

HCSC


Snubber capacitor for IGBT (Lug terminals)



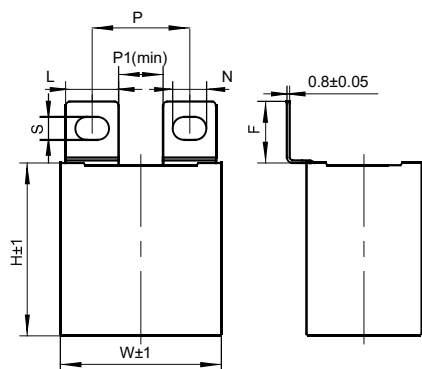
Features

- Excellent active and passive flame resistances
- Low loss and small inherent temperature rise
- Excellent electrical performance
- Square plastic case, sealed with epoxy resin (UL94 V-0)

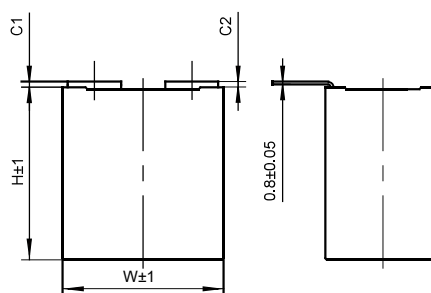
Safety Approvals

	UL	UL810	0.047μF-10μF,max 3000Vd.c. max 105°C File No.: E222132,CCN:CZDS2
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Outline Drawing



Style 1



Style 2

Note: The dimensions of the product are in mm units.
Outline dimensions can be found in the Product Dimensions Table.

Specifications

Reference standard	GB/T 17702 (IEC 61071)	
Climatic category	40/85/56	
Operating temperature range	-40°C~+85°C	
Rated voltage	630Vd.c.~2500Vd.c.	
Capacitance range	0.047μF~10μF	
Capacitance tolerance	±5%(J),±10%(K)	
Voltage proof	1.6U _N (10s)	
Dissipation factor	≤0.0005(1kHz,20°C)	
Insulation resistance (IR×C _N)	IR≥100000MΩ,C _N ≤0.33μF IR×C _N ≥30000s,C _N >0.33μF	(20°C,100Vd.c,1min)
Expected lifetime	≥100,000h@U _N ,Θ _{hs} =70°C	

Ordering Information

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22																				
<table border="1"><tr><td>H</td><td>C</td><td>S</td><td>C</td></tr></table>				H	C	S	C	<table border="1"><tr><td>/</td></tr></table>	/	<table border="1"><tr><td></td><td></td></tr></table>				<table border="1"><tr><td></td><td></td><td></td></tr></table>						<table border="1"><tr><td></td></tr></table>		<table border="1"><tr><td></td></tr></table>		<table border="1"><tr><td></td></tr></table>		<table border="1"><tr><td></td></tr></table>		<table border="1"><tr><td></td><td></td><td></td></tr></table>						<table border="1"><tr><td>(</td><td>x</td><td>x</td><td>x</td><td>)</td></tr></table>			(x	x	x)
H	C	S	C																																						
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(x	x	x)																																					
Series code				AC rated voltage		Rated capacitance value		Capacitance tolerance		Installation hole		Internal code		Width of case		Terminal code		Style of solder slice		Size of solder slice		Special code																			
						For example: 154=15×10 ⁴ pF =0.15μF				See table 1								See table 2				To identify when the special requirements needed																			
				<table border="1"><tr><td>2J=630V</td></tr></table>		2J=630V			J=±5%						<table border="1"><tr><td>2=37mm</td></tr></table>		2=37mm																								
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				<table border="1"><tr><td>1V=700V</td></tr></table>		1V=700V			K=±10%						<table border="1"><tr><td>3=42mm</td></tr></table>		3=42mm																								
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				<table border="1"><tr><td>1W=850V</td></tr></table>		1W=850V									<table border="1"><tr><td>5=57.5mm</td></tr></table>		5=57.5mm																								
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				<table border="1"><tr><td>3A=1000V</td></tr></table>		3A=1000V																																			
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				<table border="1"><tr><td>3L=1200V</td></tr></table>		3L=1200V																																			
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				<table border="1"><tr><td>3C=1600V</td></tr></table>		3C=1600V																																			
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				<table border="1"><tr><td>7M=1700V</td></tr></table>		7M=1700V																																			
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				<table border="1"><tr><td>3D=2000V</td></tr></table>		3D=2000V																																			
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				<table border="1"><tr><td>3E=2500V</td></tr></table>		3E=2500V																																			
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Table 1 Installation Pitch Code

