ON Semiconductor

Initial Product/Process Change Notification

Document # : IPCN21298Y
Issue Date: 18 April 2016

Title of Change:	Copper thick film elimination from Rhythm hybrid family products.
Proposed first ship date:	25 August 2016
Contact information:	Contact your local ON Semiconductor Sales Office.
Samples:	Contact your local ON Semiconductor Sales Office or <Brenda.Johnston@onsemi.com>
Type of notification:	This is an Initial Product/Process Change Notification (IPCN) sent to customers. IPCNs are issued at least 30 days prior to the issuance of the Final Change Notice (FPCN). An IPCN is an advance notification about an upcoming change and contains general information regarding the change details and devices affected. It also contains the preliminary reliability qualification plan. The completed qualification and characterization data will be included in the Final Product/Process Change Notification (FPCN). This IPCN notification will be followed by a Final Product/Process Change Notification (FPCN) at least 90 days prior to implementation of the change. In case of questions, contact <PCN.Support@onsemi.com>.
Change Part Identification:	There is no change to the part identification. The part numbers will continue to be the same. Change tracking will be done based on work order number which will be communicated on request.
Change category:	☐ Wafer Fab Change ☐ Assembly Change ☐ Test Change ☒ Other Hybrid Manufacturing

Change Sub-Category(s):

☐ Manufacturing Site Change/Addition
☐ Manufacturing Process Change
☒ Material Change
☐ Product specific change
☐ Datasheet/Product Doc change
☐ Shipping/Packaging/Marking
☐ Other: ________________________

Sites Affected:

☐ All site(s)
☐ not applicable
☒ ON Semiconductor site(s) : ON Burlington, Canada
☐ External Foundry/Subcon site(s)

Description and Purpose:

This is an Initial Notification that announces the replacement of copper thick film with Silver thick film for under-bump I/O metallization layer. This change is being made to align the Rhythm Hybrid Product family to our standard BOM design at the Burlington site.

There’s no change in form, fit, or function expected with this material change.

Qualification Plan:

QV DEVICE NAME : Rhythm Family
PACKAGE : Hybrid Ceramic SIP

Test	Specification	Test Vehicle	Condition	Interval
Temperature cycle on FR4 carrier	JESD22-A104	SK3919-E1	Ta= -40°C to +85°C	100 cyc
Solderability – reflow application	Internal	SK3919-E1 E7110-102A33-AG SA3291A-E1 R3910-CFAB-E1	Reflow solder simulation	N/A
Solderability – hand solder application	Internal	R3910-CFAB-E1	Hand solder simulation	N/A
Temperature humidity bias	JESD22-A101	SK3919-E1 E7110-102A33-AG SA3291A-E1 R3910-CFAB-E1	85°C, 85% RH, 1.3V	288 hrs

Estimated date for qualification completion: 30 June 2016

List of Affected Standard Parts:

Part Number	Qualification Vehicle
R3910-CFAB-E1B	R3910-CFAB-E1
R3910-CFAB-E1T	
SA3400-E1-T	
SA3400-E1	
R3920-CFAB-E1T	
R3920-CFAB-E1B	
SB3229-E1	
SA3229-E1	
SA3229-E1-T	
SB3231-E1-T	
SB3231-E1	
SB3230-E1-T	
SB3230-E1	
SB3229-E1-T	