

HER301G THRU HER308G

**ULTRAFAST EFFICIENT
GLASS PASSIVATED RECTIFIER**
VOLTAGE: 500 TO 1000V CURRENT: 3.0A

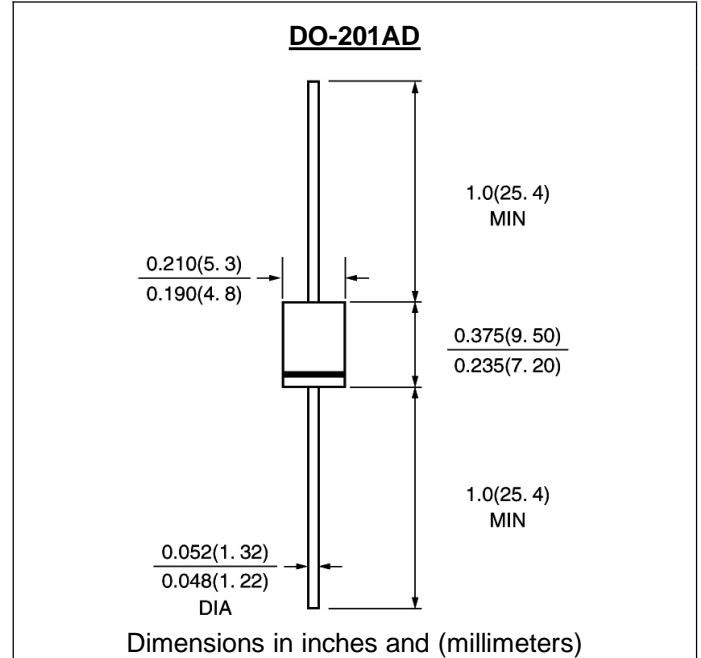


FEATURE

Low power loss
High surge capability
Ultra-fast recovery time for high efficiency
High temperature soldering guaranteed
250°C/10sec/0.375" lead length at 5 lbs tension

MECHANICAL DATA

Terminal: Plated axial leads solderable per MIL-STD 202E, method 208C
Case: Molded with UL-94 Class V-0 recognized Flame Retardant Epoxy
Polarity: color band denotes cathode
Mounting position: any



MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

(single-phase, half -wave, 60HZ, resistive or inductive load rating at 25°C, unless otherwise stated)

	Symbol	HER 301G	HER 302G	HER 303G	HER 304G	HER 305G	HER 306G	HER 307G	HER 308G	units	
Maximum Recurrent Peak Reverse Voltage	V _{rrm}	50	100	200	300	400	600	800	1000	V	
Maximum RMS Voltage	V _{rms}	35	70	140	210	280	420	560	700	V	
Maximum DC blocking Voltage	V _{dc}	50	100	200	300	400	600	800	1000	V	
Maximum Average Forward Rectified Current 3/8" lead length at Ta =50°C	I _{f(av)}	3.0								A	
Peak Forward Surge Current 8.3ms single half sine-wave superimposed on rated load	I _{fsm}	125								A	
Maximum Forward Voltage at Forward current 3A Peak	V _f	1.0			1.3		1.7			V	
Maximum DC Reverse Current Ta =25°C at rated DC blocking voltage Ta =125°C	I _r	10.0 200.0								μA	
Maximum Reverse Recovery Time (Note 1)	T _{rr}	50					75				nS
Typical Junction Capacitance (Note 2)	C _j	80					50				pF
Typical Thermal Resistance (Note 3)	R _{th(ja)}	20.0								°C/W	
Storage and Operating Junction Temperature	T _{stg, Tj}	-50 to +150								°C	

Note:

- Reverse Recovery Condition I_f =0.5A, I_r =1.0A, I_{rr} =0.25A
- Measured at 1.0 MHz and applied reverse voltage of 4.0Vdc
- Thermal Resistance from Junction to Ambient at 3/8" lead length, P.C. Board Mounted

