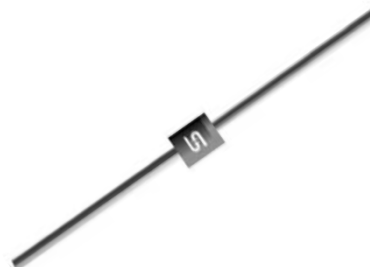


Features

- ✧ High efficiency, Low VF
- ✧ High current capability
- ✧ High reliability
- ✧ High surge current capability
- ✧ For use in low voltage, high frequency inverter, free wheeling, and polarity protection application
- ✧ Green compound with suffix "G" on packing code & prefix "G" on datecode



Mechanical Data

- ✧ Case: Molded plastic
- ✧ Epoxy: UL 94V-0 rate flame retardant
- ✧ Lead: Pure tin plated, lead free, solderable per MIL-STD-202, Method 208 guaranteed
- ✧ Polarity: Color band denotes cathode
- ✧ Solder dip 260°C max.10s per JESD 22-B106
- ✧ Weight: 0.40 grams

Ordering Information (example)

Part No.	Package	Packing	INNER TAPE	Packing code	Packing code (Green)
HER201	DO-15	1.5K / AMMO box	52mm	A0	A0G

Maximum Ratings and Electrical Characteristics

Rating at 25 °C ambient temperature unless otherwise specified.

Parameter	Symbol	HER 201	HER 202	HER 203	HER 204	HER 205	HER 206	HER 207	Unit
Maximum Repetitive Peak Reverse Voltage	V _{RRM}	50	100	200	300	400	600	800	V
Maximum RMS Voltage	V _{RMS}	35	70	140	210	280	420	560	V
Maximum DC Blocking Voltage	V _{DC}	50	100	200	300	400	600	800	V
Maximum Average Forward Rectified Current	I _{F(AV)}	2							A
Peak Forward Surge Current, 8.3 ms Single Half Sine-wave Superimposed on Rated Load (JEDEC method)	I _{FSM}	60							A
Maximum Instantaneous Forward Voltage (Note 1) @ 2 A	V _F	1.0				1.3	1.7		V
Maximum Reverse Current @ Rated VR T _A =25 °C T _A =125 °C	I _R	5 150							uA
Maximum Reverse Recovery Time (Note 2)	T _{rr}	50					75		nS
Typical Junction Capacitance (Note 3)	C _j	50					35		pF
Typical Thermal Resistance	R _{θJA} R _{θJC}	60 8							°C/W
Operating Temperature Range	T _J	- 55 to + 150							°C
Storage Temperature Range	T _{STG}	- 55 to + 150							°C

Note 1: Pulse Test with PW=300 usec, 1% Duty Cycle

Note 2: Reverse Recovery Test Conditions: IF=0.5A, IR=1.0A, IRR=0.25A

Note 3: Measured at 1 MHz and Applied Reverse Voltage of 4.0V D.C.

RATINGS AND CHARACTERISTIC CURVES (HER201 THRU HER207)

