

# SHINDENGEN

## Schottky Rectifiers (SBD)

Modules

# D180SC4M

**40V 180A**

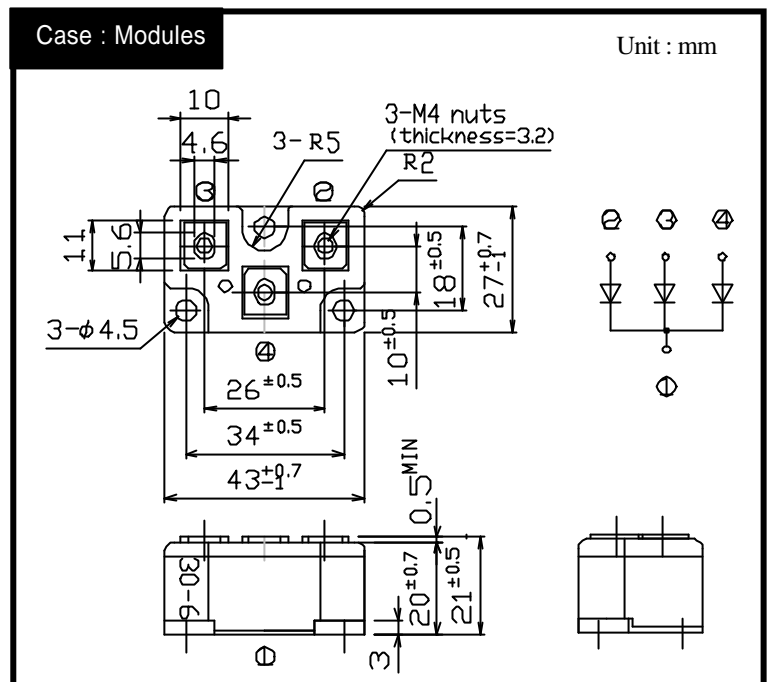
### FEATURES

- High capacity modules
- Low VF
- Small  $j_c$

### APPLICATION

- Big switching power supply
- DC/DC converter
- Mainframe
- IC tester

### OUTLINE DIMENSIONS



### RATINGS

Absolute Maximum Ratings (If not specified  $T_c=25$  )

Item	Symbol	Conditions	Ratings	Units
Storage Temperature	$T_{stg}$		-40 ~ 125	
Operating Junction Temperature	$T_j$		125	
Maximum Reverse Voltage	$V_{RM}$		40	V
Repetitive Peak Surge Reverse Voltage	$V_{RRSM}$	Pulse width 100ms, duty 1/100	48	V
Average Rectified Forward Current	$I_o$	50Hz sine wave, R-load, Rating for each diode $I_o/3$ , $T_c=83$	180	A
Peak Surge Forward Current	$I_{FSM}$	50Hz sine wave, Non-repetitive 1cycle peak value, Rating of per diode $T_j=125$	800	A
Mounting Torque	TOR		1.7	N·m

Electrical Characteristics (If not specified  $T_c=25$  )

Item	Symbol	Conditions	Ratings	Units
Forward Voltage	$V_F$	$I_F=60A$ , Pulse measurement, Rating of per diode	Max.0.58	V
Reverse Current	$I_R$	$V_R=V_{RM}$ , Pulse measurement, Rating of per diode	Max.40	mA
Junction Capacitance	$C_j$	$f=1MHz$ , $V_R=10V$ , Rating of per diode	TYP 2.1	nF
Thermal Resistance	$j_c$	junction to case	Max.0.25	/W
	$cf$	case to heatsink, Mounting torque = 1.7N·m	Max.0.12	