HCBB65

Metallized Polypropylene Film AC Motor Capacitor
(Cylindrical, Aluminum Case, Anti-explosion)



Features

- Metallized polypropylene film structure
- Excellent self-healing performance
- Excellent stable performance and reliability
- Explosion-proof design and more safety
- Long lifetime

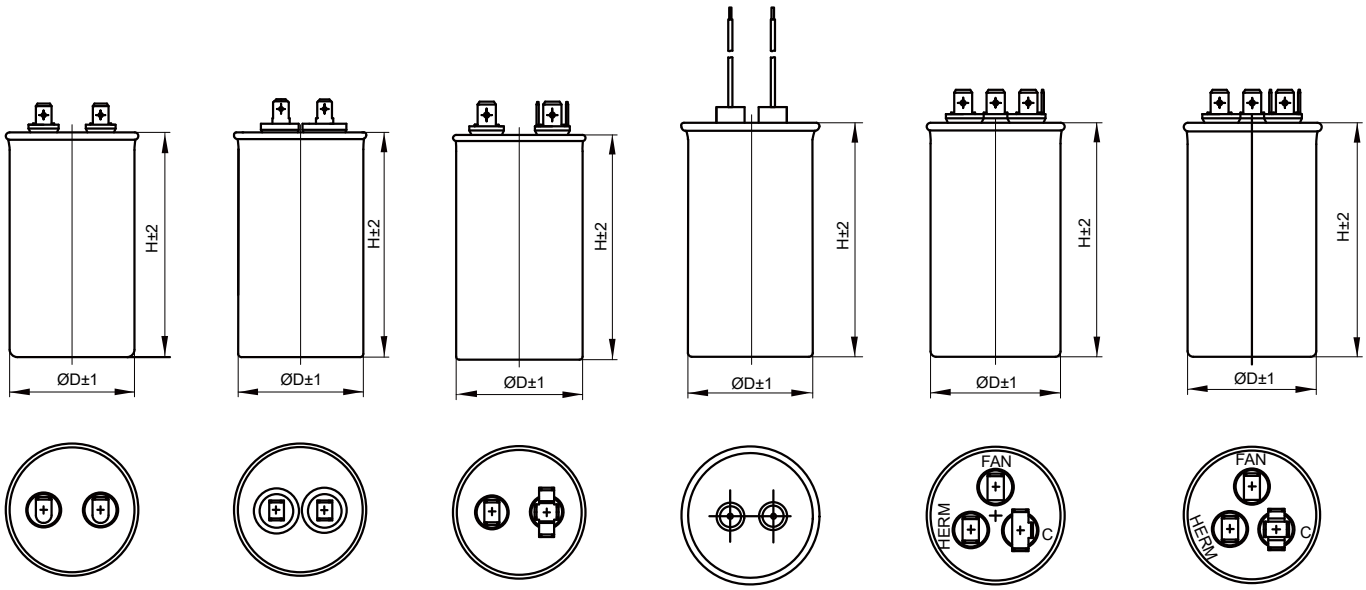
Typical Applications

- Widely applied to starting and running of AC single-phase motors at 50Hz/60Hz frequency power

Safety Approvals

	CQC	GB/T 3667.1	(x+y)μF, x=1μF-85μF,y=0μF-15μF,±5%,450Va.c. 40/70/21,40/85/21,B,S2,SH,50/60Hz File No.: CQC15006131261 (x+y)μF, x=1μF-85μF,y=0μF-15μF,±5%,250Va.c.-300Va.c. 40/70/21,40/85/21,B,S2,SH,50/60Hz File No.: CQC16006150526 1μF-30μF,±5%,400Va.c.-450Va.c. inductor:0-50μH,resistor:0-200Ω 40/70/21,40/85/21,B/C,S2,SH,50/60Hz File No.: CQC17002174922 (x+y)μF, x=1μF-60μF,450Va.c.; y=1μF-15μF,560Va.c. 40/70/21,40/85/21,B/C,S2,SH,50/60Hz File No.: CQC17002174948
	VDE	EN 60252-1	1μF-80μF,±5%,250Va.c.-450Va.c. 25/70/21,25/85/21,40/70/21,40/85/21,B,S2,SH,50/60Hz File No.: 40044475
	TÜV	EN 60252-1	1μF-85μF;(x+y)μF, x=1μF-85μF,y=1μF-15μF,1.5μF,2.5μF,±5%,400Va.c.-450Va.c. 40/70/21,40/85/21,B/C,S2,SH,50/60Hz File No.: R 50314716 1μF-85μF;(x+y)μF, x=1μF-85μF,y=1μF-15μF,1.5μF,2.5μF,±5%,250Va.c.-300Va.c. 40/70/21,40/85/21,B/C,S2,SH,50/60Hz File No.: R 50355632
	UL/cUL	UL810 CSA C22.2 N0.190	max 450Va.c. max 100℃,50/60Hz,“Protected”,10000AFC File No.: E481493,CCN:CYWT2/8