FIG.1 MAXIMUM FORWARD CURRENT DERATING CURVE

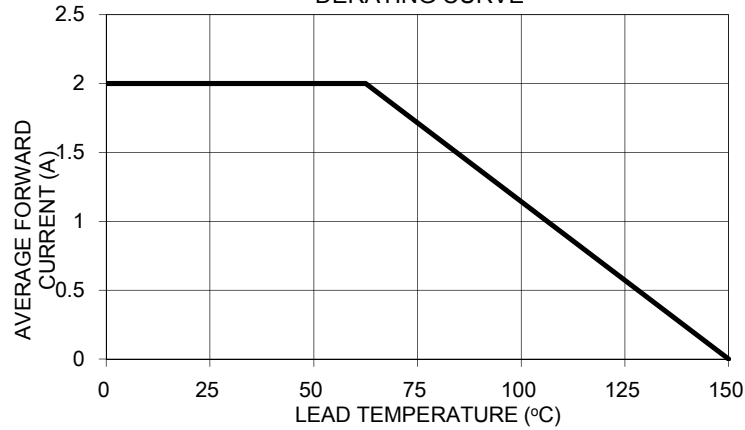


FIG. 2 TYPICAL REVERSE CHARACTERISTICS

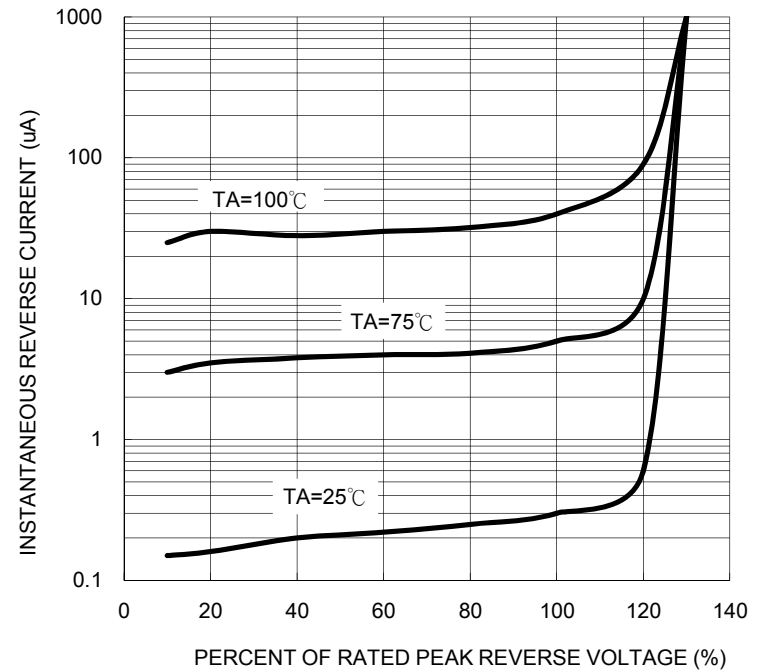


FIG. 3 MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

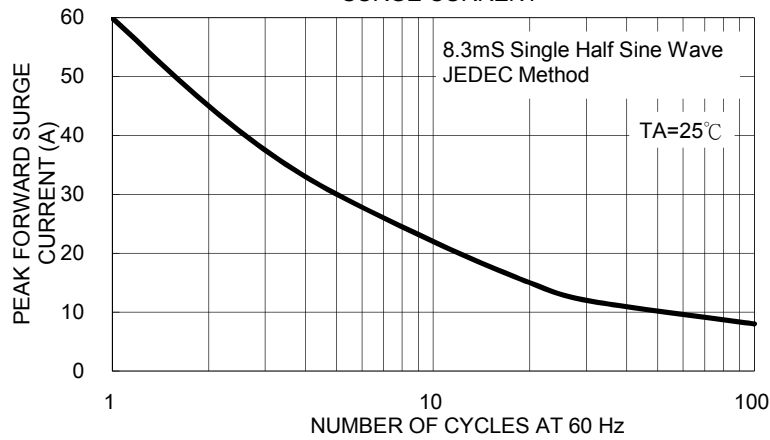


FIG. 5 TYPICAL FORWARD CHARACTERISTICS

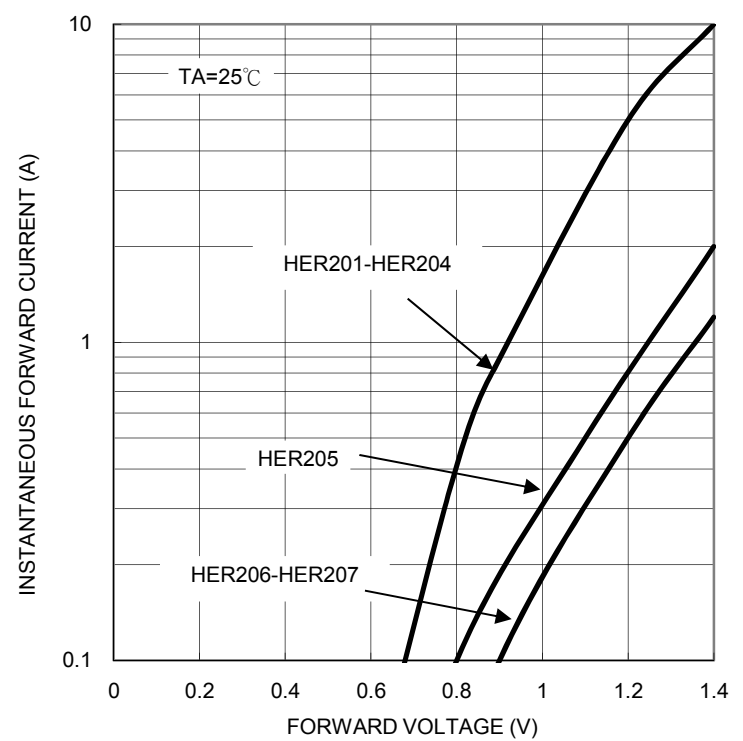