Digit 12			
Width of case	Distance of hole for fixing		The distance of solder slice
W (mm)	P (mm)	Code	P1 (mm)
37/42	16 ~ 24	1	6
	21 ~ 29	4	11
57.5	31 ~ 39	9	21
	36 ~ 44	B	26

Table 2 Terminal Code

Digit 15			Digit 16		Digit 17	
Terminal height			Connector style		Connector size	
C1	C2	Code	Outline Dimensions	Code	LxFxNxS	Code
(C1=C2)<3mm		0	Style1	1	14.0mmx16.0mmx10.2mmx6.2mm	0
C1=C2=6mm		1	Style2	2		

Outline Dimensions

630Vd.c./700Vd.c.(420Va.c.)#									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
0.68	37.0	25.0	15.0	900	612	5.0	9	23	HCSC/2J684-*02***(+++)
1.0	37.0	30.0	16.0	900	900	5.0	12	23	HCSC/2J105-*02***(+++)
1.2	37.0	30.0	16.0	900	1080	4.5	14	23	HCSC/2J125-*02***(+++)
1.5	37.0	34.0	20.0	900	1350	4.5	17	23	HCSC/2J155-*02***(+++)
1.8	37.0	34.0	20.0	900	1620	4.5	18	23	HCSC/2J185-*02***(+++)
1.2	42.0	33.0	18.0	600	720	4.5	12	29	HCSC/2J125-*03***(+++)
1.5	42.0	33.0	18.0	600	900	4.5	14	29	HCSC/2J155-*03***(+++)
2.0	42.0	40.0	20.0	600	1200	4.0	18	29	HCSC/2J205-*03***(+++)
2.2	42.0	40.0	20.0	600	1320	4.0	18.5	29	HCSC/2J225-*03***(+++)

Note: (1) "#"when the rated voltage is 700Vd.c.,the digit 6~7 is 1V;
 (2) "ESR","Ls" are typical values.

Outline Dimensions

630Vd.c./700Vd.c.(420Va.c.)#									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
2.5	42.0	40.0	20.0	600	1500	4.0	19	29	HCSC/2J255-*03***(+++)
3.0	42.0	44.0	24.0	600	1800	4.0	20	29	HCSC/2J305-*03***(+++)
3.3	42.0	44.0	24.0	600	1980	3.5	20	29	HCSC/2J335-*03***(+++)
4.0	42.0	44.0	24.0	600	2400	3.5	21	29	HCSC/2J405-*03***(+++)
4.7	42.0	45.0	30.0	600	2820	3.5	23	29	HCSC/2J475-*03***(+++)
5.0	42.0	45.0	30.0	600	3000	3.0	23.5	29	HCSC/2J505-*03***(+++)
6.0	57.5	45.0	25.0	360	2160	2.5	22.5	33	HCSC/2J605-*05***(+++)
6.5	57.5	45.0	30.0	360	2340	2.5	24	33	HCSC/2J655-*05***(+++)
6.8	57.5	45.0	30.0	360	2448	2.5	24.5	33	HCSC/2J685-*05***(+++)
7.0	57.5	45.0	30.0	360	2520	2.5	25	33	HCSC/2J705-*05***(+++)
8.0	57.5	50.0	35.0	360	2880	2.5	27	33	HCSC/2J805-*05***(+++)
8.2	57.5	50.0	35.0	360	2952	2.5	27	33	HCSC/2J825-*05***(+++)
9.0	57.5	50.0	35.0	360	3240	2.5	29	33	HCSC/2J905-*05***(+++)
10.0	57.5	50.0	35.0	360	3600	2.5	30	34	HCSC/2J106-*05***(+++)
850Vd.c.(450Va.c.)									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
0.47	37.0	25.0	15.0	1200	564	5.0	9	23	HCSC/1W474-*02***(+++)
0.68	37.0	30.0	16.0	1200	816	5.0	12	23	HCSC/1W684-*02***(+++)
1.0	37.0	34.0	20.0	1200	1200	5.0	14	23	HCSC/1W105-*02***(+++)
1.2	37.0	34.0	20.0	1200	1440	5.0	16	23	HCSC/1W125-*02***(+++)
1.5	37.0	34.0	20.0	1200	1800	5.0	18	23	HCSC/1W155-*02***(+++)
1.0	42.0	33.0	18.0	750	750	5.0	12.5	29	HCSC/1W105-*03***(+++)
1.2	42.0	33.0	18.0	750	900	5.0	14.5	29	HCSC/1W125-*03***(+++)
1.5	42.0	40.0	20.0	750	1125	4.5	18.5	29	HCSC/1W155-*03***(+++)
2.0	42.0	40.0	20.0	750	1500	4.5	19	29	HCSC/1W205-*03***(+++)
2.2	42.0	40.0	20.0	750	1650	4.5	19.5	29	HCSC/1W225-*03***(+++)
2.5	42.0	44.0	24.0	750	1875	4.5	20	29	HCSC/1W255-*03***(+++)
3.0	42.0	44.0	24.0	750	2250	4.5	21	29	HCSC/1W305-*03***(+++)
3.3	42.0	45.0	30.0	750	2475	4.5	21.5	29	HCSC/1W335-*03***(+++)

