12500 TI Boulevard, MS 8640, Dallas, Texas 75243

PCN# 20140806000
Qualification of TI Chengdu as Additional Assembly and Test Site for Select WQFN Package Devices
Change Notification / Sample Request

Dear Customer:

This is an announcement of a change to a device that is currently offered by Texas Instruments. The details of this change are on the following pages.

We request you acknowledge receipt of this notification within **30** days of the date of this notice. Lack of acknowledgement of this notice within 30 days constitutes acceptance of the change. If you require samples or additional data to support your evaluation, please request within 30 days.

The changes discussed within this PCN will not take effect any earlier than **90** days from the date of this notification, unless customer agreement has been reached on an earlier implementation of the change. This notification period is per TI's standard process.

This notice does not change the end-of-life status of any product. Should product affected be on a previously issued product withdrawal/discontinuance notice, this notification does not extend the life of that product or change the life time buy offering/discontinuance plan.

For questions regarding this notice, contact your local Field Sales Representative or the PCN Manager (PCN_ww_admin_team@list.ti.com).

Sincerely,

PCN Team
SC Business Services
Phone: +1(214) 480-6037
Fax: +1(214) 480-6659

PCN# 20140806000
Attachment: 1

Products Affected:

According to our records, there are the affected device(s) that you have purchased within the past twenty-four (24) months. Technical details of this Product Change follow on the next page(s).

PCN Number:	20140806000	**PCN Date:**	08/11/2014
Title:	Qualification of TI Chengdu (CDAT) as Additional Assembly and Test Site for Select WQFN Package Devices		

Customer Contact:	PCN Manager	**Phone:**	+1(214)480-6037	**Dept:**	Quality Services

Proposed 1st Ship Date:	11/11/2014	**Estimated Sample Availability:**	Date Provided at Sample request

Change Type:

☒	Assembly Site	☐	Design	☐	Wafer Bump Site
☐	Assembly Process	☐	Data Sheet	☐	Wafer Bump Material
☐	Assembly Materials	☐	Part number change	☐	Wafer Bump Process
☐	Mechanical Specification	☒	Test Site	☐	Wafer Fab Site
☐	Packing/Shipping/Labeling	☐	Test Process	☐	Wafer Fab Materials
				☐	Wafer Fab Process

PCN Details

Description of Change:

Texas Instruments Incorporated is announcing the qualification of TI Chengdu (CDAT) as Additional Assembly and Test Site for select devices listed in the “Product Affected” Section. Current assembly sites are as follows and material differences as follows.

	Existing Sites	Additional Site
Assembly/Test Sites	TI-CLARK, CARZ, NSE	CDAT

Test coverage, insertions, conditions will remain consistent with current testing and verified with test MQ.

Reason for Change:

Continuity of supply.

Anticipated impact on Form, Fit, Function, Quality or Reliability (positive / negative):

None

Changes to product identification resulting from this PCN:

Assembly Site		
TI-CLARK	Assembly Site Origin (22L)	ASO: QAB
CARZ	Assembly Site Origin (22L)	ASO: CSZ
NSE	Assembly Site Origin (22L)	ASO: NSE
TI Chengdu (CDAT)	Assembly Site Origin (22L)	ASO: CDA

ASSEMBLY SITE CODES: TI-CLARK = I , CARZ = F , NSE = J, CDAT = 8

Sample product shipping label (not actual product label)

TEXAS INSTRUMENTS
G4
MADE IN: Malaysia
2DC: 2Q:
MSL 2 /260C/1 YEAR | SEAL DT
MSL 1 /235C/UNLIM | 03/29/04
OPT:
ITEM: 39
LBL: 5A (L)TO:1750
(1P) SN74LS07NSR
(Q) 2000 (D) 0336
(31T)LOT: 3959047MLA
(4W) TKY(1T) 7523483SI2
(P)
(2P) REV: (V) 0033317
(20L) CSO: SHE (21L) CCO:USA
(22L) ASO: MLA (23L) ACO: MYS

Product Affected:

