



12500 TI Boulevard, MS 8640, Dallas, Texas 75243

**PCN# 20221201000.1B**  
**Qualification of ASEN as Additional Assembly Site**  
**for Select Package Devices**  
**Change Notification / Sample Request**

**Date:** February 09, 2023  
**To:** TOKYO ELECTRON DEVICE (DSTR) PCN

Dear Customer:

**Revision B** is to announce the addition of a new device that was not included on the original PCN notification.

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.

Texas Instruments requires acknowledgement of 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 samples or additional data are required, requests must be received within **30 days** of this notification.

The changes discussed within this PCN will not take effect any earlier than the proposed first ship date on Page 3 of this notification, unless customer agreement has been reached on an earlier implementation of the change.

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 or to provide acknowledgement of this PCN, you may contact your local Field Sales Representative or the PCN Team ([PCN ww admin team@list.ti.com](mailto:PCN_admin_team@list.ti.com)). For sample requests or sample related questions, contact your local Field Sales Representative.

Sincerely,

PCN Team  
SC Business Services

**20221201000.1B**  
**Attachment: 1**

**Products Affected:**

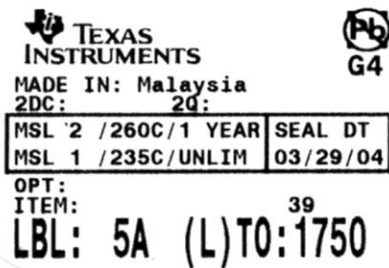
The devices listed on this page are a subset of the complete list of affected devices. According to our records, these are the devices that you have purchased within the past twenty-four (24) months. The corresponding customer part number is also listed, if available.

<b>DEVICE</b>	<b>CUSTOMER PART NUMBER</b>
TPD6E001RSER	null
TS5A23157RSER	null
TPS62231DRYR	null
TPS62232DRYR	null
TPS62231DRYT	null
TPS62232DRYT	null
TS3A24157RSER	null