Note: (1) The above are normal types, for the special types, please contact with relative person;
(2) "ESR", "Ls" are typical values.

Outline Dimensions

850Vd.c.(450Va.c.)									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
4.0	42.0	46.0	35.0	750	3000	4.5	22	29	HCSC/1W405-*03***(+++)
4.7	42.0	50.0	35.0	750	3525	4.5	23.5	29	HCSC/1W475-*03***(+++)
3.3	57.5	45.0	25.0	450	1485	4.0	19	33	HCSC/1W335-*05***(+++)
4.0	57.5	45.0	25.0	450	1800	4.0	23	33	HCSC/1W405-*05***(+++)
4.7	57.5	45.0	30.0	450	2115	4.0	24.5	33	HCSC/1W475-*05***(+++)
5.0	57.5	45.0	30.0	450	2250	4.0	25	33	HCSC/1W505-*05***(+++)
5.6	57.5	50.0	35.0	450	2520	4.0	25	33	HCSC/1W565-*05***(+++)
6.0	57.5	50.0	35.0	450	2700	4.0	26	33	HCSC/1W605-*05***(+++)
6.5	57.5	50.0	35.0	450	2925	4.0	27	33	HCSC/1W655-*05***(+++)
6.8	57.5	50.0	35.0	450	3060	4.0	28	33	HCSC/1W685-*05***(+++)
8.2	57.5	55.0	45.0	450	3690	4.0	33	33	HCSC/1W825-*05***(+++)
1000Vd.c.(500Va.c.)									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
0.47	37.0	25.0	15.0	1300	611	5.0	9	23	HCSC/3A474-*02***(+++)
0.68	37.0	30.0	16.0	1300	884	5.0	10.5	23	HCSC/3A684-*02***(+++)
0.82	37.0	30.0	16.0	1300	1066	5.0	12	23	HCSC/3A824-*02***(+++)
1.0	37.0	34.0	20.0	1300	1300	4.5	15	23	HCSC/3A105-*02***(+++)
1.2	37.0	34.0	20.0	1300	1560	4.5	17	23	HCSC/3A125-*02***(+++)
0.82	42.0	33.0	18.0	850	697	5.0	11	29	HCSC/3A824-*03***(+++)
1.0	42.0	33.0	18.0	850	850	5.0	13	29	HCSC/3A105-*03***(+++)
1.2	42.0	40.0	20.0	850	1020	4.5	16	29	HCSC/3A125-*03***(+++)
1.5	42.0	40.0	20.0	850	1275	4.5	16	29	HCSC/3A155-*03***(+++)
2.0	42.0	44.0	24.0	850	1700	4.5	17	29	HCSC/3A205-*03***(+++)
2.2	42.0	44.0	24.0	850	1870	4.0	20	29	HCSC/3A225-*03***(+++)
2.5	42.0	45.0	30.0	850	2125	4.0	21	29	HCSC/3A255-*03***(+++)
3.0	42.0	45.0	30.0	850	2550	4.0	21.5	29	HCSC/3A305-*03***(+++)
3.3	42.0	50.0	35.0	850	2805	4.0	22	29	HCSC/3A335-*03***(+++)
3.0	57.5	45.0	25.0	500	1500	4.0	18	33	HCSC/3A305-*05***(+++)
3.3	57.5	45.0	30.0	500	1650	4.0	20	33	HCSC/3A335-*05***(+++)

Note: (1) The above are normal types, for the special types, please contact with relative person;
(2) "ESR","Ls" are typical values.