HPA00667DRVR	TPS2544RTET	TPS54418ARTET	TPS61161DRVR
HPA00735DRVR	TPS2546RTER	TPS54418RTER	TPS61161DRVRG4
HPA00810-2/2	TPS2546RTET	TPS54418RTET	TPS61161DRVT
HPA00810ADRVR-2/2	TPS54218ARTER	TPS54618RTER	TPS61161DRVTG4
HPA00835RTER	TPS54218ARTET	TPS54618RTET	TPS61165DRVR
SN1004055RTER	TPS54218RTET	TPS55010RTER	TPS61165DRVR-S
SN1006030RTER	TPS54318ARTER	TPS55010RTET	TPS61165DRVRG4
SN1007054RTER	TPS54318ARTET	TPS61160DRVR	TPS61165DRVT
SN1208003RTER	TPS54318MRTER	TPS61160DRVRG4	TPS61165DRVTG4
SN1305017RTER	TPS54318MRTET	TPS61160DRVT	TPS61170DRVR
TPS2543RTER	TPS54318RTER	TPS61160DRVTG4	TPS61170DRVRG4
TPS2543RTET	TPS54318RTET	TPS61161ADRVR	TPS61170DRVT
TPS2544RTER	TPS54418ARTER	TPS61161ADRVT	TPS61170DRVTG4

Qualification Plan Report

Chengdu A/T WQFN

Product Attributes

	Qual Device: TPS2546RTER	Qual Device: TPS61161DRVR
Die Attributes		
Die Revision	A	C
Wafer Fab Supplier	RFAB	MIHO8
Wafer Fab Process	LBC7	LBC7
Package Attributes		
Assembly Site	CHENGDU	CHENGDU
Package Family	WQFN	WQFN
Package Designator	RTE	DRV
Package Size (mils)	118.11 X 118.11	78.74 X 78.74
Body Thickness (mils)	29.53	29.53
Pin Count	16	6
Lead Frame Type	Cu	Cu
Lead Finish	NiPdAu	NiPdAu
Lead Pitch (mils)	19.68	25.59
Mount Compound	4207768	4207768
Mold Compound	4208625	4208625
Bond Wire Composition	Cu	Cu
Bond Wire Diameter (mils)	1.98	0.96
Flammability Rating	UL 94 V-0	UL 94 V-0

- QBS: Qual By Similarity
- Qual Devices qualified at LEVEL2-260C: TPS2546RTER, TPS61161DRVR

Qualification Plan Schedule

Type	Test Name / Condition	Duration	Qual Device: TPS2546RTER	Qual Device: TPS61161DRVR
HAST	Biased Hast	130C/85% RH	N/A	9/23/14
AC	Autoclave 121C	96 Hours	9/27/14	9/27/14
TC	Temperature Cycle, -65/+150C	500 Cycles	10/30/2014	10/30/2014
HTSL	High Temp Storage Bake 170C	420 Hours	10/6/2014	10/6/2014
ED	Electrical Characterization	Per Datasheet Parameters	9/17/2014	9/17/2014
PD	Physical Dimensions	Per specification	9/5/2014	9/3/2014
WBS	Ball Bond Shear	76 wires	9/5/2014	9/3/2014
WBP	Wire Pull	76 wires	9/5/2014	9/3/2014
XRAY	X Ray	(top side only)	9/5/2014	9/3/2014
DS	Die Shear	30 Die	9/5/2014	9/3/2014
SD	Solderability	8 Hours Steam Age	9/10/2014	9/10/2014
TIS	Thermal Integrity Sequence	Level 2 @260C	10/15/2014	10/15/2014

- Preconditioning was performed for Autoclave, Unbiased HAST, THB/Biased HAST, Temperature Cycle, Thermal Shock, and HTSL, as applicable

- The following are equivalent HTOL options based on an activation energy of 0.7eV : 125C/1k Hours, 140C/480 Hours, 150C/300 Hours, and 155C/240 Hours
- The following are equivalent HTSL options based on an activation energy of 0.7eV : 150C/1k Hours, and 170C/420 Hours
- The following are equivalent Temp Cycle options per JESD47 : -55C/125C/700 Cycles and -65C/150C/500 Cycles

Quality and Environmental data is available at TI's external Web site: http://www.ti.com/

Green/Pb-free Status:
Qualified Pb-Free(SMT) and Green
N/A = Test is Not Applicable
TI Qualification ID: 20140311-102704

For questions regarding this notice, e-mails can be sent to the regional contacts shown below or your local Field Sales Representative.

Location	E-Mail
USA	PCNAmericasContact@list.ti.com
Europe	PCNEuropeContact@list.ti.com
Asia Pacific	PCNAsiaContact@list.ti.com
Japan	PCNJapanContact@list.ti.com