

Product Change Notice (PCN)

Subject: Alternate wafer fabrication facility of the listed Renesas PQFN packaged products

Publication Date: 9/30/2025

Effective Date: 12/29/2025

Revision Description:

Initial Release

Description of Change:

Alternate wafer fabrication facility of the listed Renesas PQFN packaged products

- *Vanguard Fab2, Hsin-Chu, Taiwan ROC*

Affected Devices:

RAA2209004GNP#HB0	RAA2214904GNP#HB0	RAA2214904GNP#HBA	RAA2214904GNP#HBB
RAA2214904S04GNP#HB0	RAA2214904S05GNP#HB0	RAA2214904S09GNP#HB0	RAA2214904S0DGNP#HB0

This notice is to inform you that Renesas Electronics America will begin using Vanguard Fab2 as a secondary wafer fabrication facility for the products listed above, which will be assembled into Renesas PQFN (Power Quad Flat No-Leads) packaged products.

Reason for Change:

The Vanguard Fab2 wafer fabrication facility is currently qualified as an existing facility for Renesas high-volume production. The Vanguard Fab2 is being added as alternate wafer fabrication facility to expand current capacity and optimize Renesas's ability to meet customer's delivery requirements for the listed devices above. There is no change to the use of existing wafer fabrication, assembly and test sites.

Impact on fit, form, function, quality & reliability:

The qualification plan is designed using JEDEC and other applicable industry standards to confirm there is no impact to form, fit, function or interchangeability of the product. A summary of the qualification result is included for reference. Please refer Appendix A. The remainder of the manufacturing operations (wafer fabrication, package level electrical test, etc) will continue to be processed to previously established manufacturing flow.

Product Identification:

There will be no change in the external marking of the packaged parts. Products affected by this change are identifiable via Renesas Electronics America Inc. internal traceability system. All shipments with date-codes prior to 01/01/2026 will contain only existing wafer fabrication material, whereas, shipments with date-codes on or after 01/01/2026 may contain both existing and new (Fab2) wafer fabrication material.

Qualification status: Completed, See attached

Sample availability: 10/15/2025

Device material declaration: Available upon request

Sample is available on Oct 15, 2025 onwards, and subject to availability. Customer may expect 1 – 2 months for sample replenishment.

Note:

1. Acknowledgement must be received by Renesas within 30 days or Renesas will consider the change as approved.
2. If timely acknowledgement is provided by Customer, then Customer shall have 90 days from the date of receipt of this PCN to make any objections to this PCN. If Customer fails to make objections to this PCN within 90 days of the receipt of the PCN then Renesas will consider the PCN changes as approved.
3. If customer cannot accept the PCN then customer must provide Renesas with a last time buy demand and purchase order.

For additional information regarding this notice, please contact your regional change coordinator (below)			
Americas: PCN-US@RENESAS.COM	Europe: PCN-EU@RENESAS.COM	Japan: PCN-JP@RENESAS.COM	Asia Pac: PCN-APAC@RENESAS.COM

Appendix A : Qualification result

Test Description	Condition	RAA2214904GNP#HB0 34 Leads, 4mm x 6mm x 1.0mm PQFN Package
High Temperature Operating Life (HTOL) +125°C	500 hours	N=240 Acc = 0
Biased High Accelerated Stress Test (bHAST) +110°C ; 85% RH	264 hours	N=240 Acc = 0 L3 Pb-Free
Moisture Sensitivity Level	Level 3	N=222 Acc = 0 L3 Pb-Free
Unbiased Highly Accelerated Stress Test (uHAST) +130°C ; 85% RH	96 hours	N=240 Acc = 0 L3 Pb-Free
Temperature Cycle (TCT) -40°C / +125 °C	500 cycles	N=240 Acc = 0 L3 Pb-Free
Hot Temperature Storage (HTS) +150°C	500 hours	N=240 Acc = 0

 Pass Qualification

 Qualified by Extension

Note : QBE : Qualification by Extension (Qualification Family) – This methodology is adopted because bHAST and uHAST share similar reliability characteristics. As such, uHAST is waived and with reference to the result of bHAST.