

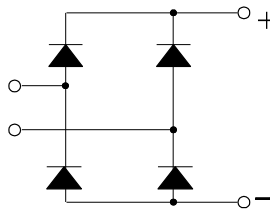
Single Phase Rectifier Bridge

PSB 25T PSB 25TN

$I_{dAVM} = 21 \text{ A}$
 $V_{RRM} = 1200 \text{ V to } 2200 \text{ V}$

Preliminary Data Sheet

V_{RSM} V	V_{RRM} V	Type Number	
		Gold-plated terminals	Nickel-plated terminals
1200	1200	PSB 25T/12	PSB 25TN/12
1400	1400	PSB 25T/14	PSB 25TN/14
1600	1600	PSB 25T/16	PSB 25TN/16
1800	1800	PSB 25T/18	PSB 25TN/18
2000	2000	PSB 25T/20	PSB 25TN/20
2200	2200	PSB 25T/22	PSB 25TN/22



Symbol	Test Conditions		Maximum Ratings	
I_{dAVM}	$T_c = 63^\circ\text{C}$ per module		21	A
I_{FSM}	$T_{vj} = 45^\circ\text{C}$, $V_R = 0 \text{ V}$	$t = 10 \text{ ms}$	50 Hz, sine	380 A
	$T_{vj} = T_{vjM}$, $V_R = 0 \text{ V}$	$t = 10 \text{ ms}$	50 Hz, sine	360 A
$\int i^2 dt$	$T_{vj} = 45^\circ\text{C}$, $V_R = 0 \text{ V}$	$t = 10 \text{ ms}$	50 Hz, sine	725 A ² s
T_{vj}			-40 ... +150	$^\circ\text{C}$
T_{vjM}			150	$^\circ\text{C}$
T_{stg}			-40 ... +150	$^\circ\text{C}$
V_{isol}	50/60 Hz, RMS	$t = 1 \text{ min}$	2500	V~
	$I_{isol} \leq 1 \text{ mA}$	$t = 1 \text{ s}$	3000	V~
M_d	Mounting torque	(M5)	2±10%	Nm
		(10-32 UNF)	18±10%	lb in
Weight	typ.		20	g

Features

- ¼" gold- or nickel-plated FASTON terminals
- Isolation voltage 3000 V~
- Mesa glass-passivated chips
- Blocking voltage up to 2200 V
- Low forward voltage drop
- UL registered E 148688

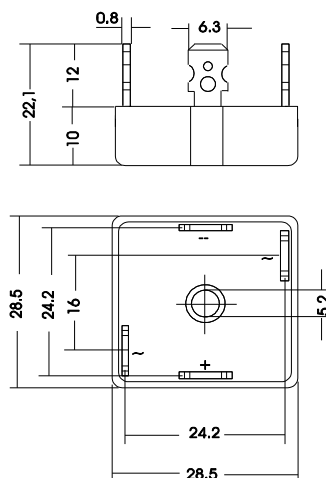
Applications

- Supplies for DC power equipment
- Input rectifiers for PWM inverters
- Battery DC power supplies
- Field supply of DC motors

Advantages

- Easy to mount with one screw
- Space and weight savings
- Improved temperature and power cycling capability

Package style and outline



Dimensions in mm (1mm = 0.0394")

Symbol	Test Conditions		Characteristic Value	
I_R	$V_R = V_{RRM}$	$T_{vj} = 25^\circ\text{C}$	$\leq$	0.3 mA
	$V_R = V_{RRM}$	$T_{vj} = T_{vjM}$	$\leq$	5.0 mA
V_F	$I_F = 150 \text{ A}$	$T_{vj} = 25^\circ\text{C}$	$\leq$	2.2 V
V_{TO}	For power-loss calculations only			0.85 V
r_T	$T_{vj} = T_{vjM}$			12 mΩ
$R_{th(j-c)}$	per diode; DC current			8.2 K/W
	per module			2.05 K/W
$R_{th(j-s)}$	per diode; DC current			9.4 K/W
	per module			2.35 K/W
d_s	Creeping distance on surface			12.7 mm
d_A	Creeping distance on air			9.4 mm
a	Maximum allowable acceleration			50 m/s ²

Data according to IEC 60747 refers to a single diode unless otherwise stated