}=0.25\text{A}$
2. Mount on Cu-Pad Size 16mm×16mm on P.C.B.

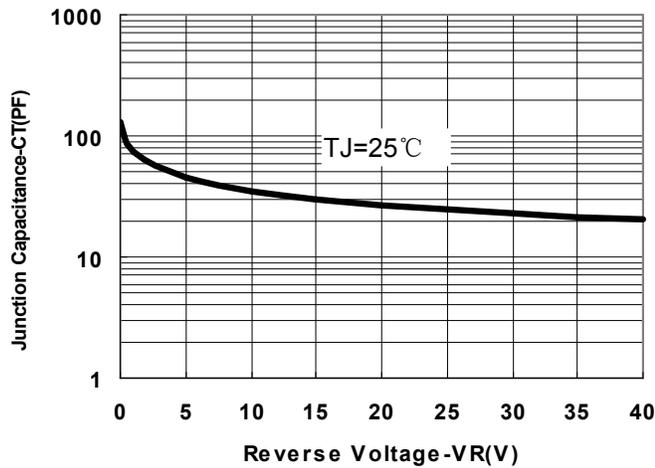


Fig.1-Typical Junction Capacitance

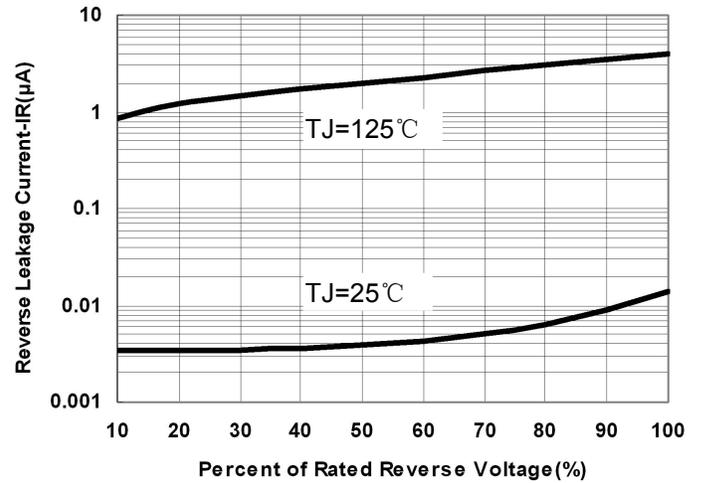


Fig.2-Typical Reverse Characteristics

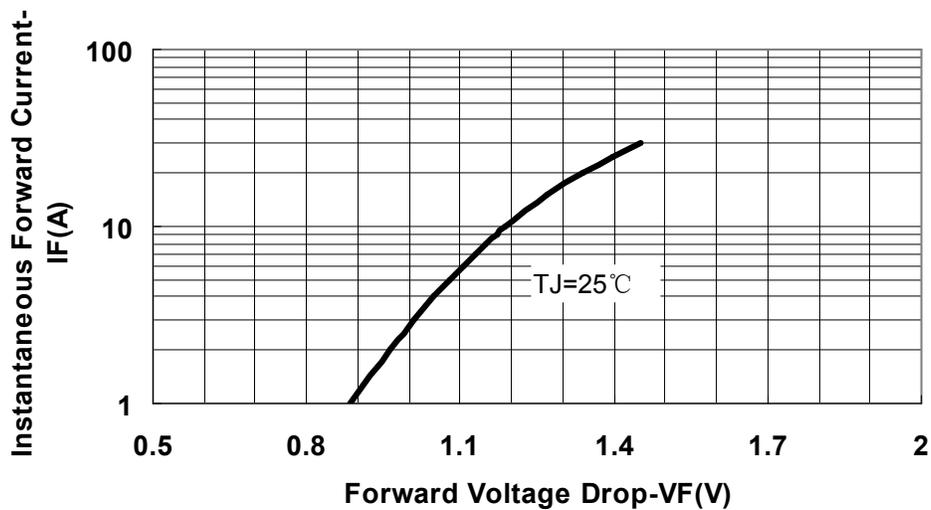


Fig.3-Typical Forward Voltage Drop Characteristics

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