12500 TI Boulevard, MS 8640, Dallas, Texas 75243

Notification# 20230306003.1
Datasheet for THS309x
Change Notification

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

Dear Customer:

This is a notice of change to a product data sheet for 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.

The proposed first ship date is indicated 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, contact your local Field Sales Representative or the PCN Team (PCN_ww_admin_team@list.ti.com).

Sincerely,

PCN Team
SC Business Services

Data Sheet Change Notification
Attachments

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
THS3095DDA	null

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

PCN Number:	20230306003.1	**PCN Date:**	March 09, 2023
Title:	Datasheet for THS309x		
Customer Contact:	PCN Manager	**Dept:**	Quality Services
Proposed 1st Ship Date:	June 9, 2023		
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

Notification Details

Description of Change:

Texas Instruments Incorporated is announcing an information only notification.
The product datasheet(s) is being updated as summarized below.

TEXAS INSTRUMENTS

THS3091, THS3095

SLOS423J – SEPTEMBER 2003 – REVISED FEBRUARY 2023

Changes from Revision I (December 2022) to Revision J (February 2023) **Page**

- Updated *Features* section....1
- Updated *Description* section....1
- Updated the *Device Comparison Table* section....6
- Removed D package information from the datasheet....7
- Removed continuous power dissipation specification from *Absolute Maximum Ratings* table....8
- Updated *ESD Ratings* table....8
- Updated *Thermal Information* table....8
- Changed *Electrical Characteristics THS3091 table* to *Electrical Characteristics:* V_S = ±15 *V*....9
- Changed small-signal bandwidth at G = 1 from 235 MHz to 715 MHz in *Electrical Characteristics:* V_S = ±15 *V* table....9
- Changed small-signal bandwidth at G = 2 from 210 MHz to 305 MHz in *Electrical Characteristics:* V_S = ±15 *V* table....9
- Changed small-signal bandwidth at G = 5 from 190 MHz to 205 MHz in *Electrical Characteristics:* V_S = ±15 *V* table....9
- Changed small-signal bandwidth at G = 10 from 180 MHz to 190 MHz in *Electrical Characteristics:* V_S = ±15 *V* table....9
- Removed slew rate (25% to 75% level) specifications from *Electrical Characteristics:* V_S = ±15 *V* and *Electrical Characteristics:* V_S = ±5 *V* tables....9
- Added slew rate (10% to 90% level) specifications to *Electrical Characteristics:*V_S = ±15 *V and Electrical Characteristics:*V_S = ±5 *V tables*....9
- Changed rise and fall time from 5 ns to 2 ns in *Electrical Characteristics:* V_S = ±15 *V* table....9
- Changed settling time to 0.1% from 42 ns to 12.5 ns in *Electrical Characteristics:* V_S = ±15 *V* table....9
- Changed settling time to 0.01% from 72 ns to 18.5 ns in *Electrical Characteristics:* V_S = ±15 *V* table....9
- Changed second harmonic distortion at R_L = 100 Ω from 66 dBc to 72 dBc in *Electrical Characteristics:* V_S = ±15 *V* table....9
- Changed second harmonic distortion at R_L = 1 kΩ from 77 dBc to 84 dBc in *Electrical Characteristics:* V_S = ±15 *V* table....9
- Changed third harmonic distortion at R_L = 100 Ω from 74 dBc to 70 dBc in *Electrical Characteristics:* V_S = ±15 *V* table....9
- Changed third harmonic distortion at R_L = 1 kΩ from 69 dBc to 99 dBc in *Electrical Characteristics:* V_S = ±15 *V* table....9

- Changed second harmonic distortion at R_L = 1 kΩ from 73 dBc to 76 dBc in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed third harmonic distortion at R_L = 1 kΩ from 68 dBc to 75 dBc in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed input voltage noise from 2 nV/√Hz to 1.1 nV/√Hz in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed noninverting input current noise from 14 pA/√Hz to 15 pA/√Hz in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed inverting input current noise from 17 pA/√Hz to 14 pA/√Hz in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed typical transimpedance from 700 kΩ to 1500 kΩ in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed typical input offset voltage from 0.3 mV to 0.6 mV in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed maximum input offset voltage at T_A = –40°C to 85°C from 3 mV to 3.5 mV in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed maximum inverting input bias current at T_A = –40°C to 85°C from 20 µA to 25 µA in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed typical input offset current at T_A= 25°C from 1 µA to 1.5 µA in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed max input offset current at T_A= 0°C to 85°C from 15µA to 20µA in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed typical average offset voltage drift from ±10 µV/°C to ±20 µV/°C in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed typical inverting bias current drift from ±20 nA/°C to ±95 nA/°C in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed typical average offset current drift from ±20 nA/°C to ±90 nA/°C in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed typical common-mode rejection ratio from 66 dB to 74 dB in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed typical noninverting input resistance from 1.1 MΩ to 0.45 MΩ in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed typical noninverting input capacitance from 0.1 pF to 2.6 pF in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed typical output current (sourcing) from 180 mA to 250 mA in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed typical output current (sinking) from -160 mA to -250 mA in *Electrical Characteristics: V_S = ±5 V* table....11
- Changed power supply rejection (+PSRR) from 73 dB to 81 dB in *Electrical Characteristics: V_S = ±5 V* table...11
- Changed power supply rejection (-PSRR) from 71 dB to 79 dB in *Electrical Characteristics: V_S = ±5 V* table....11
- Removed *Dissipation Ratings* table....13
- Updated *Typical Characteristics (±15 V)* section....13
- Updated *Typical Characteristics (±5 V)* section....19
- Updated *Feature Description* section....21
- Updated *Device Functional Modes* section....22
- Updated *Application and Implementation* section....24
- Updated *Typical Application* section....24
- Updated *Layout* section....27

The datasheet number will be changing.

Device Family	Change From:	Change To:
THS309x	SLOS423I	SLOS423J

These changes may be reviewed at the datasheet links provided.
http://www.ti.com/product/THS309x

Reason for Change:
To accurately reflect device characteristics.
Anticipated impact on Fit, Form, Function, Quality or Reliability (positive / negative):
Electrical specification performance changes as indicated above.
Changes to product identification resulting from this PCN:
None.
Product Affected:

THS3091D	THS3091DDA	THS3091DDAG3	THS3091DDAR
THS3091DDARG3	THS3091DR	THS3095D	THS3095DDA
THS3095DDAR			

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

Location	E-Mail
WW PCN Team	PCN_ww_admin_team@list.ti.com

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