



- Maximum operating temperature 105°C.
- Allowable temperature rise 15K max.
- A little hum is produced when applied AC voltage.

◆ SPECIFICATIONS

Items	Characteristics							
Category temperature range	-40 to +105°C							
Rated voltage range	630 to 4000V <sub>dc</sub>							
Capacitance tolerance	J: ±5%							
Voltage proof (Terminal - Terminal)	No degradation, at 150% of rated voltage shall be applied for 60 seconds.							
Dissipation factor (tanδ)	No more than 0.05% : Equal or less than 1μF. No more than (c×0.015+0.05)% : More than 1μF.							
Insulation resistance (Terminal - Terminal)	No less than 30000MΩ : Equal or less than 0.33μF.							
	No less than 10000ΩF : More than 0.33μF.							
	Rated voltage (V <sub>dc</sub> )	630	1000	1250	1600	2000	3150	4000
	Measurement voltage (V <sub>dc</sub> )	500	1000	1000	1000	1000	1000	1000
Endurance	The following specifications shall be satisfied, after 1000hrs with applying rated voltage x 125% at 105°C.							
	Appearance	No serious degradation						
	Insulation resistance (Terminal - Terminal)	No less than 10000MΩ : Equal or less than 0.33μF.						
		No less than 3000ΩF : More than 0.33μF.						
	Dissipation factor (tanδ)	Not more than initial specification at 1kHz.						
Loading under damp heat	The following specifications shall be satisfied, after 500hrs with applying rated voltage at 40°C 90~95%RH.							
	Appearance	No serious degradation.						
	Insulation resistance (Terminal - Terminal)	No less than 10000MΩ : Equal or less than 0.33μF.						
		No less than 3000ΩF : More than 0.33μF.						
	Dissipation factor (tanδ)	Not more than initial specification at 1kHz.						
	Capacitance change	Within ±5% of initial value.						

◆ STANDARD RATINGS

WV (V <sub>dc</sub> )	Cap (μF)	Dimensions (mm)					Maximum ripple current (Arms)	WV (Vac)	Part Number	Previous Part Number (Just for your reference)
		W	H	T	F	φd				
630	0.033	17.7	8.7	8.3	12.5	0.8	3.50	300	FHACB631V333J0LGZ0	HACB2J333J
	0.039		9.3	8.8			3.81		FHACB631V393J0LGZ0	HACB2J393J
	0.047		9.8	9.3			4.18		FHACB631V473J0LGZ0	HACB2J473J
	0.056		10.4	10.0			4.56		FHACB631V563J0LGZ0	HACB2J563J
	0.068		11.3	10.8			5.03		FHACB631V683J0LGZ0	HACB2J683J
	0.082		12.1	11.6			5.52		FHACB631V823J0LGZ0	HACB2J823J
	0.1	13.1	12.5	6.10	FHACB631V104J0LGZ0		HACB2J104J			
	0.12	14.0	13.4	6.68	FHACB631V124J0LGZ0		HACB2J124J			
	0.15	12.9	12.3	5.67	FHACB631V154J1LHZ0		HACB2J154J			
	0.18	13.8	13.2	6.21	FHACB631V184J1LHZ0		HACB2J184J			
	0.22	15.1	14.4	6.87	FHACB631V224J1LHZ0		HACB2J224J			
	0.27	16.5	15.7	7.61	FHACB631V274J1LHZ0		HACB2J274J			
	0.33	18.0	17.1	8.41	FHACB631V334J1LHZ0		HACB2J334J			
	0.39	19.3	18.4	9.15	FHACB631V394J1LHZ0		HACB2J394J			
	0.47	18.4	17.5	8.24	FHACB631V474J2LEZ0		HACB2J474J			
	0.56	19.9	18.9	9.00	FHACB631V564J2LEZ0		HACB2J564J			
	0.68	21.7	20.6	9.34	FHACB631V684J2LEZ0		HACB2J684J			
	0.82	23.6	22.5	10.0	FHACB631V824J2LEZ0		HACB2J824J			
1.0	25.8	24.6	10.0	FHACB631V105J2LEZ0	HACB2J105J					
1.2	28.1	26.8	10.0	FHACB631V125J2LEZ0	HACB2J125J					
1000	0.018	17.7	8.6	8.3	12.5	0.8	3.00	350	FHACB102V183J0LGZ0	HACB3A183J
	0.022		9.3	8.8			3.32		FHACB102V223J0LGZ0	HACB3A223J
	0.027		9.8	9.5			3.68		FHACB102V273J0LGZ0	HACB3A273J
	0.033		10.7	10.2			4.06		FHACB102V333J0LGZ0	HACB3A333J
	0.039		11.3	10.8			4.42		FHACB102V393J0LGZ0	HACB3A393J
	0.047		12.1	11.6			4.85		FHACB102V473J0LGZ0	HACB3A473J
	0.056	13.0	12.4	5.29	FHACB102V563J0LGZ0		HACB3A563J			
	0.068	14.0	13.4	5.83	FHACB102V683J0LGZ0		HACB3A683J			
	0.082	12.5	11.9	4.78	FHACB102V823J1LHZ0		HACB3A823J			
	0.1	13.5	12.9	5.28	FHACB102V104J1LHZ0		HACB3A104J			
	0.12	14.6	13.9	5.79	FHACB102V124J1LHZ0		HACB3A124J			
	0.15	16.1	15.3	6.47	FHACB102V154J1LHZ0		HACB3A154J			
	0.18	17.3	16.5	7.09	FHACB102V184J1LHZ0		HACB3A184J			
	0.22	18.9	18.0	7.83	FHACB102V224J1LHZ0		HACB3A224J			

