

Materials Comparison Chart

Pos. #	Material	Supplier	Dk @10GHz	Df @10GHz	CTE, ppm/°C			Thermal Cond., W/m/K	Material components	Comments
					X	Y	Z			
1	RT/duroid 5880LZ	Rogers	1,96	0,0019	44	43	41	0,33	PTFE/random glass	
2	FEP 200-70	Taconic	2,00	0,0003	-	-	-	-	Thermoplastic bonding film 50um thick	Bonds at 285C
3	NY9208	Neltec	2,08	0,0006	25	35	250	0,27	PTFE/woven glass	
4	NY9208IM	Neltec	2,08	0,0006	25	35	250	0,27	PTFE/woven glass	Reduced intermodulation
5	TaclamPlus	Taconic	2,10	0,0004	-	-	280	-	Thin PTFE/ 2% to 3% ceramic	Needs 0.5 to 3.0mm metal backing
6	F4BK-1/2	WangLing	2,10	0,0015	25	34	240	0,30	Woven glass/Teflon resin	
7	IsoClad 917	Arlon	2,17	0,0013	46	47	236	0,26	PTFE/Crossplied glass	
8	CuClad 217LX	Arlon	2,17	0,0009	29	28	246	0,26	PTFE/Crossplied glass	
9	DiClad 880	Arlon	2,17	0,0009	25	34	252	0,26	PTFE/Unidirectional glass	
10	NY9217	Neltec	2,17	0,0008	25	35	260	0,27	PTFE/woven glass	
11	NY9217IM	Neltec	2,17	0,0008	25	35	260	0,27	PTFE/woven glass	Reduced intermodulation
12	TLP-5A	Taconic	2,17	0,0009	20	20	280	0,22	PTFE/woven glass	
13	TLY-5A	Taconic	2,17	0,0009	26	15	217	0,22	PTFE/woven glass	
14	TLY-5A-L	Taconic	2,17	0,0009	26	15	217	0,22	PTFE/woven glass	Laser ablateable
15	RT/duroid 5880	Rogers	2,20	0,0009	31	48	237	0,20	PTFE/random glass	
16	NY9220	Neltec	2,20	0,0009	25	35	260	0,27	PTFE/woven glass	
17	NY9220IM	Neltec	2,20	0,0009	25	35	260	0,27	PTFE/woven glass	Reduced intermodulation
18	TLP-5	Taconic	2,20	0,0009	20	20	280	0,22	PTFE/woven glass	
19	TLY-5	Taconic	2,20	0,0009	26	15	217	0,22	PTFE/woven glass	
20	TLY-5-L	Taconic	2,20	0,0009	26	15	217	0,22	PTFE/woven glass	Laser ablateable
21	F4BM-1/2	WangLing	2,20	0,0010	25	34	240	0,30	PTFE/woven glass/Teflon resin	
22	Ro 3001	Rogers	2,28	0,0030	-	-	-	0,22	Thermoplastic Bondingfilm 38um	Bonds at 220C
23	CuClad 6250	Arlon	2,32	0,0013	-	-	-	0,17	Thermoplastic Bondingfilm 38um	Bond at 130C
24	CuClad 233 LX	Arlon	2,33	0,0013	23	24	194	0,26	PTFE/Crossplied glass	
25	IsoClad 933	Arlon	2,33	0,0016	31	35	203	0,26	PTFE/Crossplied glass	
26	DiClad 870	Arlon	2,33	0,0013	17	29	217	0,26	PTFE/Unidirectional	
27	RT/duroid 5870	Rogers	2,33	0,0012	22	28	173	0,22	PTFE/random glass	
28	NY9233	Neltec	2,33	0,0011	25	35	260	0,27	PTFE/woven glass	
29	NY9233IM	Neltec	2,33	0,0011	25	35	260	0,27	PTFE/woven glass	Reduced intermodulation
30	TLP-3	Taconic	2,33	0,0009	20	20	280	0,22	PTFE/woven glass	