Outline Drawing



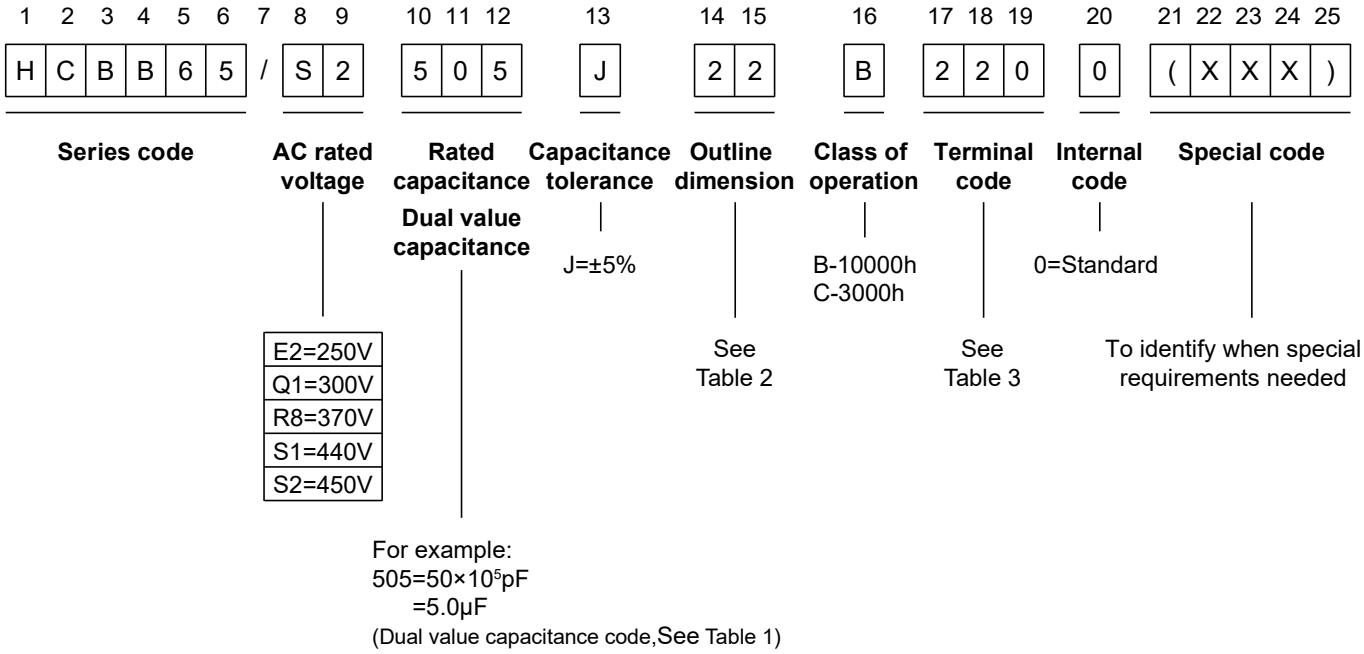
a) AMP250#(1+1) b) AMP250#(2+2) c)AMP250#(2+LG4) d) Lead wires e) AMP250#(1+2+LG3) f) AMP250#(1+2+LG4)

Notes: All product dimensions are in mm.
See the Outline Dimensions table for details.

