



Materials Electronic Products Corp.
994 Spruce St., Trenton, NJ 08648 USA
Telephone (609) 393-4178/TELEX 843314
FAX (609) 393-9461

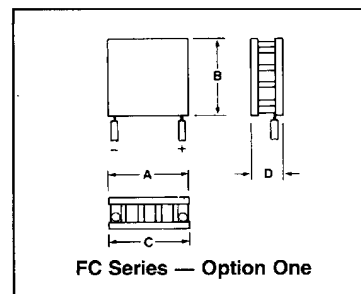
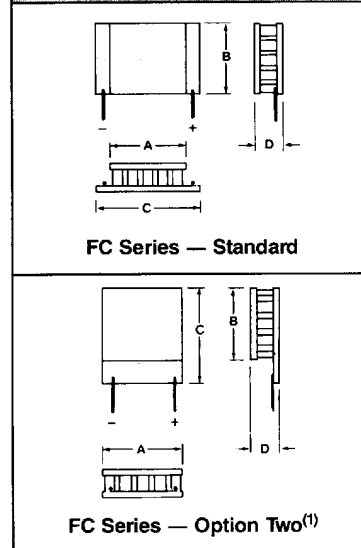
SOLID STATE COOLING WITH THERMOELECTRICS

Thermoelectric (Peltier) Heat Pump Module Specifications—FC Series

FC SERIES

Catalog Number	I max Amps	Hot Face Th = 25°C			Universal Multipliers			Dimensions, mm				
		Q max ⁽¹⁾ (watts)	V max (volts)	ΔT max (°C)	N No. of Couples	G Geometry Factor	G x N	A	B	C ⁽²⁾	D ⁽³⁾	
STANDARD AND OPTION 2	FC 0.45-4-05	0.80	0.22	0.48	67	4	.016	0.06	1.8	3.4	3.4	2.4
	FC 0.45-8-05	0.80	0.43	0.97	67	8	.016	0.13	3.4	3.4	5.0	2.4
	FC 0.45-12-05	0.80	0.65	1.45	67	12	.016	0.19	3.4	5.0	5.0	2.4
	FC 0.45-18-05	0.80	0.97	2.18	67	18	.016	0.29	5.0	5.0	6.6	2.4
	FC 0.45-32-05	0.80	1.72	3.87	67	32	.016	0.51	6.6	6.6	8.3	2.4
	FC 0.45-66-05	0.80	3.56	7.98	67	66	.016	1.06	9.9	9.1	11.5	2.4
	FC 0.6-4-06	1.20	0.32	0.48	67	4	.024	0.10	2.2	4.2	4.2	2.7
	FC 0.6-8-06	1.20	0.65	0.97	67	8	.024	0.19	4.2	4.2	6.2	2.7
	FC 0.6-12-06	1.20	0.97	1.45	67	12	.024	0.29	4.2	6.2	6.2	2.7
	FC 0.6-18-06	1.20	1.46	2.18	67	18	.024	0.43	6.2	6.2	8.3	2.7
	FC 0.6-32-06	1.20	2.59	3.87	67	32	.024	0.77	8.3	8.3	10.3	2.7
	FC 0.6-66-06	1.20	5.34	7.98	67	66	.024	1.58	12.3	11.3	14.4	2.7
STANDARD AND OPTION 2	FC 0.6-4-05	1.50	0.40	0.48	67	4	.030	0.12	2.2	4.2	4.2	2.4
	FC 0.6-8-05	1.50	0.81	0.87	67	8	.030	0.24	4.2	4.2	6.2	2.4
	FC 0.6-12-05	1.50	1.21	1.45	67	12	.030	0.36	4.2	6.2	6.2	2.4
	FC 0.6-18-05	1.50	1.82	2.18	67	18	.030	0.54	6.2	6.2	8.3	2.4
	FC 0.6-32-05	1.50	3.23	3.87	67	32	.030	0.96	8.3	8.3	10.3	2.4
	FC 0.6-66-05	1.50	6.67	7.98	67	66	.030	1.98	12.3	11.3	14.4	2.4
	FC 0.7-4-05	2.00	0.54	0.48	67	4	.040	0.16	2.4	4.7	4.7	2.4
	FC 0.7-8-05	2.00	1.08	0.97	67	8	.040	0.32	4.7	4.7	7.0	2.4
	FC 0.7-12-05	2.00	1.62	1.45	67	12	.040	0.48	4.7	7.0	7.0	2.4
	FC 0.7-18-05	2.00	2.43	2.18	67	18	.040	0.72	7.0	7.0	9.3	2.4
