TAYCHIPST

GLASS PASSIVATED GENERAL PURPOSE RECTIFIERS

BY251G-BY255G

200V-1300V

3.0A

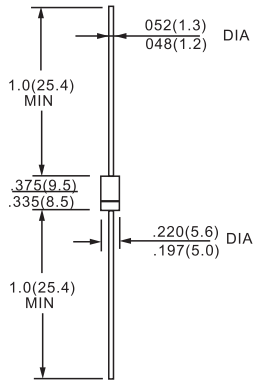
FEATURES

- The plastic package carries Underwriters Laboratory Flammability Classification 94V-0
- Construction utilizes void-free molded plastic technique
- Low reverse leakage
- High forward surge current capability
- High temperature soldering guaranteed: 250℃/10 seconds,0.375″(9.5mm) lead length, 5 lbs. (2.3kg) tension

MECHANICAL DATA

Case: JEDEC DO-201AD molded plastic body
Terminals: Plated axial leads, solderable per MIL-STD-750, Method 2026
Polarity: Color band denotes cathode end
Mounting Position: Any
W

DO-27



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25℃ ambient temperature unless otherwise specified.
Single phase half-wave 60Hz,resistive or inductive load,for capacitive load current derate by 20%.

	SYMBOLS	BY251G	BY252G	BY253G	BY254G	BY255G	UNITS
Maximum repetitive peak reverse voltage	V_{RRM}	200	400	600	800	1300	VOLTS
Maximum RMS voltage	V_{RMS}	140	280	420	560	910	VOLTS
Maximum DC blocking voltage	V_{DC}	200	400	600	800	1300	VOLTS
Maximum average forward rectified current 0.375″(9.5mm) lead length at T_A=75℃	$I_{(AV)}$	3.0					Amps
Peak forward surge current 8.3ms single half sine-wave superimposed on rated load (JEDEC Method)	I_{FSM}	150					Amps
Maximum instantaneous forward voltage at 3.0A	V_F	1.1					Volts
Maximum DC reverse current T_A=25℃ at rated DC blocking voltage T_A=100℃	I_R	10.0 500					μA
Typical junction capacitance (NOTE 1)	C_J	30.0					pF
Typical thermal resistance (NOTE 2)	$R_{\theta JA}$	20.0					°C/W
Operating junction and storage temperature range	T_J,T_{STG}	-65 to +175					°C

Note:1.Measured at 1MHz and applied reverse voltage of 4.0V D.C.
2.Thermal resistance from junction to ambient at 0.375″(9.5mm)lead length,P.C.B. mounted

RATINGS AND CHARACTERISTIC CURVES BY251G THRU BY255G

FIG. 1- FORWARD CURRENT DERATING CURVE

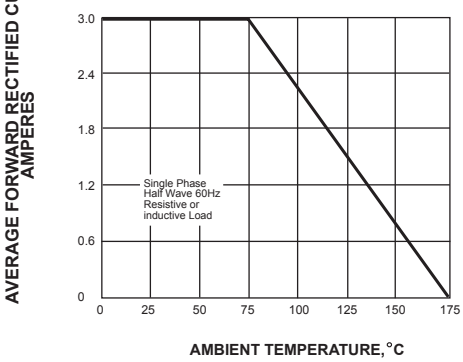


FIG. 2-MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT

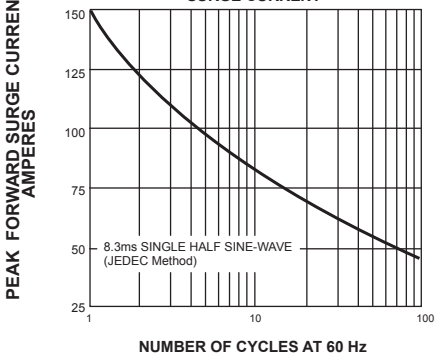


FIG. 3-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

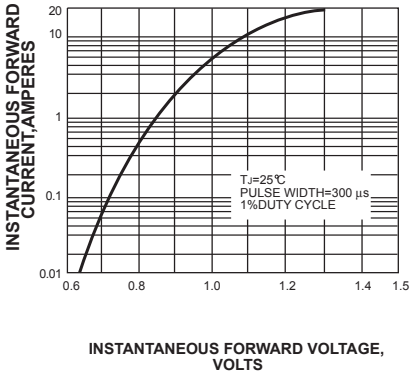


FIG. 4-TYPICAL REVERSE CHARACTERISTICS

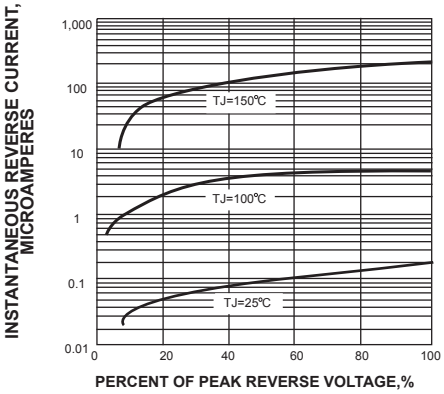


FIG. 5-TYPICAL JUNCTION CAPACITANCE

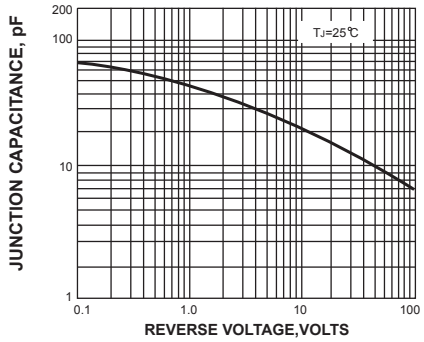


FIG. 6-TYPICAL TRANSIENT THERMAL IMPEDANCE

