

Model 82 material declaration. BI Technologies Corporation

10/3/2013

LF and non-LF option content are identical after 2/1/2005

No content is banned per E.U. RoHS. Average mass of 82 trimmer is 0.34 gram each.

Prepared by Eric Arnold (714) 447-2565

Weights above 1 milligram rounded to the nearest mg. Values less than 1 milligram given in scientific notation.

Sub-component	Material	% of total mass	Substance name	CAS #	Substance Weight (grams)	Special classification
Housing	"Nickel silver" alloy	31.6%	Cu	7440-50-8	0.069	
			Zn	7440-66-6	0.018	
			Ni	7440-02-0	0.019	
Rotor	PPS blend	14.0%	polyphenylene sulphide	26125-40-6	0.038	
			trade secret	unknown	0.009	non-hazardous
O-ring	silicone rubber	1.1%	methylvinyl polysiloxane	68083-18-1	0.003	
			trade secret	unknown	7.62E-04	non-hazardous
Contact	Cu alloy wire	0.42%	Cu	7440-50-8	7.70E-04	
			Zn	7440-66-6	3.78E-04	
			Ni	7440-02-0	2.52E-04	
	Nickel alloy bar	0.30%	Cu	7440-50-8	5.00E-07	
			Ni	7440-02-0	8.46E-04	
			C	7440-44-0	6.00E-07	
			Mn	7439-96-5	2.50E-06	
			Fe	7439-89-6	1.50E-04	
			S	7704-34-9	5.00E-08	
			Si	7440-21-3	5.00E-07	
Terminals	Cu wire	16.3%	Cu	7440-50-8	0.055	
	Sn plating	0.008%	Sn	7440-31-5	2.54E-05	
Substrate	Alumina	36.1%	Al2O3	1344-28-1	0.117	
			SiO2, amorphous	7631-86-9	0.001	
			TiO2	13463-67-7	6.09E-04	
			FeO2	1345-25-1	6.09E-04	
			MnO2	1313-13-9	0.001	
			MgO	1309-48-4	6.09E-04	
			CaO	1305-78-8	6.09E-04	
Conductor	AgPd thick film	0.12%	Al2O3	1344-28-1	2.71E-06	
			SiO2, amorphous	7631-86-9	1.19E-05	
			TiO2	13463-67-7	2.71E-06	
			PbO	1317-36-8	1.62E-05	RoHS exemption 34
			ZnO	1314-13-2	2.94E-06	
			B2O3	1303-86-2	1.00E-06	
			ZrO2	1314-23-4	2.4E-07	
			BaO	1304-28-5	3.08E-06	
			Ag	7440-22-4	3.23E-04	
			Pd	7440-05-3	3.60E-05	
Resistor	Ruthenate thick film	0.06%	Al2O3	1344-28-1	2.66E-06	
			SiO2, amorphous	7631-86-9	2.23E-05	
			TiO2	13463-67-7	2.66E-06	
			MnO2	1313-13-9	1.20E-06	
			PbO	1317-36-8	5.85E-05	RoHS exemption 34
			ZnO	1314-13-2	6.38E-06	
			B2O3	1303-86-2	7.46E-06	
			ZrO2	1314-23-4	1.79E-06	
			BaO	1304-28-5	3.02E-06	
			Ag	7440-22-4	7.22E-06	
			Pd	7440-05-3	9.18E-06	
			Steatite	14807-96-6	4.00E-07	
			Bi2Ru2O6	unknown	9.00E-06	
			Pb2Ru2O6+x	unknown	6.40E-05	RoHS exemption 34
			RuO2	12036-10-1	4.20E-06	