



Features

- Lead Free Finish/RoHS Compliant (Note1) ("P"Suffix Designates Compliant. See Ordering Information)
- Halogen Free Available Upon Request By Adding Suffix "-HF"
- Have Over Voltage Protect Loop and High Reliability
- Low Voltage Continued Circuit and Protection Circuit
- Epoxy Meets UL 94 V-0 Flammability Rating
- Moisture Sensitivity Level 1

Maximum Ratings

- Operating Junction Temperature Range: -55°C to +150°C
- Storage Temperature Range: -55°C to +150°C
- Typical Thermal Resistance (Per Leg): 3°C/W Junction to Case

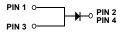
MCC Part Number	Device Marking	Maximum Recurrent Peak Reverse Voltage	Maximum RMS Voltage	Maximum DC Blocking Voltage
MBRD845C	845C	45V	32V	45V

Electrical Characteristics @ 25°C Unless Otherwise Specified

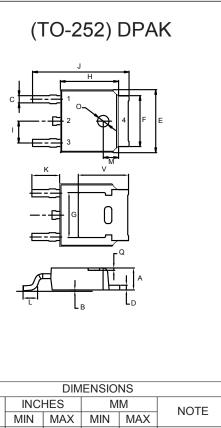
Average Rectified Forward Current (Rated VR-20Khz Square Wave) - 50% Duty Cycle	I _{F(AV)}	8.0A	T _c =115°C
Peak Forward Surge Current	I _{FSM}	150A	8.3ms,Half Sine
Maximum Instantaneous Forward Voltage	V _F	0.51V	I _F =8.0A; T _J =25⁰C
Maximum DC Reverse Current at Rated DC Blocking Voltage	I _R	0.1mA	T _J =25⁰C

Note: 1. High Temperature Solder Exemption Applied, See EU Directive Annex 7a.

Internal Structure:







DIM	INCHES		MM		NOTE
	MIN	MAX	MIN	MAX	NOTE
Α	0.087	0.094	2.20	2.40	
В	0.000	0.005	0.00	0.13	
С	0.026	0.034	0.66	0.86	
D	0.018	0.023	0.46	0.58	
Е	0.256	0.264	6.50	6.70	
F	0.201	0.215	5.10	5.46	
G	0.1	90	4.8	83	
Н	0.236	0.244	6.00	6.20	
I	0.086	0.094	2.18	2.39	
J	0.386	0.409	9.80	10.40	
Κ	0.1	14	2.9	90	
L	0.055	0.067	1.40	1.70	
Μ	0.063		1.60		
0	0.043	0.051	1.10	1.30	
Q	0.000	0.012	0.00	0.30	
V	0.211		5.35		



Curve Characteristics

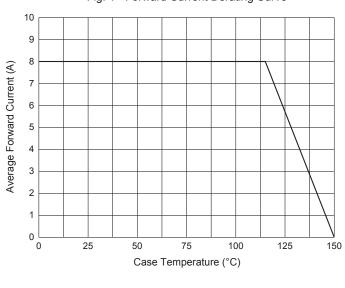
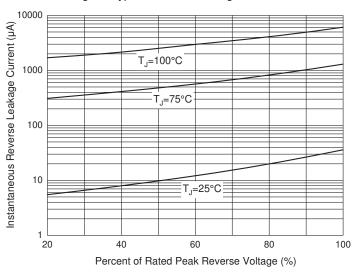


Fig. 1 - Forward Current Derating Curve





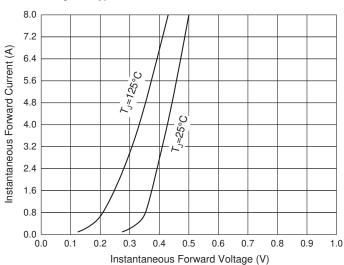


Fig. 2 - Typical Instantaneous Forward Characteristics



Ordering Information

Device	Packing	
Part Number-TP	Tape&Reel: 2.5Kpcs/Reel	

Note : Adding "-HF" Suffix For Halogen Free, eg. Part Number-TP-HF

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