

FINAL PRODUCT/PROCESS CHANGE NOTIFICATION #16697

Generic Copy

Issue Date: 26-Jul-2011

<u>TITLE</u>: Qualification of Vigilant Technology, Bangkok, Thailand for Assembly/Test of PDIP-8 UCx84x Family

PROPOSED FIRST SHIP DATE: 26-Oct-2011

AFFECTED CHANGE CATEGORY(S): Subcontractor Assembly/Test Location

FOR ANY QUESTIONS CONCERNING THIS NOTIFICATION:

Contact your local ON Semiconductor Sales Office or Scott Brow < Scott.Brow@onsemi.com >

SAMPLES: Contact your local ON Semiconductor Sales Office

ADDITIONAL RELIABILITY DATA: Available

Contact your local ON Semiconductor Sales Office or Ken Fergus Ken.Fergus@onsemi.com

NOTIFICATION TYPE:

Final Product/Process Change Notification (FPCN)

Final change notification sent to customers. FPCNs are issued at least 90 days prior to implementation of the change.

ON Semiconductor will consider this change approved unless specific conditions of acceptance are provided in writing within 30 days of receipt of this notice. To do so, contact <quality@onsemi.com>.

DESCRIPTION AND PURPOSE:

This is a Final Product Change Notice to alert customers of the planned qualification of Vigilant Technology, Bangkok, Thailand, to assemble and test ON Semiconductor's UCx84x products in PDIP-8 lead packages. Vigilant will provide additional capacity to supplement ON Semiconductors' current assembly and test facility located at Unisem, Batam, Indonesia. Vigilant is currently qualified for assembly/test to run PDIP-8 lead packages within ON Semiconductor.

PDIP-8 package from Vigilant Technology, Bangkok, Thailand are both Pb-Free & Halide Free.

Issue Date: 26-Jul-2011 Rev. 06-Jan-2010 Page 1 of 3



FINAL PRODUCT/PROCESS CHANGE NOTIFICATION # 16697

RELIABILITY DATA SUMMARY:

As there is no change in the bill of materials (BOM) from the products already qualified at Vigilant, the products will qualify by similarity to devices already running in production.

Reliability Summary:		Lot 1	Lot 2	Lot 3
External Visual	40X	0/237	0/237	0/237
Autoclave	121C/15PSI/100%RH/240 Hrs	0/116	0/116	0/116
Temperature Cycle	-65C/+150C, 500 Cy	0/121	0/121	0/121
Wire Bond Inspection	100-500X	0/5	0/5	0/5
Wire Pull		0/5	0/5	0/5

ELECTRICAL CHARACTERISTIC SUMMARY:

The electrical specifications will remain identical. A full electrical characterization over temperature will be performed for each device to ensure device functionality and electrical specifications.

CHANGED PART IDENTIFICATION:

Devices assembled by Vigilant will include the character 'V' as the identifier in the trace code. Upon expiration of the PCN devices may be sourced from either Vigilant, or previously qualified assembly locations. Manufacturing traceability will be maintained to allow identification of the assembly source.

As Vigilant will be using pre-plated NiPdAu lead frames when compared to the Sn Plating done at Unisem, as per JESD97, May 2004, section 5 the following information will be included to indicate the appropriate Pb-free 2nd level interconnect:

- Package labeling for material assembled in Vigilant will state 'e4', to indicate the use of precious metals, no Sn
- Package labeling for material assembled in previously qualified assembly locations will state 'e3' to indicate the use of Sn.

Issue Date: 26-Jul-2011 Rev. 06-Jan-2010 Page 2 of 3



FINAL PRODUCT/PROCESS CHANGE NOTIFICATION # 16697

List of affected General Parts:

UC2842BNG

UC2843BNG

UC2844BNG

UC2845BNG

UC3842BNG

UC3843BNG

UC3843BVNG

UC3844BNG

UC3844BVNG

UC3845BNG

UC3845BVNG

Issue Date: 26-Jul-2011 Rev. 06-Jan-2010 Page 3 of 3