

## 15A/60V Low VF Schottky Rectifier

### **FEATURES**

- High current capability, low forward voltage
- Excellent high temperature stability
- Low power loss, and high efficiency
- High forward surge capability
- RoHS compliant, and Halogen free

### **MACHANICAL DATA**

- Case: TO-277B small outline plastic package
- Terminal: Matte tin plated, solderable per MIL-STD-750, Method 2026
- Molding Compound Flammability Rating:UL94-0
- High temperature soldering guaranteed:260°C /10second
- Packed with FRP substrate and epoxy Underfilled

### **APPLICATIONS**

- Switching mode power supply applications
- Portable equipment battery applications
- High frequency rectification
- DC/DC converter
- Designed as bypass diodes for solar panels

### **ORDERING INFORMATION**

Device: K SD15S60SL
Package: TO-277B
Marking: H15T60
Material: Halogen free

Packing: Tape & 13" ReelQuantity per reel: 5,000pcs



PACKAGE OUTLINE



PIN CONFIGURATION



# KSD15S60SL

# ABSOLUTE MAXIMUM RATING (Tamb=25 C, unless otherwise specified)

Symbol	Parameter	Value	Units	
$V_{RRM}$	Repetitive Peak Reverse Voltage	60	٧	
I <sub>F(AV)</sub>	Average Forward Current	15	Α	
I <sub>FSM</sub>	Peak Forward Surge Current, 8.3ms single half sine-wave	320	А	
T <sub>J</sub> & T <sub>STG</sub>	Junction and Storage Temperature	-50~+150	°C	

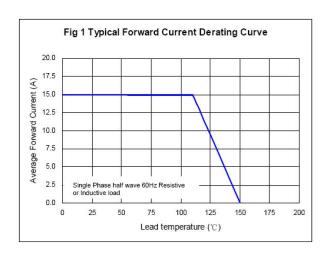
# ELECTRICAL CHARACTERISTICS (Tamb=25°C, unless otherwise specified)

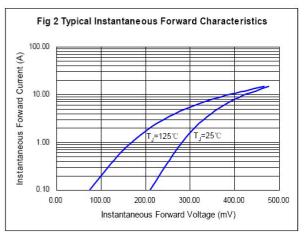
Symbol	Parameter	Test Condition	Min	Тур	Мах	Units
V <sub>F</sub>	Forward Voltage	I <sub>F</sub> = 3A @ 25°C		0.33	0.37	V
		I <sub>F</sub> = 10A @ 25°C		0.42	0.47	٧
		I <sub>F</sub> = 15A @ 25°C		0.47	0.52	٧
		I <sub>F</sub> = 3A @ 125°C		0.24		٧
		I <sub>F</sub> = 10A @ 125°C		0.38		٧
		I <sub>F</sub> = 15A @ 125°C		0.46		٧
<b>V</b> <sub>R</sub>	Reverse Breakdown Voltage	I <sub>R</sub> = 0.5mA	60			٧
I <sub>R</sub>	Reverse Leakage Current	V <sub>R</sub> = 60V @ 25°C			0.30	mA
		V <sub>R</sub> = 60V @ 125°C			60	mA
C <sub>J</sub>	Junction Capacitance	f=1MHz, V <sub>R</sub> =4V		850		pF
R <sub>th(JA)</sub>	Thermal Resistance Junction to Ambient (note 1)			94		°C/W
R <sub>th(JL)</sub>	Thermal Resistance Junction to Lead (note 1)			10		°C/W

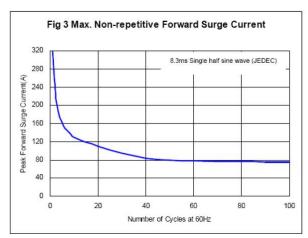
Note 1: Units mounted on recommended P.C.B. 1 oz. pad layout

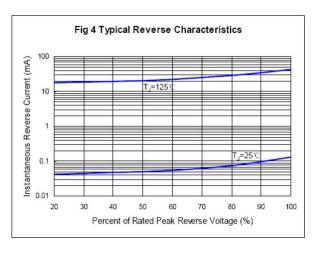
# KSD15S60SL

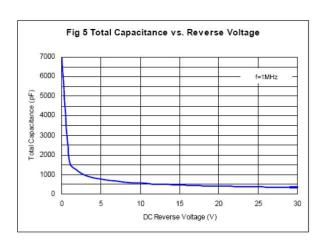
## **ELECTRICAL CHARACTERISTICS CURVE**









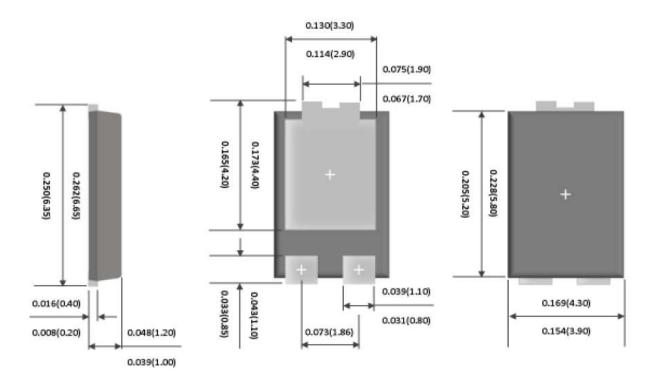




# KSD15S60SL

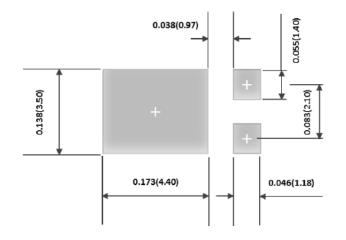
## **TO-277B PACKAGE OUTLINE DIMENSIONS**

unit: mm



## FOOT PRINT RECOMMENDATION

## **MARKING CODE**





H15T60	YMWH
Device code	Y=Year (4=2014,5=2015···)
	M=Month (A~L)
	W=Week (1~5)
	H=Halogen Free

REV.08 4 of 4