



# BD840S~BD8200S

## DPAK SURFACE MOUNT SCHOTTKY BARRIER RECTIFIERS

**VOLTAGE** 40 to 200 Volts    **CURRENT** 8 Ampere

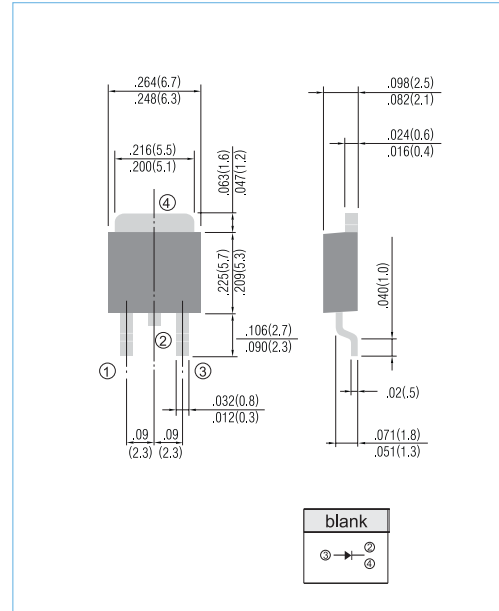
TO-252    Unit: inch ( mm )

### FEATURES

- Plastic package has Underwriters Laboratory Flammability Classification 94V-O
- For surface mounted applications
- Low profile package
- Built-in strain relief
- Low power loss, High efficiency
- High surge capacity
- In compliance with EU RoHS 2002/95/EC directives

### MECHANICAL DATA

- Case: TO-252 molded plastic
- Terminals: Solder plated, solderable per MIL-STD-750, Method 2026
- Polarity: As marking
- Standard packaging: 16mm tape (EIA-481)
- Weight: 0.0104 ounces, 0.297grams.



## MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25°C ambient temperature unless otherwise specified. Resistive or inductive load.

PARAMETER	SYMBOL	BD840S	BD845S	BD850S	BD860S	BD880S	BD890S	BD8100S	BD8150S	BD8200S	UNITS		
Maximum Recurrent Peak Reverse Voltage	$V_{RRM}$	40	45	50	60	80	90	100	150	200	V		
Maximum RMS Voltage	$V_{RMS}$	28	31.5	35	42	56	63	70	105	140	V		
Maximum DC Blocking Voltage	$V_{DC}$	40	45	50	60	80	90	100	150	200	V		
Maximum Average Forward Current (See Figure 1)	$I_{F(AV)}$	8									A		
Peak Forward Surge Current :8.3ms single half sine-wave superimposed on rated load(JEDEC method)	$I_{FSM}$	85									A		
Maximum Forward Voltage at 8.0A	$V_F$	0.70		0.75		0.80			0.90		V		
Maximum DC Reverse Current $T_J=25^{\circ}C$ at Rated DC Blocking Voltage $T_J=100^{\circ}C$	$I_R$						0.05				20	mA	
Typical Thermal Resistance	$R_{\theta JC}$						5					$^{\circ}C / W$	
Operating Junction and Storage Temperature Range	$T_J, T_{STG}$	-55 to +150										-65 to +175	$^{\circ}C$

