

# YG123S15 (6A)

(1500V / 6A)

## Fast recovery diode

### Features

- Damper diode for high definition TV and high resolution display
- Insulated package by fully molding
- High voltage by mesa design
- High reliability

### Applications

- High speed switching

### Maximum ratings and characteristics

- Absolute maximum ratings

Item	Symbol	Conditions	Rating	Unit
Repetitive peak reverse voltage	$V_{RRM}$		1500	V
Non-Repetitive peak reverse voltage	$V_{RSM}$		1500	V
Isolating voltage	$V_{iso}$	Terminals-to-Case, AC.1min	1500	V
Average output current	$I_o$	Square wave, duty=1/2 $T_c=92^{\circ}C$	6	A
Non-repetitive surge current	$I_{FSM}$	Sine wave 10ms, 1shot	80	A
Operating junction temperature	$T_j$		+150	$^{\circ}C$
Storage temperature	$T_{stg}$		-40 to +150	$^{\circ}C$

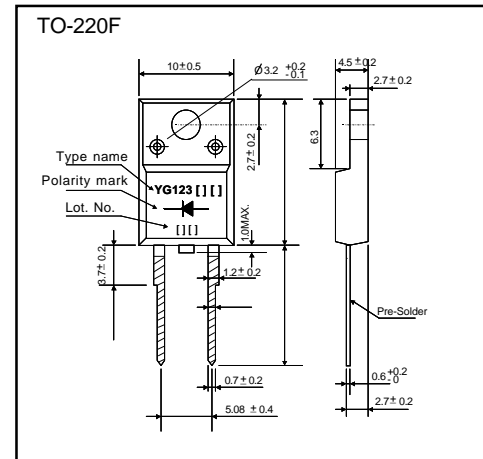
- Electrical characteristics ( $T_c=25^{\circ}C$  Unless otherwise specified)

Item	Symbol	Conditions	Max.	Unit
Forward voltage drop	$V_F$	$I_F=4A$	2.0	V
Reverse current	$I_R$	$V_R=V_{RRM}$	50.0	$\mu A$
Reverse recovery time	$t_{rr}$	$I_F=0.1A, I_R=0.1A$	0.5	$\mu s$

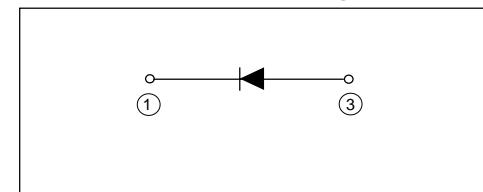
- Electrical characteristics ( $T_c=25^{\circ}C$  Unless otherwise specified)

Item	Symbol	Condition	Max.	Unit
Thermal resistance	$R_{th(j-c)}$	Junction to case	3.5	$^{\circ}C/W$

