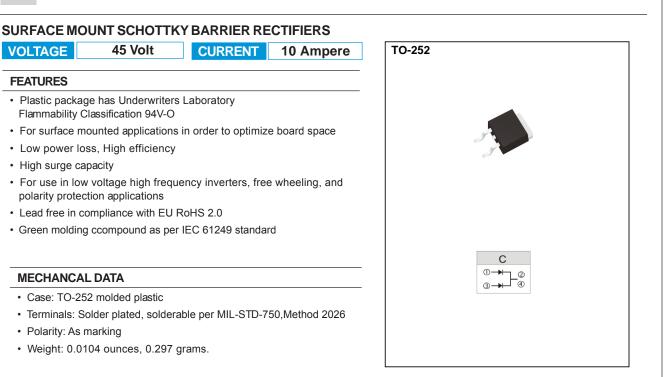


FEATURES



MAXIMUM RATINGS(TA=25°C unless otherwise noted)

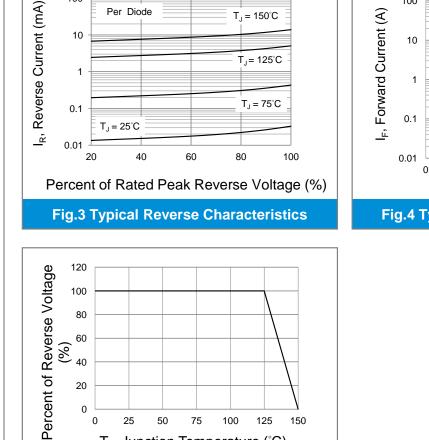
PARAMETER			VALUE	UNIT
Maximum Recurrent Peak Reverse Voltage			45	V
Maximum RMS Voltage			32	V
Maximum DC Blocking Voltage			45	V
Maximum Average Rectified Output Current	per device per diode	I F(AV)	10 5	A
Peak Forward Surge Current : 8.3ms single half sine-wave superimposed on rated load			80	Α
Typical Thermal Resistance		Reuc	8	∘C/W
Operating Junction Temperature Range And Storage Temperature Range		Тј,Тѕтс	-55 to + 150	°C

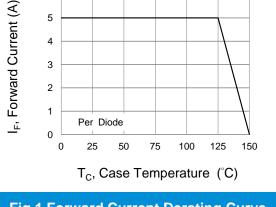
NOTE : 1.Mounted on 10cm x 10cm x 0.5mm copper pad area

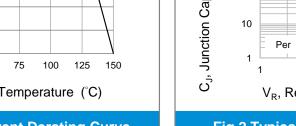
ELECTRICAL CHARACTERISTICS (TA=25 C unless otherwise noted)

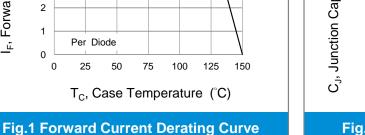
PARAMETER	SYMBOL	TEST CONDITIONS		MIN.	TYP.	MAX.	UNIT
Breakdown voltage	Vbr	I R=0.5mA	TA=25°C	45	-	-	V
Instantaneous forward voltage	VF		Ta=25°C	- - -	0.34 0.42 0.49	- - 0.54	V
		I F=1A I F=3A	T₄=125°C	-	0.26 0.39	-	V
Reverse current	l r	VR=36V		-	25	-	μΑ
		V _R =45V	TA=25°C TA=125°C	-	- 5	210	μA mA











T_J = 150°C

. T_J = 125°C

T_J = 75°C

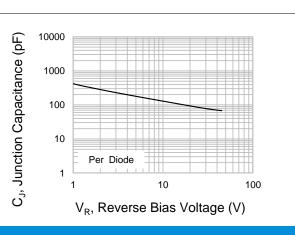


Fig.2 Typical Junction Capacitance

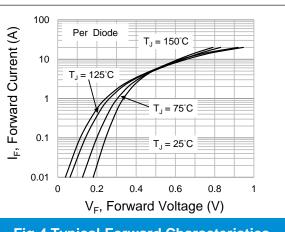
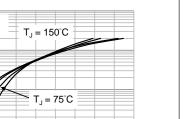


Fig.4 Typical Forward Characteristics







SDM1045CS

6

100

10

1

0.1

0 0

25

50

75

T_J, Junction Temperature (°C)

Fig.5 Operating Temperature Derating Curve

100

125

150

Per Diode



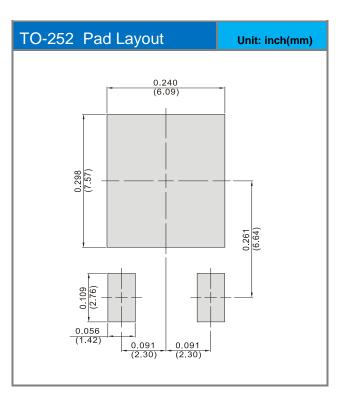


SDM1045CS

Part No Packing Code Version

Part No Packing Code	Package Type	Packing Type	Marking	Version	
SDM1045CS_S2_00001	TO-252	3K / 13" Reel	SDM1045CS	Halogen free	

Packaging Information & Mounting Pad Layout







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