# Schottky Barrier Diode

RB540VM-40 Data Sheet

# Application

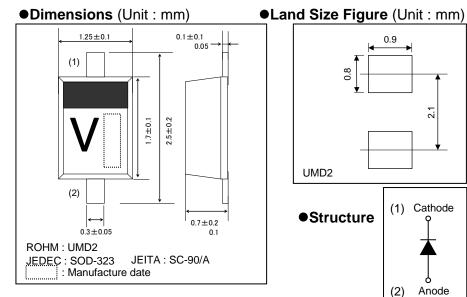
General rectification

#### Features

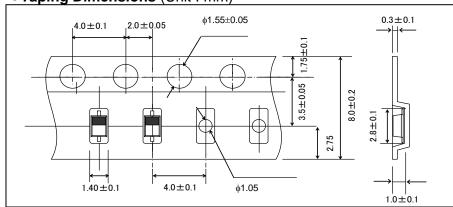
- Ultra small mold type (UMD2)
- 2) High reliability
- 3) Low V<sub>F</sub>

#### Construction

Silicon epitaxial planar type



● Taping Dimensions (Unit: mm)



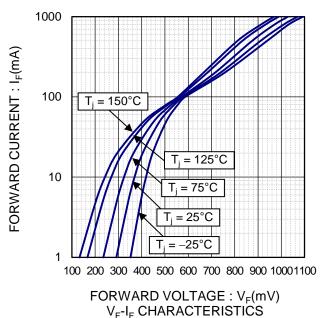
## ● Absolute Maximum Ratings (T<sub>c</sub>= 25°C)

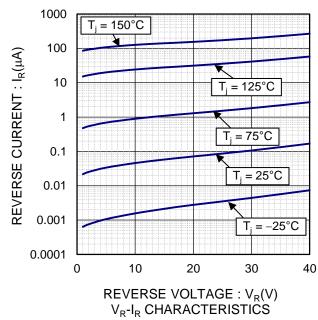
Parameter	Symbol	Conditions	Limits	Unit	
Repetitive peak reverse voltage	$V_{RM}$	Duty≦0.5	40	V	
Reverse voltage	$V_R$	Direct reverse voltage	40	V	
Average forward rectified current	I <sub>o</sub>	Glass epoxy board mounted, 60Hz half sin wave, resistive load	200	mA	
Non-repetitive forward current surge peak	I <sub>FSM</sub>	60Hz half sin wave, Non-repetitive at T <sub>a</sub> =25°C , 1cycle	1000	mA	
Operating junction temperature	T <sub>j</sub>	-	150	°C	
Storage temperature	T <sub>stg</sub>	-	-55 to +150	°C	

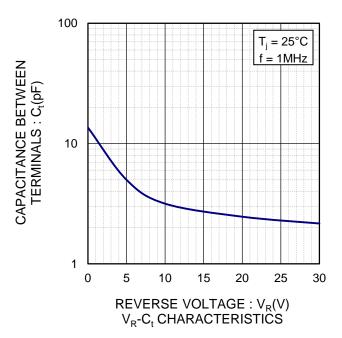
## ●Electrical Characteristics (T<sub>i</sub>= 25°C)

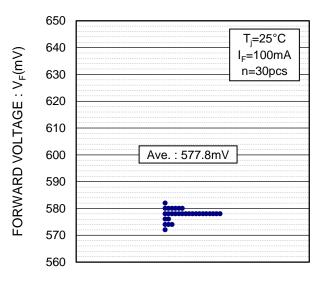
Parameter	Symbol	Conditions	Min.	Тур.	Max.	Unit
Forward voltage	$V_{F}$	I <sub>F</sub> =100mA	ı	ı	0.71	V
Reverse current	I <sub>R</sub>	V <sub>R</sub> =40V	ı	ı	15	μΑ

## • Electrical Characteristic Curves



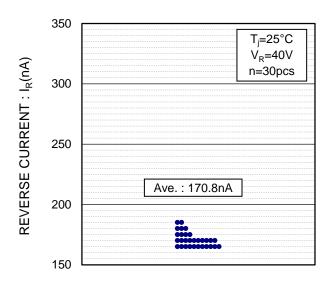


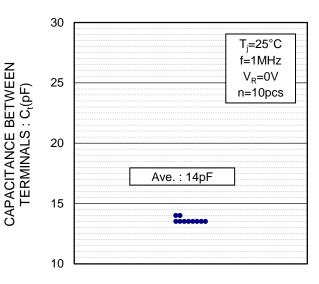




V<sub>F</sub> DISPERSION MAP

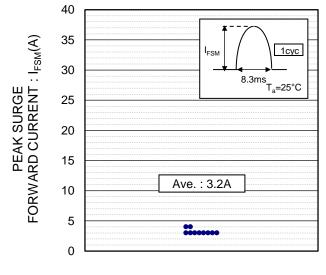
## **•**Electrical Characteristic Curves



