Super Fast Recovery Diode

RFN60TS6D Data Sheet

Serise

Standard Fast Recovery

Application

General rectification

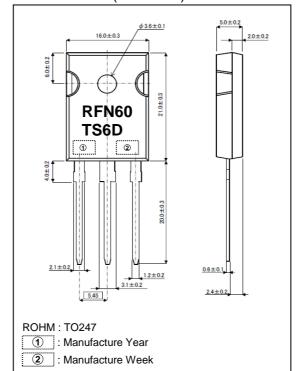
Features

- 1) Low switching loss
- 2) Low forward voltage
- 3) High current overload capacity

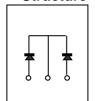
Construction

Silicon epitaxial planar type

●Dimensions (Unit: mm)



Structure



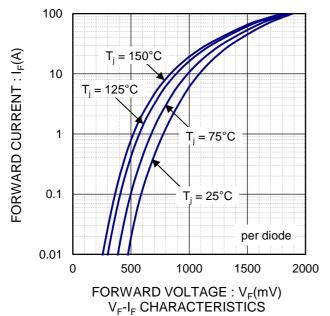
● Absolute maximum ratings (T_c= 25°C)

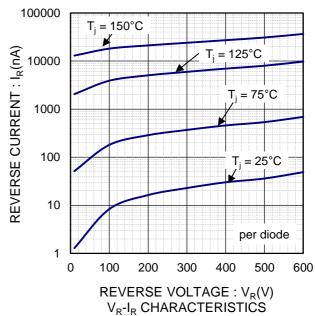
Parameter	Symbol	Conditions		Limits	Unit
Repetitive peak reverse voltage	V_{RM}	Duty≦0.5		600	V
Reverse voltage	V_R	Direct voltage		600	V
Average current	I _o	60Hz half sin wave, Resistive load, 1/2I _o per diode	T _c =72°C	60	А
Non-repetitive forward surge current	I _{FSM}	60Hz half sin wave, Non-repetitive at T _j =25°C, per diode		180	А
Operating junction temperature	T _j	-		150	°C
Storage temperature	T _{stg}	-		-55 to +150	°C

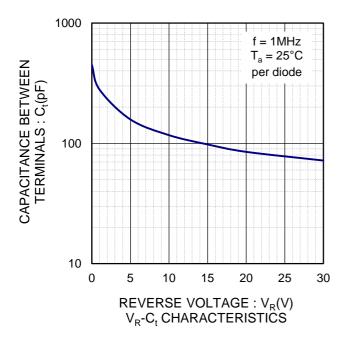
●Electrical characteristics (T_i = 25°C, per diode)

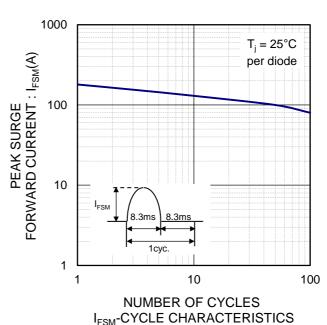
Parameter	Symbol	Conditions	Min.	Тур.	Max.	Unit
Forward voltage	V_{F}	I _F =30A	1.0	1.35	1.55	V
Reverse current	I _R	V _R =600V	-	0.05	10	μΑ
Reverse recovery time	trr	$I_F = 0.5A, I_R = 1A, Irr = 0.25 \times I_R$	-	36	60	ns
Thermal resistance	R _{th(j-c)}	Junction to case	-	-	0.7	°C / W

•Electrical characteristic curves

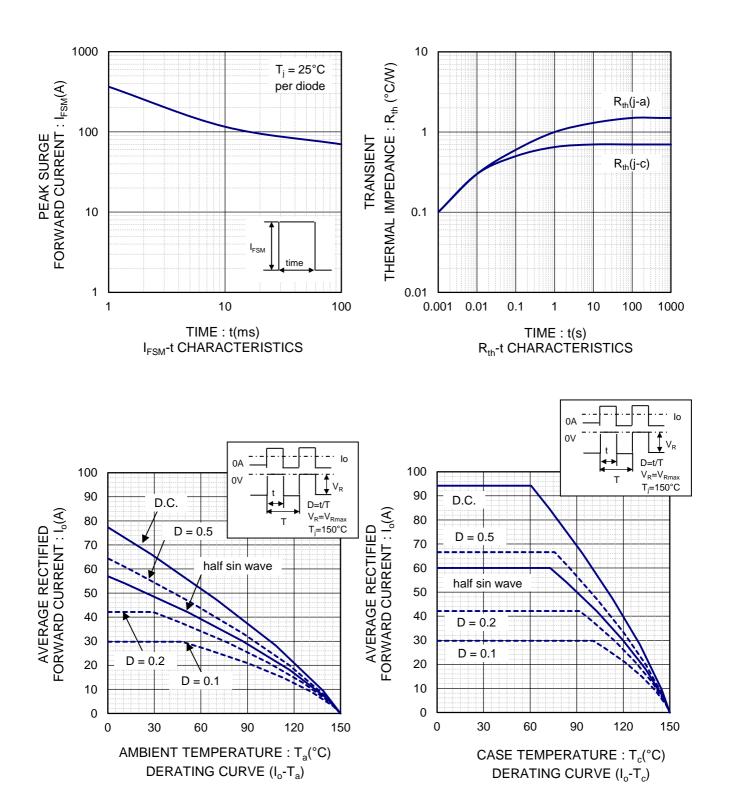




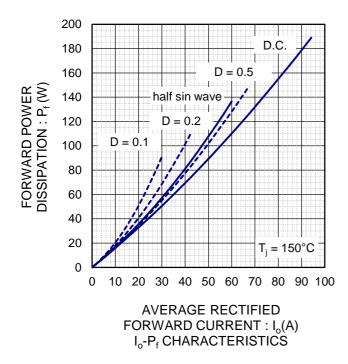




•Electrical characteristic curves



•Electrical characteristic curves



Notes

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