12500 TI Boulevard, MS 8640, Dallas, Texas 75243

PCN Number:	20261102001.1	PCN Issued	November 03, 2026
Qualification of RFAB as an additional Fab site option, Die Revision, Datasheet and BOM options for select devices		Sample request deadline:	January 02, 2027
		Estimated 1st ship date:	February 01, 2027
***Sample requests received after** January 02, 2027* **will not be supported.**			

Change type(s)
Assembly Process
Assembly Material
Packing/Shipping/Labeling
Design
Data Sheet/Electrical Specification
Wafer Fab Site
Wafer Fab Material
Wafer Fab Process

PCN Details

Description of Change:

Texas Instruments is pleased to announce the qualification of RFAB as an additional Fab site option, Die Revision, Datasheet and BOM options for the devices listed below.

Current Fab Site			Additional Fab site		
Current Fab Site	Process	Wafer Diameter	Additional Fab site	Process	Wafer Diameter
MAINEFAB	ABCD150XV1	200mm	RFAB	HPA9	300mm

The die was also changed as a result of the process change.

Construction differences are as follows:

	Current BOM	Additional BOM
Wire diam/type	1.0mil Au	1.0mil Cu
Die coat	PI	None
Mount compound	4223179	4221460, 4226215
Mold compound	8097131	4222198

The datasheets will be changing as a result of the above mentioned changes.

The datasheet change details can be reviewed in the datasheet revision history. The links to the revised datasheets are available in the table below.

TEXAS INSTRUMENTS

LMP8640, LMP8640HV

SNOSB28H – AUGUST 2010 – REVISED OCTOBER 2026

Changes from Revision G (November 2014) to Revision H (October 2026) **Page**

- Moved the automotive device to a standalone data sheet (SNOSDI6)..... 1
- Updated the numbering format for tables, figures, and cross-references throughout the document..... 1
- Added the ESD Ratings table and moved the storage temperature parameter to the *Absolute Maximum Ratings* table..... 1
- Machine Model ESD rating is removed..... 4
- Human-body model (HBM) for +IN and -IN pins are changed to ± 2000V to match with all other pins..... 4
- Thermal information is updated..... 4
- Differential Mode Input Impedance is changed to 4kΩ in *Electrical Characteristics 2.7V table*..... 5
- Differential Mode Input Impedance is changed to 4kΩ *Electrical Characteristics 5V table*..... 6
- Differential Mode Input Impedance is changed to 4kΩ *Electrical Characteristics 12V table*..... 8
- Added section 19

Product Folder	Current Datasheet Number	New Datasheet Number	Link to full datasheet
LMP8640/HV	SNOSB28G	SNOSB28H	http://www.ti.com/product/LMP8640

Qual details are provided in the Qual Data Section.
Test coverage, insertions, conditions will remain consistent with current testing.

Reason for Change:	Supply Continuity
Anticipated impact on Form, Fit, Function, Quality or Reliability:	These devices include new die based on existing schematics in a larger diameter wafer fab with a die shrink. There are changes in the electrical tables. Physical aspects of the device have changed. Request the Supporting Data Packet (SDP) for more details on the changes. Evaluating samples is encouraged.
Impact on Environmental Ratings	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.

RoHS	REACH	Green Status	IEC 62474
☒ No Change	☒ No Change	☒ No Change	☒ No Change

Changes to product identification resulting from this PCN:

Fab Site Information

Chip Site	Chip Site Origin Code (20L)	Chip Site Country Code (21L)	Chip Site City
MAINEFAB	CUA	USA	South Portland
RFAB	RFB	USA	Richardson

Die Rev:

Current	New
Die Rev [2P]	**Die Rev [2P]**
A	A

Sample product shipping label (not actual product label):



Products Affected:		
LMP8640HVMKX-F/NOPB	LMP8640HVMKX-T/NOPB	LMP8640MKX-H/NOPB
LMP8640HVMKX-H/NOPB	LMP8640MKX-F/NOPB	LMP8640MKX-T/NOPB

Qualification Report

Automotive Qualification Summary

(As per AEC-Q100 Rev. J and JEDEC Guidelines)

Approve Date 20-October-2026

Product Attributes

Attributes	Qual Device: LMP8640QHVMKX-T/NO	**QBS Package, Process, Product Reference: LMP8640QHVMKX-F/NO**	QBS Package, Process, Product Reference: LMP8640QMKX-F/NOPB
Automotive Grade Level	Grade 1	Grade 1	Grade 1
Operating Temp Range (C)	-40 to 125	-40 to 125	-40 to 125
Product Function	Signal Chain	Signal Chain	Signal Chain
Wafer Fab Supplier	RFAB	RFAB	RFAB
Assembly Site	TIEMA	TIEMA	TIEMA
Package Group	SOT	SOT	SOT
Package Designator	DDC	DDC	DDC
Pin Count	6	6	6

QBS: Qual By Similarity, also known as Generic Data
Qual Device LMP8640QHVMKX-T/NO is qualified at MSL1 260C