- (1) Capacitance tolerance: Standard (J: ±5%), Option (H: ±3%)
- (2) The maximum ripple current : +85°C max., 100kHz, sine wave
- (3) WV(Vac) : 50Hz or 60Hz, sine wave

### ◆STANDARD RATINGS

WV (Vdc)	Cap (μF)	Dimensions (mm)					Maximum ripple current (Arms)	WV (Vac)	Part Number	Previous Part Number (Just for your reference)		
		W	H	T	F	φd						
1000	0.27	27.7	18.0	17.1	22.5	1.0	7.07	350	FHACB102V274 J2LEZ0	HACB3A274J		
	0.33		19.6	18.6			7.82		FHACB102V334 J2LEZ0	HACB3A334J		
	0.39		21.1	20.1			8.50		FHACB102V394 J2LEZ0	HACB3A394J		
	0.47		22.9	21.9			9.34		FHACB102V474 J2LEZ0	HACB3A474J		
	0.56		25.0	23.8			10.0		FHACB102V564 J2LEZ0	HACB3A564J		
	0.68		27.3	26.0			10.0		FHACB102V684 J2LEZ0	HACB3A684J		
	0.82	42.7	22.8	21.8	37.5		8.44		FHACB102V824 J4LJZ0	HACB3A824J		
	1.0		25.0	23.8			9.34		FHACB102V105 J4LJZ0	HACB3A105J		
	1.2		27.1	25.8			10.0		FHACB102V125 J4LJZ0	HACB3A125J		
1250	0.012	17.7	8.5	8.2	12.5	0.8	2.68	400	FHACB1C2V123J0LGZ0	HACB3B123J		
	0.015		9.2	8.8			3.00		FHACB1C2V153J0LGZ0	HACB3B153J		
	0.018		9.8	9.3			3.29		FHACB1C2V183J0LGZ0	HACB3B183J		
	0.022		10.5	10.1			3.63		FHACB1C2V223J0LGZ0	HACB3B223J		
	0.027		11.3	10.8			4.03		FHACB1C2V273J0LGZ0	HACB3B273J		
	0.033		12.2	11.7			4.45		FHACB1C2V333J0LGZ0	HACB3B333J		
	0.039	13.1	12.5	4.84	FHACB1C2V393J0LGZ0		HACB3B393J					
	0.047	14.0	13.4	5.31	FHACB1C2V473J0LGZ0		HACB3B473J					
	0.056	22.7	13.3	12.7	17.5		4.61		FHACB1C2V563J1LHZ0	HACB3B563J		
	0.068		14.4	13.7			5.08		FHACB1C2V683J1LHZ0	HACB3B683J		
	0.082		15.5	14.8			5.58		FHACB1C2V823J1LHZ0	HACB3B823J		
	0.1	27.7	16.9	16.1	22.5		6.16		FHACB1C2V104J1LHZ0	HACB3B104J		
	0.12		18.4	17.5			6.75		FHACB1C2V124J1LHZ0	HACB3B124J		
	0.15		17.2	16.4			6.02		FHACB1C2V154J2LEZ0	HACB3B154J		
	0.18		18.6	17.7			6.60		FHACB1C2V184J2LEZ0	HACB3B184J		
	0.22		20.3	19.3			7.29		FHACB1C2V224J2LEZ0	HACB3B224J		
	0.27		22.3	21.3			8.08		FHACB1C2V274J2LEZ0	HACB3B274J		
