

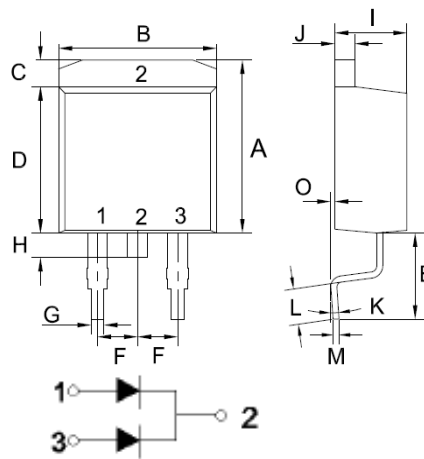
Features

- Schottky Barrier Chip
- Ideally Suited for Automatic Assembly
- Low Power Loss, High Efficiency
- For Use in Low Voltage Application
- Guard Ring Die Construction
- Plastic Case Material has UL Flammability Classification Rating 94V-O

Mechanical Data

- Case: TO-263/D² PAK, Molded Plastic
- Terminals: Plated Leads Solderable per MIL-STD-202, Method 208
- Polarity: See Diagram
- Mounting Position: Any
- **Lead Free: For RoHS / Lead Free Version**

TO-263/D² PAK



TO-263 (D ² PAK)		
Unit: mm		
DIM	MEN	MAX
A	10.44	10.84
B	9.81	10.21
C	1.44	1.84
D	8.80	9.20
E	4.46	4.66
F	2.44	2.64
G	0.61	1.01
H	0.70	1.30
I	4.27	4.87
J	1.07	1.47
K	0°	8°
L	2.10	2.50
M	0.30	0.46
O	0	0.25

Maximum Ratings and Electrical Characteristics @T_A=25°C unless otherwise specified

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

Characteristic	Symbol	MBR	MBR	MBR	MBR	MBR	MBR	MBR	MBR	Units	
		3040CG	3045CG	3050CG	3060CG	3080CG	30100CG	30150CG	30200CG		
Peak Repetitive Reverse Voltage	V _{RRM}	40	45	50	60	80	100	150	200	V	
Working Peak Reverse Voltage	V _{RWM}										
DC Blocking Voltage	V _R										
RMS Reverse Voltage	V _{R(RMS)}	28	31	35	42	56	70	105	140	V	
Average Rectified Output Current @T _L = 75°C (Note 1)	I _O	30.0								A	
Non-Repetitive Peak Forward Surge Current 8.3ms Single half sine-wave superimposed on rated load (JEDEC Method)	I _{FSM}	200								A	
Forward Voltage @I _F = 15A	V _{FM}	0.70		0.80		0.85		0.92		V	
Peak Reverse Current @T _A = 25°C At Rated DC Blocking Voltage @T _A = 100°C	I _{RM}	0.1								20	mA
Typical Junction Capacitance (Note 2)	C _j	350		280		200				pF	
Typical Thermal Resistance (Note 1)	R _{θJA}	1.4								°C/W	
Operating and Storage Temperature Range	T _j , T _{STG}	-55 to +150							-55 to +175	°C	

Note: 1. Valid provided that leads are kept at ambient temperature at a distance of 9.5mm from the case.
2. Measured at 1.0 MHz and applied reverse voltage of 4.0V D.C.

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

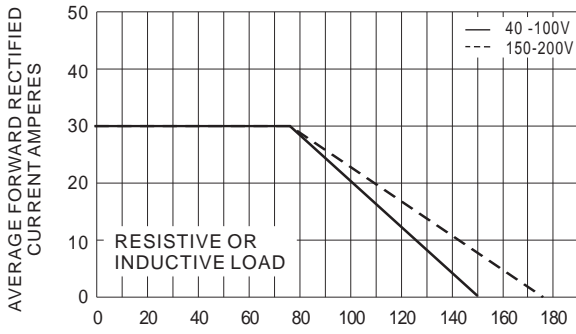


FIG.3-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

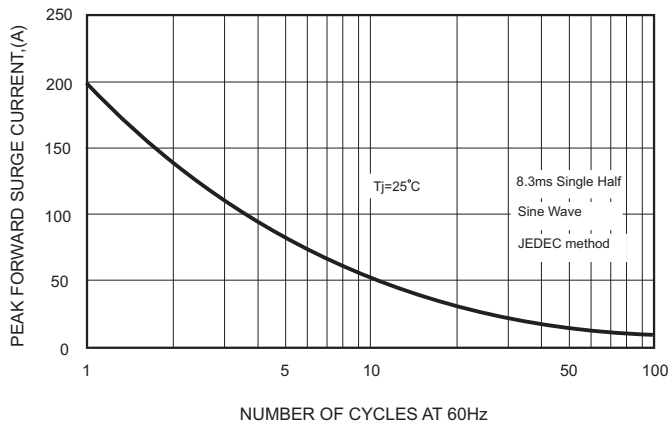


FIG.2-TYPICAL FORWARD CHARACTERISTICS

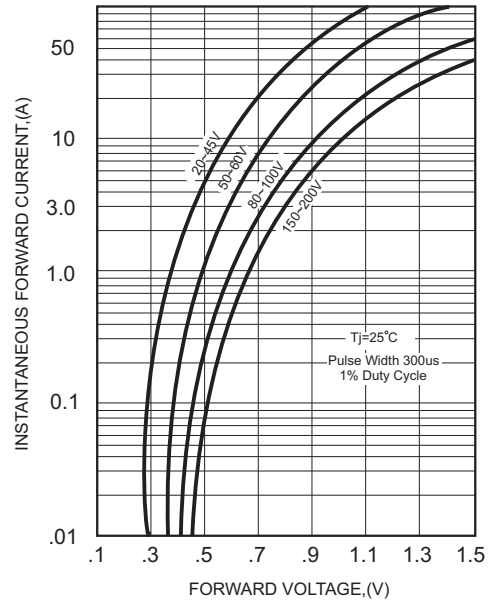


FIG.4 - TYPICAL REVERSE CHARACTERISTICS

