

Product Change Notification 110086 - 03

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Should you have any issues with the timeline or content of this change, please contact the Intel Representative(s) for your geographic location listed below. No response from customers will be deemed as acceptance of the change and the change will be implemented pursuant to the key milestones set forth in this attached PCN.

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Product Change Notification

Change Notification #: 110086 - 03

Change Title: Embedded Intel® Core™ i7-610E, i7-620LE,

i7-620UE, i5-520E, i3-330E and P4505

Processors, PCN 110086-03, Product Design, C-2 Step to K-0 Stepping conversion, Reason

for Revision: Clarification of Product

Ordering and Search Codes

Date of Publication: November 18, 2010

Key Characteristics of the Change:

Product Design

Forecasted Key Milestones:

| Date of Samples Availability: | Jun 14, 2010 |
|------------------------------------------------------------------|--------------|
| Date of Qualification Data Availability: | Jun 11, 2010 |
| Date Customer Must be Ready to Receive Post-Conversion Material: | Sep 10, 2010 |
| Date of First Availability of Post-Conversion Material: | Jul 23, 2010 |

The date of "First Availability of Post-Conversion Material" is the projected date that a customer may expect to receive the Post-Conversion Materials. This date is determined by the projected depletion of inventory at the time of the PCN publication. The depletion of inventory may be impacted by fluctuating supply and demand, therefore, although customers should be prepared to receive the Post-Converted Materials on this date, Intel will continue to ship and customers may continue to receive the pre-converted materials until the inventory has been depleted.

Description of Change to the Customer:

Revision 03 Info: The 6 products listed on the Products Affected table below have different codes for ordering and searching in the ARK.INTEL.COM tool as outlined in this reference table.

Note: Customers may also order products using the MM# code, and may search for the products using the S-spec or MM#, depending on your company business process.

Ordering & Search Codes for new K0 Step:

| Processor# | Post Conversion K0 Product SEARCH Code | Full Post Conversion K0 Product ORDER Code | Post Conversion K0 S-Spec | Post Conversion K0 MM# |
|------------|----------------------------------------------|-----------------------------------------------|------------------------------|---------------------------|
| i5-520E | CN80617004461AB | CN80617004461ACS LBXK | S LBXK | 908571 |
| i7-620LE | CN80617004455AB | CN80617004455ACS LBXH | S LBXH | 908574 |
| i7-620UE | CN80617004458AB | CN80617004458ACS LBXJ | S LBXJ | 908569 |
| P4505 | CN80617004545AF | CN80617004545AGS LBXG | S LBXG | 908572 |
| i3-330E | CN80617004467AC | CN80617004467AHS LBXW | S LBXW | 908570 |
| i7-610E | CN80617005745AB | CN80617005745ACS LBXX | S LBXX | 908575 |

Revision 02 Info: This revision affects product content only. Changes consist of alignment of Post Conversion K-0 Product Codes with Pre Conversion C-2 Product Codes. There are no changes to other content in this PCN.

Revision 01 Info: This revision is to adjust Product Content. SSpec information is not in same format from Pre Conversion to Post Conversion. Missing S in SSpec column. There are no other changes in the PCN.

Intel is initiating an C-2, C-3 to K-0 stepping conversion for the Intel® Core™ i7-610E, i7-620LE, i7-620UE, i5-520E, i3-330E and P4505 Processors where they will undergo the following changes:

- *New S-spec and MM numbers for the converting products
- *K-0 stepping package is pin compatible with C-2 stepping package.
- *CPUID will change from 0x20652h to 0x20655h.

Customer Impact of Change and Recommended Action:

Intel customers will need to search (INTEL.ARK.COM) for the 6 products, listed in the table below, using the appropriate "search code" listed in the Description of Change section above.

FROM ORIGINAL PCN:

Intel anticipates no change to customer platforms designed to Intel guidelines. Minimal re-qualification and/or validation is expected for features already supported on C-2 stepping.

The Intel® $Core^{m}$ i7-610E, i7-620LE, i7-620UE, i5-520E, i3-330E and P4505 Processors on K-0 stepping will require a BIOS update due to the new CPUID. Once customers implement the BIOS update, they will be able to accept both C-2 and K-0 stepping material. For customers implementing their own BIOS, it is necessary to incorporate the latest Microcode Update (MCU) to support the K-0 stepping.

Customers should be ready to receive a combination of both C-2 stepping material and K-0 stepping material by the "Date Customer Must be Ready to Receive Post-Conversion Material" above.

Please contact your local Intel representative for further technical questions.

Products Affected / Intel Ordering Codes:

| Processor# | Frequency | Pre Conversion Product Order Code | Pre Conversion S-Spec | Pre Conversion MM# | Post Conversion Qualification Samples QDF# | Post Conversion Qualification Samples MM# | Post Conversion Product Order Code (minus s-spec) | Post Conversion S-Spec | Post Conversion MM# |
|------------|-----------|-----------------------------------------|-----------------------------|--------------------------|--------------------------------------------------------|-------------------------------------------------------|------------------------------------------------------------|------------------------------|---------------------------|
| i5-520E | 2.4 GHz | CN80617004461AB | S LBP6 | 905467 | Q4NE | 908456 | CN80617004461AC | S LBXK | 908571 |
| i7-620LE | 2.0 GHz | CN80617004455AB | S LBP9 | 905468 | Q4ND | 908455 | CN80617004455AC | S LBXH | 908574 |
| i7-620UE | 1.06 GHz | CN80617004458AB | S LBPA | 905469 | Q4MN | 908453 | CN80617004458AC | S LBXJ | 908569 |
| P4505 | 1.86 GHz | CN80617004545AF | S LBQB | 905471 | Q4LT | 908222 | CN80617004545AG | S LBXG | 908572 |
| i3-330E | 2.13 GHz | CN80617004467AC | S LBQC | 905472 | Q4NF | 908458 | CN80617004467AH | S LBXW | 908570 |
| i7-610E | 2.53 GHz | CN80617005745AB | S LBRZ | 905473 | Q4NG | 908459 | CN80617005745AC | S LBXX | 908575 |

PCN Revision History:

| Date of Revision: | Revision Number: | Reason: |
|-------------------|-------------------------|------------------------------------------|
| June 9, 2010 | 00 | Originally Published PCN |
| July 21, 2010 | 01 | Incorrect edits in Product |
| | | Information. Missing S in S Spec column. |
| August 11, 2010 | 02 | Modification to Post Conversion K- |
| | | 0 Product Codes to align to Pre- |
| | | Conversion C-2 product codes |
| November 18, 2010 | 03 | Clarification of Product Ordering |
| | | and Search Codes |