



BY296 THRU BY299S

FAST RECOVERY SILICON RECTIFIER

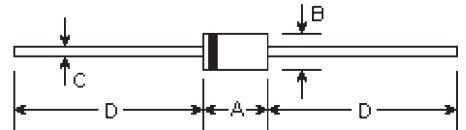
Reverse Voltage - 100 to 1000 Volts

Forward Current - 2.0 Amperes

Features

- Fast recovery diodes
- Diffused junction
- High current capability
- The plastic material carries U/L recognition 94V-0
- Terminals: Axial leads
- Polarity: Color band denotes cathode

DO-201AD



Mounting Instruction

- Min. distance from body to soldering point, 4mm
- Max. solder temperature, 350°C
- Max. soldering time: 3.5 Sec.
- Do not bend lead at a point closer than 3mm to the body

DIMENSIONS					
DIM	inches		mm		Note
	Min.	Max.	Min.	Max.	
A	0.283	0.374	7.20	9.50	
B	0.189	0.208	4.80	5.30	ϕ
C	0.048	0.051	1.20	1.30	ϕ
D	1.000	-	25.40	-	

Maximum Ratings and Electrical Characteristics

Ratings at 25°C ambient temperature unless otherwise specified.

	Symbols	BY296	BY297	BY298	BY299	BY299S	Units
Peak repetitive and non recurrent reverse voltage	V_{RRM}	100	200	400	800	1000	Volts
Forward current, R load at $T_{amb}=50^{\circ}C$	$I_{(AV)}$	2.0					Amps
8.3mS peak forward surge current at $T_j=25^{\circ}C$	I_{FSM}	70.0					Amps
Recurrent peak forward current (A)	I_{FRM}	10.0					Amps
Maximum forward voltage drop at $I_F=2.0A$	V_F	1.3					Volts
Maximum reverse current at V_{RRM} at 25°C	I_R	10.0					µA
Maximum reverse recovery time (Note 1)	T_{rr}	250					nS
Maximum thermal resistance (l=10mm)	$R_{\theta JA}$	30.0					°C/W
Operating and storage temperature range	T_J, T_{STG}	-65 to +125					°C

Note:

(1) Reverse recovery test conditions: $I_F=0.5A, I_R=1.0A, I_{rr}=0.25A$

RATINGS AND CHARACTERISTIC CURVES

