A Product Line of Diodes Incorporated | LITE-ON SEMICONDUCTOR

G3060CTFW

TRENCH SCHOTTKY RECTIFIER

REVERSE VOLTAGE – 60 Volts
FORWARD CURRENT – 30 Amperes

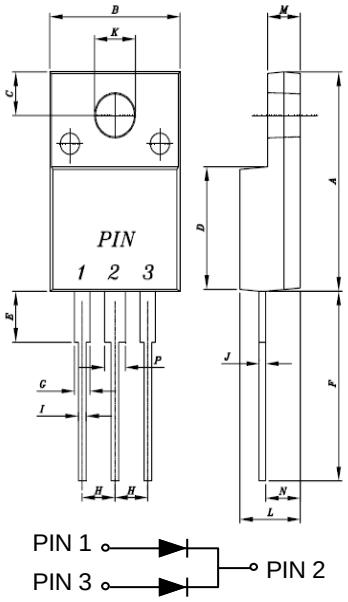
FEATURES

- Trench Schottky technology
- Low power loss, high efficiency
- Low forward drop voltage
- Qualified according to AEC-Q101 Rev_C
- For use in low voltage, high frequency inverters, free wheeling, and polarity protection application
- **Lead-Free Finish; RoHS Compliant (Notes 1 & 2)**
- **Halogen and Antimony Free. "Green" Device (Note 3)**

MECHANICAL DATA

- Package: ITO-220AB molded plastic
- Package Material: "Green" Molding compound, UL flammability classification 94V-0, "Halogen-free".
- Maximum mounting torque = 0.5N.m (5.1Kgf.cm)
- Polarity: As marked on body
- Marking Position: Any
- Weight: 0.05 ounces, 1.558 grams (Approximate)
- Marking Code: G3060CTFW

ITO-220AB(WB)



ITO-220AB(WB)		
DIM	MIN	MAX
A	14.95	15.95
B	10.00	10.40
C	2.76	3.36
D	8.50	8.80
E	3.30	3.90
F	13.0	13.70
G	1.15	1.70
H	2.40	2.70
I	0.50	0.80
J	0.45	0.70
K	3.00	3.30
L	4.46	4.87
M	2.48	2.80
N	2.50	2.80
P	1.50	1.90
All dimension in millimeter		

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25°C ambient temperature unless otherwise specified.

ABSOLUTE RATINGS

PARAMETER		SYMBOL	VALUE	UNIT
Maximum repetitive peak reverse voltage		V_{RRM}	60	V
Maximum DC blocking voltage		V_{DC}	60	V
Maximum average rectified forward current	@Tc = 130°C	I_{AV}	30	A
Peak forward surge 8.3ms single half sine-wave superimposed on rated load		I_{FSM}	250	A
Operating and storage temperature range		T_J, T_{STG}	-55 to +150	°C

STATIC ELECTRICAL CHARACTERISTICS

PARAMETER	TEST CONDITION		SYMBOL	TYP	MAX	UNIT
Forward voltage (Note 4)	I_F = 15A	T_J = 25°C T_J = 125°C	V_F	0.53 0.49	0.58 0.55	V
Reverse leakage current	V_R = 60V	T_J = 25°C T_J = 125°C	I_R	-- --	500 55	uA mA
Typical junction capacitance (Note 5)			C_J	950		pF

THERMAL CHARACTERISTICS

PARAMETER	SYMBOL	TYP	UNIT
Typical thermal resistance (Note 6)	$RthJ_C$	1	°C/W

Notes:

1. EU Directive 2002/95/EC (RoHS), 2011/65/EU (RoHS 2) & 2015/863/EU (RoHS 3) compliant. All applicable RoHS exemptions applied.
2. See https://www.diodes.com/quality/lead-free/ for more information about Diodes Incorporated's definitions of Halogen- and Antimony-free, "Green" and Lead-free.
3. Halogen- and Antimony-free "Green" products are defined as those which contain <900ppm bromine, <900ppm chlorine (<1500ppm total Br + Cl) and <1000ppm antimony compounds.
4. 300us pulse width, 2% duty cycle
5. Measured at 1.0MHz and applied reverse voltage of 4.0 VDC.
6. Thermal Resistance test performed in accordance with JESD-51.

