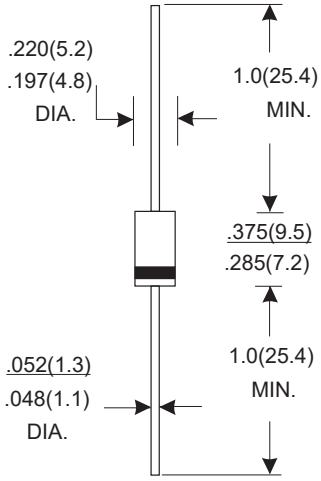
DO-27 High Efficient Rectifier Diodes

FEATURES

- The plastic package carries Underwrites Laboratory Flammability Classification 94V-0
- Construction utilizes void-free molded plastic technique
- High reliability
- High temperature soldering guaranteed:260 ℃/10 seconds at terminals
- Component in accordance to RoHs 2015/863 and WEEE 2012/19/EU

MECHANICAL DATA

- Case style: DO-27 molded plastic
- Mounting position: Any



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND CHARACTERISTICS

@ 25°C Ambient Temperature (unless otherwise noted)

Parameter		Symbol	HER 501	HER 502	HER 503	HER 504	HER 505	HER 506	HER 507	HER 508	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℃		$I_{F(AV)}$	5.0								A
Peak Forward Surge Current, 8.3 ms single half sine-wave superimposed on rated load (JEDEC method)		I_{FSM}	200.0								A
Maximum Instantaneous Forward Voltage at 2.0A		V_F	1.0			1.3		1.7			V
Maximum reverse current at rated DC blocking voltage	@T_A=25°C	I_R	10.0								μA
	@T_A=100°C		150.0								
Maximum reverse recovery time		t_{rr}	50					75			ns
Typical junction capacitance		C_J	85					60			pF
Typical thermal resistance		$R_{\theta JA}$	30								℃/W
Operating junction temperature range Storage temperature range		T_j T_{STG}	- 55 ---- + 150								℃

RATINGS AND CHARACTERISTIC CURVES

FIG.1: Io-Ta Curve

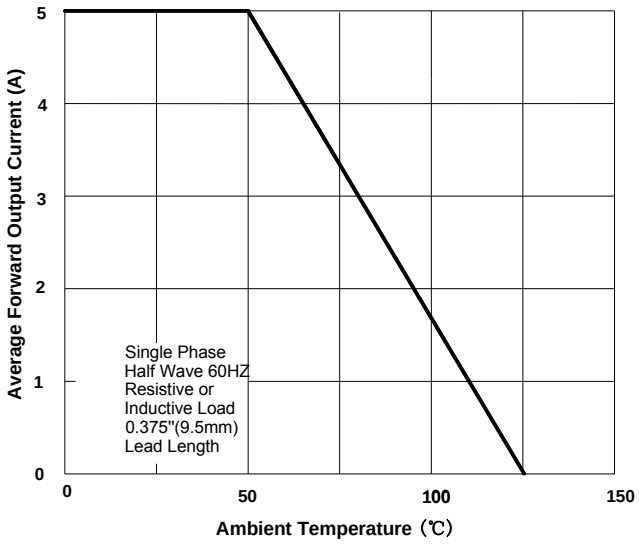


FIG.2: Surge Forward Currrent Capability

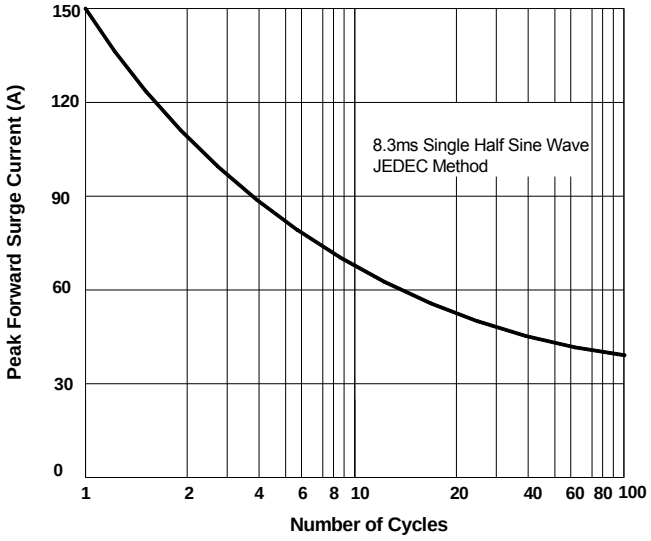


FIG.3: Forward Voltage

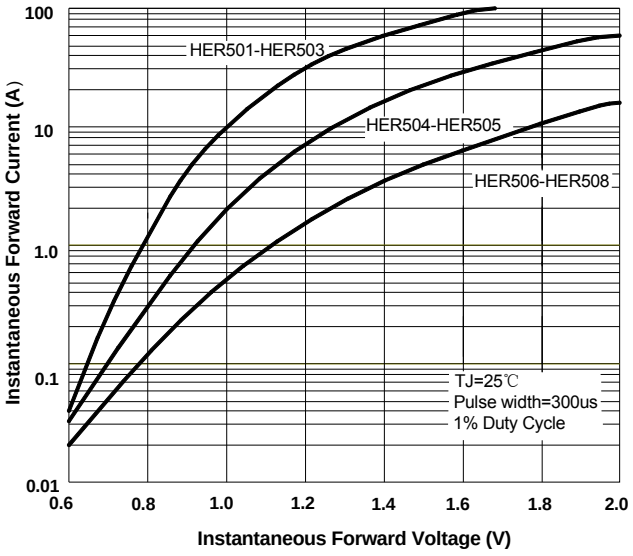


FIG.4: Typical Reverse Characteristics

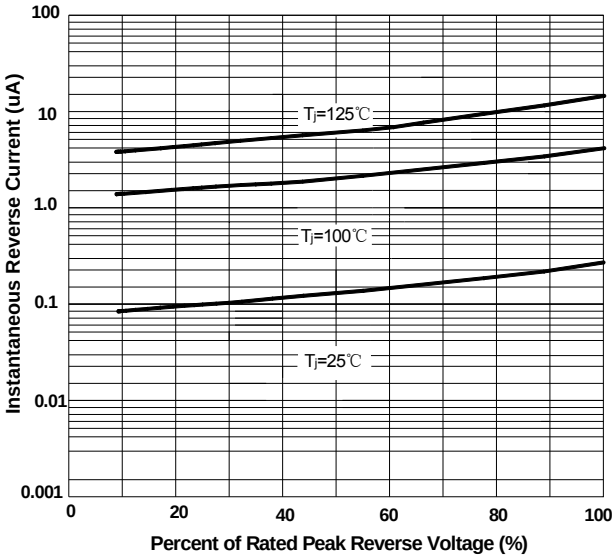


FIG.5: Diagram of circuit and Testing wave form of reverse recovery time