

[200509]

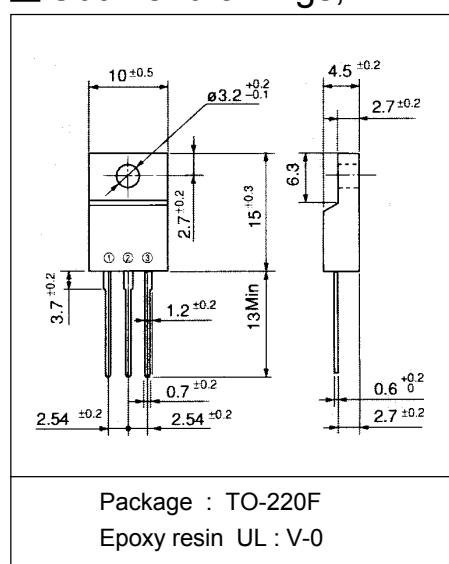
## Low IR Schottky barrier diode

## ■ Features

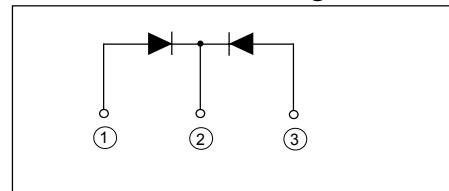
- Low IR
  - Low VF
  - Center tap connection

## ■ Applications

- High frequency operation
  - DC-DC converters
  - AC adapter



## ■ Connection diagram



## ■ Maximum ratings and characteristics

- Maximum ratings

Item	Symbol	Conditions	Rating	Unit
Repetitive peak surge reverse voltage	$V_{RSM}$	$tw=500\text{ns}$ , duty=1/40	45	V
Repetitive peak reverse voltage	$V_{RRM}$		45	V
Isolating voltage	$V_{iso}$	Terminals-to-Case, AC.1min.	1500	V
Average output current	$I_o$	Square wave, duty=1/2 $T_c=129^\circ\text{C}$	10 *	A
Non-repetitive surge current	$I_{FSM}$	Sine wave 10ms	125	A
non-repetitive reverse surge power dissipation	$PRM$	$tw=10\mu\text{s}$ , $T_j=25^\circ\text{C}$	330	W
Operating junction temperature	$T_j$		+150	$^\circ\text{C}$
Storage temperature	$T_{stg}$		-40 to +150	$^\circ\text{C}$

