Materials Declaration Form

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

Supplier Information			
Company Name *	STMicroelectronics	Response Date *	2015-06-25
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 *	Giovanni Giacopello	Representative Title	IPD Materials Declaration 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/internet/com/support/online_tech_support.jsp		

Uncertainty Statement

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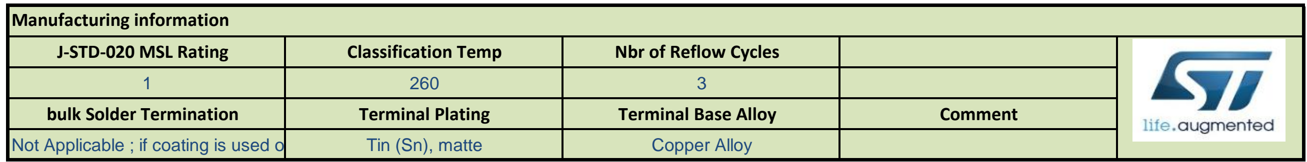
Legal Statement

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
LDL112PV33R	MQYG*UX57AB5	A	Z6HA	2015-06-25
	Amount	UoM	Unit type	ST ECOPACK Grade
	24.40	mg	Each	ECOPACK® 2



Manufacturing information				
J-STD-020 MSL Rating	Classification Temp	Nbr of Reflow Cycles		
1	260	3		
bulk Solder Termination	Terminal Plating	Terminal Base Alloy	Comment	
Not Applicable ; if coating is used o	Tin (Sn), matte	Copper Alloy		

Package Designator	Size	Nbr of instances	Shape	
QFN	3X3X0.95	6	No lead	
Comment	Package: VFDFPN 6 3X3 0,95 PITCH			

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 2014				
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**	**MQYG*UX57AB5**					
Homogeneous Material	**Material Group**	**Mass**	**UoM**	**Level**	**Substance Category**	**Substance**	**CAS**	**Exempt**	**Mass**	**UoM**	**Concentration in homogeneous material (ppm)**	**Concentration in product (ppm)**
Silicon die	Other inorganic materials	0.422	mg	supplier	die	Silicon (Si)	7440-21-3		0.394	mg	933649	16148
Silicon die				supplier	metallization	Aluminium (Al)	7429-90-5		0.006	mg	14218	246
Silicon die				supplier	metallization	Tungsten (W)	7440-33-7		0.005	mg	11848	205
Silicon die				supplier	passivation	Silicon Nitride (SiN)	12033-89-5		0.001	mg	2370	41
Silicon die				supplier	passivation	Silicon Oxide(SiO2)	7631-86-9		0.01	mg	23697	410
Silicon die				supplier	polymer die coating	PIX1 Gamma-butyrolactone	96-48-0		0.006	mg	14218	246
Leadframe	Copper & its alloys	8.953	mg	supplier	alloy	Copper (Cu)	7440-50-8		8.647	mg	965822	354385
Leadframe				supplier	alloy	Iron (Fe)	7439-89-6		0.202	mg	22562	8279
Leadframe				supplier	alloy	Lead (Pb)	7439-92-1		0.001	mg	112	41
Leadframe				supplier	alloy	Phosphorus (P)	12185-10-3		0.002	mg	223	82
Leadframe				supplier	alloy	Zinc (Zn)	7440-66-6		0.011	mg	1229	451
Leadframe				supplier	metallization	Silver (Ag)	7440-22-4		0.09	mg	10052	3689
Die attach	Other organic materials	0.093	mg	supplier	glue	Silver (Ag)	7440-22-4		0.077	mg	827957	3156
Die attach				supplier	glue	Carbocyclic Acrylates	proprietary		0.009	mg	96774	369
Die attach				supplier	glue	Bismaleimide resin	35325-39-4		0.003	mg	32258	123
Die attach				supplier	glue	2-preponoic acid, 2-methyl	68586-19-6		0.003	mg	32258	123
Die attach				supplier	glue	Dicumlyl peroxide	80-43-3		0.001	mg	10753	41
Bonding wire	Other organic materials	0.089	mg	supplier	wire	Copper (Cu)	7440-50-8		0.087	mg	977528	3566
Bonding wire				supplier	wire	Palladium (Pd)	7440-05-3		0.002	mg	22472	82
Encapsulation	Other organic materials	14.636	mg	supplier	mold compound	Silica Fused	60676-86-0		13.714	mg	937005	562049
Encapsulation				supplier	mold compound	Epoxy Resin	25068-38-6		0.439	mg	29995	17992
Encapsulation				supplier	mold compound	Phenol Resin	29690-82-2		0.44	mg	30063	18033
Encapsulation				supplier	mold compound	Carbon Black	1333-86-4		0.043	mg	2938	1762
Connections coating	Solder	0.207	mg	supplier	solder alloy	Tin (Sn)	7440-31-5		0.207	mg	1000000	8484