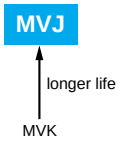
Alchip® MVJ Series

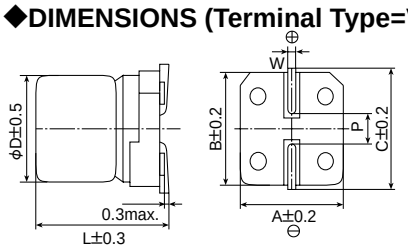
●Endurance : 105℃ 2000 hours
●Solvent-proof type (see PRECAUTIONS AND GUIDELINES)



◆SPECIFICATIONS

Items	Characteristics								
Category Temperature Range	−40 to +105℃								
Rated Voltage Range	6.3 to 50Vdc								
Capacitance Tolerance	±20% (M)								(at 20℃, 120Hz)
Leakage Current	I=0.01CV or 3μA, whichever is greater. Where, I : Max. leakage current (μA), C : Nominal capacitance (μF), V : Rated voltage (V)								(at 20℃ after 2 minutes)
Dissipation Factor (tanδ)	Rated voltage (Vdc)	6.3V	10V	16V	25V	35V	50V		
	tanδ (Max.)	0.30	0.24	0.20	0.16	0.14	0.12		(at 20℃, 120Hz)
Low Temperature Characteristics (Max. Impedance Ratio)	Rated voltage (Vdc)	6.3V	10V	16V	25V	35V	50V		
	Z(−25℃)/Z(+20℃)	4	3	2	2	2	2		
	Z(−40℃)/Z(+20℃)	12	8	6	4	3	3		(at 120Hz)
Endurance	The following specifications shall be satisfied when the capacitors are restored to 20℃ after the rated voltage is applied for 2000 hours at 105℃.								
	Rated voltage	6.3Vdc			10 & 16Vdc			25 to 50Vdc	
	Capacitance change	≦±30% of the initial value			≦±25% of the initial value			≦±20% of the initial value	
	D.F. (tanδ)	≦300% of the initial specified value			≦300% of the initial specified value			≦200% of the initial specified value	
	Leakage current	The initial specified value			≦The initial specified value			≦The initial specified value	
Shelf Life	The following specifications shall be satisfied when the capacitors are restored to 20℃ after exposing them for 1000 hours at 105℃ without voltage applied.								
	Rated voltage	6.3Vdc			10 & 16Vdc			25 to 50Vdc	
	Capacitance change	≦±30% of the initial value			≦±25% of the initial value			≦±20% of the initial value	
	D.F. (tanδ)	≦300% of the initial specified value			≦300% of the initial specified value			≦200% of the initial specified value	
	Leakage current	≦The initial specified value			≦The initial specified value			≦The initial specified value	

◆DIMENSIONS (Terminal Type=VC) [mm]



Case code	D	L	A	B	C	W	P
D60	4	5.7	4.3	4.3	5.1	0.5 to 0.8	1.0
E60	5	5.7	5.3	5.3	5.9	0.5 to 0.8	1.4
F60	6.3	5.7	6.6	6.6	7.2	0.5 to 0.8	1.9

◆MARKING

EX) 6.3V100μF

◆PART NUMBERING SYSTEM

MVJ 16 VC 22 M E60

- E60 — Case code
- M — Cap tolerance (±20%)
- 22 — Nominal cap code
- VC — Terminal type (VC)
- 16 — Rated voltage in volts
- MVJ — Series name

Capacitance	Code
0.1μF	R1
1.0μF	1
4.7μF	4R7
10μF	10
100μF	100

◆STANDARD RATINGS

μF \ Vdc	6.3		10		16		25		35		50	
0.1											D60	1.3
0.22											D60	2.6
0.33											D60	3.2
0.47											D60	3.8
1.0											D60	5.6
2.2											D60	10
3.3											D60	14
4.7									D60	15	E60	19
10					D60	16	→		E60	25	F60	29
22	D60	21	→		E60	30	→		F60	40		
33	→		E60	34	→		F60	45				
47	E60	36	→		F60	48						
100	F60	56										

Case code

Rated ripple current (mArms) at 105℃, 120Hz

Note : → Use next higher voltage part.