Qualification Results

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

Type	#	Test Spec	Min Lot Qty	SS / Lot	Test Name	Condition	Duration	**Qual Device: LMP8640QHVMKX-T/NO**	QBS Package, Process, Product Reference: LMP8640QHVMKX-F/NO	**QBS Package, Process, Product Reference: LMP8640QMKX-F/NOPB**
Test Group A - Accelerated Environment Stress Tests										
PC	A1	JEDEC J-STD-020 JESD22-A113	3	77	Preconditioning	MSL1 260C	-	1/0/0	3/0/0	-
HAST	A2	JEDEC JESD22-A110	3	77	Biased HAST	130C/85%RH	96 Hours	1/77/0	3/231/0	-
AC/UHAST	A3	JEDEC JESD22-A102/JEDEC JESD22-A118	3	77	Unbiased HAST	130C/85%RH	96 Hours	1/77/0	3/231/0	-
TC	A4	JEDEC JESD22-A104 and Appendix 6	3	77	Temperature Cycle	-65C/150C	1000 Cycles	-	3/231/0	-
TC	A4	JEDEC JESD22-A104 and Appendix 6	3	77	Temperature Cycle	-65C/150C	500 Cycles	1/77/0	3/231/0	-

Test Group B - Accelerated Lifetime Simulation Tests										
HTOL	B1	JEDEC JESD22-A108	3	77	Life Test	125C	1000 Hours	-	2/154/0	-
Test Group C - Package Assembly Integrity Tests										
WBS	C1	AEC Q100-001	1	30	Wire Bond Shear	Minimum of 5 devices, 30 wires Cpk>1.67	Wires	1/30/0	3/90/0	-
WBP	C2	MIL-STD883 Method 2011	1	30	Wire Bond Pull	Minimum of 5 devices, 30 wires Cpk>1.67	Wires	1/30/0	3/90/0	-
SD	C3	JEDEC J-STD-002	1	15	PB-Free Solderability	>95% Lead Coverage	-	-	1/15/0	-
PD	C4	JEDEC JESD22-B100 and B108	3	10	Physical Dimensions	Cpk>1.67	-	1/10/0	3/30/0	-
Test Group D - Die Fabrication Reliability Tests										
EM	D1	JESD61	-	-	Electromigration	-	-	Completed Per Process Technology Requirements	Completed Per Process Technology Requirements	Completed Per Process Technology Requirements
TDDB	D2	JESD35	-	-	Time Dependent Dielectric Breakdown	-	-	Completed Per Process Technology Requirements	Completed Per Process Technology Requirements	Completed Per Process Technology Requirements
HCI	D3	JESD60 & 28	-	-	Hot Carrier Injection	-	-	Completed Per Process Technology Requirements	Completed Per Process Technology Requirements	Completed Per Process Technology Requirements
BTI	D4	-	-	-	Bias Temperature Instability	-	-	Completed Per Process Technology Requirements	Completed Per Process Technology Requirements	Completed Per Process Technology Requirements
SM	D5	-	-	-	Stress Migration	-	-	Completed Per Process Technology Requirements	Completed Per Process Technology Requirements	Completed Per Process Technology Requirements
Test Group E - Electrical Verification Tests										
ESD	E2	AEC Q100-002	1	3	ESD HBM	-	2000 Volts	-	1/3/0	-
ESD	E3	AEC Q100-011	1	3	ESD CDM	-	500 Volts	-	1/3/0	-
LU	E4	AEC Q100-004	1	3	Latch-Up	Per AEC Q100-004	-	-	1/3/0	-
ED	E5	AEC Q100-009	3	30	Electrical Distributions	Cpk>1.67 Room, hot, and cold	-	-	2/60/0	1/30/0

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
Ambient Operating Temperature by Automotive Grade Level:
Grade 0 (or E): -40C to +150C
Grade 1 (or Q): -40C to +125C
Grade 2 (or T): -40C to +105C
Grade 3 (or I) : -40C to +85C
E1 (TEST): Electrical test temperatures of Qual samples (High temperature according to Grade level):
Room/Hot/Cold : HTOL, ED
Room/Hot : THB / HAST, TC / PTC, HTSL, ELFR, ESD & LU
Room : AC/uHAST
Quality and Environmental data is available at TI's external Web site:
TI Qualification ID: R-CHG-2509-014

In performing change qualifications, Texas Instruments follows integrated circuit industry standards in performing defect mechanism analysis and failure mechanism-based accelerated environmental testing to ensure wafer fab process, assembly process and product quality and reliability. As encouraged by these standards, TI uses both product-specific and generic (family) data in

qualifying its changes. For devices to be categorized as a 'product qualification family' for generic data purposes, they must share similar product, wafer fab process and assembly process elements. The applicability of generic data (also known at TI as Qualification by Similarity (QBS)) is determined by the Reliability Engineering function following these industry standards. Generic data is shown in the qualification report in columns titled "QBS Process" (for wafer fab process), "QBS Package" (for assembly process) and "QBS Product" (for product family).

For questions regarding this notice, e-mails can be sent to the Change Management team or your local Field Sales Representative.

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