



Materials Declaration Form

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

** : Required Field*

Supplier Information			
Company Name *	STMicroelectronics	Response Date *	2016-06-15
Contact Name *	Refer to "Supplier Comment" section	Contact Title	Refer to "Supplier Comment" section
Contact Phone *	Refer to "Supplier Comment" section	Contact Email *	Refer to "Supplier Comment" section
Authorized Representative *	Rossana Bonaccorso	Representative Title	ADG 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/online_tech_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
SPC574K72E5BD6AR	S9X6*FE72BDQ	A	MA1A	2016-06-15
Amount		UoM	Unit type	ST ECOPACK Grade
1120.00		mg	Each	ECOPACK® 2

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

Package Designator	Size	Nbr of instances	Shape	
QFP	20x20x1	144	flat	
Comment	Package: TQFP 144 20x20x1.0 1.0 ExpadDown			

QueryList : ROHS directive 2011/65/EU _ July 2011	
Query	Response
Product(s) meets EU RoHS requirement without any exemptions	true
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
Product(s) meets EU RoHS requirements by application of the selected exemption(s)	false
Product(s) does not meet EU RoHS requirements and is not under exemptions	false
Product(s) is obsolete, no information is available	false
Product(s) is unknown, no information is available	false
Exemption Id.	Description

QueryList : REACH-17th December 2015				
Query				Response
The product 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						Mfr Item Name	S9X6*FE72BDQ					
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	31.509	mg	supplier	die	Silicon (Si)	7440-21-3		28.519	mg	905106	25463
				supplier	metallization	Aluminium (Al)	7429-90-5		0.064	mg	2031	57
				supplier	metallization	Copper (Cu)	7440-50-8		0.386	mg	12250	345
				supplier	metallization	Tantalum (Ta)	7440-25-7		2.131	mg	67631	1903
				supplier	metallization	Titanium (Ti)	7440-32-6		0.017	mg	540	15
				supplier	metallization	Tungsten (W)	7440-33-7		0.003	mg	97	3
				supplier	metallization	Nickel (Ni)	7440-02-0		0.002	mg	63	2
				supplier	passivation	Silicon Nitride (SiN)	68034-42-4		0.088	mg	2793	79
				supplier	passivation	Silicon Oxide(SiO2)	7631-86-9		0.299	mg	9489	267
				Leadframe	Copper & Its alloys	360.422	mg	supplier	alloy	Copper (Cu)	7440-50-8	
supplier	alloy	Iron (Fe)	7439-89-6						8.194	mg	22734	7316
supplier	alloy	Iron Phosphide (FeP)	26508-33-8						0.493	mg	1368	440
supplier	alloy	Zinc (Zn)	7440-66-6						0.429	mg	1190	383
supplier	metallization	Nickel (Ni)	7440-02-0						2.684	mg	7447	2396
supplier	metallization	Palladium (Pd)	7440-05-3						0.172	mg	477	154
supplier	metallization	Gold (Au)	7440-57-5						0.072	mg	200	64
supplier	glue or tape	Copper (Cu)	7440-50-8						12.366	mg	974468	11041
Die attach	Other Organic Materials	12.690	mg	supplier	glue or tape	Iron (Fe)	7439-89-6		0.291	mg	22931	260
				supplier	glue or tape	Zinc (Zn)	7440-66-6		0.015	mg	1183	13
				supplier	glue or tape	Iron Phosphide (Fe2P)	1310-43-6		0.018	mg	1418	16
				supplier	wire	Copper (Cu)	7440-50-8		1.848	mg	1000000	1650
Bonding wire	Other Organic Materials	1.848	mg	supplier	wire	Copper (Cu)	7440-50-8		1.848	mg	1000000	1650
				supplier	mold compound	Epoxy Resin	85954-11-6		57.082	mg	79999	50966
Encapsulation	Other Organic Materials	713.531	mg	supplier	mold compound	Phenol Resin	26834-02-6		28.541	mg	40000	25483
				supplier	mold compound	Silica, vitreous	60676-86-0		621.486	mg	871001	554898
				supplier	mold compound	Carbon black	1333-86-4		3.568	mg	5000	3186
				supplier	mold compound	Bismuth (Bi)	7440-69-9		2.854	mg	4000	2548