

# YG803C06R (15A)

60V / 15A

## Schottky barrier diode

### Major characteristics

Characteristics	YG803C06	Units	Condition
V <sub>RRM</sub>	60	V	
V <sub>F</sub>	0.48	V	T <sub>j</sub> =125°C, typ
I <sub>o</sub>	15	A	

### Features

- Low V<sub>F</sub>
- Optimized for 3.3V
- 5V output application
- Center tap connection

### Applications

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

### Maximum ratings and characteristics

- Absolute maximum ratings

Item	Symbol	Conditions	Rating	Unit
Repetitive peak surge reverse voltage	V <sub>RSM</sub>	tw=500ns, duty=1/40	60	V
Repetitive peak reverse voltage	V <sub>RRM</sub>		60	V
Isolating voltage	V <sub>iso</sub>	Terminals-to-Case, AC.1min	1500	V
Average output current	I <sub>o</sub>	Square wave, duty=1/2 T <sub>c</sub> =94°C	15 *	A
Non-repetitive surge current	I <sub>FSM</sub>	Sine wave 10ms, 1shot	100	A
Operating junction temperature	T <sub>j</sub>		+150	°C
Storage temperature	T <sub>stg</sub>		-40 to +150	°C

\* Average output current at centertap full wave connection

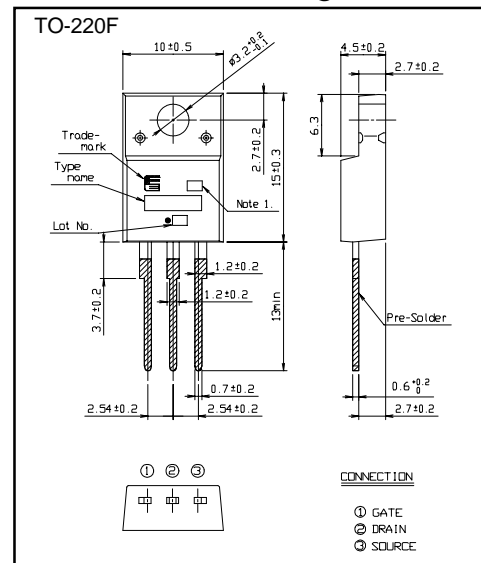
- Electrical characteristics (T<sub>c</sub>=25°C Unless otherwise specified)

Item	Symbol	Conditions	Max.	Unit
Forward voltage drop	V <sub>F</sub>	I <sub>FM</sub> =6A	0.58	V
Reverse current	I <sub>R</sub>	V <sub>R</sub> =V <sub>RRM</sub>	5.0	mA

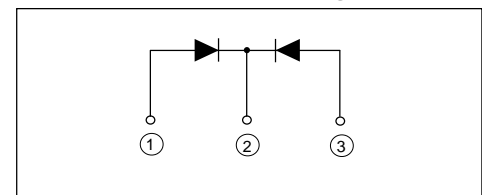
- Electrical characteristics (T<sub>c</sub>=25°C Unless otherwise specified)

Item	Symbol	Condition	Max.	Unit
Thermal resistance	R <sub>th(j-c)</sub>	Junction to case	3.0	°C/W

