SC5024,SC5028,SC5040
50A, 20-24V,24-32V,38-42V
AVALANCHE SOZA CELL

FEATURES

High current capability

Low forward voltage drop

Low leakage current

High surge current capability

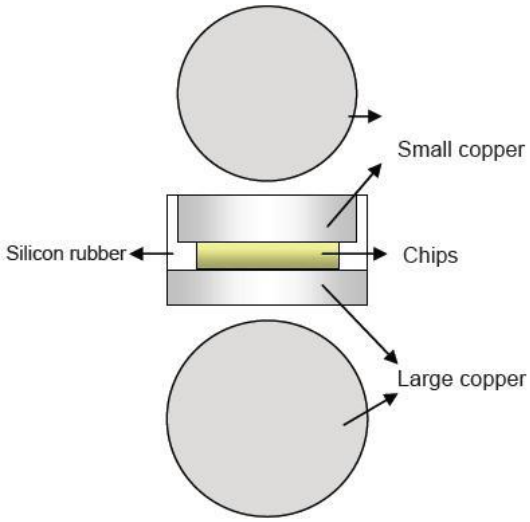
MECHANICAL DATA

Small copper：ψ0.258(6.55) x 0.0394(1.0)Thick

Large copper：ψ0.284(7.22) x 0.0295(0.75)Thick

Outline information：ψ0.284(7.22) x 0.0866(2.2)Thick

SC



Dimension in inches(millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating at 25℃ Ambient temp. Unless otherwise specified.Single phase, half sine wave, 60HZ,resistive or inductive load.

For capacitive load, derate current by 20%

	SYMBOL	SC5024	SC5028	SC5040	UNITS
Maximum Current Peak Reverse Voltage	VRRM	16	20	34	Volts
Working Peak Reverse Voltage	VRWM	16	20	34	Volts
Maximum DC Blocking Voltage	VDC	16	20	34	Volts
Breakdown voltage Min@ IBR=100mA/TA=25℃	VBRL	20	24	38	Volts
Breakdown voltage Max@ IBR=100mA/TA=25℃	VBRH	24	32	42	Volts
T_L=125℃ Maximum Average Forward Rectified Current	I(AV)	50			Amps
Peak Forward Surge Current 8.3ms Single Sine-wave on Rated Load (JEDEC Method)	IFSM	500			Amps
Maximum Instantaneous Forward Voltage Drop at 50A DC	VF	1.0			Volts
T_A=25℃ Maximum DC Reverse Current at Rated DC Blocking Voltage	IR	0.2			uA
IF=10mA Forward Voltage Temperature Coefficient	VFTS	2			mV/℃
Operating AND Storage Temperature Range	TSTG/ TJ	-55 to +150			℃

NOTE: 1.Measured at 1 MHz and Applied Reverse Voltage of 4.0 Volts D.C.

RATING ANDCHARACTERISTIC CURVES SC5024 THRU SC5040

FIG. 1 –MAXIMUM AVERAGE FORWARD CURRENT DERATING

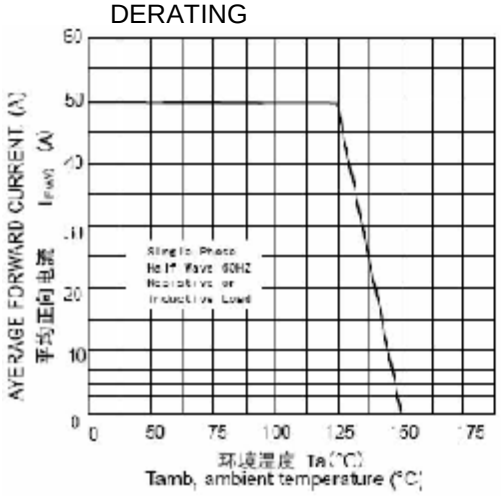


FIG. 2 –MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

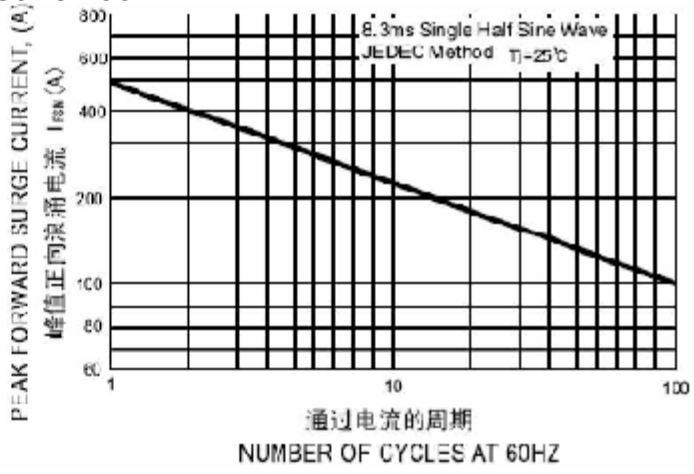


FIG. 3 – PULSE WAVEFORM

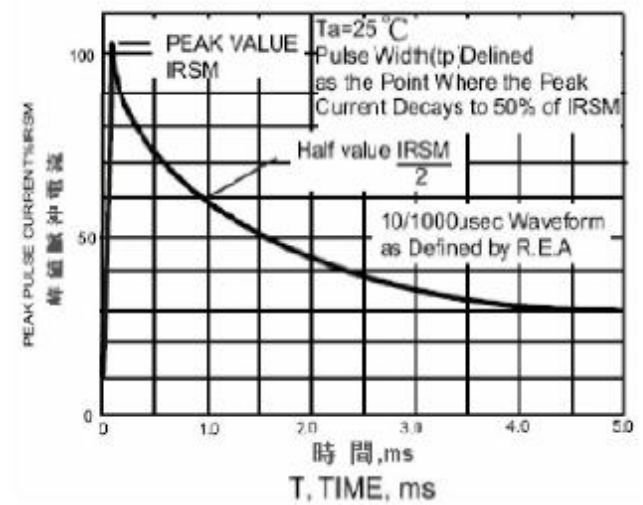


FIG.4 – TYPICA FORWARD CHARACTERISTICS

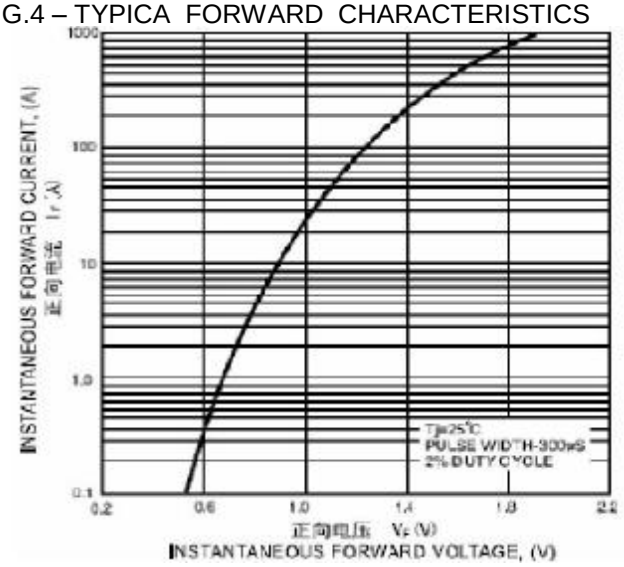


FIG.5–PULSE RATING CURVE