31	TLY-3	Taconic	2,33	0,0009	26	15	217	0,22	PTFE/woven glass	
32	TLY-3F	Taconic	2,33	0,0009	26	15	217	0,22	PTFE/woven glass	Formed antennas
33	CuClad 6700	Arlon	2,35	0,0025	-	-	-	-	Thermoplastic Bondingfilm 38um	Bonds at 220C
34	FV 6700	Neltec	2,35	0,0025	-	-	-	-	Thermoplastic Bondingfilm 38um	Bonds at 220C
35	HT1.5	Taconic	2,35	0,0025	-	-	-	0,22	Thermoplastic bonding film 38um thick	Bonds at 220C
36	CuClad 250 GX	Arlon	2,40	0,0018	18	19	177	0,25	PTFE/Crossplied glass	
37	DiClad 527	Arlon	2,40	0,0018	14	21	173	0,25	PTFE/Unidirectional glass	
38	DiClad 522	Arlon	2,40	0,0018	14	21	173	0,25	PTFE/Unidirectional	
39	Ultralam 2000	Rogers	2,40	0,0019	15	15	200	0,24	PTFE/woven glass	
40	NX9243	Neltec	2,43	0,0016	12	18	150	0,25	PTFE/woven glass	
41	NX9243IM	Neltec	2,43	0,0016	12	18	150	0,25	PTFE/woven glass	Reduced intermodulation
42	NX9245	Neltec	2,45	0,0016	12	18	150	0,25	PTFE/woven glass	
43	NX9245IM	Neltec	2,45	0,0016	12	18	150	0,25	PTFE/woven glass	Reduced intermodulation
44	TLT-0	Taconic	2,45	0,0006	9	12	140	0,19	PTFE/woven glass	
45	TLX-0	Taconic	2,45	0,0019	9	12	140	0,19	PTFE/woven glass	
46	NX9248	Neltec	2,48	0,0017	12	18	150	0,25	PTFE/woven glass	
47	NX9248IM	Neltec	2,48	0,0017	12	18	150	0,25	PTFE/woven glass	Reduced intermodulation
48	AD 250	Arlon	2,50	0,0018	12	15	95	0,24	PTFE/Glass/ceramic	
49	AD 250A	Arlon	2,50	0,0015	12	15	95	0,28	PTFE/Glass/ceramic	

50	AD 250C	Arlon	2,50	0,0013	47	29	196	0,33	PTFE/Glass/ceramic	
51	CuClad 250 GT	Arlon	2,50	0,0018	18	19	177	0,25	PTFE/Crossplied glass	
52	NX9250	Neltec	2,50	0,0017	12	18	150	0,25	PTFE/woven glass	
53	NX9250IM	Neltec	2,50	0,0017	12	18	150	0,25	PTFE/woven glass	Reduced intermodulation
54	TLT-9	Taconic	2,50	0,0006	9	12	140	0,19	PTFE/woven glass	
55	TLX-9	Taconic	2,50	0,0019	9	12	140	0,19	PTFE/woven glass	
56	AD 255	Arlon	2,55	0,0018	12	15	95	0,24	PTFE/Glass/ceramic	
57	AD 255A	Arlon	2,55	0,0015	16	16	80	0,30	PTFE/Glass/ceramic	
58	AD 255C	Arlon	2,55	0,0014	16	16	50	0,30	PTFE/Glass/ceramic	
59	AD 255C-IM	Arlon	2,55	0,0014	34	26	196	0,35	PTFE/Glass/ceramic	
60	NX9255	Neltec	2,55	0,0018	12	18	150	0,25	PTFE/woven glass	
61	NX9255IM	Neltec	2,55	0,0018	12	18	150	0,25	PTFE/woven glass	Reduced intermodulation
62	Ro 4725JXR	Rogers	2,55	0,0026	13,9	19	25,6	0,38	-	
63	TLT-8	Taconic	2,55	0,0006	9	12	140	0,19	PTFE/woven glass	
