

[200510]

## Schottky-Barrier Diode

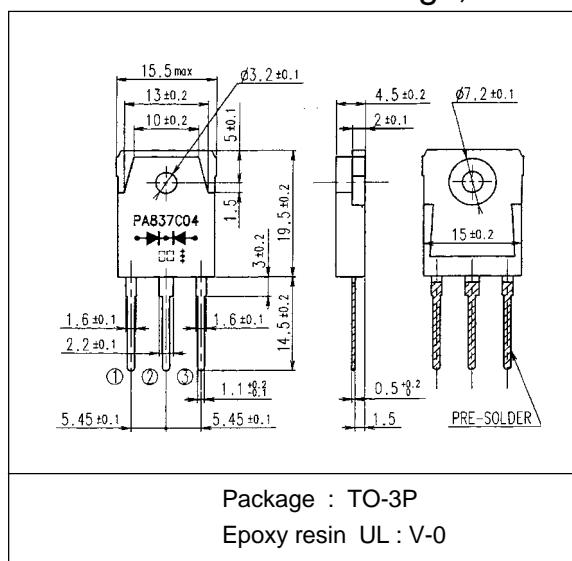
### ■ Features

- Low VF
- Center tap connection

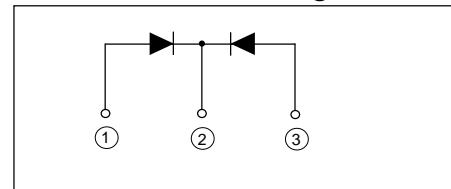
### ■ Applications

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

### ■ Outline drawings, mm



### ■ Connection diagram



### ■ Maximum ratings and characteristics

#### ● Maximum ratings

Item	Symbol	Conditions	Rating	Unit
Repetitive peak surge reverse voltage	$V_{RSM}$	$t_w=500\text{ns}$ , duty=1/40	48	V
Repetitive peak reverse voltage	$V_{RRM}$		40	V
Average output current	$I_o$	Square wave, duty=1/2 $T_c=106^\circ\text{C}$	60 *	A
Non-repetitive surge current	$I_{FSM}$	Sine wave 10ms	500	A
Surge reverse power	$P_{RM}$	$t_w=10\mu\text{s}$ , $25^\circ\text{C}$	1000	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 )