RATINGS AND CHARACTERISTIC CURVES HER301G THRU HER308G

FIG.1- MAXIMUM AVERAGE FORWARD CURRENT DERATING

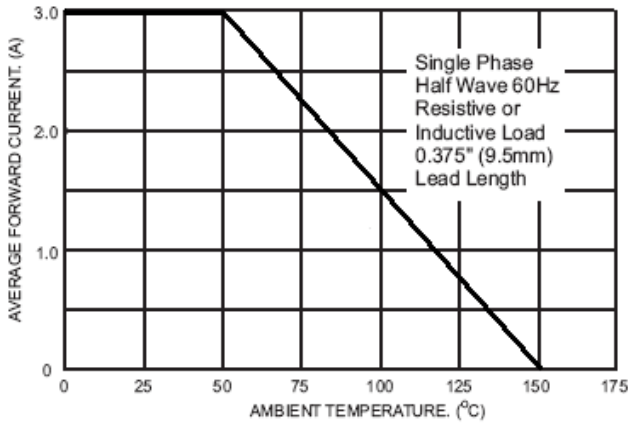


FIG.2- MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

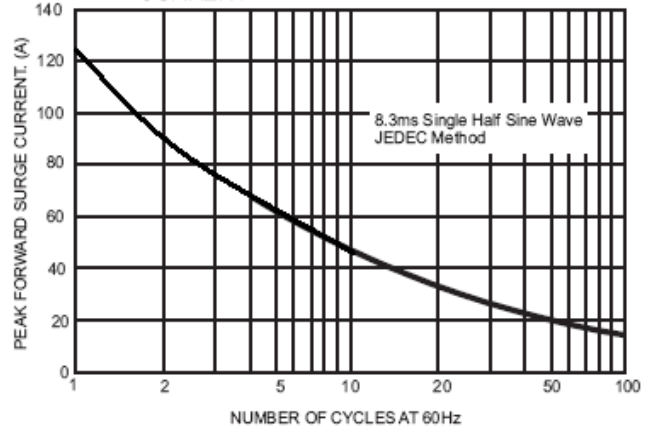


FIG.3- TYPICAL REVERSE CHARACTERISTICS

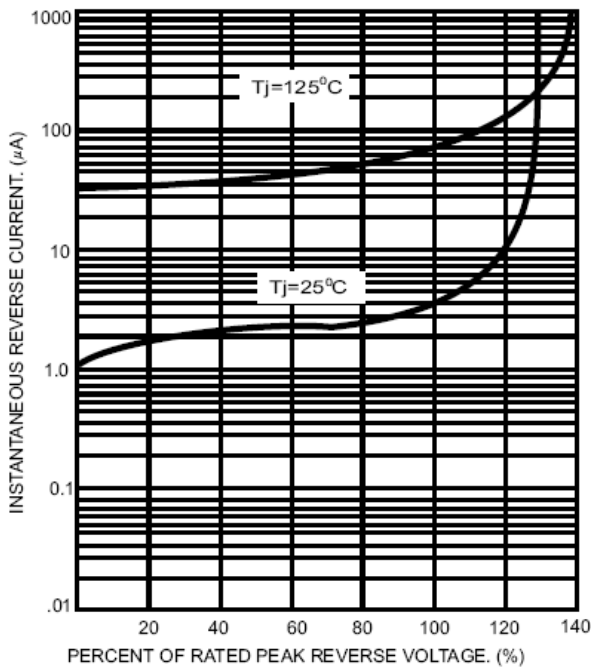


FIG.4- TYPICAL FORWARD CHARACTERISTICS

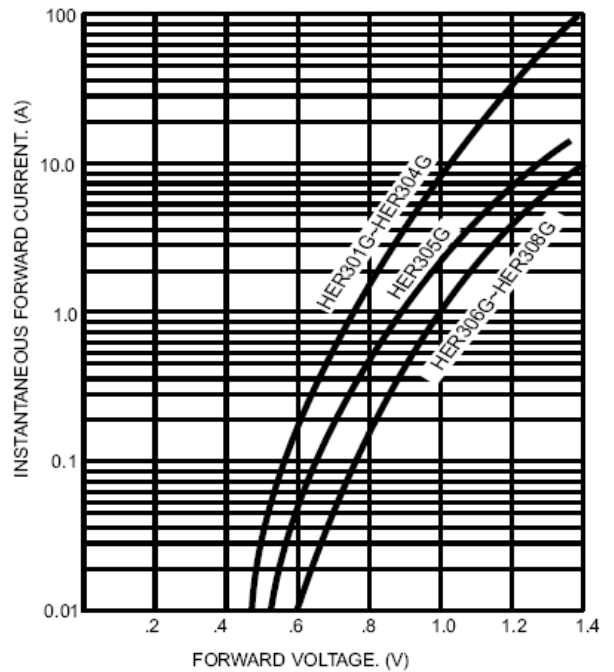


FIG.5- MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

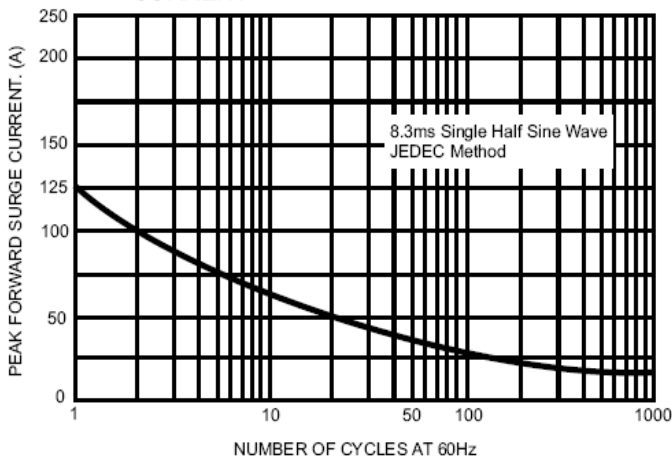


FIG.6- TYPICAL JUNCTION CAPACITANCE