### Outline drawings, mm

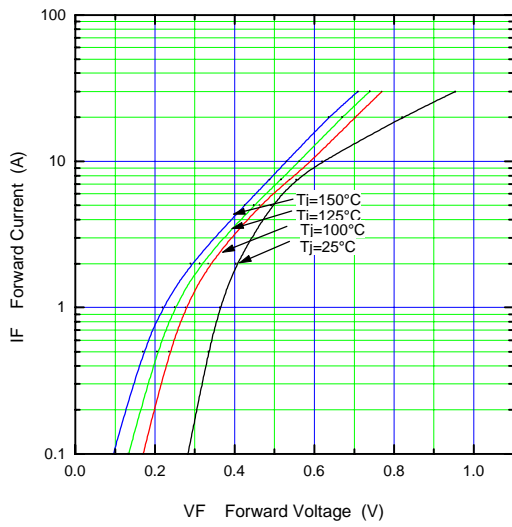


### Connection diagram

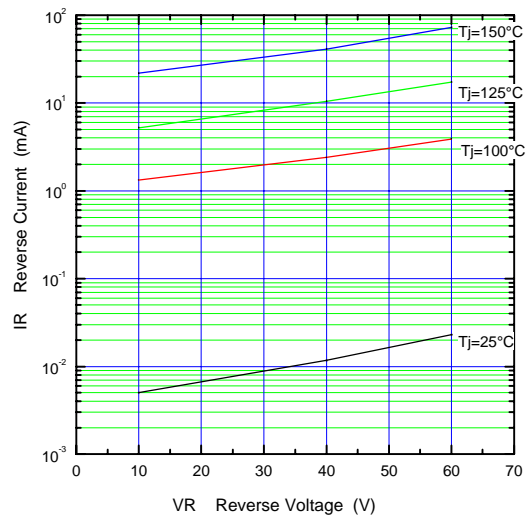


■ Characteristics

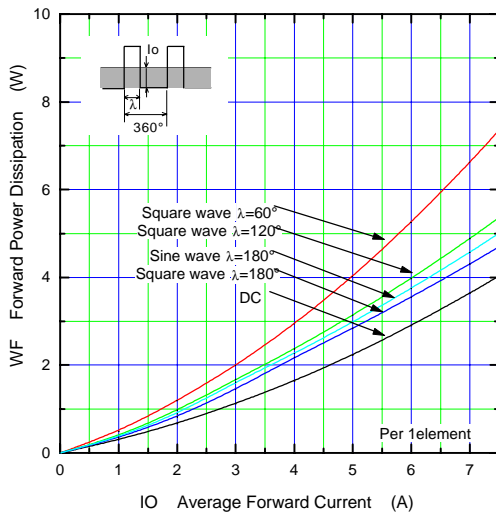
Forward Characteristic (typ.)



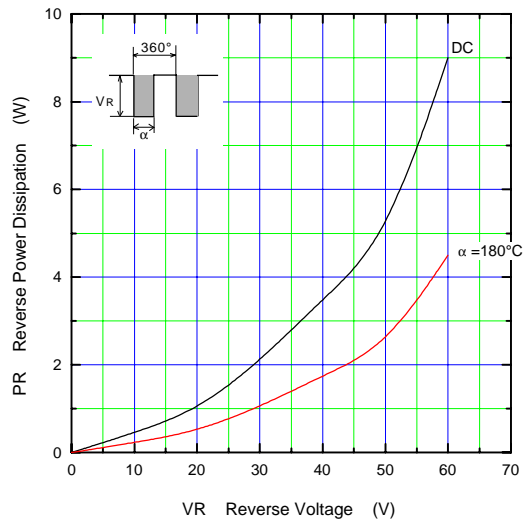
Reverse Characteristic (typ.)



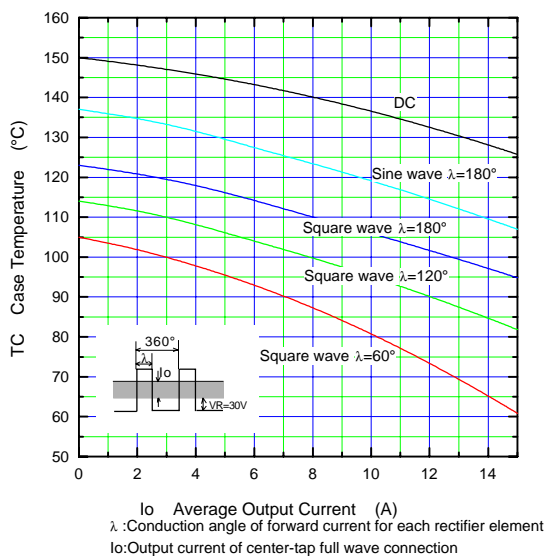
Forward Power Dissipation



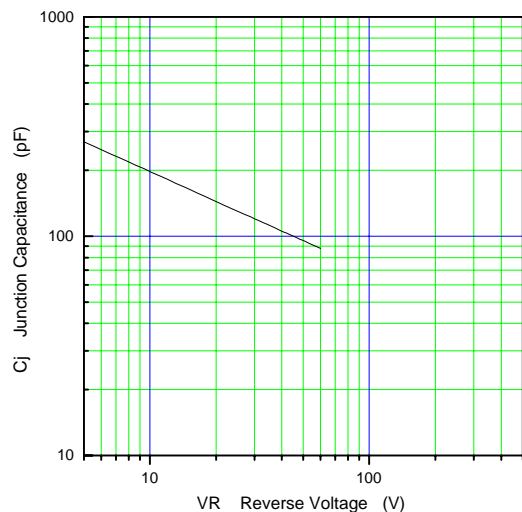
Reverse Power Dissipation



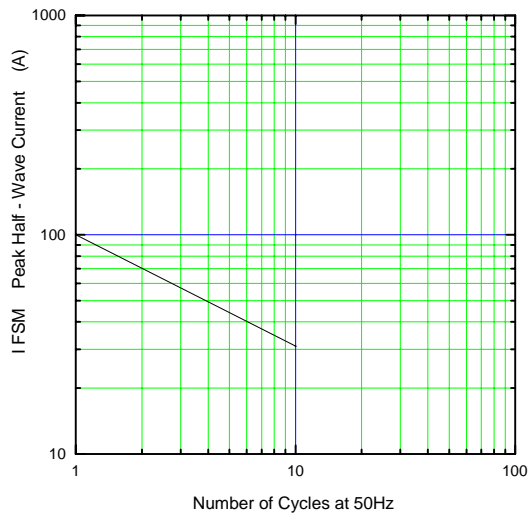
Current Derating (I<sub>o</sub>-T<sub>c</sub>)



Junction Capacitance Characteristic (typ.)



Surge Capability



Transient Thermal Impedance