	FC 0.7-32-05	2.00	4.31	3.87	67	32	.040	1.28	9.3	9.3	11.6	2.4
	OPTION 1	FC 0.45-7-05-1	0.80	0.38	0.85	67	7	.016	0.11	3.4	3.4	3.4
FC 0.45-11-05-1		0.80	0.60	1.33	67	11	.016	0.18	3.4	5.0	3.4	2.4
FC 0.45-17-05-1		0.80	0.92	2.06	67	17	.016	0.27	5.0	5.0	5.0	2.4
FC 0.45-31-05-1		0.80	1.67	3.75	67	31	.016	0.50	6.6	6.6	6.6	2.4
FC 0.45-65-05-1		0.80	3.51	7.85	67	65	.016	1.04	9.9	9.1	9.9	2.4
FC 0.6-7-06-1		1.20	0.57	0.85	67	7	.024	0.17	4.2	4.2	4.2	2.7
FC 0.6-11-06-1		1.20	0.89	1.33	67	11	.024	0.26	4.2	6.2	4.2	2.7
FC 0.6-17-06-1		1.20	1.38	2.06	67	17	.024	0.41	6.2	6.2	6.2	2.7
FC 0.6-31-06-1		1.20	2.51	3.75	67	31	.024	0.74	8.3	8.3	8.3	2.7
FC 0.6-65-06-1		1.20	5.26	7.86	67	65	.024	1.56	12.3	11.3	12.3	2.7
FC 0.6-7-05-1		1.50	0.71	0.85	67	7	.030	0.21	4.2	4.2	4.2	2.4
FC 0.6-11-05-1		1.50	1.11	1.33	67	11	.030	0.33	4.2	6.2	4.2	2.4
FC 0.6-17-05-1	1.50	1.72	2.08	67	17	.030	0.51	6.2	6.2	6.2	2.4	
FC 0.6-31-05-1	1.50	3.13	3.75	67	31	.030	0.93	8.3	8.3	8.3	2.4	
FC 0.6-65-05-1	1.50	6.57	7.86	67	65	.030	1.95	12.3	11.3	12.3	2.4	
FC 0.7-7-05-1	2.00	0.95	0.85	67	7	.040	0.28	4.2	4.2	4.2	2.4	
FC 0.7-11-05-1	2.00	1.49	1.33	67	11	.040	0.44	4.2	6.2	4.2	2.4	
FC 0.7-17-05-1	2.00	2.30	2.06	67	17	.040	0.68	6.2	6.2	6.2	2.4	
FC 0.7-31-05-1	2.00	4.18	3.75	67	31	.040	1.24	8.3	8.3	8.3	2.4	

DIMENSIONS



- Notes:**
- (1) Q max rated value at ΔT = 0°, I max and V max, T_h = 25°C
 - (2) Option 2, Dim. C = Dim. B + :
1.7 mm (FC 0.45)
2.1 mm (FC 0.6 and FC 0.7)
 - (3) Thickness (D,mm) for Type L only.

Interfacing: Both hot and cold faces lapped flat, TYPE L. Both faces metallized and tinned, TYPE TT. Hybrid, hot face tinned, cold face lapped, TYPE TL. Hot face lapped, cold face tinned, TYPE LT.

WIRE STANDARDS			
Module Type	Wire Gauge (AWG)	Length (mm/in.)	Insulation
FC 0.45-ALL	32 (SOLID)	50/2.0	None
FC 0.6-ALL	30 (SOLID)	50/2.0	None
FC 0.7-ALL	30 (SOLID)	50/2.0	None

See page 4 for performance graphs, examples, and construction specifications.