Specifications

Reference standards		GB/T 3667.1, IEC60252-1	
Rated voltage	U_N	250Va.c.~450Va.c.(50Hz/60Hz)	
Class of operation		Class B(10000h),Class C(3000h)	
Capacitance range	C_N	1μF~85μF,1+0μF~85μF+15μF	
Capacitance tolerance		±5%(J)	
Dissipation factor(DF)	tanδ	≤0.0020(100 Hz,20℃)	
Insulation resistance (20℃,100V,1min)	IR×C_N	≥3000s	
Climatic category		40/70/21,40/80/21,40/85/21	
Class of safety protection		S2	
Operating temperature range	T_{OP}	-40℃~85℃	
Voltage proof	U_{t-t}	Between terminals	2U_{NAC}(2s)
	U_{t-c}	Between terminals and case	2000Va.c.(60s)
Max permissible voltage		1.1U_N	
Max permissible current		1.3I_N	

Ordering Information



Notes: 1) The 17th to 19th digits represent the lead-out terminal code of the capacitor. Multiple mounting options are available. Please refer to Table 3 and contact us with your specific installation requirements.
2) The 16th digit represents the product's class of operation. Class B = 10000 hours continuous operation; Class C = 3000 hours continuous operation.

Table 1: Dual Value Capacitance Code

Code	C_N(μF)	Code	C_N(μF)	Code	C_N(μF)
1	1	C	3.5	P	35
2	2	D	5.5	Q	40
3	3	E	7.5	R	45
4	4	F	10	S	50
5	5	G	11	T	55
6	6	H	12	U	60
7	7	J	15	V	65
8	8	K	17	W	70
9	9	L	20	X	75
A	1.5	M	25	Y	80
B	2.5	N	30	Z	85

Notes: CF1=10μF+1μF capacitor, C = dual value capacitance, F=10μF, 1=1μF.

Table 2: Outline Dimension Code

Digit 14		Digit 15			
Code	D(mm)	Code	H(mm)	Code	H(mm)
1	30	1	50	F	90
2	35	2	55	G	100
3	40	3	57	H	102
4	45	4	60	J	105
5	50	5	65	K	110
6	55	6	67	L	120
7	60	7	70	M	125
8	63.5	8	71	N	130
9	65	9	75	P	135
A	47.5	A	77	Q	63.5
		B	78	R	91
		C	80	S	127
		D	81	T	95
		E	85	U	87

Table 3: Terminal Code

Digit 17		Digit 18		Digit 19	
Code	Terminal form	Code	Fixed style	Code	Others or lead wire length
1	AMP250#(1+1)	0	No bottom-bolt, no bracket	0	No inductance or standard lead length: 140mm±10mm, or tab type
2	AMP250#(2+2)	1	No bottom-bolt, with bracket	1	With inductance
3	AMP250#(2+LG4)	2	With bottom-bolt, no bracket	2	With resistor
6	Lead wires	3	With bottom-bolt, with bracket	L	Customer-specified lead wire length and tolerance
8	AMP250#(1+2+LG3)				
9	AMP250#(1+2+LG4)				

Notes:(1+1)=2 electrodes,each electrode has one AMP250# tab; (2+2)=2 electrodes,each electrode has two AMP250# tabs;
(2+LG4)=2 electrodes,2 AMP250# on one electrode and 4 AMP250# with large distance on the other electrode;
(1+2+LG3)=3 electrodes,each electrode has the corresponding number of AMP250# 1, 2 and 3;
(1+2+LG4)=3 electrodes, each electrode has the corresponding number of AMP250# 1, 2 and 4.

Outline Dimensions

Unit: mm

250Va.c.							
C_N(μF)	H	D	Ordering Information	C_N(μF)	H	D	Ordering Information
2.0	30	50	HCBB65/E2205J11B***0	14.0	40	55	HCBB65/E2146J32B***0
2.5	30	50	HCBB65/E2255J11B***0	15.0	40	55	HCBB65/E2156J32B***0
3.0	30	50	HCBB65/E2305J11B***0	16.0	40	55	HCBB65/E2166J32B***0
4.0	30	50	HCBB65/E2405J11B***0	18.0	40	65	HCBB65/E2186J35B***0
5.0	30	50	HCBB65/E2505J11B***0	20.0	40	65	HCBB65/E2206J35B***0
5.5	30	50	HCBB65/E2555J11B***0	25.0	40	65	HCBB65/E2256J35B***0
6.0	30	50	HCBB65/E2605J11B***0	30.0	45	65	HCBB65/E2306J45B***0
6.5	30	55	HCBB65/E2655J12B***0	35.0	45	65	HCBB65/E2356J45B***0
7.0	30	55	HCBB65/E2705J12B***0	40.0	45	75	HCBB65/E2406J49B***0
7.5	30	55	HCBB65/E2755J12B***0	45.0	45	85	HCBB65/E2456J4EB***0
8.0	35	55	HCBB65/E2805J22B***0	50.0	45	85	HCBB65/E2506J4EB***0
8.5	35	55	HCBB65/E2855J22B***0	50.0	50	75	HCBB65/E2506J59B***0
9.0	35	55	HCBB65/E2905J22B***0	55.0	50	75	HCBB65/E2556J59B***0
10.0	35	55	HCBB65/E2106J22B***0	60.0	50	85	HCBB65/E2606J5EB***0
11.0	35	55	HCBB65/E2116J22B***0	65.0	50	85	HCBB65/E2656J5EB***0
12.0	35	55	HCBB65/E2126J22B***0	70.0	50	90	HCBB65/E2706J5FB***0
13.0	40	55	HCBB65/E2136J32B***0	75.0	50	100	HCBB65/E2756J5GB***0