FIG. 4 TYPICAL JUNCTION CAPACITANCE

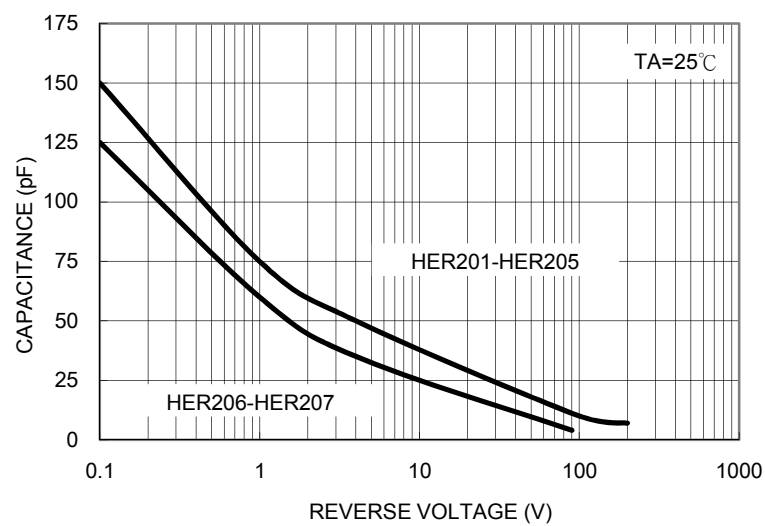
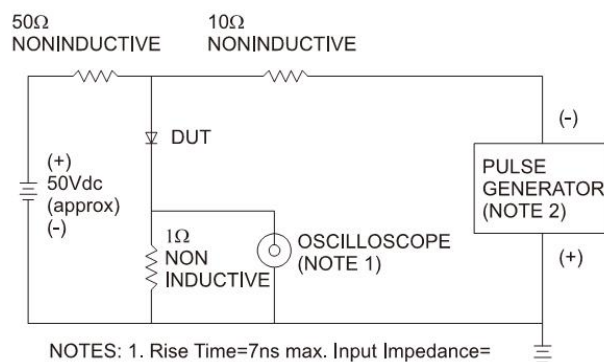
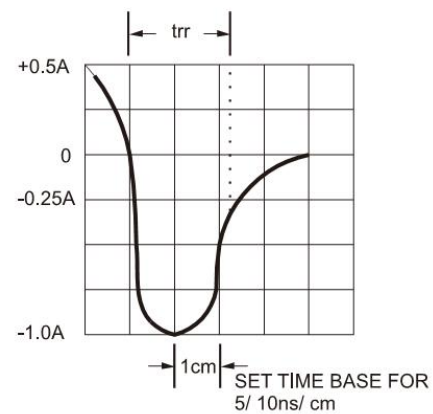


FIG.6- REVERSE RECOVERY TIME CHARACTERISTIC AND TEST CIRCUIT DIAGRAM



NOTES: 1. Rise Time=7ns max. Input Impedance=1 megohm 22pf
2. Rise Time=10ns max. Source Impedance=50 ohms