64	TLX-8	Taconic	2,55	0,0019	9	12	140	0,19	PTFE/woven glass	
65	F4B-1/2	WangLing	2,55	0,0010	16	21	186	0,30	Woven glass/Teflon resin	
66	F4BM-2-A	WangLing	2,55	0,0015	16	20	170	0,45	Woven glass/Teflon resin/ ceramic	
67	AD 260A	Arlon	2,60	0,0017	16	16	80	0,32	PTFE/Glass/ceramic	
68	NH9260	Neltec	2,60	0,0019	12	18	150	0,23	PTFE/woven glass/ceramic	
69	NX9260	Neltec	2,60	0,0019	12	18	150	0,25	PTFE/woven glass	
70	NX9260IM	Neltec	2,60	0,0019	12	18	150	0,25	PTFE/woven glass	Reduced intermodulation
71	TLT-7	Taconic	2,60	0,0006	9	12	140	0,19	PTFE/woven glass	
72	TLX-7	Taconic	2,60	0,0019	9	12	140	0,19	PTFE/woven glass	
73	TSM-26	Taconic	2,60	0,0014	23	28	78	0,27	PTFE/woven glass/ceramic	
74	TLA	Taconic	2,62	0,0012	9	12	140	0,22	PTFE/woven glass	Antenna grade
75	TLT-6	Taconic	2,65	0,0006	9	12	140	0,19	PTFE/woven glass	
76	TLX-6	Taconic	2,65	0,0019	9	12	140	0,19	PTFE/woven glass	
77	F4BM-1/2	WangLing	2,65	0,0015	16	21	173	0,40	PTFE/woven glass/Teflon resin	
78	NX9270	Neltec	2,70	0,0020	12	18	150	0,27	PTFE/woven glass	
79	AD 270	Arlon	2,70	0,0023	12	15	95	0,24	PTFE/Glass/ceramic	
80	NH9270	Neltec	2,70	0,0020	12	18	150	0,23	PTFE/woven glass/ceramic	
81	NX9270IM	Neltec	2,70	0,0020	12	18	150	0,27	PTFE/woven glass	Reduced intermodulation
82	Fastrise -27	Taconic	2,75	0,0014	59	70	72	0,25	PTFE/ceramic/thermoset resin	Bonds at 216C resin flow 4% to 36
83	NX9280	Neltec	2,80	0,0021	9	12	71	0,27	PTFE/woven glass	
84	NX9280IM	Neltec	2,80	0,0021	9	12	71	0,27	PTFE/woven glass	Reduced intermodulation
85	IS680-280	Isola	2,80	0,0280	12	13	45/191	0,32	-	
86	NH9280	Neltec	2,80	0,0021	9	12	71	0,23	PTFE/woven glass/ceramic	
87	TSM-DS	Taconic	2,85	0,0010	11	18	57	0,45	PTFE/woven glass/ceramic	
88	F4BTME-1/2	WangLing	2,85	0,0015	15	15	65	0,60	Woven glass/Teflon resin/ ceramic	
89	RT/duroid 6202PR	Rogers	2,90	0,0015	15	15	30	0,68	PTFE/woven glass/ceramic	
90	Ultralam 3850	Rogers	2,90	0,0025	17	17	150	0,20	Liquid Crystalline Polymer	
91	Ultralam 3908	Rogers	2,90	0,0025	17	17	150	0,20	LCP bonding film	LCP bonding film
92	NX9294	Neltec	2,94	0,0022	9	12	71	0,27	PTFE/woven glass	
93	NX9294IM	Neltec	2,94	0,0022	9	12	71	0,27	PTFE/woven glass	Reduced intermodulation
94	CLTE	Arlon	2,94	0,0025	10	12	35	0,50	PTFE/woven glass/ceramic/resin	Thermoplastic resin Bond at 288C
95	CLTE-MW	Arlon	2,94	0,0015	8	8	30	0,42	-	
96	CLTE-Xt	Arlon	2,94	0,0012	8	8	20	0,56	PTFE/Glass/ceramic	