### Outline drawings, mm

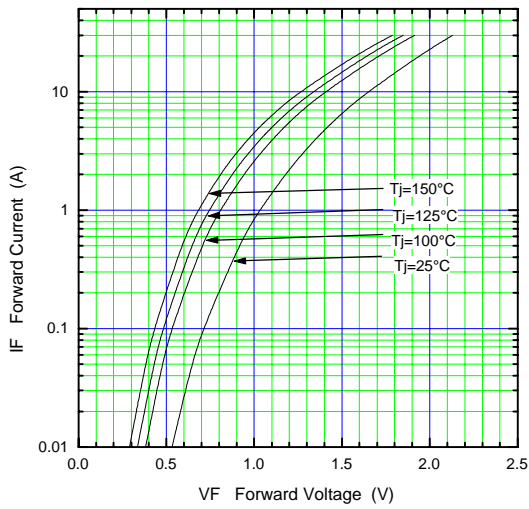


### Connection diagram

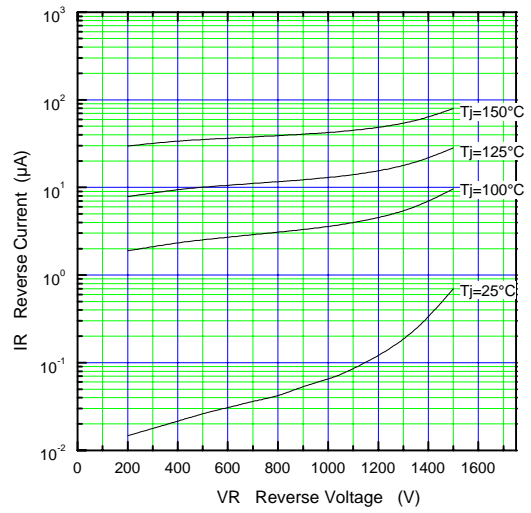


■ Characteristics

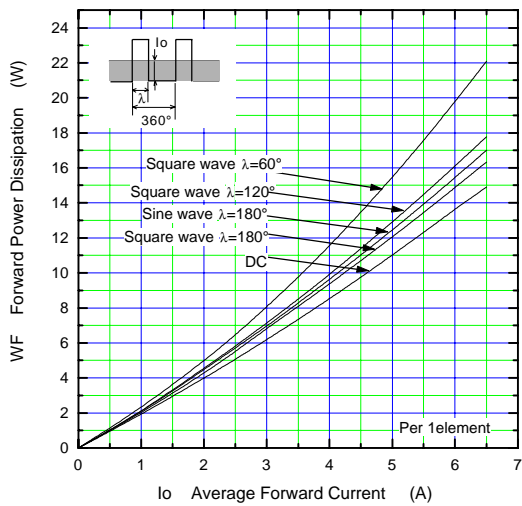
Forward Characteristic (typ.)



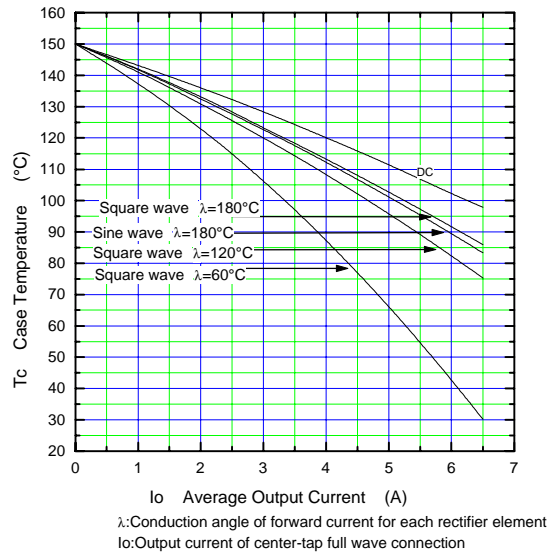
Reverse Characteristic (typ.)



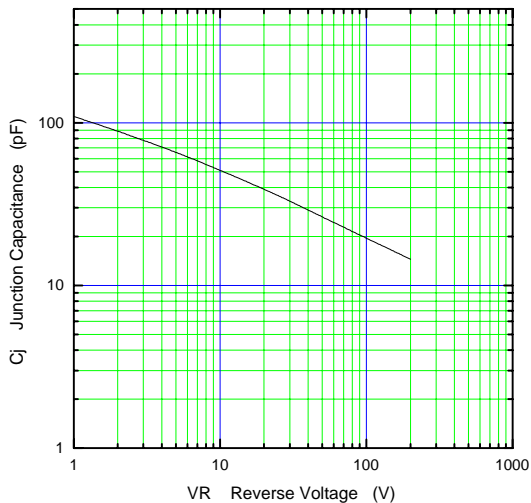
Forward Power Dissipation



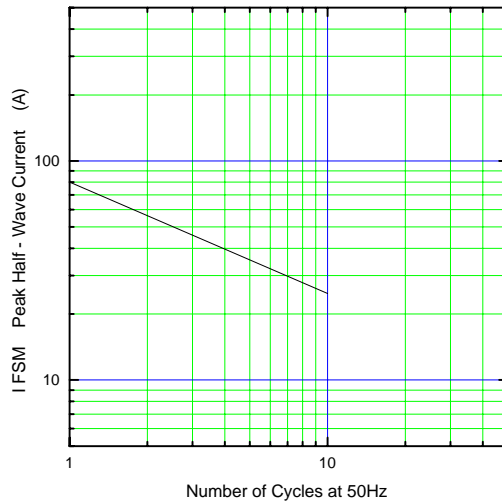
Current Derating (Io-Tc)



Junction Capacitance Characteristic (typ.)



Surge Capability



Transient Thermal Impedance

