

USB2224 Customer Evaluation Board Revised: Tuesday August 17, 2004

6310 Revision: B3



Bill Of Materials August 17,2004

Item	Quantity	Part Reference	Description	Manufacturer	Part Number	Notes
1	30	C1 C2 C4 C6 C7 C9 C10 C11 C13 C17 C18 C19 C20 C21 C22 C23 C25 C27 C47 C48 C49 C50 C51 C53 C54 C62 C64 C65 C66 C77	Capacitor, 0.1uF, 16V, 10%, X7R, 0603	Panasonic	ECJ-1VB1C104K	Non critical
2	2	C3 C71		Panasonic	ECJ-2FB0J106M	Low ESR - ceramic close to pins
3	5	C12 C14 C29 C52 C72	Capacitor, 10uF, 16VDC, 10%, Tantalum, EIA-B	Kemet	T491B106K016AS	Non critical
4	1	C28	Capacitor, 4.7uF, 16VDC, 10%, Tantalum, EIA-B	AVX	TAJB475K016R	Non critical
5	1	C30	Capacitor, 0.01uF, 16V, 10%, X7R, 0603	Panasonic	ECJ-1VB1C103K	Non critical
6	2	C57 C58	Capacitor, 18pF, 50V, 5%, NPO, 0603	Yageo America	0603CG180J9B200	Non critical
7	1	C59	Capacitor, 1uF, 35VDC, 10%, Tantalum, EIA-B	Kemet	T491B105K035AS	Non critical
8	4	C73 C74 C75 C76	Capacitor, 1.0uF, 16VDC, 10%, X5R, 0805	Panasonic	ECJ-GVB1C105K	Non critical
9	4	FB1 FB2 FB3 FB4	Ferrite Bead, 120 Ohm, 0.5A, 0.1DCR, 0603	Panasonic	EXC-3BP121H	Other mfg acceptable
10	1	J1	Header Assembly, Compact Flash, Type I/II, Normal Height, SMT	Molex	55358-5021	Other sockets available - PCB decal may be different
11	1	J2	Connector Housing Assembly, Memory Stick, SMT	DDK	MCK-10ANA-5N	Other sockets available - PCB decal may be different
12	1	J3	Connector Housing Assembly, SmartMedia + XD, SMT	Proconn	TIN044-00-1000	Other sockets available - PCB decal may be different
13	1	J4	Connector Housing Assembly, Secure Digital, SMT	AVX	14 5638 009 511 862	Other sockets available - PCB decal may be different
14	3	J13 JP11 JP12	Header, 1 x 3, 0.1 Inch, Vertical	Samtec	TSW-103-14-L-S	Not needed for production
15	5	LED5 LED6 LED7 LED8 LED9	LED, Green, 0603	Stanley Electric	BG1111C-TR	Other mfg acceptable
16	1	P1	Receptacle, USB, Style B, Right Angle, Through-hole	AMP	787780-1	
17	1	P3	Header, 2 x 17, 0.1 Inch, Shrouded, Vertical	3M	2534-6002UB	Not needed for production
18	1	P5	Connector, Power Jack, 2.0mm, 12V, 4A, Right Angle	Cui Stack	PJ-002AH	
19	2	Q3 Q5	Transistor, Si4965DY, Dual P-Channel MOS-FET, 8V, 8A, SO-8	Siliconix	Si4965DY	Not critical can be substituted with other FET IDDmax > 0.5A, Rdsn < 0.2 Ohm
20	1	Q4	Transistor, 2N3904, NPN, 40V, 350mW, SOT-23	ON Semi	MMBT3904LT1	
21	19	R1 R15 R16 R35 R63 R69 R70 R80 R83 R94 R96 R97 R117 R118 R122 R123 R144 R145 R148	Resistor, 10K, 5%, 1/16W, 0603	Yageo America	9C06031A1002JLHFT	R144, R145 not needed for production
22	2	R2 R147	Resistor, 330K, 5%, 1/16W, 0603	Yageo America	9C06031A3303JLHFT	Non critical
23	1	R4	Resistor, 12.0K, 1%, 1/16W, 0603	Yageo America	9C06031A1202FKHFT	Critical 1% needed
24	2	R7 R137	Resistor, ZERO, 0.1W, 1206	Yageo America	9C12063A0R00JLHFT	Optional for analog ground moat
25	5	R18 R19 R26 R27 R29	Resistor, ZERO, 0.1W, 0603	Yageo America	9C06031A0R00JLHFT	Non critical
26	9	R36 R37 R38 R39 R40 R109 R120 R121 R125	Resistor, 1K, 5%, 1/16W, 0603	Yageo America	9C06031A1001JLHFT	Non critical

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27	1	R48	Resistor, 22K, 5%, 1/16W, 0603	Rohm	MCR03EZHZJ223	Non critical
28	5	R57 R127 R128 R131 R132	Resistor, 220, 5%, 1/16W, 0603	Yageo America	9C06031A2200JLHFT	Non critical
29	3	R93 RR1 R150	Resistor, 2.2K, 5%, 1/16W, 0603	KOA Speer	RK73B1JLTD222J	Non critical
30	2	R119 R139	Resistor, 1Meg, 5%, 1/16W, 0603	Yageo America	9C06031A1004JLHFT	Non critical
31	1	R138	Resistor, 33, 5%, 1/16W, 0603	Yageo America	9C06031A33R0JLHFT	Non critical
32	4	R140 R141 R142 R143	Resistor, 330, 5%, 1/16W, 0603	Yageo America	9C06031A3300JLHFT	Non critical
33	1	U1	IC, USB2224, Card reader, 128 pin TQFP	SMSC	USB2224	
34	1	U4	IC, SST39VF010, Flash Memory, 1Mb, 128K x 8, 70ns, PLCC-32	Silicon Storage Technology	SST39VF010-70-4C-NH	Not needed for internal ROM, can also use AMD or other mfg
35	1	U9	IC, 93LC66A, Serial EEPROM, 512 x 8, 2.5V, SO-8	Microchip	93LC66A/SN	Other mfg acceptable
36	1	V1	Socket, IC, 32 Pin PLCC, Leaf Contacts, SMT	Assmann	A-CCS32-Z-SM	Not needed for production
37	1	VR2	IC, LT1129CST-3.3, Voltage Regulator, +3.3V, 700mA, SOT-223	Linear Technology	LT1129CST-3.3	Minimum 500mA supply - Critical for bus powered suspend current
38	1	Y1	Crystal, 12.000MHz, 50ppm, 18pF, HC-49SMT	Citizen America	HCM49-12.000MABJT	Other mfg acceptable