



Digi NS9210

Package Weight and Material Composition Information

Package **CABGA 13x13 2 LAYER**

177 IO

Die size (mm):

Die #1 4.8 x 5.1 x 0.254

		name	composition	%	gms	density	gms	%	PPM
Mold Compound		Nitto GE-100LFC5				2.0	0.2242	54.08%	540,803
		Resin	Biphenyl	11.5	0.0258			6.22%	62,192
		Filler	SiO2	88.5	0.1984			47.86%	478,610
		Antimony	none	0.00	0.0000			0.00%	-
		Brominated compound	none	0.00	0.0000			0.00%	-
Laminate		CCL-HL832 (BT)					0.1039	25.05%	250,543
				%	gms	density			
			Laminate		0.0608	1.8		14.68%	146,778
			Solder Mask	SM	0.0169	2.2		4.08%	40,803
			Plating	Cu	0.0195	8.9		4.71%	47,066
			Plating	Ni	0.0056	8.9		1.35%	13,505
			Plating	Au	0.0010	19.3		0.24%	2,391
Specific substance breakout, already included in laminate weight total			Antimony	Sb2O3	0.000	0.0000		0.00%	-
			PBB & PBDE		0.00	0.0000		0.00%	-
			Total brominated compound		3.7494	0.0039		3.75%	37,494
Die							0.0149	3.60%	36,002
Die #1	Silicon					0.014923008	2.4	3.60%	36,002
Die Attach							0.0021	0.50%	5,018
Die #1	2300	Resin		22	0.0004576	3.3		0.11%	1,104
		Filler	Ag	78	0.0016223			0.39%	3,914
Wire		MKE HTS-Type				19.3	0.0027	0.65%	6,476
Wire Dia(mm)	0.020		Au	99.00	0.002657516			0.641134%	6411.335
			Ag	0.0025	0.000000067			0.000016%	0.162
			Cu	0.0005	0.000000013			0.000003%	0.032
			Fe	0.0005	0.000000013			0.000003%	0.032
			Ca	0.0020	0.000000054			0.000013%	0.130
			Pd	0.9900	0.000026575			0.006411%	64.113
			Mg	0.0005	0.000000013			0.000003%	0.032
Ball		Sn 0.965Ag 0.03Cu 0.005					0.0668	16.12%	161,158
dia (mm)	0.46	Material		%	gms	ave density			
			Sn	96.5%	0.0645	7.4		15.55%	155,518
			Ag	3.0%	0.0020	7.4		0.48%	4,835
			Cu	0.5%	0.0003	7.4		0.08%	806
			0	0.0%	0.0000			0.00%	-
							0.4145	100%	1000000



Shaded blocks calculated per RoHS requirements (% of material weight, not total package weight)

Disclaimer

The calculators identified in this report are used solely for determining package and weight composition and not for any other purpose, including but not limited to RoHS compliance. These calculators are used at the request of Customer in accordance with Amkor's current Terms and Conditions. Customer acknowledges that certain data used to generate the package and weight composition are provided by third parties and may not be validated and as such, the associated calculations performed herein are unproven and may produce inconclusive results.

All information generated by the use of these calculators is provided "As Is." Amkor makes no warranty or representation, whatsoever, as to the sufficiency or accuracy of any such information it has disclosed hereunder or as to the results to be obtained therefrom and assumes no responsibility arising from any use or misuse thereof.