

Chip Inductors - MPC10000 Series



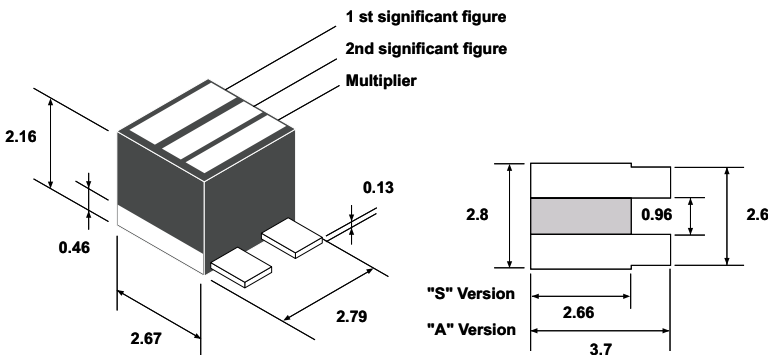
- ESA qualified and as per Mil Spec M83446/5
- Excellent Q values even at high frequencies
- Very high self-resonant frequencies (SFRs)
- Extremely stable inductance values from -55 to +125°C
- With or without tab terminations
- Terminations with tin-lead coating or gold plating
- Frequency range 1MHz to 500MHz
- Operating temperature range: -55 to +125°C
- Weight: 0.07 gram • RoHS versions upon request

Electrical Data (25°C)

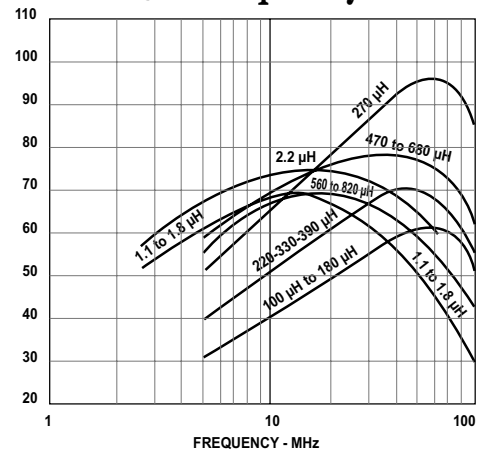
ID Code	Inductance* μH	Q Min	Test Freq. MHz	SFR Min. MHz	DCR Max. Ω	DC Current Tol** mA max %	ID Code	Inductance* μH	Q Min	Test Freq. MHz	SFR Min. MHz	DCR Max. Ω	DC Current Tol** mA max %		
MPCI - 10 000 010	0.010	60	150	2000	0.025	750	10	MPCI - 10 000 390	0.39	47	50	240	0.45	240	10
MPCI - 10 000 012	0.012	60	150	2000	0.025	750		MPCI - 10 000 470	0.47	47	25	210	0.50	230	
MPCI - 10 000 015	0.015	60	150	1800	0.04	750		MPCI - 10 000 560	0.56	52	25	180	0.55	220	
MPCI - 10 000 018	0.018	60	150	1500	0.04	750		MPCI - 10 000 680	0.68	52	25	160	0.58	210	
MPCI - 10 000 022	0.022	51	100	1400	0.04	750		MPCI - 10 000 820	0.82	52	25	130	0.60	200	
MPCI - 10 000 027	0.027	51	100	1200	0.04	750		MPCI - 10 001 000	1.00	52	25	110	0.65	190	
MPCI - 10 000 033	0.033	47	100	1200	0.05	640		MPCI - 10 001 200	1.20	42	7.9	110	0.75	180	
MPCI - 10 000 039	0.039	47	100	1200	0.07	600		MPCI - 10 001 500	1.50	42	7.9	100	1.1	160	
MPCI - 10 000 047	0.047	47	100	1000	0.08	550		MPCI - 10 001 800	1.80	48	7.9	95	1.2	150	
MPCI - 10 000 056	0.056	47	100	900	0.09	520		MPCI - 10 002 200	2.20	48	7.9	90	1.3	140	
MPCI - 10 000 068	0.068	47	100	900	0.10	480	MPCI - 10 002 700	2.70	48	7.9	65	1.5	130		
MPCI - 10 000 082	0.082	47	100	750	0.11	470	MPCI - 10 003 300	3.30	48	7.9	55	1.8	120		
MPCI - 10 000 100	0.100	47	50	620	0.11	470	MPCI - 10 003 900	3.90	48	7.9	45	2.0	110		
MPCI - 10 000 120	0.120	47	50	540	0.11	470	MPCI - 10 004 700	4.70	48	7.9	43	2.3	100		
MPCI - 10 000 150	0.150	47	50	450	0.12	450	MPCI - 10 005 600	5.60	48	7.9	40	2.5	100		
MPCI - 10 000 180	0.180	51	50	400	0.14	430	MPCI - 10 006 800	6.80	46	7.9	38	2.6	98		
MPCI - 10 000 220	0.220	51	50	380	0.20	350	MPCI - 10 008 200	8.20	46	7.9	35	2.8	95		
MPCI - 10 000 270	0.270	51	50	340	0.25	310	MPCI - 10 010 000	10.0	46	7.9	33	3.3	87		
MPCI - 10 000 330	0.330	51	50	280	0.30	280									

* Inductance tolerance: ± 10 %. ** Minimum achievable tolerances, other inductance values and S parameters on request.
 Inductance variation: 35 PPM/°C max. in the range 0.01 to 1.2μH; 80 PPM/°C max. in the range 1.5 to 10μH

Dimensions (mm)



Q vs frequency



Ordering Information

MPCI 10	047000	G	A	10
MPCI 10000	Inductance value (nH) from 000 010 nH to 1 000 000 nH	Terminations G = Gold T = Tinned	Terminations A = with tab S = without tab	Tolerances 10 for ± 10 % 5 for ± 5 % 2 for ± 2 %

Packaging (mm)

Tape and Reel
 Tray: 81 pieces without tab
 49 pieces with tab