300Va.c.							
C_N(μF)	H	D	Ordering Information	C_N(μF)	H	D	Ordering Information
2.0	30	50	HCBB65/Q1205J11B***0	8.5	35	55	HCBB65/Q1855J22B***0
2.5	30	50	HCBB65/Q1255J11B***0	9.0	35	55	HCBB65/Q1905J22B***0
3.0	30	50	HCBB65/Q1305J11B***0	10.0	35	55	HCBB65/Q1106J22B***0
4.0	30	50	HCBB65/Q1405J11B***0	11.0	40	55	HCBB65/Q1116J32B***0
5.0	30	50	HCBB65/Q1505J11B***0	12.0	40	55	HCBB65/Q1126J32B***0
5.5	30	50	HCBB65/Q1555J11B***0	13.0	40	55	HCBB65/Q1136J32B***0
6.0	30	55	HCBB65/Q1605J12B***0	14.0	40	55	HCBB65/Q1146J32B***0
6.5	30	55	HCBB65/Q1655J12B***0	15.0	40	55	HCBB65/Q1156J32B***0
7.0	30	55	HCBB65/Q1705J12B***0	16.0	40	65	HCBB65/Q1166J35B***0
7.5	35	55	HCBB65/Q1755J22B***0	18.0	40	65	HCBB65/Q1186J35B***0
8.0	35	55	HCBB65/Q1805J22B***0	20.0	40	65	HCBB65/Q1206J35B***0

Notes:1) "***" represent the lead-out terminal code of the capacitor. Multiple mounting options are available. Please refer to Table 3 and contact us with your specific installation requirements.

Outline Dimensions

Unit: mm

300Va.c.							
C_N(μF)	H	D	Ordering Information	C_N(μF)	H	D	Ordering Information
25.0	45	65	HCBB65/Q1256J45B***0	55.0	50	85	HCBB65/Q1556J5EB***0
30.0	45	75	HCBB65/Q1306J49B***0	60.0	50	90	HCBB65/Q1606J5FB***0
35.0	45	75	HCBB65/Q1356J49B***0	65.0	50	90	HCBB65/Q1656J5FB***0
40.0	45	85	HCBB65/Q1406J4EB***0	70.0	50	100	HCBB65/Q1706J5GB***0
45.0	45	90	HCBB65/Q1456J4FB***0	75.0	50	100	HCBB65/Q1756J5GB***0
50.0	50	85	HCBB65/Q1506J5EB***0				

370Va.c.							
C_N(μF)	H	D	Ordering Information	C_N(μF)	H	D	Ordering Information
5.0	35	50	HCBB65/R8505J21B***0	18.0	45	65	HCBB65/R8186J45B***0
6.0	35	50	HCBB65/R8605J21B***0	20.0	45	65	HCBB65/R8206J45B***0
6.5	35	50	HCBB65/R8655J21B***0	25.0	45	75	HCBB65/R8256J49B***0
7.0	35	55	HCBB65/R8705J22B***0	30.0	45	75	HCBB65/R8306J49B***0
7.5	35	55	HCBB65/R8755J22B***0	35.0	45	85	HCBB65/R8356J4EB***0
8.0	35	55	HCBB65/R8805J22B***0	40.0	50	85	HCBB65/R8406J5EB***0
9.0	40	55	HCBB65/R8905J32B***0	45.0	50	85	HCBB65/R8456J5EB***0
10.0	40	55	HCBB65/R8106J32B***0	50.0	50	90	HCBB65/R8506J5FB***0
11.0	40	55	HCBB65/R8116J32B***0	55.0	50	100	HCBB65/R8556J5GB***0
12.0	40	55	HCBB65/R8126J32B***0	60.0	50	100	HCBB65/R8606J5GB***0
15.0	40	65	HCBB65/R8156J35B***0	65.0	55	100	HCBB65/R8656J6GB***0
16.0	40	65	HCBB65/R8166J35B***0	70.0	55	100	HCBB65/R8706J6GB***0

