

Materials Declaration Form

IPC	1752	Version	2		
Form Type *	Distribute		_		
Sectionals *	Material Info	Subsectionals *	A-D		
	Manufacturing Info		* : Required Field		

Supplier Information								
Company Name *	STMicroelectronics Response Date *		2017-03-15					
Contact Name *	Refer to Supplier Comment section		Refer to Supplier Comment section					
Authorized Representative *	FLORIANA SAN BIAGIO	Representative Title	AMG MD CHAMPION					
Representative Phone *	Refer to Supplier Comment section	Representative Email *	Refer to Supplier Comment section					
Sunnlier Comment	Online Technical Support - STMicroele http://www.st.com/web/en/support/s							

Uncertainty Statement

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Legal Statement

Supplier Acceptance * true Legal Declaration * Standard

Legal Statement

Supplier certifies that it gathered the provided information and such information is true and correct to the best of its knowledge and belief, as of the date that Supplier completes this form. Supplier acknowledges that Company will rely on this certification in determining the compliance of its products. Company acknowledges that Supplier may have relied on information provided by others in completing this form, and that Supplier may not have independently verified such information. However, in situations where Supplier has not independently verified information provided by others, Supplier agrees that, at a minimum, its suppliers have provided certifications regarding their contributions to the part(s), and those certifications are at least as omprehensive as the certification in this paragraph. If the Company and the Supplier enter into a written agreement with respect to the identified part(s), the terms and conditions of that agreement, including any warranty rights and/or remedies provided as part of that agreement, will be the sole and exclusive source of the Supplier's liability and the Company's remedies for issues that arise regarding information the Supplier provides in this form.

Product								
Mfr Item Number	Mfr Item Name	Version	Mfr Site	Date				
	K907*U324AEA	А	SH1A	2017-03-15 ST ECOPACK Grade				
	Amount	UoM	Unit type					
	80.00	mg	ECOPACK® 2					
,	Comment	ECOPACK® 2 is STMicroelectronics trade name for ROHS compliant device without Brominated and Chlorinated compound (900ppm) and without Antimony oxide flame retardan (in each organic material)						

Manufacturing information									
J-STD-020 MSL Rating	Classification Temp	Nbr of Reflow Cycles							
3 260		3							
bulk Solder Termination	Terminal Plating	Terminal Base Alloy	Comment	life.augmented					
NAC	Nickel/Palladium/Gold (Ni/Pd/Au)	Copper Alloy							

Package Designator	Size	Nbr of instances	Shape		
DSO	4.9x3.9x1.75	8	gull wing		
Comment	Package: O7 SO 08 .15 JEDEC; MDF val				

QueryList: RoHS Directive 2011/65/EU-July 2011 – Annex II amended by Directive 2015/863-April 2015							
	Query Response						
1 - Product(s) meets EU RoHS requiremen	at without any exemptions	TRUE					
2 - Product(s) meets EU RoHS requirements except lead in solder and this usage may qualify under the lead in solder '7b' exemption (other selected exemptions may apply)							
3 - Product(s) meets EU RoHS requirements by application of the selected exemption(s) FALSE							
4 - Product(s) does not meet EU RoHS requirements and is not under exemptions							
Exemption Id. Description							

QueryList: REACH-12th January 2017							
Query Response							
1 - Product(s) does not contain REACH Substances Of Very High Concern above the limits per the definition within REACH							
ategoryLevel_Name CategoryLevel_Threshold amount in product (mg) Application							

Material Composition Declar note : Substance present with	ation: n less 0.001mg will not be declared in this	s document				Mfr Item Name	K907*L	J324AEA				
Homogeneous Material	Material Group	Mass	UoM	Level	Substance Category	Substance	CAS	Exempt	Mass	UoM	Concentration in homogeneous material (ppm)	Concentration in product (ppm)
Die	Other inorganic materials	3.607	mg	supplier	die	Silicon (Si)	7440-21-3		3.520	mg	975880	44000
				supplier	metallization	Aluminium (AI)	7429-90-5		0.005	mg	1386	63
				supplier	Passivation	Silicon Nitride	12033-89-5		0.023	mg	6376	288
				supplier	Passivation	Silicon Oxide	7631-86-9		0.031	mg	8594	388
				supplier	back side metallization	Chromium (Cr)	7440-47-3		0.002	mg	554	25
				supplier	back side metallization	Nickel (Ni)	7440-02-0		0.018	mg	4990	225
				supplier	polymer die coating	PIX1 Polyimide	108-65-6		0.008	mg	2218	100
Leadframe	Copper & its alloys	29.277	mg	supplier	alloy	Copper (Cu)	7440-50-8		28.245	mg	964750	353063
				supplier	alloy	Iron (Fe)	7439-89-6		0.664	mg	22680	8300
				supplier	alloy	Iron Phosphide (FeP)	26508-33-8		0.040	mg	1366	500
				supplier	alloy	Zinc (Zn)	7440-66-6		0.035	mg	1195	438
	Nickel (Ni)			supplier	metallization	Nickel (Ni)	7440-02-0		0.268	mg	9154	3350
	Precious metals			supplier	metallization	Palladium (Pd)	7440-05-3		0.009	mg	307	113
	Precious metals			supplier	metallization	Gold (Au)	7440-57-5		0.008	mg	273	100
				supplier	metallization	Silver (Ag)	7440-22-4		0.008	mg	273	100
Die attach	Other Organic Materials	0.999	mg	supplier	glue	Silver (Ag)	7440-22-4		0.877	mg	877878	10963
				supplier	glue	Isobornyl Methacrylate	7534-94-3		0.050	mg	50050	625
				supplier	glue	Urethane Methacrylate Resin	5888-33-5		0.050	mg	50050	625
				supplier	glue	Acrylate polymer	87320-05-6		0.020	mg	20020	250
				supplier	glue	Epoxycyclohexylethyltrimethoxysilane	3388-04-3		0.001	mg	1001	13
				supplier	glue	tert-Butyl peroxy(2-ethyl)-hexanoate	3006-82-4		0.001	mg	1001	13
Bonding wires	Other inorganic materials	0.054	mg	supplier	wire	Copper (Cu)	7440-50-8		0.054	mg	1000000	675
Encapsulation	Other Organic Materials	46.063	mg	supplier	mold compound	Silica, vitreous	60676-86-0		39.891	mg	866010	498638
				supplier	mold compound	Epoxy Resin	25068-38-6		3.455	mg	75006	43188
				supplier	mold compound	Phenol Resin	29690-82-2		2.303	mg	49997	28788
				supplier	mold compound	Carbon black	1333-86-4		0.230	mg	4993	2875
				supplier	mold compound	Bismuth compound	7440-69-9		0.184	mg	3995	2300