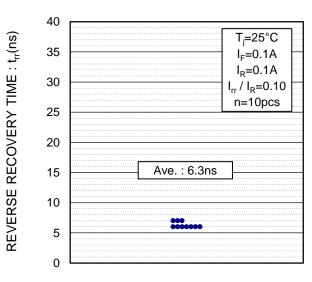


I<sub>R</sub> DISPERSION MAP

Ct DISPERSION MAP

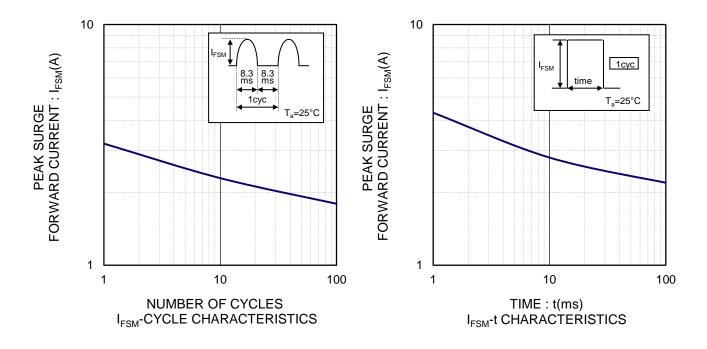


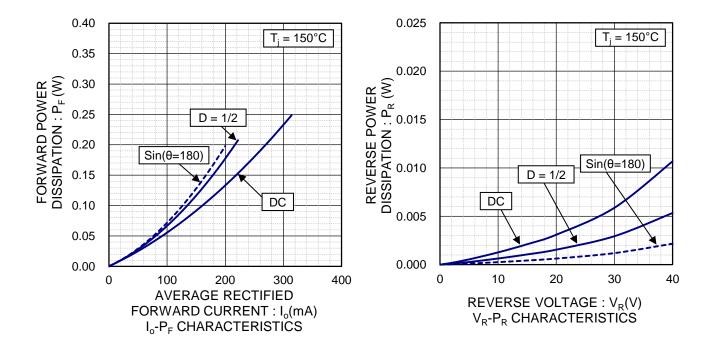
I<sub>FSM</sub> DISPERSION MAP



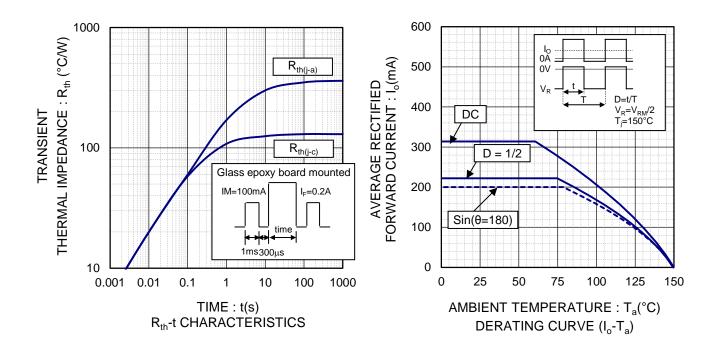
t<sub>rr</sub> DISPERSION MAP

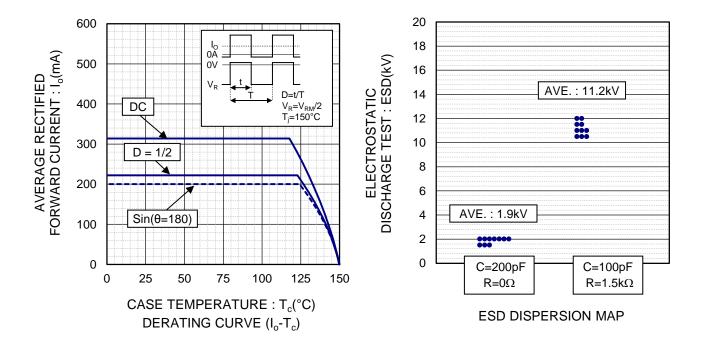
#### • Electrical Characteristic Curves





## **•**Electrical Characteristic Curves





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