

Part Number Add C For Bi-Directional (Note 5)	Reverse Standoff Voltage	Breakdown Voltage V _{BR} @ I _T (Note 6)		Test Current	Max. Reverse Leakage @ V _{RWM} (Note 7)	Max. Clamping Voltage @ I _{pp}	Max. Peak Pulse Current I _{pp}	Marking Code	
	V _{RWM} (V)	Min (V)	Max (V)	I _T (mA)	I _R (μA)	V _C (V)	(A)	BI-	UNI-
SMCJ5.0(C)A	5.0	6.40	7.25	10	1000	9.2	163.0	BDE	GDE
SMCJ6.0(C)A	6.0	6.67	7.67	10	1000	10.3	145.6	BDG	GDG
SMCJ6.5(C)A	6.5	7.22	8.30	10	500	11.2	133.9	BDK	GDK
SMCJ7.0(C)A	7.0	7.78	8.95	10	200	12.0	125.0	BDM	GDM
SMCJ7.5(C)A	7.5	8.33	9.58	1.0	100	12.9	116.3	BDP	GDP
SMCJ8.0(C)A	8.0	8.89	10.23	1.0	50	13.6	110.3	BDR	GDR
SMCJ8.5(C)A	8.5	9.44	10.82	1.0	20	14.4	104.2	BDT	GDT
SMCJ9.0(C)A	9.0	10.00	11.50	1.0	10	15.4	97.4	BDV	GDV
SMCJ10(C)A	10.0	11.10	12.80	1.0	5.0	17.0	88.2	BDX	GDX
SMCJ11(C)A	11.0	12.20	14.40	1.0	5.0	18.2	82.4	BDZ	GDZ
SMCJ12(C)A	12.0	13.30	15.30	1.0	5.0	19.9	75.3	BEE	GEE
SMCJ13(C)A	13.0	14.40	16.50	1.0	5.0	21.5	69.7	BEG	GEG
SMCJ14(C)A	14.0	15.60	17.90	1.0	5.0	23.2	64.7	BEK	GEK
SMCJ15(C)A	15.0	16.70	19.20	1.0	5.0	24.4	61.5	BEM	GEM
SMCJ16(C)A	16.0	17.80	20.50	1.0	5.0	26.0	57.7	BEP	GEP
SMCJ17(C)A	17.0	18.90	21.70	1.0	5.0	27.6	53.3	BER	GER
SMCJ18(C)A	18.0	20.00	23.30	1.0	5.0	29.2	51.4	BET	GET
SMCJ20(C)A	20.0	22.20	25.50	1.0	5.0	32.4	46.3	BEV	GEV
SMCJ22(C)A	22.0	24.40	28.00	1.0	5.0	35.5	42.2	BEX	GEX
SMCJ24(C)A	24.0	26.70	30.70	1.0	5.0	38.9	38.6	BEZ	GEZ
SMCJ26(C)A	26.0	28.90	33.20	1.0	5.0	42.1	35.6	BFE	GFE
SMCJ28(C)A	28.0	31.10	35.80	1.0	5.0	45.4	33.0	BFG	GFG
SMCJ30(C)A	30.0	33.30	38.30	1.0	5.0	48.4	31.0	BFK	GFK
SMCJ33(C)A	33.0	36.70	42.20	1.0	5.0	53.3	28.1	BFM	GFM
SMCJ36(C)A	36.0	40.00	46.00	1.0	5.0	58.1	25.8	BFP	GFP
SMCJ40(C)A	40.0	44.40	51.10	1.0	5.0	64.5	23.2	BFR	GFR
SMCJ43(C)A	43.0	47.80	54.90	1.0	5.0	69.4	21.6	BFT	GFT
SMCJ45(C)A	45.0	50.00	57.50	1.0	5.0	72.7	20.6	BFV	GFV
SMCJ48(C)A	48.0	53.30	61.30	1.0	5.0	77.4	19.4	BFX	GFX
SMCJ51(C)A	51.0	56.70	65.20	1.0	5.0	82.4	18.2	BFZ	GFZ
SMCJ54(C)A	54.0	60.00	69.00	1.0	5.0	87.1	17.2	BGE	GGE
SMCJ58(C)A	58.0	64.40	74.60	1.0	5.0	93.6	16.0	BGG	GGG
SMCJ60(C)A	60.0	66.70	76.70	1.0	5.0	96.8	15.5	BGK	GGK
SMCJ64(C)A	64.0	71.10	81.80	1.0	5.0	103.0	14.6	BGM	GGM
SMCJ70(C)A	70.0	77.80	89.50	1.0	5.0	113.0	13.3	BGP	GGP
SMCJ75(C)A	75.0	83.30	95.80	1.0	5.0	121.0	12.4	BGR	GGR
SMCJ78(C)A	78.0	86.70	99.70	1.0	5.0	126.0	11.4	BGT	GGT
SMCJ85(C)A	85.0	94.40	108.20	1.0	5.0	137.0	10.4	BGV	GGV
SMCJ90(C)A	90.0	100.00	115.50	1.0	5.0	146.0	10.3	BGX	GGX
SMCJ100(C)A	100.0	111.00	128.00	1.0	5.0	162.0	9.3	BGZ	GGZ
SMCJ110(C)A	110.0	122.00	140.50	1.0	5.0	177.0	8.4	BHE	GHE
SMCJ120(C)A	120.0	133.00	153.00	1.0	5.0	193.0	7.9	BHG	GHG
SMCJ130(C)A	130.0	144.00	165.50	1.0	5.0	209.0	7.2	BHK	GHK
SMCJ150(C)A	150.0	167.00	192.50	1.0	5.0	243.0	6.2	BHM	GHM
SMCJ160(C)A	160.0	178.00	205.00	1.0	5.0	259.0	5.8	BHP	GHP
SMCJ170(C)A	170.0	189.00	217.50	1.0	5.0	275.0	5.5	BHR	GHR

