



SOLID-ELECTROLYTE TANTALUM CAPACITORS

(TANCHIP® SERIES)

New

TYPE 251

Epoxy resin molding chip
Ultra Miniature



Type 251 is designed to meet market needs of miniaturizing electronic devices and structure having higher density mounting efficiency, and is based on the original face-down terminals of the 1005, 1608, 2012, 3216L and 3528L sizes chip tantalum capacitors.

FEATURES

- Achieves high capacitance with original construction.
1005 size : 10V-1 μ F~2.5V-4.7 μ F
1608 size : 10V-4.7 μ F~4V-22 μ F
2012 size : 10V-10 μ F~4V-47 μ F
3216L size : 10V-22 μ F~4V-100 μ F
3528L size : 10V-47 μ F~4V-220 μ F
- New construction with original face-down terminals for high density mounting.
- Wide operating temperature range : -55°C~+125°C
- Suitable for miniature equipment, such as DVC(Digital Video Camera), DSC(Digital Still Camera) Mobile Phone, Mobile Personal Computer, etc.

CAUTIONS

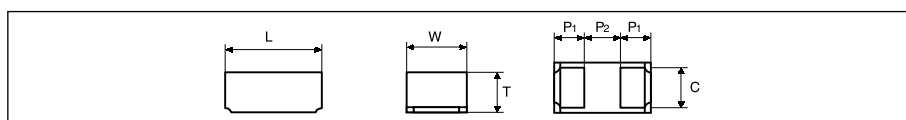
- This capacitor is polarized, do not apply reverse voltage.
- The sum of peak value of AC and DC voltage should not exceed the rated voltage.
- This catalog is designed for providing general information. Please inquire of our Sales Department to confirm specifications prior to use.

CHARACTERISTICS

ITEM	CHARACTERISTICS
Failure rate level	1%/1000h
Operating temperature range	-55~+85°C to +125°C with voltage derating
Rated voltage	2.5-4-6.3-10VDC
Capacitance range	1~220 μ F
Capacitance tolerance	±20%
Case code	1005(U case), 1608(M case), 2012(S case), 3216L(A case), 3528L(B case)

DIMENSIONS

mm



EIA Code	L	W	T	P1	P2	C	unit : mm
1005	1.0	0.55	0.5	0.3	0.4	0.4	
1608	1.6	0.85	0.8	0.5	0.65	0.75	
2012	2.0	1.25	1.1	0.5	1.05	0.9	
3216L	3.2	1.6	1.1	0.8	1.4	1.2	
3528L	3.5	2.8	1.1	0.8	1.5	2.2	

allowance: ±0.05mm(1005), ±0.1mm(others)

EIA CODE and RATINGS

R.V. (VDC) Cap. (μ F)	2.5	4	6.3	10
1				1005*
1.5				
2.2			1005*	
3.3				
4.7	1005*			1608
6.8				
10			1608	2012*
15				
22		1608*	2012*	3216L*
33				
47		2012*	3216L*	3528L*
68				
100		3216L*	3528L*	
150				
220		3528L*		

* : Development

CATALOG NUMBERS and RATINGS

Catalog number (1)(2)	Rated Voltage (VDC)	Capacitance (μ F)	EIA code	Matsuo Case Code
251M 2501 475 □ ¹ □ ²	2.5	4.7	1005	U
251M 6301 225 □ ¹ □ ²	6.3	2.2	1005	U
251M 1002 105 □ ¹ □ ²	10	1	1005	U
251M 4001 226 □ ¹ □ ²	4	22	1608	M
251M 6301 106 □ ¹ □ ²	6.3	10	1608	M
251M 1002 475 □ ¹ □ ²	10	4.7	1608	M
251M 4001 476 □ ¹ □ ²	4	47	2012	S
251M 6301 226 □ ¹ □ ²	6.3	22	2012	S
251M 1002 106 □ ¹ □ ²	10	10	2012	S
251M 4001 107 □ ¹ □ ²	4	100	3216L	A
251M 6301 476 □ ¹ □ ²	6.3	47	3216L	A
251M 1002 226 □ ¹ □ ²	10	22	3216L	A
251M 4001 227 □ ¹ □ ²	4	220	3528L	B
251M 6301 107 □ ¹ □ ²	6.3	100	3528L	B
251M 1002 476 □ ¹ □ ²	10	47	3528L	B

Note: (1)□¹ : Capacitance tolerance "M"(±20%).

(2)□² : Taping code "R" ("N") or "L" ("P"), Pull direction "R" ("N") is standard.

