

SCHOTTKY BARRIER RECTIFIERS

REVERSE VOLTAGE - **150** Volts
FORWARD CURRENT - **20** Amperes

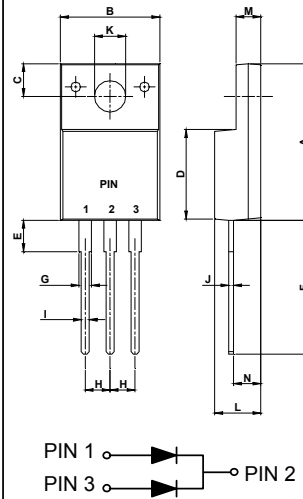
FEATURES

- Metal of silicon rectifier, majority carrier conduction
- Guard ring for transient protection
- Low power loss, high efficiency
- Low leakage current
- High current capability, low VF
- High surge capacity
- Plastic package has UL flammability classification 94V-0

MECHANICAL DATA

- Case : ITO-220AB molded plastic
- Polarity : As marked on the body
- Weight : 0.06 ounces, 1.70 grams
- Mounting position : Any
- Max. mounting torque = 0.5 N.m (5.1 Kgf.cm)

ITO-220AB



ITO-220AB		
DIM.	MIN.	MAX.
A	15.50	16.50
B	10.0	10.40
C	3.00	3.50
D	9.00	9.30
E	2.90	3.60
F	13.46	14.22
G	1.15	1.70
H	2.40	2.70
I	0.75	1.00
J	0.45	0.70
K	3.00 \varnothing	3.30 \varnothing
L	4.36	4.77
M	2.48	2.80
N	2.50	2.80
All Dimensions in millimeter		

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25°C ambient temperature unless otherwise specified.

CHARACTERISTICS	SYMBOL	MBRF20150CT	UNIT
Maximum Recurrent Peak Reverse Voltage	VRRM	150	V
Maximum RMS Voltage	VRMS	105	V
Maximum DC Blocking Voltage	VDC	150	V
Maximum Average Forward Rectified Current (See Fig.1) $T_c = 120^\circ C$	I(AV)	20	A
Peak Forward Surge Current 8.3ms single half sine-wave superimposed on rated load	IFSM	180	A
Voltage Rate of Change (Rated VR)	dv/dt	10000	V/us
Maximum Forward Voltage (Note 1)	VF	0.92 0.75 1.00 0.86	V
Maximum DC Reverse Current at Rated DC Blocking Voltage	IR	8 5	uA mA
Typical Thermal Resistance (Note 2)	R θ JC	2.5	°C/W
Typical Junction Capacitance per element (Note 3)	CJ	250	pF
Operating Junction and Storage Temperature Range	TJ, TSTG	-65 to +175	°C
Dielectric Strength from terminals to case, AC with t=1 minute, RH<30%	Vdis	2000	V

- NOTES : 1. 300us Pulse Width, 2% Duty Cycle.
2. Device mounted on 226 x114 x 8mm Alumium plate
3. Measured at 1.0MHz and applied reverse voltage of 4.0V DC.

