



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 *	2020-08-05
Company Unique ID	NL 008751171B01		
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	AMS 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		

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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 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
	K3)K*L3171A6	A	3068	2020-08-05
Amount	UoM	Unit type	ST ECOPACK Grade	
1360	mg	Each	ECOPACK® 2	
Comment	ECOPACK® 2 is STMicroelectronics trade name for ROHS compliant device without Brominated and Chlorinated compound (900ppm) and without Antimony oxide flame retardant (in each organic material)			

Manufacturing information				
J-STD-020 MSL Rating	Classification Temp	Nbr of Reflow Cycles		 life.augmented
Not Applicable	260	3		
Bulk Solder Termination	Terminal Plating	Terminal Base Alloy	Comment	
Not Applicable	Tin (Sn), matte, annealed	Copper Alloy		

Package Designator	Package Size	Nbr of instances	Shape	
SIP	10.2 x 9.1	3	through-hole	
Comment	JK TO220 - SINGLE GAUGE; MDF is valid for LM317BT-LM217T-LM317T			

QueryList : RoHS Directive 2011/65/EU-July 2011 Annex II amended by Directive 2015/863-March 2015				
Query				Response
1 - Product(s) meets EU RoHS requirement without any exemptions				false
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)				true
4 - Product(s) does not meet EU RoHS requirements and is not under exemptions				false
Exemption Id.	Description			
7a	Lead in high melting temperature type solders (i.e. lead- based alloys containing 85 % by weight or more lead)			

QueryList : ELV directive : 2000/53/EC amended 2020/363_March 2020				
Query				Response
1 - Product(s) meets EU ELV requirements without any exemptions				false
2 - Product(s) meets EU RoHS requirements by application of the selected exemption(s)				true
Exemption Id.	Description			
8e	8e - Lead in high melting temperature type solders (i.e. lead-based alloys containing 85 % by weight or more lead)			

QueryList : California Prop65 list, dated 3rd January 2020				
Query				Response
1 - The product does not contain identified substance from California Prop 65 List, no exposure to consumers is foreseen				false
2 - The product is containing below substance(s) from California Prop 65 List, no exposure to consumers is foreseen				true
Substance	amount in product (mg)	Application	ppm in product	
Lead	1.73	soft solder	1268	

QueryList : REACH-25th June 2020				
Query				Response
1 - Product(s) does not contain REACH Substances Of Very High Concern above the limits per the definition within REACH				false
CategoryLevel_Name	CategoryLevel_Threshold	amount in product (mg)	Application	ppm in product
Lead	1000 ppm	1.73	Soft solder	1268
2 - Product(s) does not contain REACH Substances Of Very High Concern in any Embedded article nor Homogeneous Material above the limits per the definition within REACH				false
CategoryLevel_Name	CategoryLevel_Threshold	Amount in Embedded Article / Homogeneous Material (mg)	Application - Article / Homogeneous Material	ppm in Article /Homogeneous Material
Lead	1000 ppm	1.73	Soft solder	955150

QueryList : Korea Chemical Control Act_ 27 Dec 2017 update				
Query				Response
The Product does contain at least one of the substances listed in Chemical Control Act				false
Substance	Homogeneous Material impacted	Content in Homogeneous Material (mg)	Concentration in the material(%)	Application Purpose

Material Composition Declaration : note : Substance present with less 0.001mg will not be declared in this document						Mfr Item Name	K3J*K*L3171A6				5000001.0	999999.0
Homogeneous Material	Material Group	Mass	UoM	Level	Substance Category	Substance	CAS	Exempt	Mass	UoM	Concentration in homogeneous material (ppm)	Concentration in product (ppm)
Die	M-011 Other inorganic materials	3.033	mg	supplier	die	Silicon(Si)	7440-21-3		2.965	mg	977580	2180
				supplier	metallisation	Aluminium(Al)	7429-90-5		0.038	mg	12529	28
				supplier	Passivation	Silicon nitride(SiN)	12033-89-5		0.013	mg	4286	10
				supplier	passivation	Silicon oxide	7631-86-9		0.017	mg	5605	13
				supplier	alloy & coating	Copper(Cu)	7440-50-8		760.594	mg	998700	559260
Leadframe	M-004 Copper and its alloys	761.584	mg	supplier	alloy & coating	Iron(Fe)	7439-89-6		0.350	mg	460	257
				supplier	alloy & coating	Iron Phosphide(FeP)	26508-33-8		0.640	mg	840	471
				SVHC	solder	Lead(Pb)	7439-92-1	7a-Lead in high melting temper	1.725	mg	955150	1268
Soft solder	Solder	1.806	mg	supplier	solder	Silver(Ag)	7440-22-4		0.045	mg	24917	33
				supplier	solder	Tin(Sn)	7440-31-5		0.036	mg	19934	26
				supplier	mold compound	Silica vitreous	60676-86-0		394.286	mg	696000	289916
Encapsulation	M-011 Other inorganic materials	566.503	mg	supplier	mold compound	Quartz	14808-60-7		56.650	mg	99999	41654
				supplier	mold compound	Phenol resin	9003-35-4		33.990	mg	60000	24993
				supplier	mold compound	Epoxy resin	proprietary		73.645	mg	129999	54151
				supplier	mold compound	Carbon black	1333-86-4		2.833	mg	5001	2083
				supplier	mold compound	Polyethylene resin	9002-88-4		2.266	mg	4000	1666
				supplier	mold compound	Mercaptopropyl trimethoxysilane	4420-74-0		2.266	mg	4000	1666
				supplier	mold compound	Triphenylphosphine	603-35-0		0.567	mg	1001	417
connections coating	Solder	27.074	mg	supplier	solder alloy	Tin (Sn)	7440-31-5		27.074	mg	1000000	19907