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RATING AND CHARACTERISTIC CURVES
G3060CTFW

FIG.1- FORWARD CURRENT DERATING CURVE

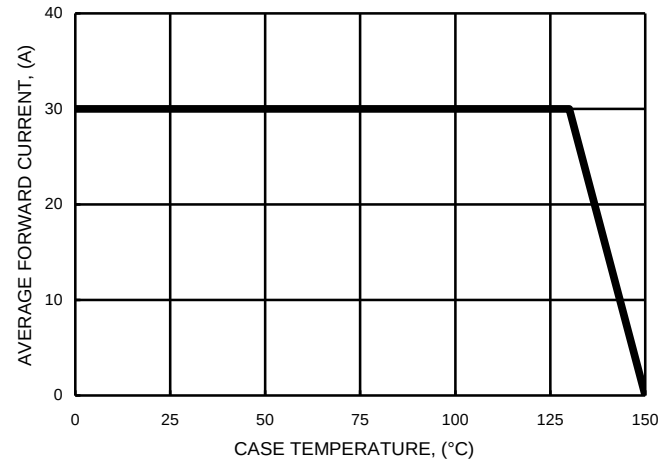


FIG.2- MAXIMUM NON-REPETITIVE SURGE CURRENT

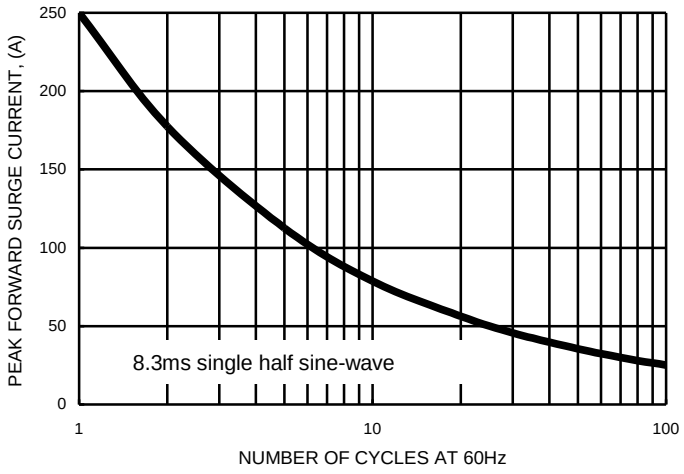


FIG.3- TYPICAL FORWARD CHARACTERISTICS

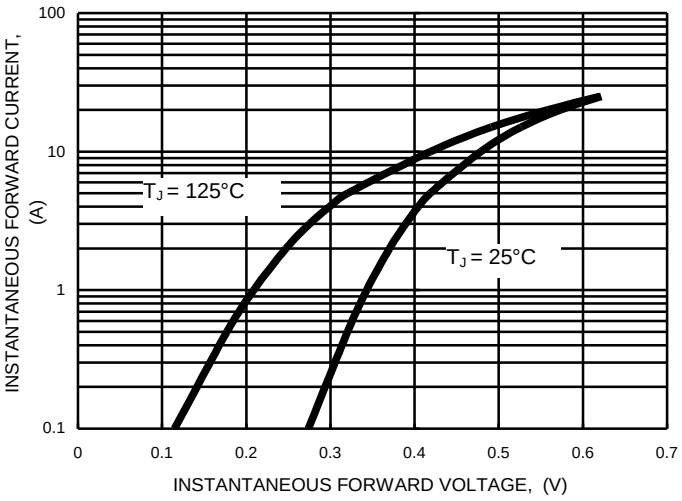


FIG.4- TYPICAL JUNCTION CAPACITANCE

