

**Average Weight: 9.5270g**

Component	Substance Description	CAS Number or Description	Percent of Component (%)	Use in Product	Component Weight/ Substance Weight (grams)	Component Percent of Total (%)
<b>Silicon Die</b>					<b>0.237267</b>	<b>2.490</b>
	Silicon (Si)	7440-21-3	100.00	Basis	0.237267	
<b>Solder Bump</b>					<b>0.011261</b>	<b>0.118</b>
	Tin (Sn)	7440-31-5	63.00	Basis	0.007094	
	Lead (Pb)	7439-92-1	37.00	Basis	0.004167	
<b>Underfill</b>					<b>0.030000</b>	<b>0.315</b>
	Bisphenol F/ epichlorohydrin copolymer	9003-36-5	20.00	Basis	0.006000	
	Phenolic Resin	Trade Secret	15.00	Basis	0.004500	
	Bisphenol A type liquid epoxy resin	25068-38-6	5.00	Basis	0.001500	
	Amine type accelerator	Trade Secret	5.00	Basis	0.001500	
	Silicon Dioxide	60676-86-0	51.50	Basis	0.015450	
	Carbon Black	1333-86-4	1.00	Basis	0.000300	
	Additives	Trade Secret	2.50	Additive	0.000750	
<b>Lid</b>					<b>4.965400</b>	<b>52.119</b>
	Copper (Cu)	7440-50-8	99.35	Main Material	4.883471	
	Nickel (Ni)	7440-02-0	1.65	Main Material	0.081929	
<b>Lid Adhesive</b>					<b>0.116000</b>	<b>1.218</b>
	Aluminium Oxide Al <sub>2</sub> O <sub>3</sub>	1344-28-1	70.00	Main Material	0.081200	
	Dimethyl siloxane, dimethylvinyl-terminated	68083-19-2	30.00	Main Material	0.034800	
<b>Solder Ball</b>					<b>0.964719</b>	<b>10.126</b>
	Tin (Sn)	7440-31-5	96.50	Main Material	0.930954	
	Silver (Ag)	7440-22-4	3.00	Main Material	0.028942	
	Copper (Cu)	7440-50-8	0.50	Main Material	0.004824	

Component	Substance Description	CAS Number or Description	Percent of Component (%)	Use in Product	Component Weight/ Substance Weight (grams)	Component Percent of Total (%)
Substrate					<b>3.202400</b>	<b>33.614</b>
	Copper (Cu)	7440-50-8	36.11		1.156341	
	Tin (Sn)	7440-31-5	0.78		0.024927	
	Lead (Pb)	7439-92-1	0.12		0.003880	
	Silver (Ag)	7440-22-4	0.02		0.000570	
	BT Core	N/A	49.17		1.574723	
	ABF	N/A	11.31		0.362182	
	Solder Mask	N/A	2.49		0.079778	

## Revision History

The following table shows the revision history for this document.

Date	Version	Description of Revisions
05/23/2014	1.0	Initial Xilinx release.

## Notice of Disclaimer

Xilinx regards this materials data to be correct but makes no guarantee as to its accuracy or completeness, including, but not limited to, with respect to its compliance with applicable environmental laws and regulations. Xilinx subcontracts the production, test and assembly of hardware devices to independent third-party vendors and materials suppliers (“Contractors”). All data provided hereunder is based on information received from Contractors. Xilinx has not independently verified the accuracy or completeness of this information which is provided solely for your reference in connection with the use of Xilinx products.