97	NH9294	Neltec	2,94	0,0022	9	12	71	0,23	PTFE/woven glass/ceramic	
98	Ro 6002	Rogers	2,94	0,0012	16	16	24	0,60	PTFE/ceramic/bond-ply	Ceramic PTFE bond ply
99	RT/duroid 6002	Rogers	2,94	0,0012	16	16	24	0,60	PTFE/ceramic	
100	RT/duroid 6202	Rogers	2,94	0,0015	15	15	30	0,68	PTFE/woven glass/ceramic	
101	F4BT-1/2	WangLing	2,94	0,0010	20	25	140	0,40	PTFE/woven glass/ceramic	
102	TLE	Taconic	2,95	0,0028	9	12	70	0,20	PTFE/woven glass	
103	Fastrise -DS	Taconic	2,96	0,0018	11	17	66	0,36	PTFE/ceramic/ woven glass/ thermoset resin	Bonds at 216C - resin flow 5%
104	AD 300C	Arlon	2,97	0,0020	12	12	50	0,45	PTFE/Glass/ceramic	
105	AD 300D	Arlon	2,97	0,0021	24	23	98	0,37	PTFE/Glass/ceramic	
106	AD 300D-IM	Arlon	2,97	0,0021	24	23	98	0,37	PTFE/Glass/ceramic	

107	RF-301	Taconic	2,97	0,0012	17	20	150	0,23	PTFE/woven glass/ceramic	Antenna grade
108	CLTE	Arlon	2,98	0,0023	10	12	34	0,50	PTFE/Glass/ceramic	
109	NX9300	Neltec	3,00	0,0023	9	12	71	0,27	PTFE/woven glass	
110	NX9300IM	Neltec	3,00	0,0023	9	12	71	0,27	PTFE/woven glass	Reduced intermodulation
111	AD 300A	Arlon	3,00	0,0020	12	12	125	0,49	PTFE/Glass/ceramic	
112	CLTE-AT	Arlon	3,00	0,0013	8	8	20	0,64	PTFE/Glass/ceramic	
113	IS680-300	Isola	3,00	0,0300	12	13	45/191	0,32	-	
114	N9300-13RF	Neltec	3,00	0,0040	13	20	67	-	PTFE/wovenglass/thermoset resin	
115	NH9300	Neltec	3,00	0,0023	9	12	71	0,23	PTFE/woven glass/ceramic	
116	RF-30	Taconic	3,00	0,0014	11	21	125	0,23	PTFE/woven glass/ceramic	Antenna grade
117	Ro 3003	Rogers	3,00	0,0013	17	16	25	0,50	PTFE/ceramic/bond-ply	Ceramic PTFE bond ply
118	Ro 3003G2	Rogers	3,00	0,0011	16	17	18	0,43	-	
119	Ro 3730	Rogers	3,00	0,0013	11	12	65	0,45	PTFE/ceramic	Antenna grade laminate
120	Ro 4730	Rogers	3,00	0,0023	19	17	40	0,52	Ceramic/hydrocarbon	Antenna grade laminate
121	Ro 4730G3	Rogers	3,00	0,0029	13,7	14,7	30,3	0,42	-	
122	Ro 4730JXR	Rogers	3,00	0,0027	11,3	13,5	21,1	0,49	-	
123	TacPreg TPG-30	Taconic	3,00	0,0038	21	23	28	0,25	PTFE/ceramic/ woven glass/ BT resin	Bonds at 205C - resin flow 24%
124	TSM-30	Taconic	3,00	0,0013	23	28	78	0,27	PTFE/woven glass/ceramic	
125	TSM-DS3	Taconic	3,00	0,0011	10	16	23	0,65	PTFE/woven glass/ceramic	
126	F4BM-2-A	WangLing	3,00	0,0200	12	15	90	0,55	Woven glass/Teflon resin/ ceramic	
127	TF-1/2	WangLing	3,00	0,0010	50	50	60	0,50	Woven glass/Teflon resin/ ceramic	
128	F4BM-1/2	WangLing	3,00	0,0015	12	15	95	0,50	PTFE/woven glass/Teflon resin	
