



SANYO Semiconductors

DATA SHEET

DBF250

— Diffused Junction Silicon Diode

25A Single-Phase Bridge Rectifier

Features

- Glass passivation for high reliability.
- Plastic molded structure.
- Peak reverse voltage : $V_{RM}=200, 600V$.
- Average output current : $I_O=25A$.

Specifications

Absolute Maximum Ratings at $T_a=25^{\circ}C$

Parameter	Symbol	Conditions	DBF250C	DBF250G	Unit
Peak Reverse Voltage	V_{RM}		200	600	V
Average Output Current	I_O	$T_c=98^{\circ}C$, With heatsink	→	25	A
		$T_a=25^{\circ}C$, Without heatsink	→	3.5	A
Surge Forward Current	I_{FSM}	50Hz sine 1cycle peak value	→	350	A
Junction Temperature	T_j		→	150	$^{\circ}C$
Storage Temperature	T_{stg}		→	-40 to +150	$^{\circ}C$
Dilective Strength Voltage	V_{dis}	Terminals tc case, AC 1 minute	→	2.5	kV
Tightening Torque	TOR	(): recommended value	→	0.8(0.5)	N•m

Electrical Characteristics at $T_a=25^{\circ}C$ Per Constituent element of bridge.

Parameter	Symbol	Conditions	Ratings			Unit
			min	typ	max	
Forward Voltage	V_F	$I_F=12.5A$			1.05	V
Reverse Current	I_R	$V_R=At$ each V_{RM}			10	μA
Thermal Resistance(Junction-Ambient)	$R_{th(j-a)}$	Without heatsink			22	$^{\circ}C / W$
Thermal Resistance(Junction-Case)	$R_{th(j-c)}$	With heatsink			1	$^{\circ}C / W$
Thermal Resistance(Junction-Lead)	$R_{th(j-l)}$	Without heatsink			5	$^{\circ}C / W$

