

SANYO Semiconductors DATA SHEET

DBA500G

Diffused Junction Silicon Diode

50A Single-Phase Bridge Rectifier

Features

· Plastic molded structure

Peak reverse voltage: V_{RM}=600V
Average output current: I_O=50A

Specifications

Absolute Maximum Ratings at Tc=25°C

Parameter	Symbol	Conditions	Ratings	Unit
Peak Reverse Voltage	V _{RM}		600	V
Average Output Current	lo	50Hz sine 1cycle peak value, Tc=95°C, with heatsink	50	А
Surge Forward Current	IFSM	50Hz sine wave, non-repetitive, 1cycle peak value, Tj=25°C	500	А
Current Squared Time	l²t	1ms≤t<10ms, Tj=25°C, Rating of per diode	800	A ² s
Junction Temperature	Tj		150	°C
Storage Temperature	Tstg		-40 to +150	°C
Dilective Strength Voltage	Vdis	Terminals tc case, AC 1 minute	2	kV
Tightening Torque	TOR	(): recommended value	0.8(0.6)	N•m

Electrical Characteristics at Tc=25°C Per Constituent element of bridge.

Parameter	Symbol	Conditions	Ratings			Unit
			min	typ	max	Offic
Forward Voltage	VF	IF=25A			1.05	V
Reverse Current	IR	V _R =600V			10	μΑ
Thremal Resistance	Rth(j-c)	With heatsink (Junction-Case)			0.5	°C/W

Marking: BA500G

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Ø3.5

12.8

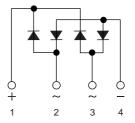
Package Dimensions

unit : mm (typ) 7806-001

100

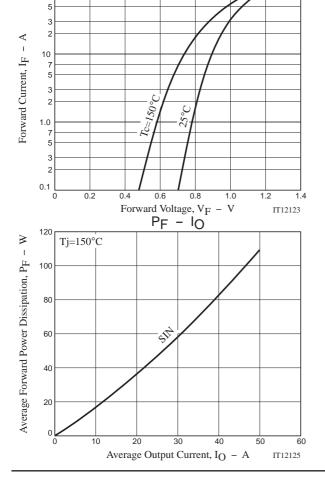
36.0MAX 11.5MAX 11.5MAX 11.5MAX 11.5MAX 12.5 9.0 R1.75 R1

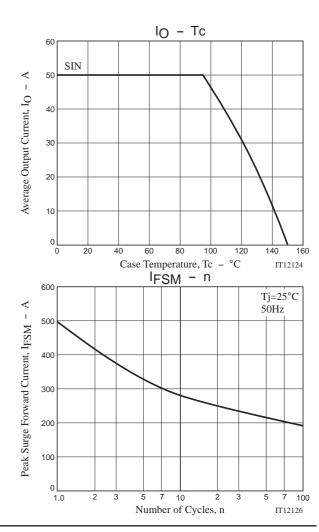
Electrical Connection



IF - VF

7.0





^{*:} In case of over 30A of IO. bigger fasten hole should be filled by solder. Lead-Wire with solder connection also requested for over 30A of IO.

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