Outline Dimensions

1000Vd.c.(500Va.c.)									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
4.0	57.5	45.0	30.0	500	2000	4.0	21	33	HCSC/3A405-*05***(+++)
4.7	57.5	50.0	35.0	500	2350	4.0	22	33	HCSC/3A475-*05***(+++)
5.0	57.5	50.0	35.0	500	2500	4.0	23	33	HCSC/3A505-*05***(+++)
5.6	57.5	55.0	45.0	500	2800	4.0	24	33	HCSC/3A565-*05***(+++)
1200Vd.c.(600Va.c.)									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
0.33	37.0	25.0	15.0	1500	495	4.5	9	23	HCSC/3L334-*02***(+++)
0.47	37.0	30.0	16.0	1500	705	4.5	11	23	HCSC/3L474-*02***(+++)
0.68	37.0	34.0	20.0	1500	1020	4.5	12.5	23	HCSC/3L684-*02***(+++)
0.75	37.0	34.0	20.0	1500	1125	4.5	13	23	HCSC/3L754-*02***(+++)
0.82	42.0	40.0	20.0	950	779	4.0	14.5	29	HCSC/3L824-*03***(+++)
1.0	42.0	40.0	20.0	950	950	4.0	16	29	HCSC/3L105-*03***(+++)
1.2	42.0	44.0	24.0	950	1140	4.0	19	29	HCSC/3L125-*03***(+++)
1.5	42.0	44.0	24.0	950	1425	4.0	19.5	29	HCSC/3L155-*03***(+++)
2.0	42.0	45.0	30.0	950	1900	4.0	20	29	HCSC/3L205-*03***(+++)
2.2	42.0	46.0	35.0	950	2090	4.0	21	29	HCSC/3L225-*03***(+++)
2.2	57.5	45.0	30.0	600	1320	3.8	20	33	HCSC/3L225-*05***(+++)
2.5	57.5	45.0	30.0	600	1500	3.8	21	33	HCSC/3L255-*05***(+++)
3.0	57.5	45.0	30.0	600	1800	3.8	22	33	HCSC/3L305-*05***(+++)
3.3	57.5	50.0	35.0	600	1980	3.8	23	33	HCSC/3L335-*05***(+++)
4.0	57.5	50.0	35.0	600	2400	3.8	24	33	HCSC/3L405-*05***(+++)
1600Vd.c.(650Va.c.)									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
0.22	37.0	25.0	15.0	1900	418	6.0	8	23	HCSC/3C224-*02***(+++)
0.33	37.0	30.0	16.0	1900	627	6.0	10	23	HCSC/3C334-*02***(+++)
0.39	37.0	34.0	20.0	1900	741	5.5	12	23	HCSC/3C394-*02***(+++)
0.47	37.0	34.0	20.0	1900	893	5.5	14	23	HCSC/3C474-*02***(+++)
0.68	42.0	40.0	20.0	1250	850	4.0	16	29	HCSC/3C684-*03***(+++)

Note: (1) The above are normal types, for the special types, please contact with relative person;
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Outline Dimensions

1600Vd.c.(650Va.c.)									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
0.82	42.0	44.0	24.0	1250	1025	4.0	19	29	HCSC/3C824-*03***(+++)
1.0	42.0	45.0	30.0	1250	1250	4.0	19.5	29	HCSC/3C105-*03***(+++)
1.2	42.0	45.0	30.0	1250	1500	4.0	20	29	HCSC/3C125-*03***(+++)
1.5	42.0	43.0	42.0	1250	1875	4.0	21	29	HCSC/3C155-*03***(+++)
1.5	57.5	45.0	25.0	750	1125	3.5	22	33	HCSC/3C155-*05***(+++)
2.0	57.5	50.0	35.0	750	1500	3.5	24	33	HCSC/3C205-*05***(+++)
2.5	57.5	50.0	35.0	750	1875	3.5	30	33	HCSC/3C255-*05***(+++)
1700Vd.c.(675Va.c.)									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
0.15	37.0	25.0	15.0	2000	300	7.0	7	23	HCSC/7M154-*02***(+++)
0.22	37.0	30.0	16.0	2000	440	6.0	9	23	HCSC/7M224-*02***(+++)
0.33	37.0	34.0	20.0	2000	660	5.5	11.5	23	HCSC/7M334-*02***(+++)
0.39	37.0	34.0	20.0	2000	780	5.5	13	23	HCSC/7M394-*02***(+++)
0.47	42.0	36.0	24.0	1260	592	4.0	14	29	HCSC/7M474-*03***(+++)
0.56	42.0	36.0	24.0	1260	706	4.0	15.5	29	HCSC/7M564-*03***(+++)
0.68	42.0	44.0	24.0	1260	857	3.5	18	29	HCSC/7M684-*03***(+++)
0.82	42.0	44.0	24.0	1260	1033	3.5	19	29	HCSC/7M824-*03***(+++)
1.0	42.0	45.0	30.0	1260	1260	3.5	20	29	HCSC/7M105-*03***(+++)
1.0	57.5	45.0	25.0	780	780	3.5	18	33	HCSC/7M105-*05***(+++)
1.2	57.5	45.0	30.0	780	936	3.5	19	33	HCSC/7M125-*05***(+++)
1.5	57.5	45.0	30.0	780	1170	3.0	22	33	HCSC/7M155-*05***(+++)
2.0	57.5	50.0	35.0	780	1560	3.0	24	33	HCSC/7M205-*05***(+++)
2.5	57.5	55.0	45.0	780	1950	3.0	25	33	HCSC/7M255-*05***(+++)
3.0	57.5	55.0	45.0	780	2340	3.0	28	33	HCSC/7M305-*05***(+++)

