Product / Package Information

Package	BGA_ED
Body Size (mm)	25 X 25
Ball Count	576
Terminal Finish	SnAgCu
Solder Ball Size (um)	0.65

Environmental Information

RoHS Compliant	RoHS-compliant
High Temperature Compliant	Yes
Halogen Free Compliant	Yes
REACH SVHC Compliant	Yes

Materials Declaration

Heat Spreader Material

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Copper & its alloys	Copper	7440-50-8	2.41 E+00	98.50	985000	56.03	560311
Nickel & its alloys	Nickel	7440-02-0	3.68 E-02	1.50	15000	0.85	8533
Subtotal	Subtotal		2.45 E+00	100.0	1000000	56.88	568844

Heat Spreader Attach Material

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Copper & its alloys	Alumina Filler	Proprietary	4.40 E-02	80	800000	1.02	10216
Nickel & its alloys	Silicone Elastomer	Proprietary	1.10 E-02	20	200000	0.26	2554
Subtotal			5.50 E-02	100	1000000	1	12770

Laminate

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Copper & its alloys	Glass Cross	Proprietary	3.82 E-01	38.77	387700	8.88	88756
Thermoset	Epoxy	Proprietary	3.86 E-01	33.60	391600	8.96	89649
Copper & its alloys	Copper	7440-50-8	2.11 E-01	21.42	214200	4.90	49037
Other inorganic materials	Silicon Dioxide	Proprietary	6.41 E-03	0.65	6500	0.15	1488
Subtotal			9.86 E-01	94.4	1000000	23	228931

Flip Chip Attach Material

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Tin & its alloys	Tin	7440-31-5	2.53E-03	98.20	982000	0.06	588
Tin & its alloys	Silver	7440-22-4	4.64E-05	1.80	18000	0.00	11
			2.58E-03	100.00	1000000	0.06	599

External Solder Ball

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Tin & its alloys	Tin	7440-31-5	5.48 E-01	96.50	965000	12.73	127263
Tin & its alloys	Silver	7440-22-4	1.70 E-02	3.00	30000	0.40	3956
Tin & its alloys	Copper	7440-50-8	2.84 E-03	0.50	5000	0.07	659
Subtotal			5.68 E-01	100	1000000	13.19	131879

Chip

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Other inorganic materials	Silicon	7440-21-3	1.84 E-01	99.0	990000	4.28	42754
Copper & its alloys	Copper	7440-50-8	1.86 E-03	1.0	10000	0.04	432
Subtotal			1.86 E-01	100	1000000	4.32	43186

Solder Bump Composition

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Tin & its alloys	Tin	7440-31-5	2.40 E-02	98.20	42185	0.56	5563
Tin & its alloys	Silver	7440-22-4	4.39 E-04	1.80	773	0.01	102
Subtotal			2.44 E-02	100.00	42958	0.57	5665

Underfill

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Other inorganic materials	Silicon dioxide filler	Proprietary	1.93 E-02	55.0	550000	0.45	4469
Other organic materials	Napthalene Base Epoxy	Proprietary	7.00 E-03	20.0	200000	0.16	1625
Thermoset	Anhydride hardener	Proprietary	5.25 E-03	15.0	150000	0.12	1219
Others	Others	Proprietary	3.50 E-03	10.0	100000	0.08	813
Subtotal			3.50 E-02	100.0	1000000	0.81	8126

	Weight (g)	Percentage (%)	PPM
Package Totals	**4.31 E+00**	100.00	1000000

Note: The information provided in this declaration are true to the best of ADI's knowledge.