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

<b>PCN Number:</b>	20221201000.1B			<b>PCN Date:</b>	February 09, 2023												
<b>Title:</b>	Qualification of ASEN as Additional Assembly Site for Select Package Devices																
<b>Customer Contact:</b>	<a href="#">PCN Manager</a>	<b>Dept:</b>	Quality Services														
<b>Proposed 1<sup>st</sup> Ship Date:</b>	Mar 02, 2023	<b>Sample requests accepted until:</b>	Mar 10, 2023*														
*Sample requests received after "Mar 10, 2023" will not be supported.																	
<b>Change Type:</b>																	
<input checked="" type="checkbox"/>	Assembly Site	<input type="checkbox"/>	Design	<input type="checkbox"/>	Wafer Bump Site												
<input type="checkbox"/>	Assembly Process	<input type="checkbox"/>	Data Sheet	<input type="checkbox"/>	Wafer Bump Material												
<input checked="" type="checkbox"/>	Assembly Materials	<input type="checkbox"/>	Part number change	<input type="checkbox"/>	Wafer Bump Process												
<input type="checkbox"/>	Mechanical Specification	<input type="checkbox"/>	Test Site	<input type="checkbox"/>	Wafer Fab Site												
<input checked="" type="checkbox"/>	Packing/Shipping/Labeling	<input type="checkbox"/>	Test Process	<input type="checkbox"/>	Wafer Fab Materials												
		<input type="checkbox"/>		<input type="checkbox"/>	Wafer Fab Process												
<b>PCN Details</b>																	
<b>Description of Change:</b>																	
<p><b>Revision B</b> is to announce the <u>addition</u> of new devices that was not included on the original PCN notification. The new devices are highlighted and <b>bolded</b> in the device list below. The expected first shipment date for the new devices will be 90 days from this notice (May 10, 2023) for the newly added devices only. The proposed 1<sup>st</sup> ship date of Mar 02, 2023 still applies for the original set of devices.</p> <p>Texas Instruments Incorporated is announcing the qualification of ASEN as Additional Assembly Site for select devices listed in the "Product Affected" Section. Current assembly sites and Material differences are as follows.</p>																	
<table border="1"> <thead> <tr> <th>Assembly Site</th> <th>Assembly Site Origin</th> <th>Assembly Country Code</th> <th>Assembly Site City</th> </tr> </thead> <tbody> <tr> <td>UTAC</td> <td>NSE</td> <td>THA</td> <td>Bangkok</td> </tr> <tr> <td><b>ASEN</b></td> <td><b>ASN</b></td> <td><b>CHN</b></td> <td><b>Suzhou</b></td> </tr> </tbody> </table>						Assembly Site	Assembly Site Origin	Assembly Country Code	Assembly Site City	UTAC	NSE	THA	Bangkok	<b>ASEN</b>	<b>ASN</b>	<b>CHN</b>	<b>Suzhou</b>
Assembly Site	Assembly Site Origin	Assembly Country Code	Assembly Site City														
UTAC	NSE	THA	Bangkok														
<b>ASEN</b>	<b>ASN</b>	<b>CHN</b>	<b>Suzhou</b>														
<b>Material Differences:</b>																	
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	UTAC	ASEN															
Mold Compound	CZ0138	<b>1801512111</b>															
<b>Reason for Change:</b>																	
Continuity of supply.																	
<b>Anticipated impact on Form, Fit, Function, Quality or Reliability (positive / negative):</b>																	
None																	
<b>Impact on Environmental Ratings:</b>																	
<p>Checked boxes indicate the status of environmental ratings following implementation of this change. If below boxes are checked, there are no changes to the associated environmental ratings.</p> <table border="1"> <thead> <tr> <th>RoHS</th> <th>REACH</th> <th>Green Status</th> <th>IEC 62474</th> </tr> </thead> <tbody> <tr> <td><input checked="" type="checkbox"/> No Change</td> <td><input checked="" type="checkbox"/> No Change</td> <td><input checked="" type="checkbox"/> No Change</td> <td><input checked="" type="checkbox"/> No Change</td> </tr> </tbody> </table>						RoHS	REACH	Green Status	IEC 62474	<input checked="" type="checkbox"/> No Change	<input checked="" type="checkbox"/> No Change	<input checked="" type="checkbox"/> No Change	<input checked="" type="checkbox"/> No Change				
RoHS	REACH	Green Status	IEC 62474														
<input checked="" type="checkbox"/> No Change	<input checked="" type="checkbox"/> No Change	<input checked="" type="checkbox"/> No Change	<input checked="" type="checkbox"/> No Change														
<b>Changes to product identification resulting from this PCN:</b>																	
<table border="1"> <tbody> <tr> <td colspan="4">Assembly Site</td> </tr> <tr> <td>UTAC</td> <td>Assembly Site Origin (22L)</td> <td colspan="2">ASO: NSE</td> </tr> <tr> <td><b>ASEN</b></td> <td>Assembly Site Origin (22L)</td> <td colspan="2">ASO: <b>ASN</b></td> </tr> </tbody> </table>						Assembly Site				UTAC	Assembly Site Origin (22L)	ASO: NSE		<b>ASEN</b>	Assembly Site Origin (22L)	ASO: <b>ASN</b>	
Assembly Site																	
UTAC	Assembly Site Origin (22L)	ASO: NSE															
<b>ASEN</b>	Assembly Site Origin (22L)	ASO: <b>ASN</b>															

Sample product shipping label (not actual product label)



(1P) SN74LS07NSR  
 (Q) 2000 (D) 0336  
 (31T) LOT: 3959047MLA  
 (4W) TKY (1T) 7523483SI2  
 (P)  
 (2P) REV: (V) 0033317  
 (20L) CS0: SHE (21L) CCO: USA  
 (22L) AS0: MLA (23L) ACO: MYS