Notes: 5. Suffix C denotes Bi-directional device.
6. V_{BR} measured with I_T current pulse = 300μs
7. For Bi-Directional devices having V_{RWM} of 10V and under, the I_R is doubled.

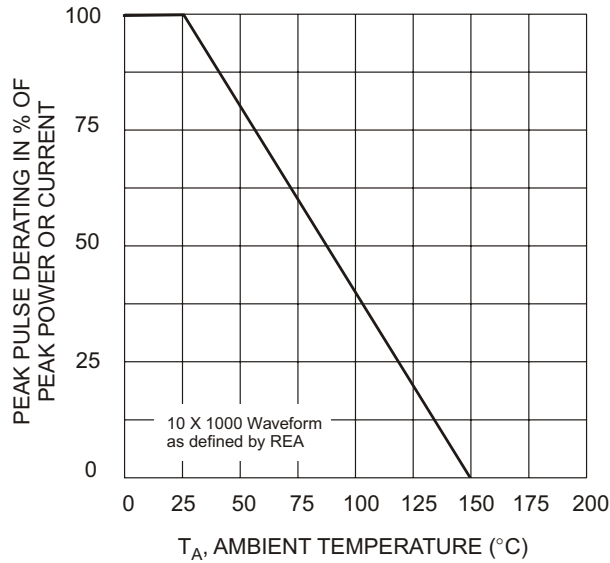


Fig. 1 Pulse Derating Curve

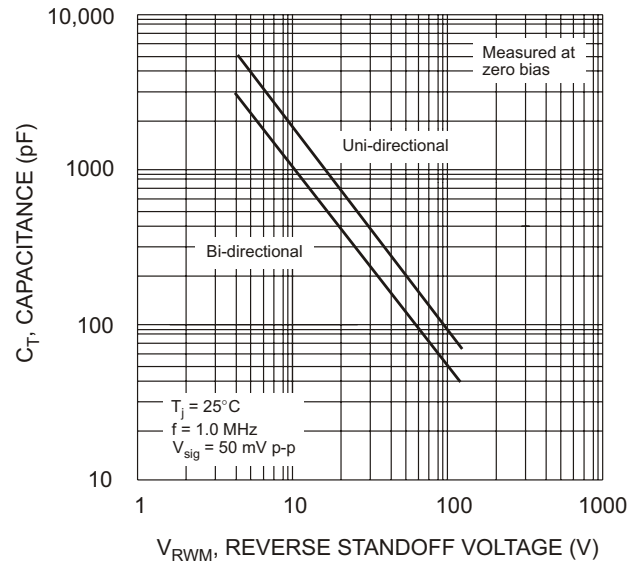


Fig. 2 Typical Total Capacitance

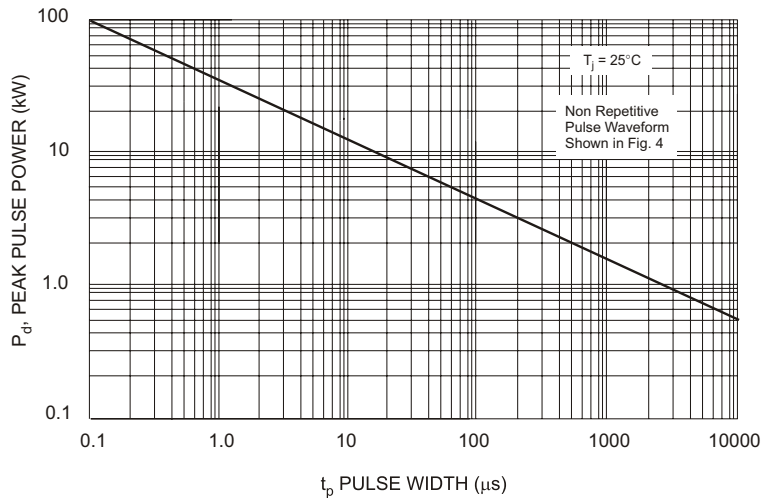


Fig. 3 Pulse Rating Curve

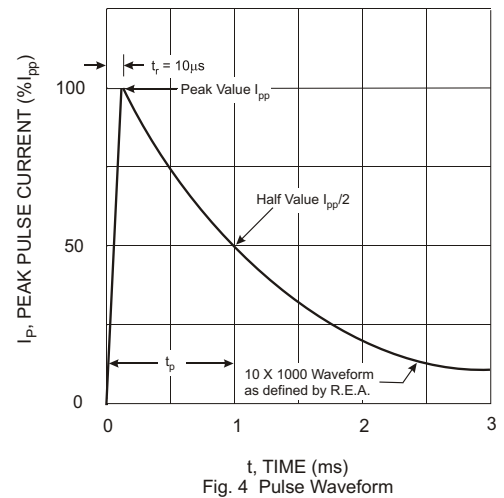


Fig. 4 Pulse Waveform

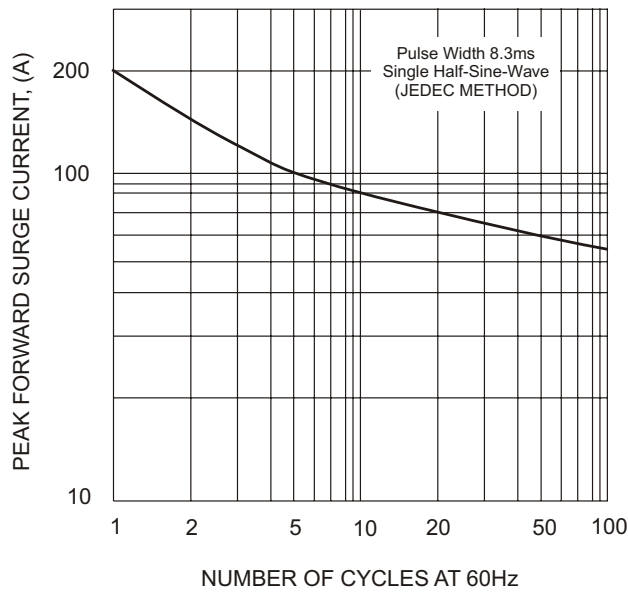


Fig. 5, Maximum Non-Repetitive Surge Current

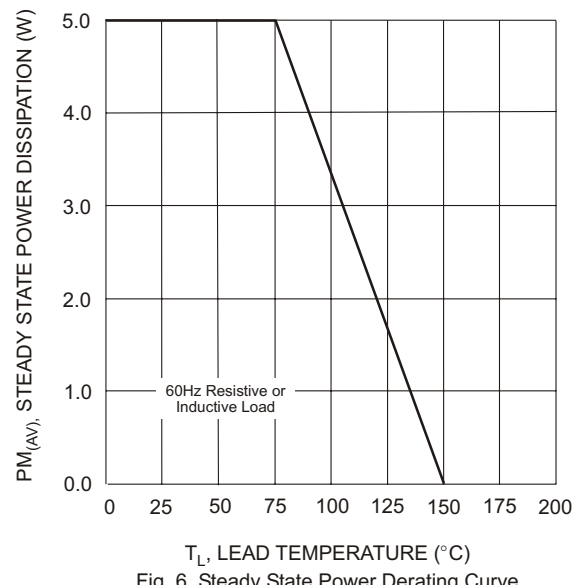
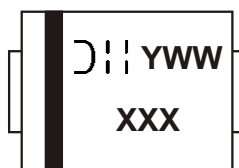


Fig. 6 Steady State Power Derating Curve

Ordering Information (Note 8)

Device	Packaging	Shipping
SMCJXXX(C)A-13	SMC	5000/Tape & Reel

Notes: 8. For Packaging Details, go to our website at <http://www.diodes.com/datasheets/ap02007.pdf>.
9. For Lead Free Finish/RoHS Compliant version part number, please add "-F" suffix to the part number above. Example: SMCJ170A-13-F.

Marking Information

XXX = Product type marking code (See Page 2)
D||| = Manufacturers' code marking
YWW = Date code marking
Y = Last digit of year ex: 2 for 2002
WW = Week code 01 to 52