129	TP-1/2	WangLing	3,00	0,0010	-	-	-	0,60	Woven glass/Teflon resin/ ceramic	Temperature rise of 96°C=> CTE <6x10(-5)
130	Ro 3203	Rogers	3,02	0,0016	13	13	58	0,48	PTFE/glass/ceramic	
131	XtremeSpeed RO1200	Rogers	3,05	0,0017	8	8	30	0,42	-	
132	NX9318	Neltec	3,18	0,0024	9	12	71	0,27	PTFE/woven glass	
133	NX9318IM	Neltec	3,18	0,0024	9	12	71	0,27	PTFE/woven glass	Reduced intermodulation
134	NH9318	Neltec	3,18	0,0024	9	12	71	0,23	PTFE/woven glass/ceramic	
135	NX9320	Neltec	3,20	0,0024	9	12	71	0,27	PTFE/woven glass	
136	NX9320IM	Neltec	3,20	0,0024	9	12	71	0,27	PTFE/woven glass	Reduced intermodulation
137	TLC	Taconic	3,20	0,0030	9	12	70	0,24	PTFE/woven glass	
138	AD 320	Arlon	3,20	0,0038	12	15	95	0,24	PTFE/Glass/ceramic	
139	AD 320A	Arlon	3,20	0,0032	14	14	128	0,45	PTFE/Glass/ceramic	
140	GML 1000	GIL	3,20	0,0040	32	32	70/400	0,23	Plastic (polyester)	
141	IS680-320	Isola	3,20	0,0320	12	13	45/191	0,32	-	
142	N9320-13RF	Neltec	3,20	0,0045	13	20	67	-	PTFE/wovenglass/thermoset resin	
143	NH9320	Neltec	3,20	0,0024	9	12	71	0,23	PTFE/woven glass/ceramic	
144	TacPreg TPG-32	Taconic	3,20	0,0050	-	-	-	0,31	PTFE/ceramic/ woven glass/ BT resin	Bonds at 205C
145	Ro 4830	Rogers	3,25	0,0033	23	23	110	0,45	-	
146	NH9326	Neltec	3,26	0,0025	9	12	71	0,23	PTFE/woven glass/ceramic	
147	TMM 3	Rogers	3,27	0,0020	15	15	23	0,70	Ceramic/hydrocarbon	
148	Ro 4533	Rogers	3,30	0,0020	13	11	37	0,60	Ceramic/hydrocarbon	Antenna grade laminate
149	IS680-333	Isola	3,33	0,0340	12	13	45/191	0,32	-	
150	Ro 4835T	Rogers	3,33	0,0030	14	16	62	0,53	-	
151	TacPreg TPN-33	Taconic	3,33	0,0031	8	12	61	0,27	PTFE/ceramic/ woven glass/ BT resin	Bonds at 205C - resin flow 1~7%, 0,25 thik
152	XT Duroid 8000	Rogers	3,34	0,0035	18	23	68	0,35	Ceramic/high temp. thermoplastic	
153	25N	Arlon	3,38	0,0025	15	15	52	0,45	Ceramic/hydrocarbon	
154	IS680-338	Isola	3,38	0,0350	12	13	45/191	0,32	-	
155	NH9338	Neltec	3,38	0,0025	9	12	71	0,23	PTFE/woven glass/ceramic	
156	Ro 4003	Rogers	3,38	0,0029	11	14	46	0,71	Ceramic/hydrocarbon	
157	Ro 4003C	Rogers	3,38	0,0027	11	14	46	0,71	-	
158	F4BTME-1/2	WangLing	3,38	0,0020	15	15	55	0,75	Woven glass/Teflon resin/ ceramic	
159	Ro 4534	Rogers	3,40	0,0022	11	14	46	0,60	Ceramic/hydrocarbon	Antenna grade laminate
160	Syron 7000	Rogers	3,40	0,0045	18	23	68	0,35	Ceramic/high temp. thermoplastic	