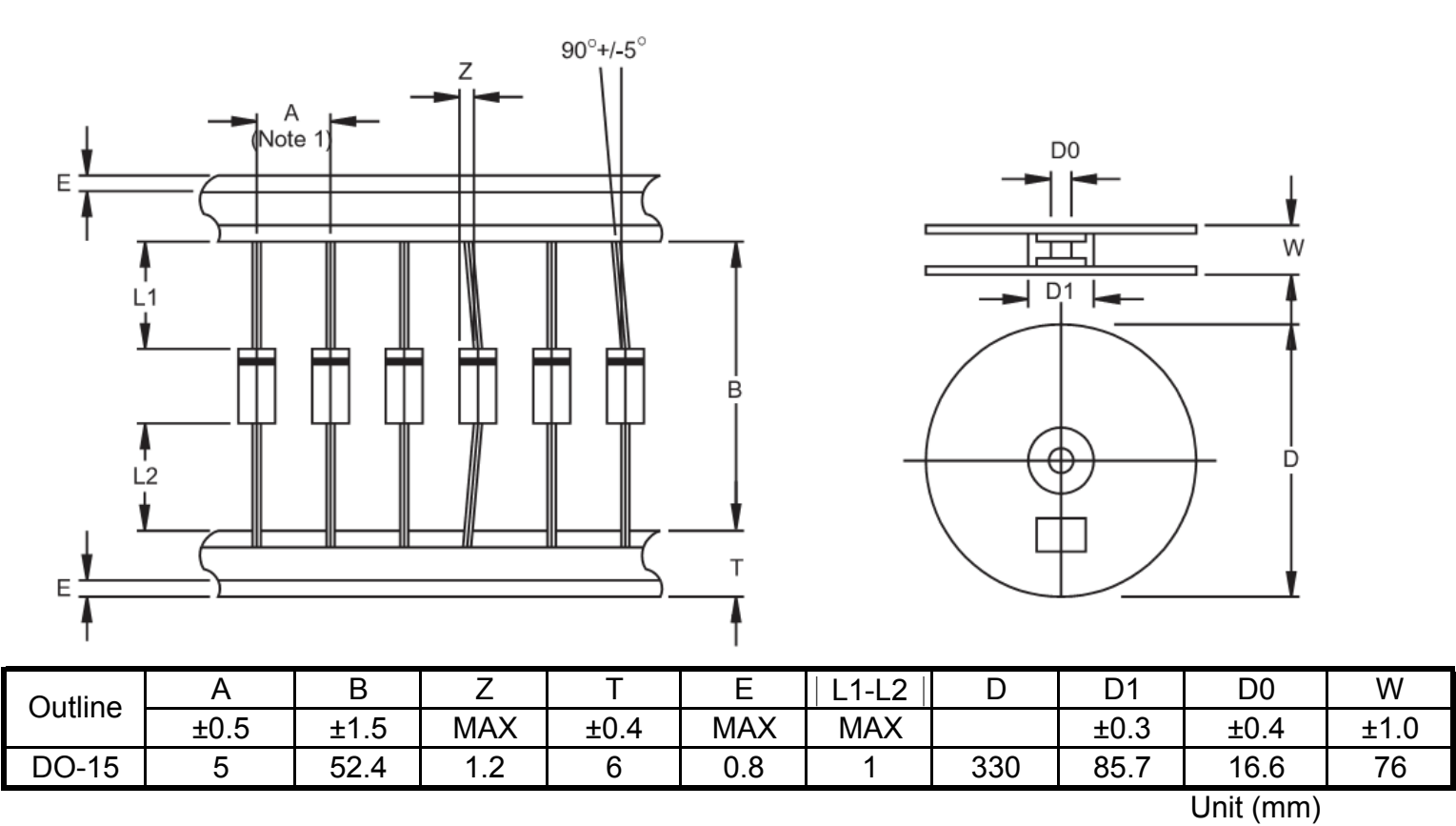


Ordering information

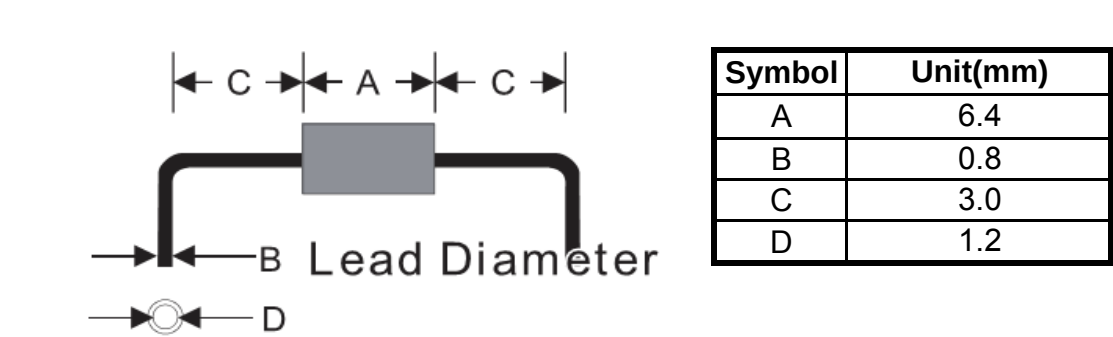
Part No.	Package	Packing	INNER TAPE	Packing code	Packing code (Green)
HER20x (Note)	DO-15	1.5K / AMMO box	52mm	A0	A0G
	DO-15	3.5K / 13" Reel	52mm	R0	R0G
	DO-15	1K / Bulk packing		B0	B0G

Note: "x" is Device Code from "1" thru "7".

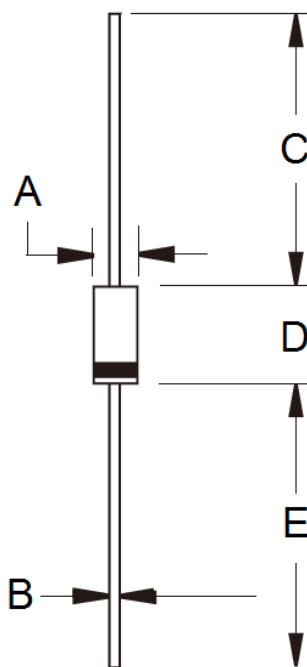
AXIAL LEAD TAPING SPECIFICATIONS



Suggested Mounting Hole Rule

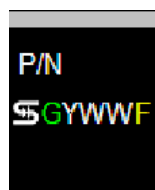


Dimensions



DIM.	Unit(mm)		Unit(inch)	
	Min	Max	Min	Max
A	2.60	3.60	0.102	0.142
B	0.70	0.90	0.028	0.035
C	25.40	-	1.000	-
D	5.80	7.60	0.228	0.299
E	25.40	-	1.000	-

Marking Diagram



P/N = Specific Device Code
G = Green Compound
YWW = Date Code
F = Factory Code