Note: (1) The above are normal types, for the special types, please contact with relative person;
(2) "ESR", "Ls" are typical values.

Outline Dimensions

2000Vd.c.(700Va.c.)									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
0.10	37.0	25.0	15.0	2241	224.1	8.0	7	23	HCSC/3D104-*02***(+++)
0.15	37.0	25.0	15.0	2241	336.15	8.0	8.5	23	HCSC/3D154-*02***(+++)
0.22	37.0	30.0	16.0	2241	493.02	6.0	10	23	HCSC/3D224-*02***(+++)
0.33	37.0	34.0	20.0	2241	739.53	6.0	13	23	HCSC/3D334-*02***(+++)
0.47	42.0	40.0	20.0	1300	611	4.0	15.5	29	HCSC/3D474-*03***(+++)
0.56	42.0	44.0	24.0	1300	728	4.0	18	29	HCSC/3D564-*03***(+++)
0.68	42.0	44.0	24.0	1300	884	3.5	18.5	29	HCSC/3D684-*03***(+++)
0.82	42.0	45.0	30.0	1300	1066	3.5	19	29	HCSC/3D824-*03***(+++)
1.0	42.0	50.0	35.0	1300	1300	3.5	21	29	HCSC/3D105-*03***(+++)
1.0	57.5	45.0	30.0	850	850	4.0	24	33	HCSC/3D105-*05***(+++)
1.2	57.5	45.0	30.0	850	1020	4.0	23	33	HCSC/3D125-*05***(+++)
1.5	57.5	50.0	35.0	850	1275	4.0	24	33	HCSC/3D155-*05***(+++)
2.0	57.5	55.0	45.0	850	1700	4.0	28	33	HCSC/3D205-*05***(+++)
2500Vd.c.(725Va.c.)									
C _N (μF)	W (mm)	H (mm)	T (mm)	dv/dt (V/μs)	Î (A)	ESR @100kHz	I _{max} (A)	L _s (nH)	Ordering Information
0.068	37.0	25.0	15.0	3230	220	8.5	6.5	23	HCSC/3E683-*02***(+++)
0.10	37.0	30.0	16.0	3230	323	8.5	8	23	HCSC/3E104-*02***(+++)
0.15	37.0	34.0	20.0	3230	485	8.0	11	23	HCSC/3E154-*02***(+++)
0.18	37.0	34.0	20.0	3230	581	7.5	12.5	23	HCSC/3E184-*02***(+++)
0.22	42.0	40.0	20.0	2100	462	4.0	14	29	HCSC/3E224-*03***(+++)
0.33	42.0	44.0	24.0	2100	693	4.0	15.5	29	HCSC/3E334-*03***(+++)
0.47	42.0	45.0	30.0	2100	987	3.5	18	29	HCSC/3E474-*03***(+++)
0.68	42.0	50.0	35.0	2100	1428	3.5	18.5	29	HCSC/3E684-*03***(+++)
0.68	57.5	45.0	30.0	1200	816	3.5	19	33	HCSC/3E684-*05***(+++)
1.0	57.5	50.0	35.0	1200	1200	3.5	19.5	33	HCSC/3E105-*05***(+++)

Note: (1) The above are normal types, for the special types, please contact with relative person;
(2) "ESR","Ls" are typical values.