

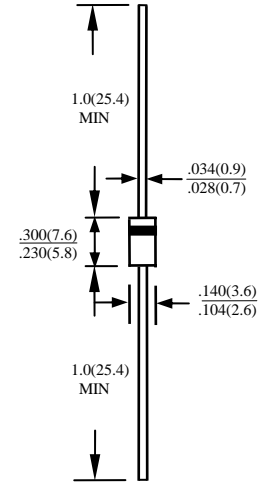
**2A ULTRA FAST RECOVERY RECTIFIER**

**FEATURES**

- PLASTIC PACKAGE HAS UNDERWRITERS LABORATORY FLAMMABILITY CLASSIFICATION 94V-0
- ULTRA FAST RECOVERY TIMES FOR HIGH EFFICIENCY
- LOW FORWARD VOLTAGE, HIGH CURRENT CAPABILITY
- LOW LEAKAGE
- HIGH SURGE CAPABILITY
- HIGH TEMPERATURE SOLDERING GUARANTEED : 260°C .375" (9.5mm) LEAD LENGTHS FOR 10 SECONDS AT 5 LBS. (2.3KG) TENSION
- GLASS

**MECHANICAL DATA**

- CASE : MOLDED PLASTIC
- TERMINALS : AXIAL LEADS SOLDERABLE PER MIL-STD-202, METHOD 208
- POLARITY : COLOR BAND DENOTES CATHODE END
- MOUNTING POSITION : ANY
- WEIGHT : 0.4 GRAMS



CASE : DO15

DIMENSIONS IN INCHES AND (MILLIMETERS)

**MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS**

RATINGS AT 25°C AMBIENT TEMPERATURE UNLESS OTHERWISE SPECIFIED  
SINGLE PHASE, HALF WAVE, 60 HZ, RESISTIVE OR INDUCTIVE LOAD.  
FOR CAPACITIVE LOAD, DERATE CURRENT BY 20%

RATINGS	SYMBOL	HER201G	HER202G	HER203G	HER204G	HER205G	HER206G	HER207G	HER208G	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 .375" (9.5mm) LEAD LENGTH AT TA=55°C	$I_O$	2.0								A	
PEAK FORWARD SURGE CURRENT 8.3ms SINGLE HALF SINE-WAVE SUPERIMPOSED ON RATED LOAD	$I_{FSM}$	60								A	
TYPICAL JUNCTION CAPACITANCE (NOTE 1)	$C_J$	30					20				PF
TYPICAL THERMAL RESISTANCE (NOTE 2)	$R_{\theta ja}$	25								°C/W	
STORAGE TEMPERATURE RANGE	$T_{STG}$	-55 TO + 150								°C	
OPERATING TEMPERATURE RANGE	$T_{OP}$	-55 TO + 150								°C	

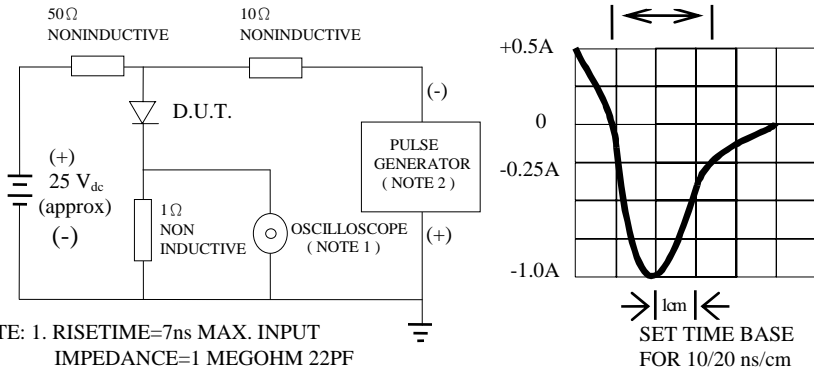
**ELECTRICAL CHARACTERISTICS (AT TA =25°C UNLESS OTHERWISE NOTED)**

CHARACTERISTICS	SYMBOL	HER201G	HER202G	HER203G	HER204G	HER205G	HER206G	HER207G	HER208G	UNITS	
MAXIMUM FORWARD VOLTAGE AT $I_O$ DC	$V_F$	1.3					1.7				V
MAXIMUM REVERSE CURRENT AT TA=25°	$I_R$	10								μA	
MAXIMUM REVERSE CURRENT AT TA=100°	$I_R$	100								μA	
MAXIMUM REVERSE RECOVERY TIME (NOTE 3)	$T_{RR}$	50					75				nS

- NOTE : 1. MEASURED AT 1 MHZ AND APPLIED REVERSE VOLTAGE OF 4.0 VOLTS  
2. BOTH LEADS ATTACHED TO HEATSINK 35x35x1t(mm) COPPER PLATE AT LEAD LENGTH 5mm  
3. REVERSE RECOVERY TEST CONDITIONS:  $I_F=0.5A$ ,  $I_R=1.0A$ ,  $I_{RR}=0.25A$