REV. 2, Oct-2010, KTHC31

FIG.1 - FORWARD CURRENT DERATING CURVE

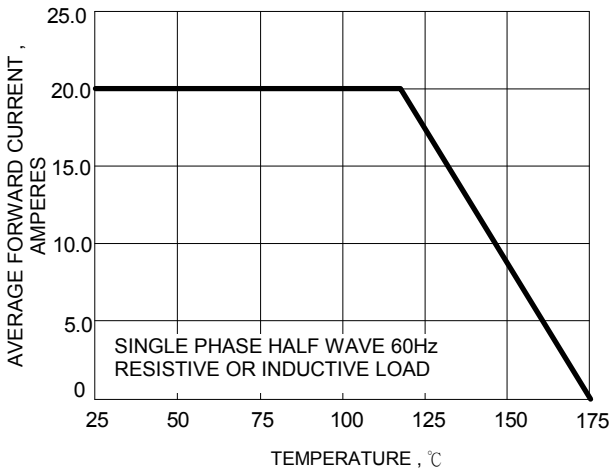


FIG.2 - MAXIMUM NONREPETITIVE SURGE CURRENT

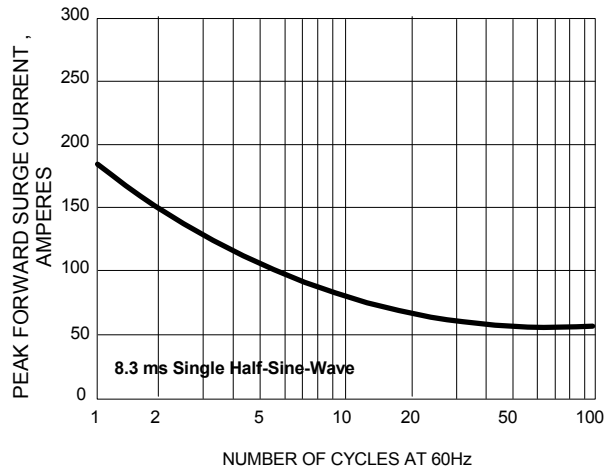


FIG.3 - TYPICAL REVERSE CHARACTERISTICS

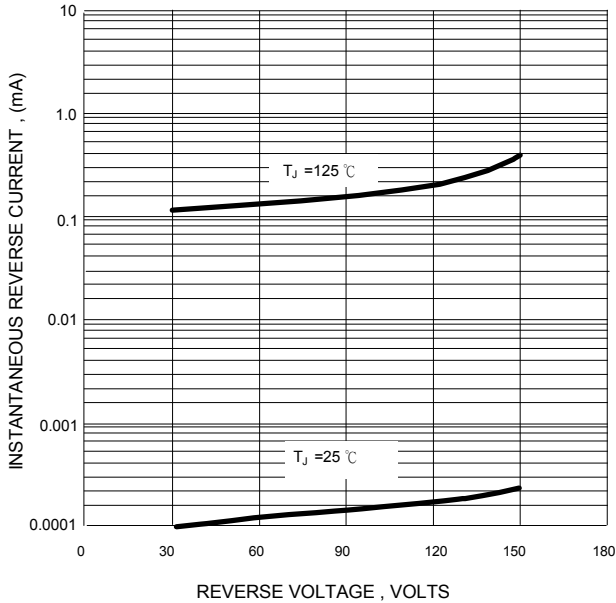


FIG.4 - TYPICAL FORWARD CHARACTERISTICS

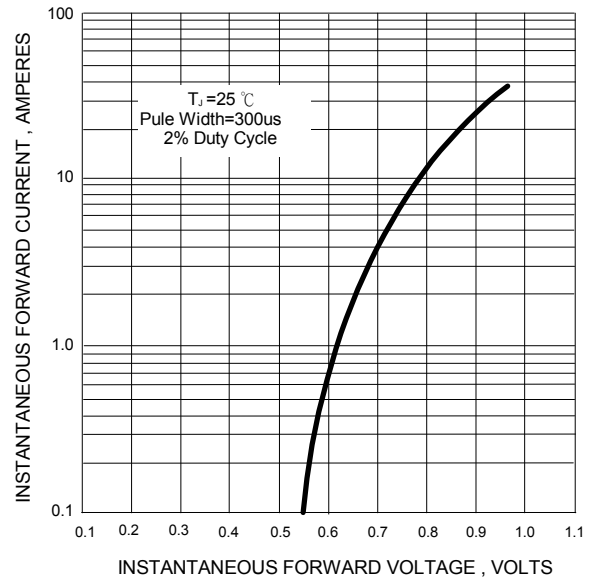
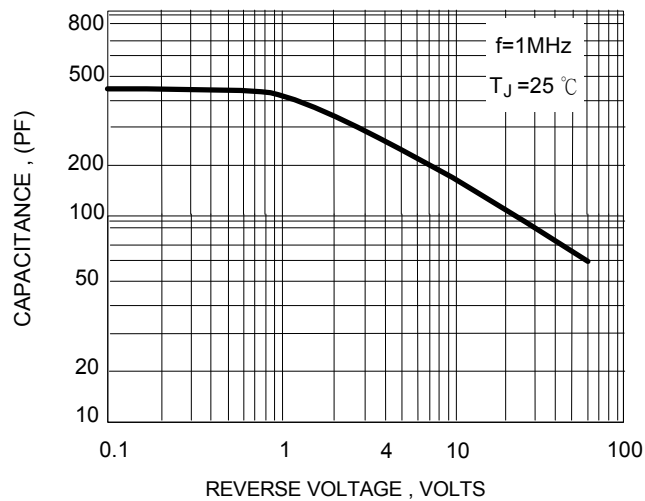


FIG.5 - TYPICAL JUNCTION CAPACITANCE



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