

Featured Products

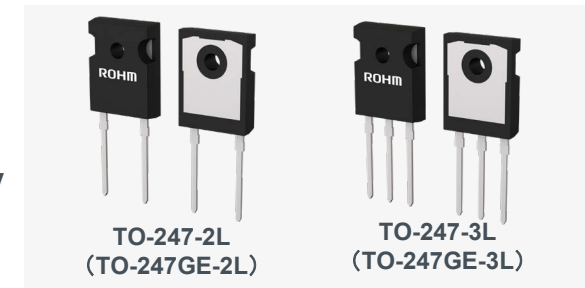


Achieves higher performance with lower switching noise and higher breakdown voltage

650V 4th Gen Fast Recovery Diodes

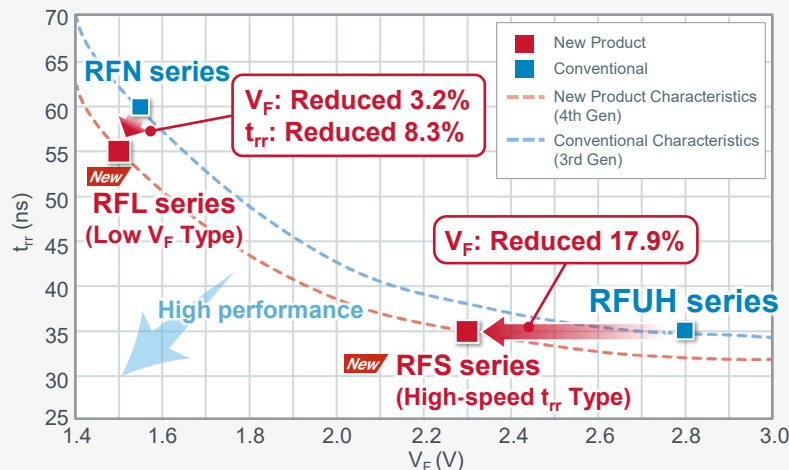
Low V_F Type (RFL series) / High-Speed t_{rr} Type (RFS series)

- Both series provide ultra-low noise switching characteristics according to power supply requirements
 Low V_F Type: RFL series
 High Speed t_{rr} Type: RFS series
- Withstand voltage increased from 600V to 650V, contributing to increased reliability
 Ideal for PFC, secondary rectifier, and inverter circuits
- Improving both V_F and t_{rr} characteristics results in higher efficiency



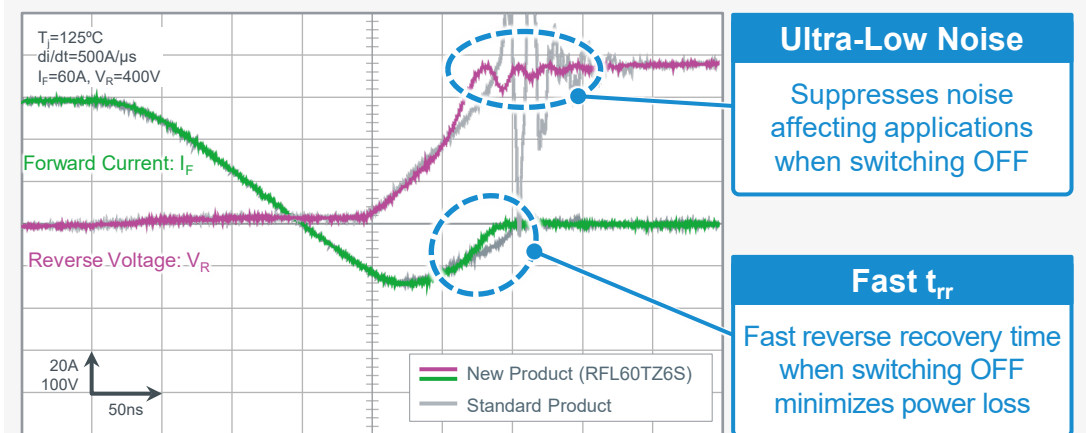
Note: Indicates the JEDEC package notation. () denotes ROHM package type.

