

<b>PCN Number:</b>	20181212001.1	<b>PCN Date:</b>	Dec 13, 2018
<b>Title:</b>	New 5x5 BGA trays for Select 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 13, 2019		
<b>Change Type:</b>			
<input type="checkbox"/>	Assembly Site	<input type="checkbox"/>	Design
<input type="checkbox"/>	Assembly Process	<input type="checkbox"/>	Data Sheet
<input type="checkbox"/>	Assembly Materials	<input type="checkbox"/>	Part number change
<input type="checkbox"/>	Mechanical Specification	<input type="checkbox"/>	Test Site
<input checked="" type="checkbox"/>	Packing/Shipping/Labeling	<input type="checkbox"/>	Test Process
		<input type="checkbox"/>	Wafer Bump Site
		<input type="checkbox"/>	Wafer Bump Material
		<input type="checkbox"/>	Wafer Bump Process
		<input type="checkbox"/>	Wafer Fab Site
		<input type="checkbox"/>	Wafer Fab Materials
		<input type="checkbox"/>	Wafer Fab Process
<b>PCN Details</b>			
<b>Description of Change:</b>			
Texas Instruments is pleased to announce the qualification of a new tray for select 5x5 BGA package devices in the Product Affected section below. A comparison summary of the differences are as follows:			
<b>5x5 BGA Tray Change</b>			
<b>What</b>	<b>From</b>	<b>To</b>	
Stock #/Supplier	4200815/Ohkawa	<a href="#">4224682/KMH Hitech</a>	
Weight	231.5 grams	<a href="#">231.4 grams</a>	
Surface Resistivity	10 <sup>5</sup> - 10 <sup>8</sup> ohm/sq.	<a href="#">10<sup>5</sup> - 10<sup>8</sup> ohm/sq.</a>	
Package Size	5x5	<a href="#">5x5</a>	
Package Type	BGA	<a href="#">BGA</a>	
Temperature Rating	150C	<a href="#">150C</a>	
Matrix (Column x Rows)	10x25	<a href="#">16x36</a>	
Fence Design	Fillet	<a href="#">Fillet</a>	
Raw material	Carbon Powder	<a href="#">Carbon fiber</a>	
Color	Black	<a href="#">Black</a>	

## Dimensional Tray Comparison

Items Description	4200815 (Ohkawa)			4224682 (KMHhitech)			Remarks
	DIM	Upper Limits	Lower Limits	DIM	Upper Limits	Lower Limits	
Overall Length	322.6	322.85	322.35	322.6	322.85	322.35	Same
Layout Length	315.0	315.25	314.75	315.0	315.25	314.75	Same
Layout Width	135.9	136.15	135.65	135.9	136.15	135.65	Same
Layout Length on Top Stack Frame	311.15	311.40	311.02	311.15	311.40	311.02	Same
Layout Width on Top Stack Frame	132.05	132.30	131.92	132.05	132.30	131.92	Same
Layout Length on Bottom Stack Frame	311.66	311.91	311.53	311.66	311.91	311.53	Same
Layout Width on Bottom Stack Frame	132.56	132.81	132.43	132.59	132.84	132.46	Same
End Tab Length	92.10	92.35	91.85	92.10	92.35	91.85	Same
Overall Height	7.62	7.75	7.49	7.62	7.75	7.49	Same
Stack Height (JEDEC C0-034)	1.27	1.40	1.14	2.00	2.13	1.87	Changed
Tray Matrix No.	12x30			16x36			Changed
Pitch M	12.70	12.83	12.57	8.70	8.83	8.57	Changed
Pitch M3	10.90	11.15	10.65	7.90	8.15	7.65	Changed
Pitch M1	8.15	8.28	8.02	8.75	9.00	8.50	Changed
Pitch M2	10.30	10.43	10.17	8.50	8.75	8.25	Changed
Cavity Size	5.19	5.29	5.09	5.23	5.28	5.18	Changed
Pedestal Design	Floor			Slope/Floor support			Changed
Package seating height (Top)	2.00	2.08	1.92	1.47	1.55	1.39	Changed
Package seating height (Bottom)	1.60	1.68	1.52	1.41	1.49	1.33	Changed

### Reason for Change:

Continuity of supply

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

None

### Anticipated impact on Material Declaration

<input checked="" type="checkbox"/>	No Impact to the Material Declaration	<input type="checkbox"/>	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 from the <a href="#">TI Eco-Info website</a> . There is no impact to the material meeting current regulatory compliance requirements with this PCN change.
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### Changes to product identification resulting from this PCN:

New tray

### Product Affected:

SN65LVDS301ZQE	SN65LVDS302ZQE	TLV320AIC3106IZQE
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Revision: A

EQ# :  
A/T Site:

## BGA JEDEC Tray Qualification Summary

Reference (QSS 003-008, 009-006, 014-102)

Supplier:	<u>KMH HITECH PHILS CORP</u>	
Vendor Part No:	<u>P10100919</u>	
TI Part No:	<u></u>	(If available)
Weight/tray (g):	<u>231.5g</u>	
Material:	<u>150C MPPO</u>	
Package Description	<u>BGA 5.0 X 5.0</u>	(yes/no)
Package Designator:	<u>ZXH</u>	
Result:	<u>Pass</u>	
Date:	<u></u>	

I. First Article Inspection Test	<u>Pass</u>	(Pass/Fail)
II. Dimensional Test	<u>Pass</u>	
III. Manufacturability Test	<u>Pass</u>	
IV. Bake & Surface Resistivity Test	<u>Pass</u>	
V. Fit Analysis	<u>Pass</u>	
VI. Drop Test	<u>Pass</u>	

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	<a href="mailto:PCNAmericasContact@list.ti.com">PCNAmericasContact@list.ti.com</a>
Europe	<a href="mailto:PCNEuropeContact@list.ti.com">PCNEuropeContact@list.ti.com</a>
Asia Pacific	<a href="mailto:PCNAsiaContact@list.ti.com">PCNAsiaContact@list.ti.com</a>
Japan	<a href="mailto:PCNJapanContact@list.ti.com">PCNJapanContact@list.ti.com</a>