



Materials Declaration Form

IPC Form Type *	1752 Distribute	Version	2
Sectionals *	Material Info Manufacturing Info	Subsectionals *	A-D <i>* : Required Field</i>

Supplier Information			
Company Name *	STMicroelectronics	Response Date *	2017-06-22
Company Unique ID	NL 008751171801		
Contact Name *	Refer to Supplier Comment section		Refer to Supplier Comment section
Contact Phone *	Refer to Supplier Comment section	Contact Email *	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
Supplier Comment	Online Technical Support - STMicroelectronics : http://www.st.com/web/en/support/support.html		

Uncertainty Statement

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Legal Statement

Supplier Acceptance *	true	Legal Declaration *	Standard
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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 comprehensive 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
	KD6P*103AAAY	A	BO2A	2017-06-22
Amount	UoM	Unit type	ST ECOPACK Grade	
34.89	mg	Each	ECOPACK® 3	
	Comment	ECOPACK® 3 is STMicroelectronics trade name for ROHS compliant device without use of any ROHS exemption and without Halogen nor Antimony		

Manufacturing information				
J-STD-020 MSL Rating	Classification Temp	Nbr of Reflow Cycles		 life.augmented
1	260	3		
bulk Solder Termination	Terminal Plating	Terminal Base Alloy	Comment	
Not Applicable	Nickel/Palladium/Gold (Ni/Pd/Au)	Copper Alloy		

Package Designator	Size	Nbr of instances	Shape	
DSO	4.4x3x0.9	8	gull wing	
Comment	Package: 6P TSSOP 8 BODY 4.4 PITCH 0.65; MDF valid for TSC1031IYPT			

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 requirement 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)	FALSE
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	FALSE
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				true
CategoryLevel_Name	CategoryLevel_Threshold	amount in product (mg)	Application	ppm in product

Material Composition Declaration : note : Substance present with less 0.001mg will not be declared in this document						Mfr Item Name	KD6P*103AAAY				5000001.0	1000027.0
Homogeneous Material	Material Group	Mass	UoM	Level	Substance Category	Substance	CAS	Exempt	Mass	UoM	Concentration in homogeneous material (ppm)	Concentration in product (ppm)
Die or dies	M-011 Other inorganic materials	2.106	mg	supplier	die	Silicon (Si)	7440-21-3		2.020	mg	959164	57905
				supplier	metallization	Aluminium (Al)	7429-90-5		0.021	mg	9972	602
				supplier	metallization	Titanium (Ti)	7440-32-6		0.002	mg	950	57
				supplier	Passivation	Silicon Nitride	12033-89-5		0.006	mg	2849	172
				supplier	Passivation	Silicon Oxide	7631-86-9		0.035	mg	16619	1003
				supplier	polymer die coating	PIIX1 Gamma-butyrolactone	96-48-0		0.022	mg	10446	631
Leadframe	M-004 Copper and its alloys	13.136	mg	supplier	alloy	Copper (Cu)	7440-50-8		12.168	mg	926309	348803
				supplier	alloy	Iron (Fe)	7439-89-6		0.286	mg	21772	8198
				supplier	alloy	Zinc (Zn)	7440-66-6		0.015	mg	1142	430
				supplier	metallization	Nickel (Ni)	7440-02-0		0.178	mg	13551	5102
M-008 Precious metals	M-008 Precious metals			supplier	metallization	Palladium (Pd)	7440-05-3		0.006	mg	457	172
				supplier	metallization	Gold (Au)	7440-57-5		0.005	mg	381	143
				supplier	metallization	Silver (Ag)	7440-22-4		0.478	mg	36389	13702
Die attach	M-015 Other organic materials	0.754	mg	supplier	glue	Silver (Ag)	7440-22-4		0.661	mg	876658	18948
				supplier	glue	Isobornyl Methacrylate	7534-94-3		0.038	mg	50398	1089
				supplier	glue	Urethane Methacrylate Resin	5888-33-5		0.038	mg	50398	1089
				supplier	glue	Acrylate polymer	87320-05-6		0.015	mg	19894	430
				supplier	glue	Epoxy(2-cyclohexylethyl)trimethoxysilane	3388-04-3		0.001	mg	1326	29
				supplier	glue	tert-Butyl peroxy(2-ethyl)-hexanoate	3006-82-4		0.001	mg	1326	29
Bonding wires	M-011 Other inorganic materials	0.065	mg	supplier	wire	Copper (Cu)	7440-50-8		0.065	mg	1000000	1863
Encapsulation	M-015 Other organic materials	18.825	mg	supplier	mold compound	Silica, vitreous	60676-86-0		16.509	mg	876972	473241
				supplier	mold compound	Epoxy resin	85954-11-6		0.753	mg	40000	21585
				supplier	mold compound	Epoxy	25068-38-6		0.753	mg	40000	21585
				supplier	mold compound	phenol resin	29690-82-2		0.565	mg	30013	16196
				supplier	mold compound	additive	Proprietary		0.188	mg	9987	5389
				supplier	mold compound	carbon black	1333-86-4		0.057	mg	3028	1634