161	TLF-34	Taconic	3,40	0,0020	21	23	85	0,36	PTFE/woven glass/ceramic	
162	Ro 4535	Rogers	3,44	0,0037	16	17	50	0,60	-	
163	IS680-345	Isola	3,45	0,0360	12	13	45/191	0,32	-	

164	NH9348	Neltec	3,48	0,0030	9	12	71	0,23	PTFE/woven glass/ceramic	
165	Ro 4350B	Rogers	3,48	0,0037	14	16	35	0,69	Ceramic/hydrocarbon	
166	Ro 4350B-TX	Rogers	3,48	0,0034	14	16	35	0,62	Ceramic/hydrocarbon	
167	Ro 4835	Rogers	3,48	0,0037	10	12	31	0,66	-	
168	VT-462S	Ventec	3,50	0,0050	12	12	48/260	-	PTFE/woven glass	RC 50%
169	AD 350A	Arlon	3,50	0,0030	5	9	35	0,45	PTFE/Glass/ceramic	
170	GETEK	Isola	3,50	0,0100	13	14	55/275	0,15	-	
171	N4350-13RF	Neltec	3,50	0,0065	10	14	70	0,35	Woven glass/thermoset resin	
172	N9350-13RF	Neltec	3,50	0,0055	13	20	67	-	PTFE/wovenglass/thermoset resin	
173	RF-35	Taconic	3,50	0,0018	19	24	64	0,24	PTFE/woven glass/ceramic	
174	RF-35A2	Taconic	3,50	0,0015	8	10	104	0,29	PTFE/woven glass/ceramic	
175	RF-35P	Taconic	3,50	0,0034	15	15	110	0,23	PTFE/woven glass/ceramic	
176	Ro 3035	Rogers	3,50	0,0018	17	17	24	0,50	PTFE/ceramic	
177	RT/duroid 6035HTC	Rogers	3,50	0,0013	19	19	39	1,44	-	
178	TacPreg TPG-35	Taconic	3,50	0,0050	21	23	28	0,25	PTFE/ceramic/ woven glass/ BT resin	Bonds at 205C
179	TC350	Arlon	3,50	0,0020	7	7	23	1,03	PTFE/Glass/ceramic	
180	TC350 Plus	Arlon	3,50	0,0017	10	9	38	1,24	-	
181	TLF-35	Taconic	3,50	0,0020	21	23	85	0,36	PTFE/woven glass/ceramic	
182	Ro 4450F	Rogers	3,52	0,0041	19	17	50	0,65	Ceramic/hydrocarbon prepreg	Hydrocarbon ceramic prepreg
183	Ro 4450B	Rogers	3,54	0,0040	19	17	50	0,60	Ceramic/hydrocarbon prepreg	Hydrocarbon ceramic prepreg, 0,004 thick
184	25FR	Arlon	3,58	0,0035	16	18	59	0,45	Ceramic/hydrocarbon	
185	VT-464(D)	Ventec	3,60	0,0060	12	12	60/280	-	PTFE/woven glass	RC 50%
186	BT-Epoxy	-	3,60	0,0140	15	18	140	-	-	
187	VT-464L	Ventec	3,70	0,0090	12	12	45/210	-	PTFE/woven glass	RC 50%
188	Multiclad HF	Arlon	3,70	0,0040	14	16	20	0,64	Woven glass/thermoset resin	prepreg
189	Multiclad HF	Arlon	3,70	0,0040	14	16	20	0,64	Woven glass/thermoset resin	
190	VT-462(L)	Ventec	3,80	0,0070	12	12	52/210	-	PTFE/woven glass	RC 50%
191	VT-461	Ventec	3,80	0,0095	12	12	40/240	-	PTFE/woven glass	RC 50%
192	VT-464	Ventec	3,80	0,0120	12	12	45/210	-	PTFE/woven glass	RC 50%
193	N4380-13RF	Neltec	3,80	0,0070	10	14	70	0,35	Woven glass/thermoset resin	
194	VT-464(M)	Ventec	4,05	0,0100	12	12	40/210	-	PTFE/woven glass	RC 50%