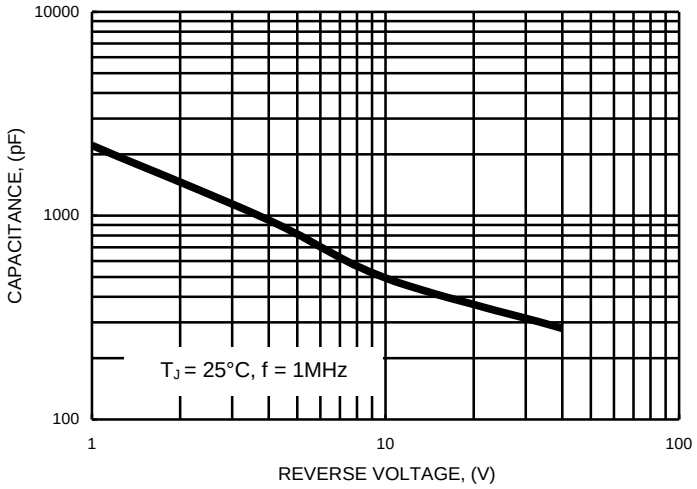
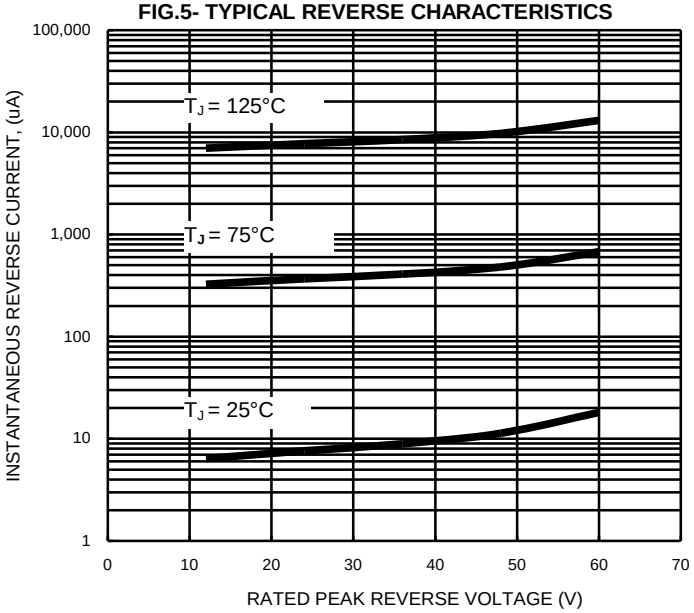


FIG.5- TYPICAL REVERSE CHARACTERISTICS



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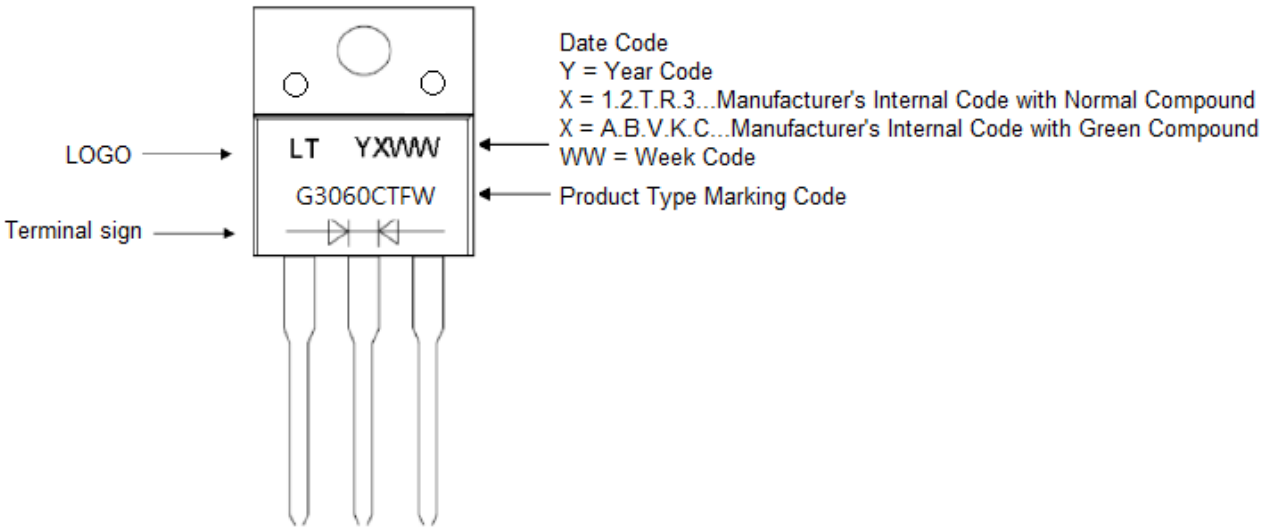
Ordering Information:

Part Number	Package	Packing	
		Qty.	Carrier
G3060CTFW	ITO-220AB(WB)	50 pcs	Tube

Marking Information:



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