#### Product Affected:

74LVC1G3157DRYRG4	TPS3421ECDRYR	TPS3896PDRYT	TPS62237DRYR
<b>SN74AUC1G74RSER</b>	TPS3421ECDRYT	TPS3898ADRYR	TPS62237DRYT
SN74LVC1G07DRYR	TPS3421EGDRYR	TPS3898ADRYT	TPS62730DRYR
SN74LVC1G07DRYRG4	TPS3421EGDRYT	TPS3898PDRYR	TPS62730DRYT
SN74LVC1G125DRYR	TPS3422EGDRYR	TPS3898PDRYT	TPS62732DRYR
SN74LVC1G126DRYR	TPS3422EGDRYT	TPS622311DRYR	TPS62732DRYT
SN74LVC1G14DRYR	TPS3895ADRYR	TPS622311DRYT	TPS62733DRYR
SN74LVC1G175DRYR	TPS3895ADRYT	TPS622314DRYR	TPS62733DRYT
SN74LVC1G3157DRYR	TPS3895PDRYR	TPS622314DRYT	<b>TS3A24157RSER</b>
TCA6507RUEP	TPS3895PDRYT	<b>TPS62231DRYR</b>	<b>TS3A24157RSEPG4</b>
TPD3E001DRYR	TPS3896ADRYR	<b>TPS62231DRYT</b>	<b>TS5A23157HRSER</b>
TPD3E001DRYRG4	TPS3896ADRYT	<b>TPS62232DRYR</b>	<b>TS5A23157RSER</b>
<b>TPD6E001RSER</b>	TPS3896PDRYR	<b>TPS62232DRYT</b>	

## Qualification Report

Approved Date 21-Nov-2022

### Qualification Results

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

Type	Test Name / Condition	Duration	Qual Device: TCA6507RUEP
PC	Preconditioning	Level 1 - 260C	3/693/0
TC	Temperature Cycle, -55C/125C	700 Cycles	3/231/0
SAM	Post Temperature Cycle SAM	Devices	3/15/0
UHAFT	Unbiased HAST, 130C	96 Hours	3/231/0
SAM	Post Unbiased HAST SAM	Devices	3/15/0
BHAFT	Biased HAST, 130C	96 Hours	3/231/0
SAM	Post Biased HAST SAM	Devices	3/15/0
SD	Solderability, Pb	155C Dry Bake Preconditioning	3/66/0
SD	Solderability, Pb-Free	155C Dry Bake Preconditioning	3/66/0
BBS	Ball Bond Shear	Ball Bonds	3/228/0
WBP	Wire Bond Pull	Wires	3/228/0
PD	Physical Dimensions	(per package drawing requirements)	3/60/0
MQ	Manufacturability (Assembly)	(per mfg. site requirements)	3/PASS
DSS	Die Shear Strength	Die	3/30/0
CHAR	Electrical Characterization	Devices	1/30/0
MSL	Moisture Sensitivity Level	Level 1 - 260C	3/36/0

YLD	FTY and Bin Summary	Lots	3/PASS
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Qual Device TCA6507RUE is qualified at MSL1-260C

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

The following are equivalent Temperature 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

## Qualification Report

Approved Date 02-Dec-2022

### Qualification Results

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

Type	Test Name / Condition	Duration	Qual Device: SN74LVC1G07DRYR
PC	Preconditioning	Level 1 - 260C	3/693/0
TC	Temperature Cycle, -55C/125C	700 Cycles	3/231/0
SAM	Post Temperature Cycle SAM	Devices	3/15/0
UHA	Unbiased HAST, 130C	96 Hours	3/231/0
SAM	Post Unbiased HAST SAM	Devices	3/15/0
BHA	Biased HAST, 130C	96 Hours	3/231/0
SAM	Post Biased HAST SAM	Devices	3/15/0
SD	Solderability, Pb-Free	155C Dry Bake Preconditioning	3/66/0
BBS	Ball Bond Shear	Ball Bonds	3/228/0
WBP	Wire Bond Pull	Wires	3/228/0
PD	Physical Dimensions	(per package drawing requirements)	3/60/0
MQ	Manufacturability (Assembly)	(per mfg. site requirements)	3/PASS
DSS	Die Shear Strength	Die	3/30/0
CHAR	Electrical Characterization	Devices	1/30/0
MSL	Moisture Sensitivity Level	Level 1 - 260C	3/36/0
YLD	FTY and Bin Summary	Lots	3/PASS