195	AD 410	Arlon	4,10	0,0030	9	9	40	0,46	PTFE/Glass/ceramic	
196	Kappa 438	Rogers	4,10	0,0050	13	16	42	0,64	-	
197	RF-41	Taconic	4,10	0,0038	9	12	93	0,29	PTFE/woven glass/ceramic	
198	TLF-41	Taconic	4,10	0,0035	9	9	40	0,43	PTFE/woven glass/ceramic	
199	VT-42	Ventec	4,20	0,0150	13	13	50/250	-	PTFE/woven glass	1 GHz
200	VT-42A	Ventec	4,20	0,0150	13	13	50/250	-	PTFE/woven glass	1 GHz
201	VT-42S	Ventec	4,20	0,0150	13	13	50/250	-	PTFE/woven glass	1 GHz
202	FR402	Isola	4,25	0,0160	13	13	165	-	-	
203	VT-47	Ventec	4,27	0,0160	12	12	45/190	-	PTFE/woven glass	1 GHz
204	VT-481	Ventec	4,30	0,0150	12	12	45/220	-	PTFE/woven glass	1 GHz
205	AD 430	Arlon	4,30	0,0030	9	9	40	0,46	PTFE/Glass/ceramic	
206	Polyimide	Nelco	4,30	0,0150	15	15	55	-	-	1 MHz
207	RF-43	Taconic	4,30	0,0033	9	11	96	0,30	PTFE/woven glass/ceramic	
208	TLF-43	Taconic	4,30	0,0035	9	9	40	0,43	PTFE/woven glass/ceramic	
209	VT-447	Ventec	4,35	0,0130	12	12	40/210	-	PTFE/woven glass	1 GHz
210	VT-447(B)	Ventec	4,35	0,0130	12	12	45/190	-	PTFE/woven glass	1 GHz
211	447V	Ventec	4,35	0,0130	12	12	40/210	-	PTFE/woven glass	1 GHz
212	VT-441	Ventec	4,40	0,0140	12	12	38/190	-	PTFE/woven glass	1 GHz
213	VT-441V	Ventec	4,40	0,0140	12	12	38/190	-	PTFE/woven glass	1 GHz
214	VT-441C	Ventec	4,40	0,0140	-	-	35/185	-	PTFE/woven glass	1 GHz
215	F4BTME-1/2	WangLing	4,40	0,0025	12	14	50	0,90	Woven glass/Teflon resin/ ceramic	
216	VT-42 (Black)	Ventec	4,50	0,0180	13	13	50/250	-	PTFE/woven glass	1 GHz
217	AD 450	Arlon	4,50	0,0035	8	11	42	0,38	PTFE/Glass/ceramic	
218	AD 450A	Arlon	4,50	0,0030	10	10	40	0,40	PTFE/Glass/ceramic	
219	RF-45	Taconic	4,50	0,0037	9	13	96	0,33	PTFE/woven glass/ceramic	
220	TLF-45	Taconic	4,50	0,0035	9	9	40	0,43	PTFE/woven glass/ceramic	

221	TMM 4	Rogers	4,50	0,0020	16	16	21	0,70	Ceramic/hydrocarbon	
222	VT-42C	Ventec	4,80	0,0180	13	13	40/220	-	PTFE/woven glass	1 GHz
223	92ML	Arlon	5,30	0,0110	18	18	27	1,60	-	1MHz
224	92ML StaCool	Arlon	5,30	0,0110	18	18	27	1,60	-	1MHz
225	TMM 6	Rogers	6,00	0,0023	18	18	26	0,72	Ceramic/hydrocarbon	
226	TP-1/2	WangLing	6,00	0,0010	-	-	-	0,60	Woven glass/Teflon resin/ ceramic	Temperature rise of 96°C=> CTE <6x10(-5)
227	AD 600	Arlon	6,15	0,0030	11	10	45	0,46	PTFE/Glass/ceramic	
228	RF-60	Taconic	6,15	0,0038	9	8	69	0,40	PTFE/woven glass/ceramic	
229	Ro 3006	Rogers	6,15	0,0020	17	17	24	0,79	PTFE/ceramic/bond-ply	Ceramic PTFE bond ply
230	Ro 3006	Rogers	6,15	0,0020	17	17	24	0,79	PTFE/ceramic	
