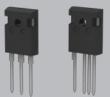


- $V_{\text{CE(sat)}}$ switching loss trade-off improvement
- IGBT, FWD optimized for approximately f_c = 20 kHz operation
- Ideal for 3-level inverters, bridge inverters, and PFC circuits



Package: TO-247, TO-247-4

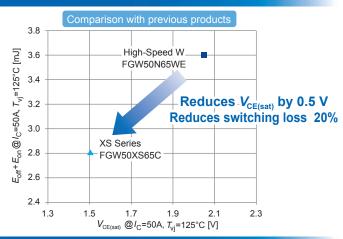
Application example: UPS, power conditioning sub-systems, communication equipment, servers, EV chargers, etc.

1. V_{CE(sat)} – switching loss trade-off improvement

Improves the $V_{\rm CE(sat)}$ – switching loss trade-off by applying our latest 7th generation IGBT technology

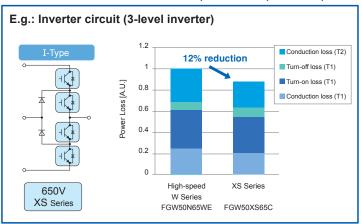


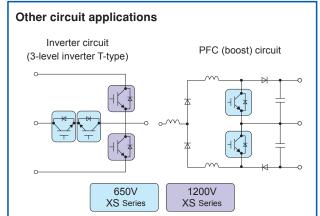
Compared with the High-Speed W Series, it achieves $V_{\mathrm{CE(sat)}}$: 0.5 V reduction Switching loss: 20% reduction



2. Ideal for 3-level inverters, bridge inverters, and PFC circuits

Reduces inverter loss 12% compared with previous products



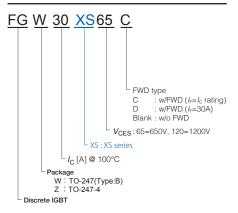


[Loss calculation conditions] f_c =20kHz, V_{dc} =400V, I_c =30Arms, V_{GE} =+15/-8V, T_i =125°C, PF=1.0

Product Line-up

V _{CES}	PKG	Rated current $I_{\mathbb{C}}$				FWD
		30A	40A	50A	75A	1 44 D
650V	TO-247 (Type:B)	FGW30XS65C	FGW40XS65C	FGW50XS65C	FGW75XS65C	$I_{F}=I_{C}$ rating
				FGW50XS65D	FGW75XS65D	<i>I</i> _F =30A
		FGW30XS65	FGW40XS65	FGW50XS65	FGW75XS65	-
	TO-247-4L				FGZ75XS65C	$I_F = I_C$ rating
1200V	TO-247 (Type:B)		FGW40XS120C		FGW75XS120C	I _F =I _C rating
			FGW40XS120		FGW75XS120	-

Type designation



Safety Precautions

*Before using this product, read the "Instruction Manual" and "Specifications" carefully, and consult with the retailer from which you purchased this product as necessary to use this product correctly. *The product must be handled by a technician with the appropriate skills

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