PRELIMINARY



# BD840S~BD8200S

## RATING AND CHARACTERISTIC CURVES

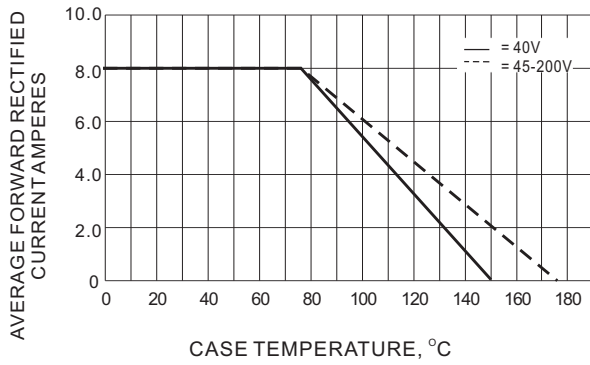


Fig.1- FORWARD CURRENT DERATING CURVE

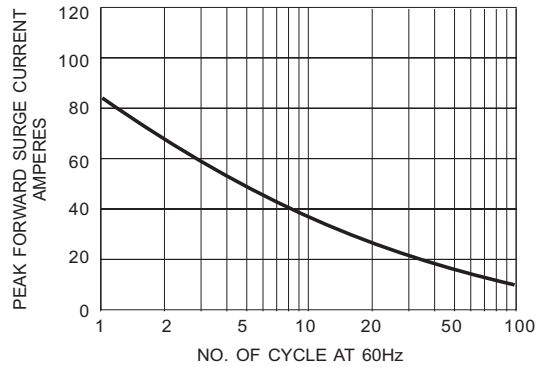


Fig.2- MAXIMUM NON - REPETITIVE SURGE CURRENT

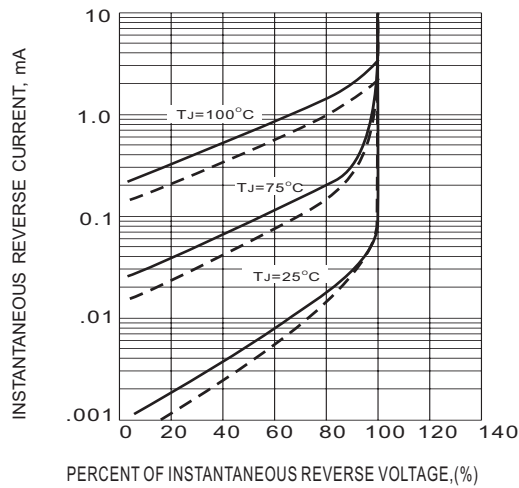


Fig.3- TYPICAL REVERSE CHARACTERISTICS

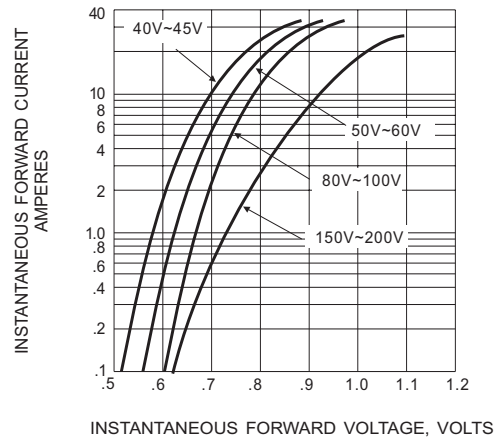
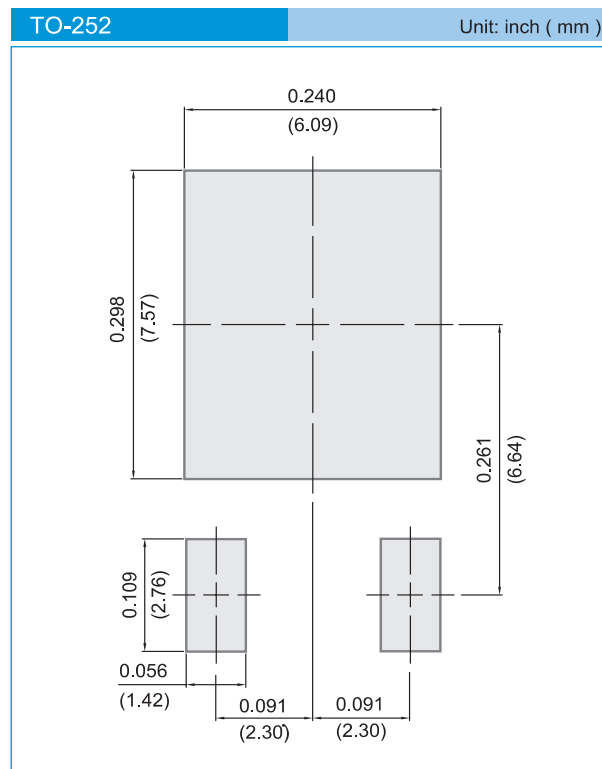


Fig.4- TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

PRELIMINARY



## MOUNTING PAD LAYOUT



## ORDER INFORMATION

- Packing information  
T/R - 3K per 13" plastic Reel

## LEGAL STATEMENT

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