231	Ro 3206	Rogers	6,15	0,0027	13	13	34	0,67	PTFE/woven glass/ceramic	
232	Ro 4360	Rogers	6,15	0,0038	17	15	30	0,80	Ceramic/hydrocarbon	
233	Ro 4360G2	Rogers	6,15	0,0038	13	14	28	0,75	-	
234	RT/duroid 6006	Rogers	6,15	0,0027	47	34	117	0,49	-	
235	TC600	Arlon	6,15	0,0020	9	9	35	1,10	PTFE/Glass/ceramic	
236	Fastrise -77	Taconic	7,70	0,0034	10	17	62	0,43	PTFE/ceramic/ woven glass/ thermoset resin	Bonds at 216C - resin flow 5%
237	TMM 10	Rogers	9,20	0,0022	21	21	20	0,76	Ceramic/hydrocarbon	
238	TF-1/2	WangLing	9,20	0,0010	50	50	60	0,50	Woven glass/Teflon resin/ ceramic	
239	TP-1/2	WangLing	9,60	0,0010	-	-	-	0,60	Woven glass/Teflon resin/ ceramic	Temperature rise of 96°C=> CTE <6x10(-5)
240	TMM 10i	Rogers	9,80	0,0020	19	19	20	0,76	Ceramic/hydrocarbon	
241	AR 1000	Arlon	10,00	0,0030	14	16	37	0,65	PTFE/ceramic	
242	CER10	Taconic	10,00	0,0035	13	15	46	0,63	PTFE/woven glass/ceramic	
243	AD 1000	Arlon	10,20	0,0023	8	10	20	0,81	PTFE/Glass/ceramic	
244	Ro 3010	Rogers	10,20	0,0022	13	11	16	0,95	PTFE/ceramic/bond-ply	Ceramic PTFE bond ply
245	Ro 3010	Rogers	10,20	0,0022	13	11	16	0,95	PTFE/ceramic	
246	Ro 3210	Rogers	10,20	0,0027	13	13	34	0,81	PTFE/woven glass/ceramic	
247	RT/duroid 6010LM	Rogers	10,20	0,0023	24	24	47	0,86	PTFE/ceramic	
248	TF-1/2	WangLing	10,20	0,0010	50	50	60	0,50	Woven glass/Teflon resin/ ceramic	
249	TP-1/2	WangLing	10,20	0,0010	-	-	-	0,60	Woven glass/Teflon resin/ ceramic	Temperature rise of 96°C=> CTE <6x10(-5)
250	TP-1/2	WangLing	10,50	0,0010	-	-	-	0,60	Woven glass/Teflon resin/ ceramic	Temperature rise of 96°C=> CTE <6x10(-5)
251	TP-1/2	WangLing	11,00	0,0010	-	-	-	0,60	Woven glass/Teflon resin/ ceramic	Temperature rise of 96°C=> CTE <6x10(-5)
252	TMM 13i	Rogers	12,85	0,0019	19	19	20	0,76	-	
253	TF-1/2	WangLing	16,00	0,0015	50	50	60	0,50	Woven glass/Teflon resin/ ceramic	
254	TP-1/2	WangLing	16,00	0,0015	-	-	-	0,60	Woven glass/Teflon resin/ ceramic	Temperature rise of 96°C=> CTE <6x10(-5)
255	TF-1/2	WangLing	20,00	0,0015	50	50	60	0,50	Woven glass/Teflon resin/ ceramic	
256	TP-1/2	WangLing	20,00	0,0015	-	-	-	0,60	Woven glass/Teflon resin/ ceramic	Temperature rise of 96°C=> CTE <6x10(-5)
257	TF-1/2	WangLing	22,00	0,0015	50	50	60	0,50	Woven glass/Teflon resin/ ceramic	
258	TP-1/2	WangLing	22,00	0,0015	-	-	-	0,60	Woven glass/Teflon resin/ ceramic	Temperature rise of 96°C=> CTE <6x10(-5)