onsemi

Initial Product/Process Change Notification Document #:IPCN24631X Issue Date:01 Apr 2022

Title of Change:	Qualify Vanguard International Semiconductor (VIS) Fab3 as an additional site to VIS Fab2	
Proposed First Ship date:	13 Feb 2023 or earlier if approved by customer	
Contact Information:	Contact your local onsemi Sales Office or CheePin.Tay@onsemi.com	
PCN Samples Contact:	Contact your local onsemi Sales Office. Sample requests are to be submitted no later than 30 days from the date of first notification, Initial PCN or Final PCN, for this change. Samples delivery timing will be subject to request date, sample quantity and special customer packing/label requirements.	
Type of Notification:	This is an Initial Product/Process Change Notification (IPCN) sent to customers. 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 < <u>PCN.Support@onsemi.com</u> >	
Marking of Parts/ Traceability of Change:	Affected part will be identified with a date-code/wafer lot#.	
Change Category:	Wafer Fab Change	
Change Sub-Category(s):	Manufacturing Site Addition	
Sites Affected:		
onsemi Sites		External Foundry/Subcon Sites

none

Description and Purpose:

The purpose of this change is to expand VIS Fab capacity from Fab2 to Fab2/Fab3. This will enhance loading flexibility between Fab2/Fab3.

There is no change to the substrate, EPI, design, package, probe, assembly, test coverage/flow or datasheet and it will not affect the form, fit & function of the finished product.

Vanguard International Semiconductor, Taiwan

	Before Change Description	After Change Description
Wafer Fab Site	Vanguard (VIS) Fab2	Vanguard (VIS) Fab2 & Fab3

Note:

- There is no substrate, EPI & other product material changes as a result of this change since this is only involving Wafer Fab site addition.

- There is no change in Assembly & Test site.
- There is no product marking change as a result of this change.



Qualification Plan:

QV DEVICE NAME: FDPC5030SG PACKAGE: PQFN5X6

Test	Specification	Condition	Interval
HTRB	JESD22-A108	Tj=150°C, VDS=24V	1008 hrs
HTGB	JESD22-A108	Tj=150°C, VGS=20V	1008 hrs
HTSL	JESD22-A103	Ta=150°C	1008 hrs
IOL	MIL-STD-750 (M1037) AEC-Q101	Ta=+25°C, Delta Tj=100°C On/off = 2 min	15000 cyc
TC	JESD22-A104	Ta= -55°C to +150°C	1000 сус
HAST	JESD22-A110	130°C, 85% RH, 18.8psig, 24V bias	96 hrs
uHAST	JESD22-A118	130°C, 85% RH, 18.8psig, unbiased	96 hrs
РС	J-STD-020 JESD-A113	MSL 1 @ 260°C	-

Estimated date for qualification completion: 18 November 2022

List of Affected Parts:

Note: Only the standard (off the shelf) part numbers are listed in the parts list. Any custom parts affected by this PCN are shown in the customer specific PCN addendum in the PCN email notification, or on the **PCN Customized Portal**.

Part Number	Qualification Vehicle
NTMFD2D4N03P8	FDPC5030SG
FDPC5030SG	FDPC5030SG