	0.33		24.4	23.3			8.93		FHACB1C2V334J2LEZ0	HACB3B334J		
	0.39		26.3	25.1			9.34		FHACB1C2V394J2LEZ0	HACB3B394J		
	0.47		21.9	20.8			7.10		FHACB1C2V474J4LJZ0	HACB3B474J		
	0.56		42.7	23.7			22.6		37.5	7.75	FHACB1C2V564J4LJZ0	HACB3B564J
	0.68			25.8			24.6			8.54	FHACB1C2V684J4LJZ0	HACB3B684J
	0.82			27.6			26.3			9.34	FHACB1C2V824J4LJZ0	HACB3B824J
	1.0	52.7	27.0	25.7	47.5		8.57		FHACB1C2V105JULWZ0	HACB3B105J		
1600	0.0047	19.7	8.8	8.5	15.0	0.8	1.32	450	FHACB162V472 JKLDZ0	HACB3C472J		
	0.0056		9.3	9.0			1.58		FHACB162V562 JKLDZ0	HACB3C562J		
	0.0068		10.0	9.6			1.93		FHACB162V682 JKLDZ0	HACB3C682J		
	0.0082		10.7	10.2			2.32		FHACB162V822 JKLDZ0	HACB3C822J		
	0.01		11.5	11.0			2.83		FHACB162V103 JKLDZ0	HACB3C103J		
	0.012		12.3	11.8			3.39		FHACB162V123 JKLDZ0	HACB3C123J		
	0.015	13.5	12.9	4.24	FHACB162V153 JKLDZ0		HACB3C153J					
	0.018	14.6	13.9	4.47	FHACB162V183 JKLDZ0		HACB3C183J					
	0.022	15.8	15.1	4.94	FHACB162V223 JKLDZ0		HACB3C223J					
	0.027	22.7	13.0	12.4	17.5		3.86		FHACB162V273 J1LHZ0	HACB3C273J		
	0.033		14.0	13.4			4.27		FHACB162V333 J1LHZ0	HACB3C333J		
	0.039		15.1	14.4			4.64		FHACB162V393 J1LHZ0	HACB3C393J		
	0.047	27.7	16.4	15.6	22.5		5.09		FHACB162V473 J1LHZ0	HACB3C473J		
	0.056		17.6	16.8			5.56		FHACB162V563 J1LHZ0	HACB3C563J		
	0.068		19.1	18.2			6.12		FHACB162V683 J1LHZ0	HACB3C683J		
	0.082		17.4	16.6			5.29		FHACB162V823 J2LEZ0	HACB3C823J		
	0.1		19.0	18.1			5.84		FHACB162V104 J2LEZ0	HACB3C104J		
	0.12		20.6	19.6			6.40		FHACB162V124 J2LEZ0	HACB3C124J		
	0.15	22.8	21.8	7.15	FHACB162V154 J2LEZ0		HACB3C154J					
	0.18	24.7	23.6	7.84	FHACB162V184 J2LEZ0		HACB3C184J					
	0.22	27.2	25.9	8.66	FHACB162V224 J2LEZ0		HACB3C224J					
	0.27	42.7	23.4	22.3	37.5		6.47		FHACB162V274 J4LJZ0	HACB3C274J		
	0.33		25.9	24.7			7.15		FHACB162V334 J4LJZ0	HACB3C334J		
	0.39		27.9	26.6			7.77		FHACB162V394 J4LJZ0	HACB3C394J		

