



12500 TI Boulevard, MS 8640, Dallas, Texas 75243

PCN#20190919000.1

**Qualify TI Chengdu (CDAT) as an additional Assembly site for select devices
Change Notification / Sample Request**

Date: September 23, 2019

Dear TI 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.

The customer should acknowledge receipt of this notification by email within 30 days of the date of receipt. Lack of acknowledgement of this notice within 30 days constitutes customer acceptance of the change.

Samples or additional data to support customer evaluation must be requested within 30 days of receipt of this notification. If samples are requested for evaluation the customer must provide evaluation results within the sample evaluation period indicated on page 3 of this notification. The Sample Evaluation Period begins on the date the customer receives samples from TI.

If the customer approved the change, TI can proceed with implementation of the change. The proposed first ship date is shown on page 3.

If the customer does not approve the PCN or the approval response is not provided within the Sample Evaluation Period, TI can implement the change, but the customer may elect to place an order for unchanged product by the Last Time Buy Date for delivery by the Last Time Ship Date. TI cannot guarantee that shipments to the customer after any last time order is delivered will not include the changed material. If the customer places an order with delivery after the Last Time Shipment Date, the order may be fulfilled with changed material or any material processed to TI specifications at that future time.

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 Team (PCN_ww_admin_team@list.ti.com).

Sincerely,

PCN Team
SC Business Services

20190919000
Attachment: 1

Products Affected:

The devices listed on this page are a subset of the complete list of affected devices. According to our records, these are the devices that you have purchased within the past twenty-four (24) months. The corresponding customer part number is also listed, if available.

DEVICE	CUSTOMER PART NUMBER
TPS51393PRJER	39111358
TPS51393PRJER	99055YNK

Technical details of this Product Change follow on the next page(s).

PCN Number:	20190919000.1		PCN Date:	Sept 23, 2019	
Title:	Qualify TI Chengdu (CDAT) as an additional Assembly site for select devices				
Customer Contact:	PCN Manager		Dept:	Quality Services	
Proposed 1st Ship Date:	Dec 23, 2019		Sample Eval Period:	90 days	
Last Time Buy Date:	Feb 20, 2020		Last Time Ship Date:	May 20, 2020	
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 is pleased to announce the qualification of TI Chengdu (CDAT) as an additional Assembly site for the list of devices shown below. Material differences between sites as follows.					
Assembly Site	Assembly Site Origin	Assembly Country Code	Assembly City		
TI Clark	QAB	PHL	Angeles City		
TI Chengdu	CDA	CHN	Chengdu		
Material Differences:					
	TI Clark	TI Chengdu			
Mold Compound	4222790	4223495			
Reason for Change:					
Continuity of Supply					
Anticipated impact on Fit, Form, Function, Quality or Reliability (positive / negative):					
None					
Anticipated impact on Material Declaration					
☐	No Impact to the Material Declaration	☒	Material Declarations or Product Content reports are driven from production data and will be available following the production release. Upon production release the revised reports can be obtained at the site link below http://www.ti.com/quality/docs/materialcontentsearch.tsp		
Changes to product identification resulting from this PCN:					
Assembly Site					
TI Clark Philippines	Assembly Site Origin (22L)	ASO: QAB			
TI Chengdu	Assembly Site Origin (22L)	ASO: CDA			
Sample product shipping label (not actual product label)					

 TEXAS INSTRUMENTS MADE IN: Malaysia 2DC: 20: MSL '2 / 260C/1 YEAR SEAL DT MSL 1 / 235C/UNLIM 03/29/04 OPT: ITEM: 39 LBL: 5A (L)T0:1750		(1P) SN74LS07NSR (Q) 2000 (D) 0336 (31T) LOT: 3959047MLA (4W) TKY (1T) 7523483SI2 (P) (2P) REV: (V) 0033317 (20L) CS0: SHE (21L) CC0:USA (22L) AS0: MLA (23L) AC0: MYS
Product Affected		
Refer to Page 2		

Qualification Report

Approve Date 8-Aug-2019

Qualification Results

Data Displayed as: Number of lots / Total sample size / Total failed

Type	Test Name / Condition	Duration	Qual Device: TPS51393PR JE	Qual Device: TPS51393RJ E	Qual Device: TPS51395PRJ E	Qual Device: TPS51395RJ E	QBS Product Reference: TPS51393R JE	QBS Product Reference: TPS51393R JE PG1.0
ED	Electrical Characterization	Per Datasheet Parameters	Pass	Pass	Pass	Pass	Pass	-
HBM	ESD - HBM	2500 V	-	-	1/3/0	-	3/9/0	-
CDM	ESD - CDM	1500 V	-	-	1/3/0	-	3/9/0	-
LU	Latch-up	(per JESD78)	-	-	1/6/0	-	3/18/0	-
HTOL	Life Test, 125C	1000 Hours	-	-	-	-	3/231/0	1/77/0
ELFR	Early Life Failure Rate, 125C	48 Hours	-	-	-	-	-	3/2400/0
HTSL	High Temp Storage Bake, 170C	420 Hours	-	-	-	-	3/231/0	1/77/0
HAST	Biased HAST, 130C/85%RH	96 Hours	-	-	-	-	3/231/0	-
HAST	Biased HAST, 110C/85%RH	264 Hours	-	-	-	-	-	3/231/0
UHA	Unbiased HAST, 130C/85%RH	96 Hours	-	-	-	-	3/231/0	-
UHA	Unbiased HAST, 110C/85%RH	264 Hours	-	-	-	-	-	3/231/0
AC	Autoclave, 121C/100%RH	96 Hours	-	-	-	-	-	-
TC	Temperature Cycle, -55/125C	700 Cycles	-	-	-	-	3/231/0	3/231/0
SD	Surface Mount	Pb Free	-	-	-	-	3/66/0	-

Type	Test Name / Condition	Duration	Qual Device: <u>TPS51393PR</u> <u>JE</u>	Qual Device: <u>TPS51393RJ</u> <u>E</u>	Qual Device: <u>TPS51395PRJ</u> <u>E</u>	Qual Device: <u>TPS51395RJ</u> <u>E</u>	QBS Product Reference: <u>TPS51393R</u> <u>JE</u>	QBS Product Reference: <u>TPS51393R</u> <u>JE PG1.0</u>
	Solderability							
SD	Surface Mount Solderability	Pb	-	-	-	-	3/66/0	-
PD	Physical Dimensions	--	-	-	-	-	3/90/0	-

- QBS: Qual By Similarity
- Qual Device TPS51393PRJE is qualified at LEVEL2-260C
- Qual Device TPS51393RJE is qualified at LEVEL2-260C
- Qual Device TPS51395PRJE is qualified at LEVEL2-260C
- Qual Device TPS51395RJE is qualified at LEVEL2-260C

- 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

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

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