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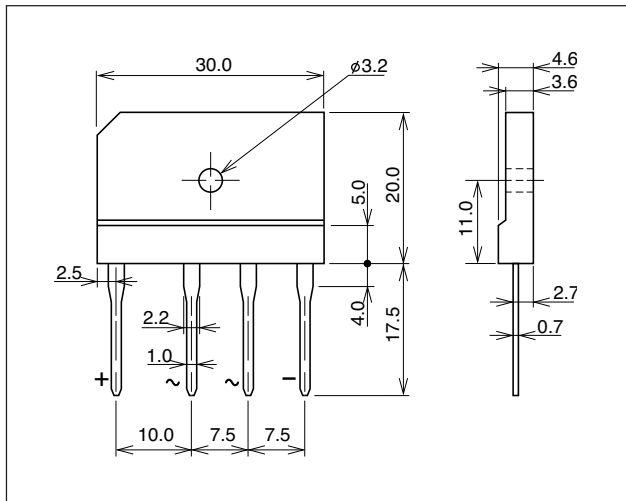
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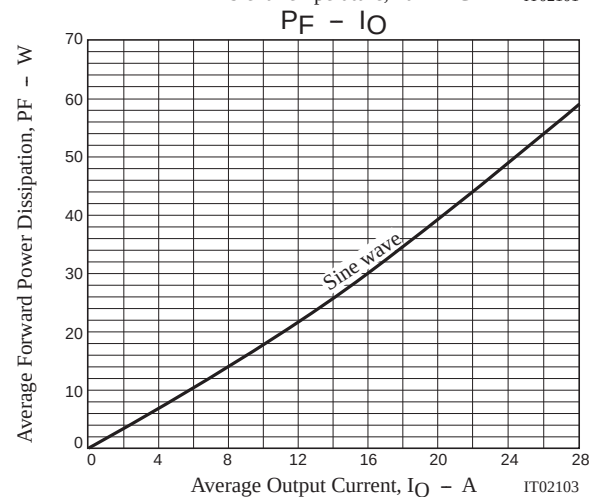
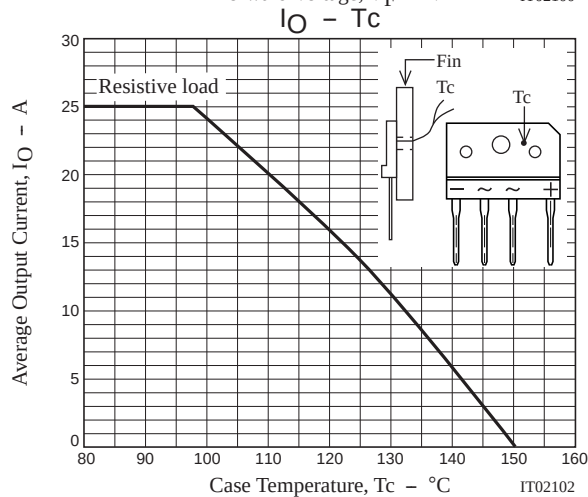
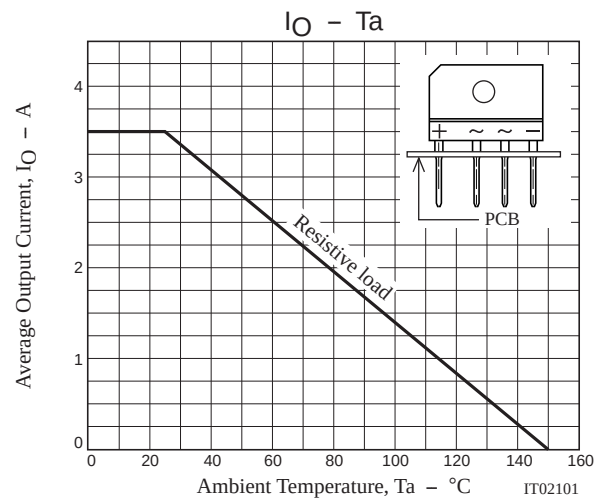
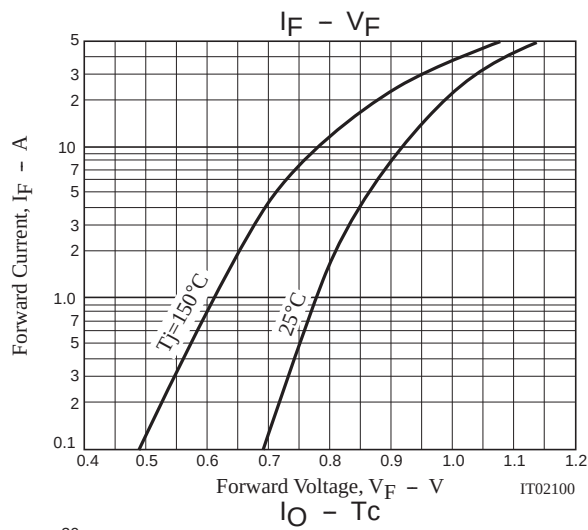
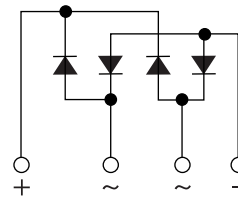
Package Dimensions

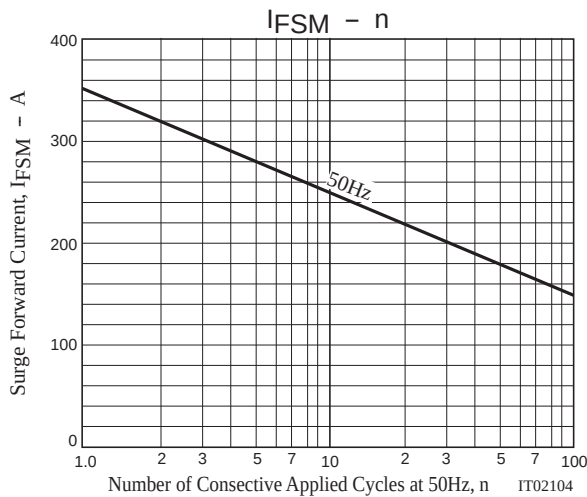
unit : mm (typ)

1191A



Electrical Connection





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