- (1) Capacitance tolerance: Standard(J: ±5%) , Option(H: ±3%)
- (2) The maximum ripple current : +85°C max., 100kHz, sine wave
- (3) WV(Vac) : 50Hz or 60Hz, sine wave

◆STANDARD RATINGS

WV (Vdc)	Cap (μF)	Dimensions (mm)					Maximum ripple current (Arms)	WV (Vac)	Part Number	Previous Part Number (Just for your reference)
		W	H	T	F	φd				
2000	0.001	19.7	8.3	8.1	15.0	0.8	0.28	450	FHACB202V102JKLDZ0	HACB3D102J
	0.0012		9.0	8.6			0.34		FHACB202V122JKLDZ0	HACB3D122J
	0.0015		9.6	9.2			0.42		FHACB202V152JKLDZ0	HACB3D152J
	0.0018		9.3	9.0			0.51		FHACB202V182JKLDZ0	HACB3D182J
	0.0022		10.0	9.6			0.62		FHACB202V222JKLDZ0	HACB3D222J
	0.0027		8.5	8.2			0.76		FHACB202V272JKLDZ0	HACB3D272J
	0.0033		9.1	8.7			0.93		FHACB202V332JKLDZ0	HACB3D332J
	0.0039		9.6	9.2			1.10		FHACB202V392JKLDZ0	HACB3D392J
	0.0047		10.2	9.8			1.33		FHACB202V472JKLDZ0	HACB3D472J
	0.0056		11.0	10.5			1.53		FHACB202V562JKLDZ0	HACB3D562J
	0.0068		11.8	11.3			1.92		FHACB202V682JKLDZ0	HACB3D682J
	0.0082		12.7	12.1			2.32		FHACB202V822JKLDZ0	HACB3D822J
	0.01		13.7	13.1			2.83		FHACB202V103JKLDZ0	HACB3D103J
	0.012		14.8	14.1			3.39		FHACB202V123JKLDZ0	HACB3D123J
	0.015		16.3	15.5			4.24		FHACB202V153JKLDZ0	HACB3D153J
	0.018	22.7	13.2	12.6	17.5	1.0	3.52		FHACB202V183J1LHZ0	HACB3D183J
	0.022		14.3	13.6			3.89		FHACB202V223J1LHZ0	HACB3D223J
	0.027		15.5	14.8			4.31		FHACB202V273J1LHZ0	HACB3D273J
	0.033		17.0	16.2			4.77		FHACB202V333J1LHZ0	HACB3D333J
	0.039		18.3	17.4			5.19		FHACB202V393J1LHZ0	HACB3D393J
	0.047		19.8	18.8			5.69		FHACB202V473J1LHZ0	HACB3D473J
	0.056	27.7	17.9	17.0	22.5	1.0	4.89		FHACB202V563J2LEZ0	HACB3D563J
	0.068		19.4	18.5			5.39		FHACB202V683J2LEZ0	HACB3D683J
	0.082		21.2	20.2			5.91		FHACB202V823J2LEZ0	HACB3D823J
	0.1		23.2	22.1			6.53		FHACB202V104J2LEZ0	HACB3D104J
	0.12		25.3	24.1			7.15		FHACB202V124J2LEZ0	HACB3D124J
	0.15		27.9	26.6			8.00		FHACB202V154J2LEZ0	HACB3D154J
	0.18	42.7	22.1	21.1	37.5	1.0	5.67		FHACB202V184J4LJZ0	HACB3D184J
	0.22		24.5	23.4			6.27		FHACB202V224J4LJZ0	HACB3D224J
	0.27		26.5	25.3			6.95		FHACB202V274J4LJZ0	HACB3D274J

- (1)Capacitance tolerance:Standard (J:±5%),Option (H:±3%)  
 (2)The maximum ripple current : +85°C max., 100kHz, sine wave  
 (3)WV(Vac) : 50Hz or 60Hz, sine wave

WV (Vdc)	Cap (μF)	Dimensions (mm)					Maximum ripple current (Arms)	WV (Vac)	Part Number	Previous Part Number (Just for your reference)
		W	H	T	F	φd				
3150	0.0047	34.7	12.0	11.5	30.0	1.0	2.60	920	FHACB3B2V472JLLQZ0	HACB3F472J
	0.0056		12.9	12.3			2.84		FHACB3B2V562JLLQZ0	HACB3F562J
	0.0068		13.9	13.3			3.13		FHACB3B2V682JLLQZ0	HACB3F682J
	0.0082		15.0	14.3			3.44		FHACB3B2V822JLLQZ0	HACB3F822J
	0.01		16.3	15.5			3.80		FHACB3B2V103JLLQZ0	HACB3F103J
	0.012		17.5	16.7			4.16		FHACB3B2V123JLLQZ0	HACB3F123J
	0.015		19.3	18.4			4.65		FHACB3B2V153JLLQZ0	HACB3F153J
	0.018		20.9	19.9			5.09		FHACB3B2V183JLLQZ0	HACB3F183J
	0.022		22.9	21.9			5.63		FHACB3B2V223JLLQZ0	HACB3F223J
	0.027		25.2	24.0			6.24		FHACB3B2V273JLLQZ0	HACB3F273J
	0.033		27.5	26.2			6.90		FHACB3B2V333JLLQZ0	HACB3F333J
	4000		0.0027	34.7			12.7		12.1	30.0
0.0033		13.7	13.1		1.91	FHACB402V332JLLQZ0	HACB3G332J			
0.0039		14.6	13.9		2.25	FHACB402V392JLLQZ0	HACB3G392J			
0.0047		15.7	15.0		2.72	FHACB402V472JLLQZ0	HACB3G472J			
0.0056		17.0	16.2		3.24	FHACB402V562JLLQZ0	HACB3G562J			
0.0068		18.4	17.5		3.71	FHACB402V682JLLQZ0	HACB3G682J			
0.0082		20.0	19.0		4.07	FHACB402V822JLLQZ0	HACB3G822J			
0.01		21.8	20.7		4.49	FHACB402V103JLLQZ0	HACB3G103J			
0.012		23.7	22.6		4.92	FHACB402V123JLLQZ0	HACB3G123J			
0.015		26.2	25.0		5.50	FHACB402V153JLLQZ0	HACB3G153J			
0.018		28.5	27.1		6.03	FHACB402V183JLLQZ0	HACB3G183J			

- (1)Capacitance tolerance : Standard (J:±5%) , Option (K:±10%)  
 (2)The maximum ripple current : +85°C max., 100kHz, sine wave  
 (3)WV(Vac) : 50Hz or 60Hz, sine wave

◆DIMENSIONS (mm)