Qual Device SN74LVC1G07DRYR is qualified at MSL1-260C

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

The following are equivalent Temperature 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

## Qualification Report

Approved Date 06-Feb-2023

### Qualification Results

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

Type	Test Name / Condition	Duration	Qual Device: TS5A23157RSER
PC	Preconditioning	Level 1 - 260C	3/693/0
BHAST	Biased HAST, 130C	96 Hours	3/231/0
UFAST	Unbiased HAST, 130C	96 Hours	3/231/0
TC	Temperature Cycle, -55C/125C	700 Cycles	3/231/0
SAM	Post Temperature Cycle SAM	Devices	3/15/0
SD	Solderability, Pb-Free	155C Dry Bake Preconditioning	3/66/0
MQ	Manufacturability (Assembly)	(per mfg. site requirements)	3/PASS
DSS	Die Shear Strength	Die	3/30/0
BBS	Ball Bond Shear	Ball Bonds	3/228/0
WBP	Wire Bond Pull	Wires	3/228/0
PD	Physical Dimensions	(per package drawing requirements)	3/60/0
CHAR	Electrical Characterization	Devices	1/30/0
MSL	Moisture Sensitivity Level	Level 1 - 260C	3/36/0
YLD	FTY and Bin Summary	Lots	3/PASS

Qual Device TS5A23157RSER is qualified at MSL1-260C

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

The following are equivalent Temperature 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

## Qualification Report

Approved Date 01-Feb-2023

### Qualification Results

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

Type	Test Name / Condition	Duration	Qual Device: TPS62231DRYR	Qual Device: TPS62232DRYR
PC	Preconditioning	Level 1 - 260C	3/693/0	3/693/0
UFAST	Unbiased HAST, 130C	96 Hours	3/231/0	3/231/0
SAM	Post Unbiased HAST SAM	Devices	3/15/0	3/15/0
BHAST	Biased HAST, 130C	96 Hours	3/231/0	3/231/0
SAM	Post Biased HAST SAM	Devices	3/15/0	3/15/0

Type	Test Name / Condition	Duration	Qual Device: TPS62231DRYR	Qual Device: TPS62232DRYR
TC	Temperature Cycle, -55C/125C	700 Cycles	3/231/0	3/231/0
SAM	Post Temperature Cycle SAM	Devices	3/15/0	3/15/0
SD	Solderability, Pb-Free	155C Dry Bake	3/66/0	3/66/0
MQ	Manufacturability (Assembly)	(per mfg site requirements)	3/PASS	3/PASS
DSS	Die Shear Strength	Die	3/30/0	3/30/0
BBS	Ball Bond Shear	Ball Bonds	3/228/0	3/228/0
WBP	Wire Bond Pull	Wires	3/228/0	3/228/0
PD	Physical Dimensions	(per pkg drawing requirements)	3/60/0	3/60/0
CHAR	Electrical Characterization	Devices	1/30/0	1/30/0
MSL	Moisture Sensitivity Level	Level 1 - 260C	3/36/0	3/36/0
YLD	FTY and Bin Summary	Lots	3/PASS	3/PASS

Qual Device TPS62231DRYR is qualified at MSL1-260C

Qual Device TPS62232DRYR is qualified at MSL1-260C

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

The following are equivalent Temperature 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
WW PCN Team	<a href="mailto:PCN_ww_admin_team@list.ti.com">PCN_ww_admin_team@list.ti.com</a>

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