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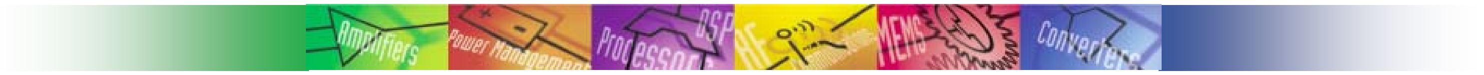

Product / Package Information

Package	BGA_ED
Body Size (mm)	25 X 25
Ball Count	576
Terminal Finish	SnPbAg

Environmental Information

RoHS Compliant	No
High Temperature Compliant	No
Halogen Free Compliant	No
REACH SVHC Compliant	Yes

Materials Declaration

Metal Lid

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Copper & its alloys	Copper	7440-50-8	2.41 E+00	98.50	985000	56.00	559976
Copper & its alloys	Nickel	7440-02-0	3.68 E-02	1.50	15000	0.85	8528
Subtotal	Subtotal		2.45 E+00	100.0	1000000	56.85	568504

Metal Lid Adhesive

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Other inorganic materials	Alumina Filler	Proprietary	4.40 E-02	80	800000	1.02	10210
Other organic materials	Silicone Elastomer	Proprietary	1.10 E-02	20	200000	0.26	2552
Subtotal			5.50 E-02	100	1000000	1	12762

Laminate

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Copper & its alloys	Glass Cross	Proprietary	3.82 E-01	38.77	387700	8.87	88703
Thermoset	Epoxy	Proprietary	3.31 E-01	33.60	336000	7.69	76875
Copper & its alloys	Copper	7440-50-8	2.11 E-01	21.42	214200	4.90	49008
Thermoset	Bromine Compounds	Proprietary	5.48 E-02	5.56	55600	1.27	12721
Other inorganic materials	Silicon Dioxide	Proprietary	6.41 E-03	0.65	6500	0.15	1487
Subtotal			9.86 E-01	100.0	1000000	23	228794

Laminate Pre-plating

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Tin & its alloys	Tin	7440-31-5	1.63E-03	63.00	630000	0.04	377
Other organic materials	Lead	7439-92-1	9.55E-04	37.00	370000	0.02	222
Subtotal			2.58E-03	100.00	1000000	0.06	599

Laminate Pre-plating

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Tin & its alloys	Tin	7440-31-5	1.60E-03	62.00	620000	0.04	371
Tin & its alloys	Lead	7439-92-1	9.29E-04	36.00	360000	0.02	216
Tin & its alloys	Silver	7440-22-4	5.16E-05	2.00	20000	0.001	12
Subtotal			2.58E-03	100.00	1000000	0.06	599

External Solder Ball

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Tin & its alloys	Tin	7440-31-5	3.52 E-01	62.00	620000	8.17	81716
Tin & its alloys	Lead	7439-92-1	2.04 E-01	36.00	360000	4.74	47448
Tin & its alloys	Silver	7440-22-4	1.14 E-02	2.00	20000	0.26	2636
Subtotal			5.68 E-01	100	1000000	13.18	131800

Chip

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Other inorganic materials	Silicon	7440-21-3	1.84 E-01	99.0	990000	4.27	42728
Copper & its alloys	Copper	7440-50-8	1.86 E-03	1.0	10000	0.04	432
Subtotal			1.86 E-01	100	1000000	4.32	43160

High Lead Solder Bump

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Lead & its alloys	Lead	7439-92-1	2.37 E-02	97.00	41669	0.55	5492
Lead & its alloys	Tin	7440-31-5	7.32 E-04	3.00	1289	0.02	170
Subtotal			2.44 E-02	100.00	42958	0.57	5662

Underfill

Description	Substance	CAS#	Weight (g)	Homogeneous Material Level		Component Level	
				Percentage (%)	PPM	Percentage (%)	PPM
Other inorganic materials	Silicon dioxide filler	Proprietary	1.93 E-02	55.0	550000	0.45	4467
Other organic materials	Napthalene Base Epoxy	Proprietary	7.00 E-03	20.0	200000	0.16	1624
Thermoset	Anhydride hardener	Proprietary	5.25 E-03	15.0	150000	0.12	1218
Others	Others	Proprietary	3.50 E-03	10.0	100000	0.08	812
Subtotal			3.50 E-02	100.0	1000000	0.81	8121

	Weight (g)	Percentage (%)	PPM
Package Totals	**4.31 E+00**	100.00	1000000

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