\* Out put current of center tap full wave connection

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

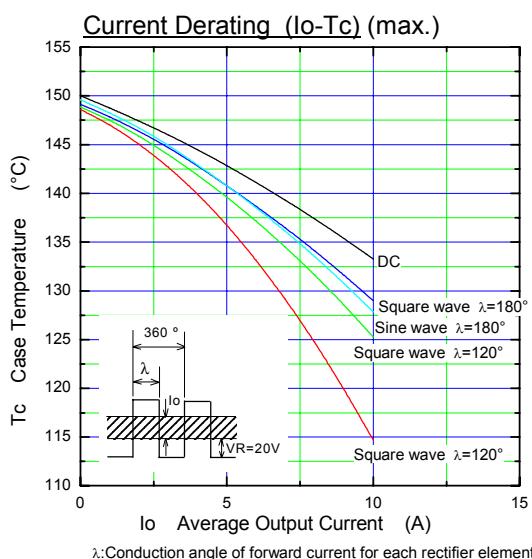
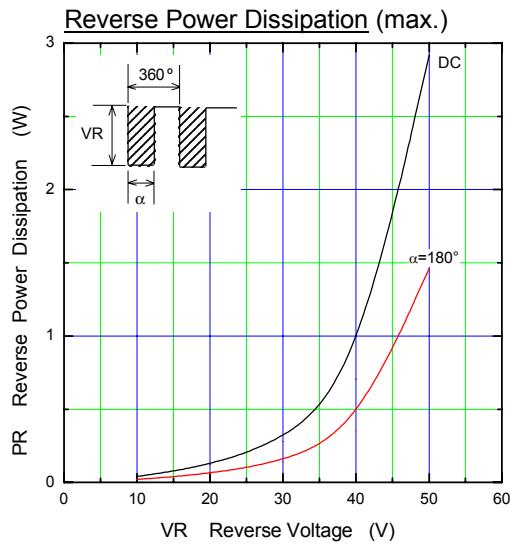
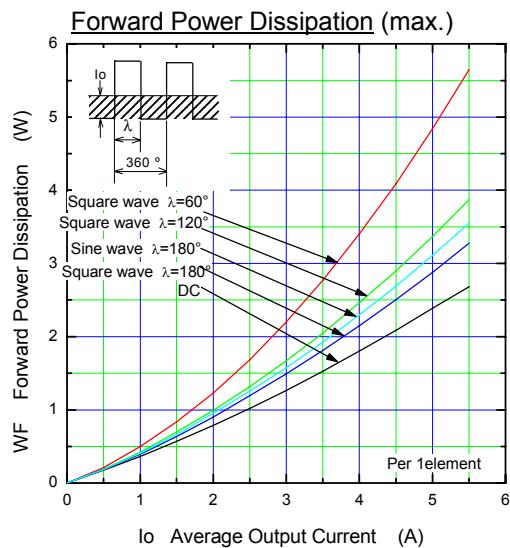
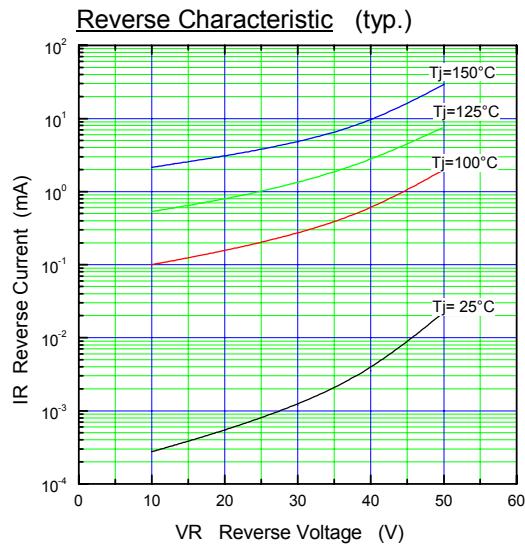
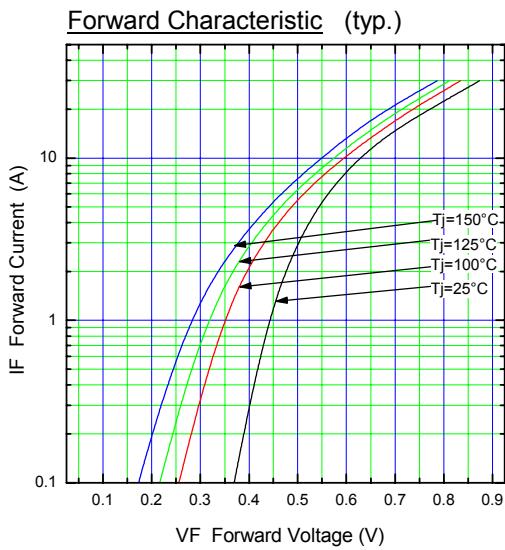
Item	Symbol	Conditions	Max.	Unit
Forward voltage **	$V_F$	$I_F=5A$	0.61	V
Reverse current **	$I_R$	$V_R=40V$	150	$\mu A$
Thermal resistance	$R_{th(j-c)}$	Junction to case	3.5	$^{\circ}C/W$

\*\*Rating per element

- Mechanical characteristics

Mounting torque	Recommended torque	0.3 to 0.5	N·m
Approximate mass		2	g

## ■ Characteristics



$\lambda$ : Conduction angle of forward current for each rectifier element  
 $I_o$ : Output current of center-tap full wave connection