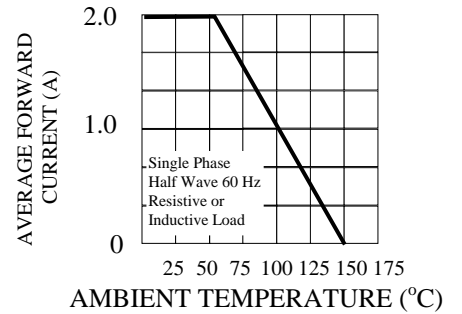
# RATINGS AND CHARACTERISTIC CURVE HER201G THRU HER208G

**FIG. 1-TEST CIRCUIT DIAGRAM AND REVERSE RECOVERY TIME CHARACTERISTIC**

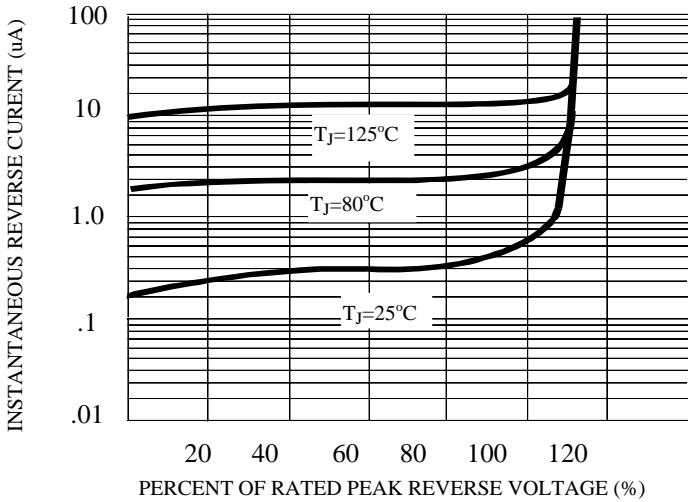


NOTE: 1. RISE TIME = 7ns MAX. INPUT IMPEDANCE = 1 MEGOHM 22PF  
 2. RISE TIME = 10ns MAX. SOURCE IMPEDANCE = 50OHMS

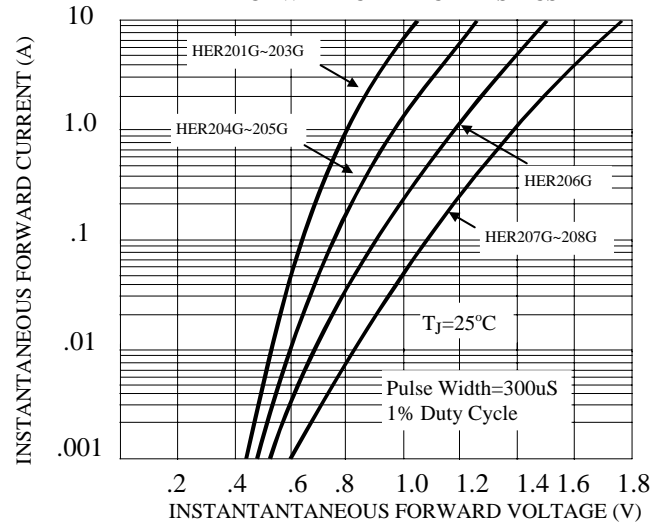
**FIG. 2-TYPICAL FORWARD CURRENT DERATING CURVE**



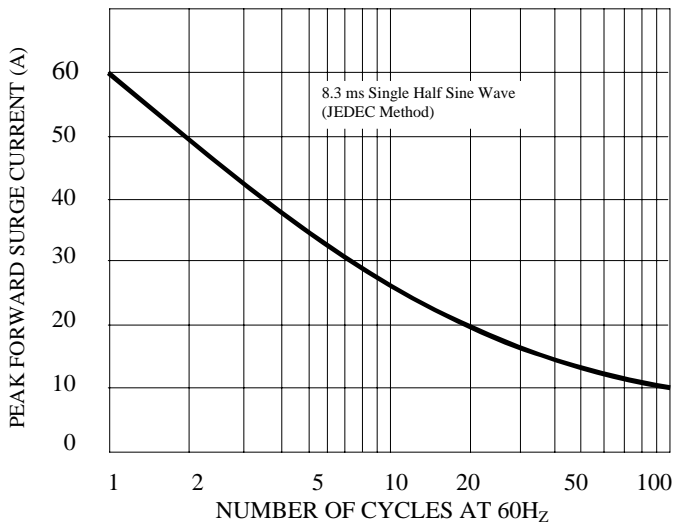
**FIG. 3-TYPICAL REVERSE CHARACTERISTICS**



**FIG. 4-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS**



**FIG. 5-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT**



**FIG. 6-TYPICAL JUNCTION CAPACITANCE**

