



Substrate Ball Pad Metallization Change for Selected Virtex-4 and Virtex-5 FPGA Flip Chip Packages

XCN16009 (v1.0) Feb 8, 2016

Product Change Notice – For Information Only

Overview

The purpose of this notification is to communicate that Xilinx has qualified an additional substrate ball pad metallization called CuSOP for selected Virtex®-4 and Virtex®-5 FPGA flip chip packages.

Description

Xilinx has qualified an additional substrate ball pad metallization called CuSOP for selected Virtex-4 and Virtex-5 FPGA flip chip packages. The implementation of CuSOP is an industry trend that impacts our substrate and assembly suppliers. This enables Xilinx to better support long-term customer demand. Xilinx will begin cross shipping Virtex®-4 and Virtex®-5 with this change upon the release of this PCN-FYI.

Xilinx will revise the corresponding Material Declaration Data Sheet. CuSOP was already qualified and in production for all Virtex®-6 and Virtex®-7 Series FPGA products. There is no change in the fit, form or function with this change. There is no change to the package substrate and solder balls.

Products Affected

This change affects all speed, package, and temperature variations of the commercial (C) and industrial (I) grade of selected Virtex-4 and Virtex-5 FPGA devices. Affected device and package combinations are included in [Table 1](#) and [Table 2](#).

Table 1: Virtex-4 FPGA products affected

Xilinx Product	Package
XC4VFX12	SF(G)363
XC4VFX20	FF(G)672
XC4VFX60	FF(G)672
XC4VFX60	FF(G)1152
XC4VLX100	FF(G)1148
XC4VLX25	SF(G)363
XC4VLX25	FF(G)668
XC4VLX40	FF(G)1148
XC4VLX60	FF(G)668
XC4VLX60	FF(G)1148
XCE04L4	FF(G)1148
XCE04L6	FF(G)668
XCE04L6	FF(G)1148

Table 2: Virtex-5 FPGA products affected

Xilinx Product	Package
XC5VFX100T	FF(G)1136
XC5VFX30T	FF(G)665
XC5VFX70T	FF(G)1136
XC5VLX110	FF(G)1153
XC5VLX110T	FF(G)1136
XC5VLX155T	FF(G)1136
XC5VLX30	FF(G)676
XC5VLX30T	FF(G)665
XC5VLX330	FF(G)1760
XC5VLX50	FF(G)676
XC5VLX50	FF(G)1153
XC5VLX50T	FF(G)665
XC5VLX50T	FF(G)1136
XC5VLX85	FF(G)676
XC5VLX85	FF(G)1153
XC5VLX85T	FF(G)1136
XC5VSX95T	FF(G)1136
XCE05L11	FF(G)1153
XCE05L11T	FF(G)1136
XCE05L33	FF(G)1760

Key Dates and Ordering Information

Xilinx will begin to cross-ship selected Virtex®-4 and Virtex®-5 FPGA flip chip production parts with this change upon release of this PCN-FYI.

Qualification Data

Xilinx had completed and successfully passed all the necessary qualification when CuSOP was introduced for 6 & 7 series products. Reliability data are available in [UG116](#), Product Reliability Monitor.

Response

No response is required. For additional information or questions, please contact [Xilinx Technical Support](#).

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Revision History

The following table shows the revision history for this document:

Date	Version	Description of Revisions
02/08/2016	1.0	Initial release.

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