■ $V_F \cdot t_{rr}$ Characteristics Comparison




Improving the V_F/t_{rr} characteristics of both series based on the power supply configuration contributes to higher device efficiency

■ Noise Characteristics Comparison

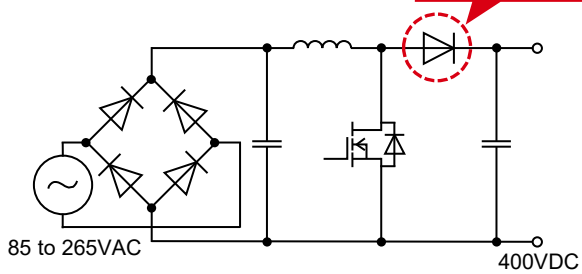


Reduces noise design load by combining ultra-low noise and high-speed t_{rr} characteristics

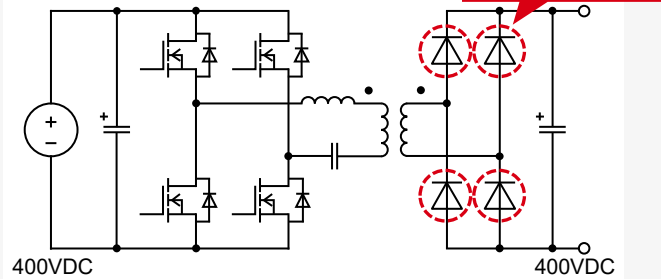
Sample Circuits

A selection page is available that shows the optimum products for various topologies ▶ 

• PFC Circuit





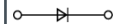

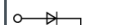

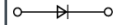

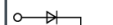
• Secondary Rectifier Circuit



Applications

- PFC circuits in AC, washers, refrigerators, etc.
- Secondary rectifier circuits in EV charging stations and the like.
- Inverter circuits in machine tool robots, compressors, etc.
- Power supplies for servers, base stations, and more.

Lineup

Product No.				Absolute Maximum Ratings (T _c =25°C)				Electrical Characteristics (T _j = 25°C)						Junction Temp T _j (°C) Max	Package	Equivalent Circuit Diagram		
Part No.	Grade Code General	Taping Code	No. of Circuits	V _{RM} (V)	V _R (V)	I _O *1 (A)	I _{FSM} (A)*2 60Hz. 1 	V _F (V) Max	V _R (V) Max	I _R (μA) Max	V _R (V) Max	t _{rr} (ns) Max	I _F (A) Max				I _R (A) Max	
Low V_F Type RFL series (4th Gen)																		
New RFL30TZ6S 	G	C13	1	650	650	30	200	1.5	30	5	650	55	0.5	1	175	TO-247-2L (TO-247GE-2L)		
New RFL60TZ6S 	G	C13						1.5	60	10	650	75	0.5	1				
☆ RFL30TS6D	G	C13	2	650	650	30	100	1.5	15	5	650	45	0.5	1	175	TO-247-3L (TO-247GE-3L)		
☆ RFL60TS6D	G	C13						1.5	30	5	650	55	0.5	1				
High Speed t_{rr} Type RFS series (4th Gen)																		
New RFS30TZ6S 	G	C13	1	650	650	30	160	2.3	30	5	650	35	0.5	1	175	TO-247-2L (TO-247GE-2L)		
New RFS60TZ6S 	G	C13						2.3	60	10	650	55	0.5	1				
☆ RFS30TS6D	G	C13	2	650	650	30	80	2.3	15	5	650	30	0.5	1	175	TO-247-3L (TO-247GE-3L)		
☆ RFS60TS6D	G	C13						2.3	30	5	650	35	0.5	1				

*1: The average current per element is I_O (with one element) or 1/2 I_O (with 2 elements). *2: Standard per element.  Click on the icon to access the product page on ROHM's website. ☆ Under Development
Note: Indicates the JEDEC package notation. () denotes ROHM package type.

ROHM Power Fast Recovery Diodes

Soft Recovery

Ultra-Low V_F Type
RFNL series (3rd Gen)

Soft Recovery **New**

Low V_F Type
RFL series (4th Gen)

Soft Recovery **New**

High-Speed t_{rr} Type
RFS series (4th Gen)

Hard Recovery

High-Speed t_{rr} Type
RFV series (3rd Gen)



ROHM Co., Ltd.

21 Sain Mizosaki-cho, Ukyo-ku,
Kyoto 615-8585 Japan

www.rohm.com

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The information contained in this document is current as of June 1st, 2022.