



HIGH VOLTAGE RECTIFIER

R1200 THRU R5000

VOLTAGE RANGE
CURRENT

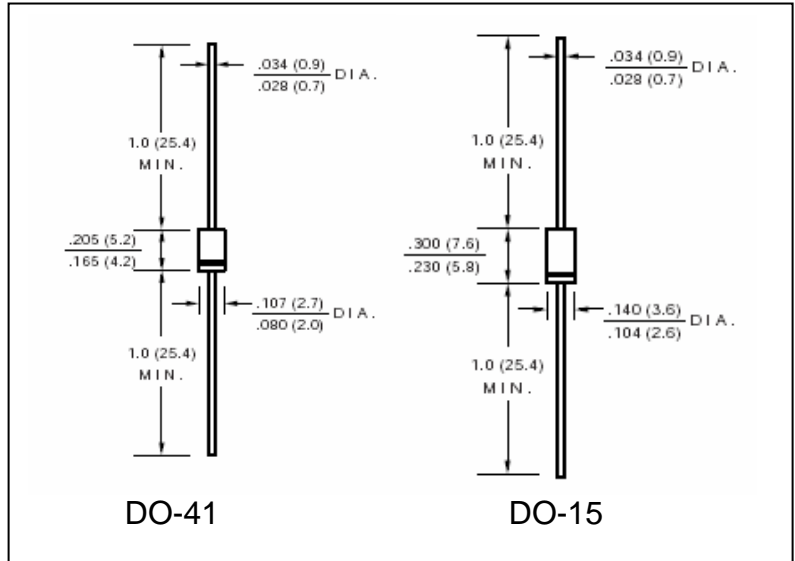
1200 to 5000 Volts
0.2 to 0.5 Ampere

FEATURES

- Low Leakage
- High Surge Capacity
- High current capability
- High Temperature soldering guaranteed:
260°C / 10 second, 0.375" (9.5mm) lead length

MECHANICAL DATA

- Case: Transfer molded plastic
- Epoxy: UL94V – 0 rate flame retardant
- Polarity: Color Band denotes cathode end
- Lead: Plated axial lead, solderable per MIL – STD-202E Method 208C
- Mounting Position: Any
- Weight: 0.012 ounce, 0.33 gram (DO-41)
0.014 ounce, 0.39 gram (DO-15)



MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

- Ratings at 25°C ambient temperature unless otherwise specified
- Single Phase, half wave, 60Hz, resistive or inductive load
- For capacitive load derate current by 20%

	SYMBOLS	R1200	R1500	R1800	R2000	R2500	R3000	R4000	R5000	UNIT
Package		DO-41	DO-41	DO41	DO-41	DO-15	D0-15	DO-15	DO-15	
Maximum Repetitive Peak Reverse Voltage	V_{RRM}	1200	1500	1800	2000	2500	3000	4000	5000	Volts
Maximum RMS Voltage	V_{RMS}	840	1050	1260	1400	1750	2100	2800	3500	Volts
Maximum DC Blocking Voltage	V_{DC}	1200	1500	1800	2000	2500	3000	4000	5000	Volts
Maximum Average Forward Rectified Current, 0.375" (9.5mm) lead length at $T_A = 50^\circ\text{C}$	$I_{(AV)}$	500				200				mA
Peak Forward Surge Current 8.3mS single half sine wave superimposed on rated load (JEDEC method)	I_{FSM}					30				Amps
Maximum Instantaneous Forward Voltage @ 0.5/0.2A	V_F	2.0		3.0		4.0		5.0		Volts
Maximum DC Reverse Current at Rated $T_A = 25^\circ\text{C}$	I_R					5.0				μA
DC Blocking Voltage per element $T_A = 100^\circ\text{C}$						40				
Maximum Full Load Reverse Current, Full Cycle average 0.375" (9.5mm) lead length at $T_L = 55^\circ\text{C}$	$I_{R(AV)}$					30				μA
Operating Junction Temperature Range	T_J					(-65 to +150)				$^\circ\text{C}$
Storage Temperature Range	T_{STG}					(-65 to +150)				$^\circ\text{C}$



RATINGS AND CHARACTERISTIC CURVES R1200 THRU R5000

FIG.1-TYPICAL FORWARD CURRENT
DERATING CURVE

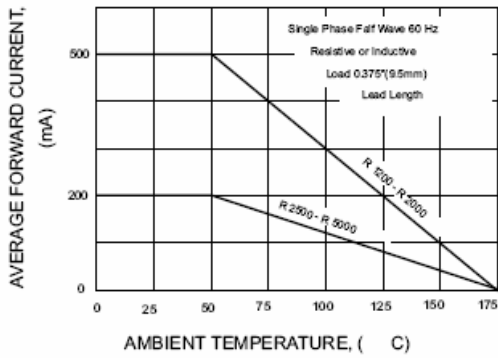


FIG.2-MAXIMUM NON-REPETITIVE PEAK
FORWARD SURGE CURRENT

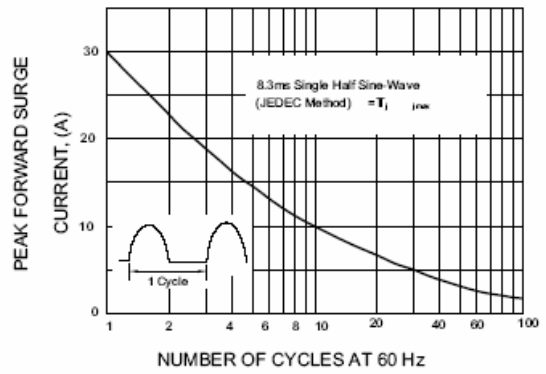


FIG.3-TYPICAL REVERSE
CHARACTERISTICS