450Va.c.							
C_N(μF)	H	D	Ordering Information	C_N(μF)	H	D	Ordering Information
1.0	30	50	HCBB65/S2105J11B***0	4.5	35	55	HCBB65/S2455J22B***0
1.5	30	50	HCBB65/S2155J11B***0	5.0	35	55	HCBB65/S2505J22B***0
2.0	30	50	HCBB65/S2205J11B***0	6.0	35	55	HCBB65/S2605J22B***0
2.5	30	50	HCBB65/S2255J11B***0	6.5	40	55	HCBB65/S2655J32B***0
3.0	30	50	HCBB65/S2305J11B***0	7.0	40	55	HCBB65/S2705J32B***0
3.5	35	55	HCBB65/S2355J22B***0	7.5	40	55	HCBB65/S2755J32B***0
4.0	35	55	HCBB65/S2405J22B***0	8.0	40	55	HCBB65/S2805J32B***0

Notes:1) "***" represent the lead-out terminal code of the capacitor. Multiple mounting options are available. Please refer to Table 3 and contact us with your specific installation requirements.

Outline Dimensions

Unit: mm

450Va.c.							
C_N(μF)	H	D	Ordering Information	C_N(μF)	H	D	Ordering Information
9.0	40	55	HCBB65/S2905J32B***0	20.0	45	85	HCBB65/S2206J4EB***0
10.0	40	65	HCBB65/S2106J35B***0	25.0	45	85	HCBB65/S2256J4EB***0
11.0	40	65	HCBB65/S2116J35B***0	30.0	50	85	HCBB65/S2306J5EB***0
12.0	40	65	HCBB65/S2126J35B***0	30.0	50	90	HCBB65/S2306J5FB***0
12.5	40	65	HCBB65/S212EJ35B***0	35.0	50	100	HCBB65/S2356J5GB***0
13.0	45	65	HCBB65/S2136J45B***0	40.0	50	100	HCBB65/S2406J5GB***0
14.0	45	65	HCBB65/S2146J45B***0	40.0	50	110	HCBB65/S2406J5KB***0
15.0	45	65	HCBB65/S2156J45B***0	45.0	50	110	HCBB65/S2456J5KB***0
7.0	40	71	HCBB65/S2705J38B***0	40.0	50	125	HCBB65/S2406J5MB***0
8.0	40	71	HCBB65/S2805J38B***0	45.0	50	125	HCBB65/S2456J5MB***0
9.0	40	71	HCBB65/S2905J38B***0	50.0	50	125	HCBB65/S2506J5MB***0
10.0	40	71	HCBB65/S2106J38B***0	40.0	55	100	HCBB65/S2406J6GB***0
11.0	40	71	HCBB65/S2116J38B***0	45.0	55	100	HCBB65/S2456J6GB***0
12.0	40	71	HCBB65/S2126J38B***0	55.0	55	125	HCBB65/S2556J6MB***0
13.0	40	81	HCBB65/S2136J3DB***0	60.0	55	125	HCBB65/S2606J6MB***0
14.0	40	81	HCBB65/S2146J3DB***0	65.0	55	125	HCBB65/S2656J6MB***0
15.0	40	81	HCBB65/S2156J3DB***0	70.0	60	125	HCBB65/S2706J7MB***0
16.0	45	65	HCBB65/S2166J45B***0	75.0	60	125	HCBB65/S2756J7MB***0
17.0	45	75	HCBB65/S2176J49B***0	80.0	60	125	HCBB65/S2806J7MB***0

250Va.c.							
C_N(μF)	H	D	Ordering Information	C_N(μF)	H	D	Ordering Information
30+15	50	80	HCBB65/E2CNJJ5CB***0	45+6	50	90	HCBB65/E2CR6J5FB***0
35+6	50	80	HCBB65/E2CP6J5CB***0	45+10	50	90	HCBB65/E2CRFJ5FB***0
35+8	50	80	HCBB65/E2CP8J5CB***0	45+15	50	90	HCBB65/E2CRJJ5FB***0
35+10	50	80	HCBB65/E2CPFJ5CB***0	50+15	50	90	HCBB65/E2CSJJ5FB***0
35+12	50	80	HCBB65/E2CPHJ5CB***0	55+6	50	90	HCBB65/E2CT6J5FB***0
35+15	50	80	HCBB65/E2CPJJ5CB***0	55+15	50	105	HCBB65/E2CTJJ5JB***0

Notes:1) "***" represent the lead-out terminal code of the capacitor. Multiple mounting options are available. Please refer to Table 3 and contact us with your specific installation requirements.