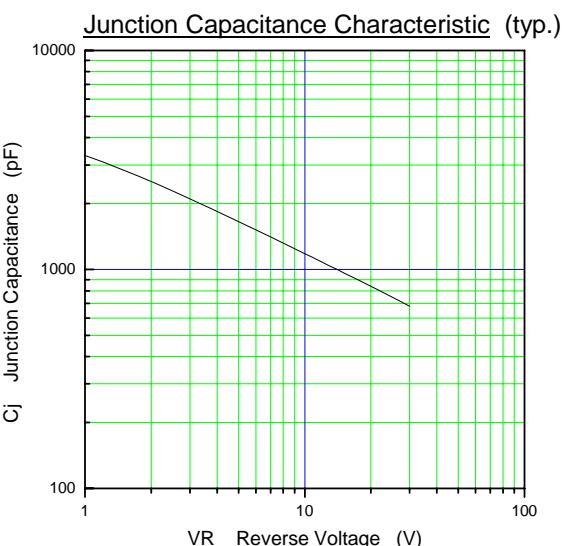
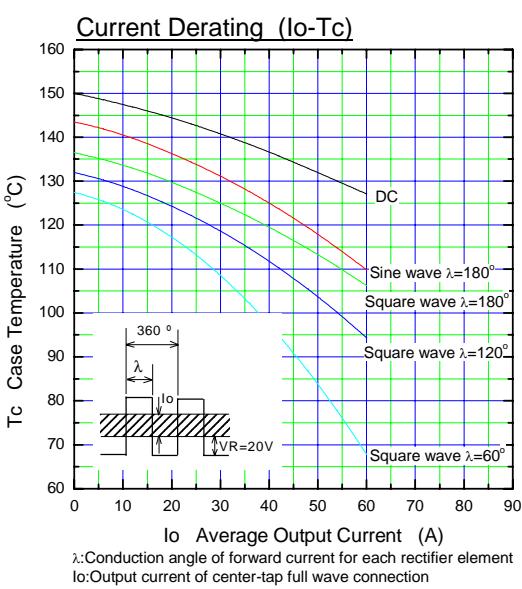
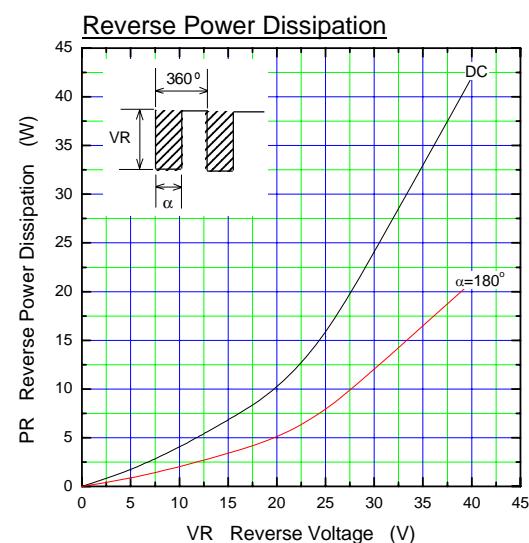
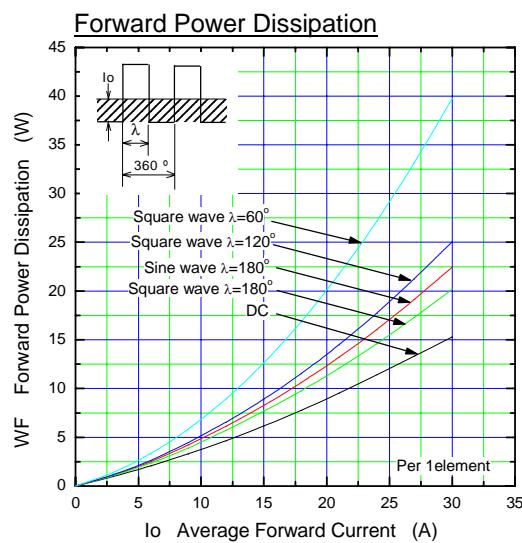
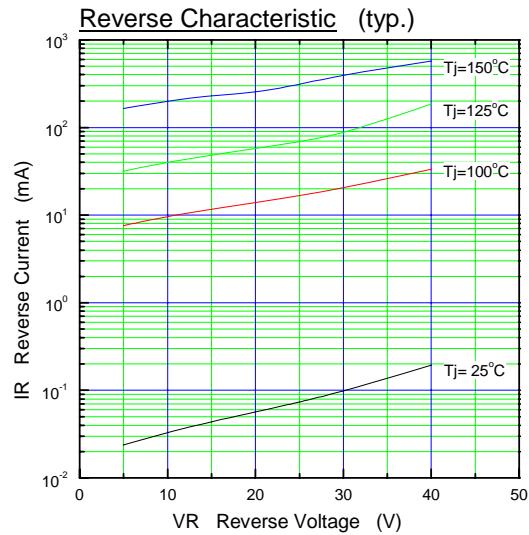
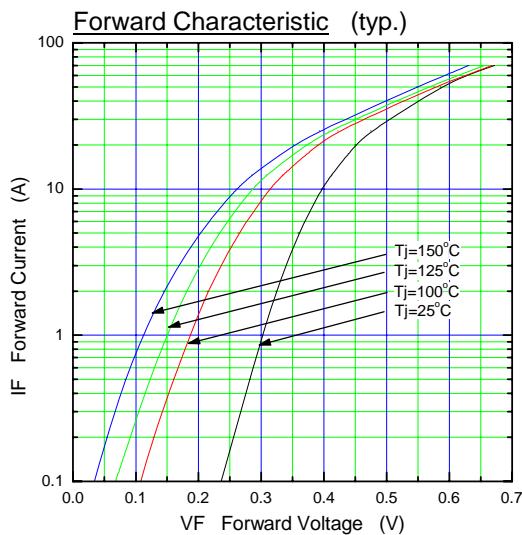
Item	Symbol	Conditions	Max.	Unit
Forward voltage **	$V_F$	$I_F=25\text{A}$	0.53	V
Reverse current **	$I_R$	$V_R=V_{RRM}$	25	mA
Reverse avalanche voltage	$V_{av}$	$I_R=10\text{mA}$	Min. 50	V
Thermal resistance	$R_{th(j-c)}$	Junction to case	0.75	$^\circ\text{C/W}$

\*\*Rating per element

#### ● Mechanical characteristics

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

## ■ Characteristics



λ:Conduction angle of forward current for each rectifier element  
Io:Output current of center-tap full wave connection

