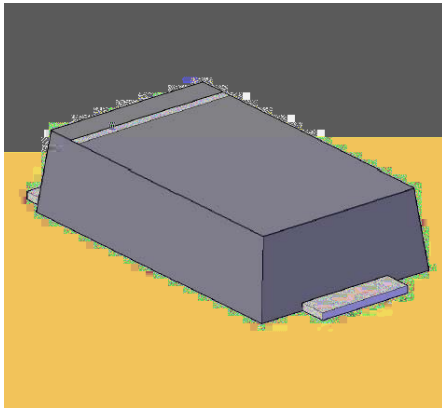


Surface Mount Fast Recovery Rectifier



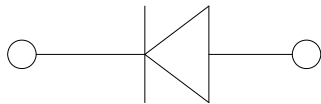
High forward surge capability
Meets MSL level 1, per J-STD-020, LF maximum peak of 260 °C

Typical Applications

For use in fast switching rectification of power supply, inverters, converters, and freewheeling diodes for consumer and telecommunication.

Mechanical Data

- **Package:** SOD-123HE
Molding compound meets UL 94 V-0 flammability rating, RoHS-compliant, halogen-free
- **Terminals:** Tin plated leads, solderable per J-STD-002 and JESD22-B102
- **Polarity:** Cathode line denotes the cathode end



■Maximum Ratings (Ta=25 °C Unless otherwise specified)

PARAMETER	SYMBOL	UNIT	F2AE	F2BE	F2DE	F2GE	F2JE	F2KE	F2ME
Device marking code			F2AE	F2BE	F2DE	F2GE	F2JE	F2KE	F2ME

Average rectified output current @60Hz sine wave, Resistance load, Ta (FIG.1)	IO	A	2.0						
Forward Surge Current (Non-repetitive) @60Hz Half-sine wave,1 cycle, Tj=25	IFSM	A	50						
Forward Surge Current (Non-repetitive) @1ms, square wave, 1 cycle, Tj=25			100						
Current squared time @1ms≤t81	Tstg		-55 ~ +150						

Junction temperature	Tj		-55 ~ +150						
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F2AE THRU F2ME

■Electrical Characteristics $T_a=25$ Unless otherwise specified

PARAMETER	SYMBOL	UNIT	TEST CONDITIONS	F2AE	F2BE	F2DE	F2GE	F2JE	F2KE	F2ME
Maximum instantaneous forward voltage drop per diode	V _F	V	I _{FM} =2.0A	1.3						
Maximum reverse recovery time	t _{rr}	ns	I _F =0.5A, I _R =1.0A, I _{rr} =0.25A	150				250	500	
Maximum DC reverse current at rated DC blocking voltage per diode	I _R	μA	T _j =25	5						
			T _j =125	100						

■Thermal Characteristics $T_a=25$ Unless otherwise specified

PARAMETER	SYMBOL	UNIT	F2AE	F2BE	F2DE	F2GE	F2JE	F2KE	F2ME
Typical Thermal resistance	$R_{\theta J-A}^{(1)}$	$^{\circ}W$	90						

F2AE THRU F2ME

F2AE THRU F2ME

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