Outline Dimensions

Unit: mm

450Va.c./440Va.c.							
C_N(μF)	H	D	Ordering Information	C_N(μF)	H	D	Ordering Information
10+4	50	65	HCBB65/S2CF4J55B***0	40+10	50	110	HCBB65/S2CQFJ5KB***0
10+5	50	65	HCBB65/S2CF5J55B***0	45+3	63.5	85	HCBB65/S2CR3J8EB***0
15+5	50	65	HCBB65/S2CJ5J55B***0	45+5	63.5	85	HCBB65/S2CR5J8EB***0
17+6	50	80	HCBB65/S2CK6J5CB***0	45+7.5	63.5	85	HCBB65/S2CREJ8EB***0
20+2.5	50	90	HCBB65/S2CLBJ5FB***0	45+8	55	110	HCBB65/S2CR8J6KB***0
20+5	50	75	HCBB65/S2CL5J59B***0	45+10	63.5	85	HCBB65/S2CRFJ8EB***0
25+3	50	85	HCBB65/S2CM3J5EB***0	50+4	50	125	HCBB65/S2CS4J5MB***0
25+5	50	85	HCBB65/S2CM5J5EB***0	50+5	63.5	85	HCBB65/S2CS5J8EB***0
25+7.5	50	85	HCBB65/S2CMEJ5EB***0	50+7.5	55	120	HCBB65/S2CSEJ6LB***0
25+10	50	100	HCBB65/S2CMFJ5GB***0	50+8.0	55	120	HCBB65/S2CS8J6LB***0
30+3	50	90	HCBB65/S2CN3J5FB***0	50+10	55	130	HCBB65/S2CSFJ6NB***0
30+4	50	105	HCBB65/S2CN4J5JB***0	55+5	63.5	100	HCBB65/S2CT5J8GB***0
30+5	60	85	HCBB65/S2CN5J7EB***0	55+7.5	63.5	100	HCBB65/S2CTEJ8GB***0
30+7.5	50	100	HCBB65/S2CNEJ5GB***0	55+10	63.5	100	HCBB65/S2CTFJ8GB***0
30+10	50	100	HCBB65/S2CNFJ5GB***0	60+5	55	130	HCBB65/S2CU5J6NB***0
35+2.5	50	105	HCBB65/S2CPBJ5JB***0	60+7.5	63.5	100	HCBB65/S2CUEJ8GB***0
35+3	50	105	HCBB65/S2CP3J5JB***0	60+10	55	130	HCBB65/S2CUFJ6NB***0
35+5	50	100	HCBB65/S2CP5J5GB***0	70+5	63.5	110	HCBB65/S2CW5J8KB***0
35+7.5	50	110	HCBB65/S2CPEJ5KB***0	70+7.5	63.5	110	HCBB65/S2CWEJ8KB***0
35+10	50	110	HCBB65/S2CPFJ5KB***0	70+10	63.5	110	HCBB65/S2CWFJ8KB***0
40+3	50	110	HCBB65/S2CQ3J5KB***0	75+5	63.5	110	HCBB65/S2CX5J8KB***0
40+5	50	110	HCBB65/S2CQ5J5KB***0	80+5	63.5	125	HCBB65/S2CY5J8MB***0
40+7.5	55	105	HCBB65/S2CQEJ6JB***0	80+7.5	63.5	125	HCBB65/S2CYEJ8MB***0
40+8	55	105	HCBB65/S2CQ8J6JB***0				

Notes:1) "***" represent the lead-out terminal code of the capacitor. Multiple mounting options are available. Please refer to Table 3 and contact us with your specific installation requirements.

2) In the ordering information, "S2" represents rated voltage 450 V a.c. When the rated voltage is 440 V a.c., replace "S2" with "S1".