

Product Change Notice (PCN)

Subject: Change Leadframe Supplier

Publication Date: 12/23/2022

Effective Date: 1/22/2023

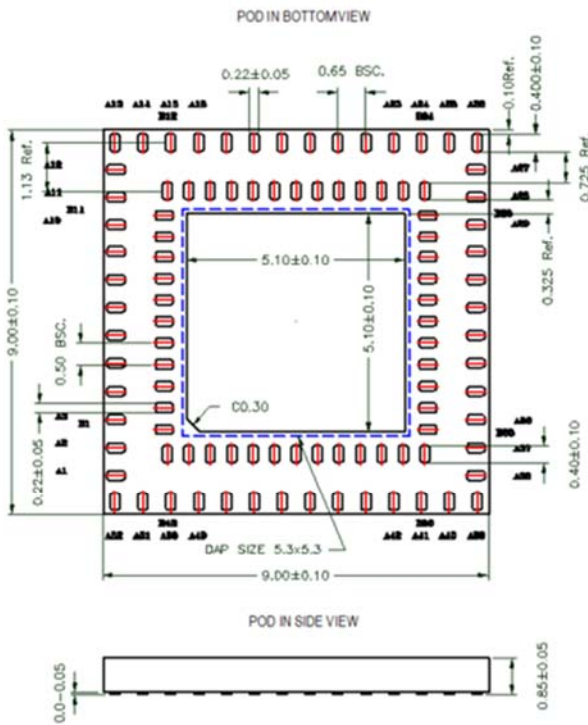
Revision Description:

Initial Release

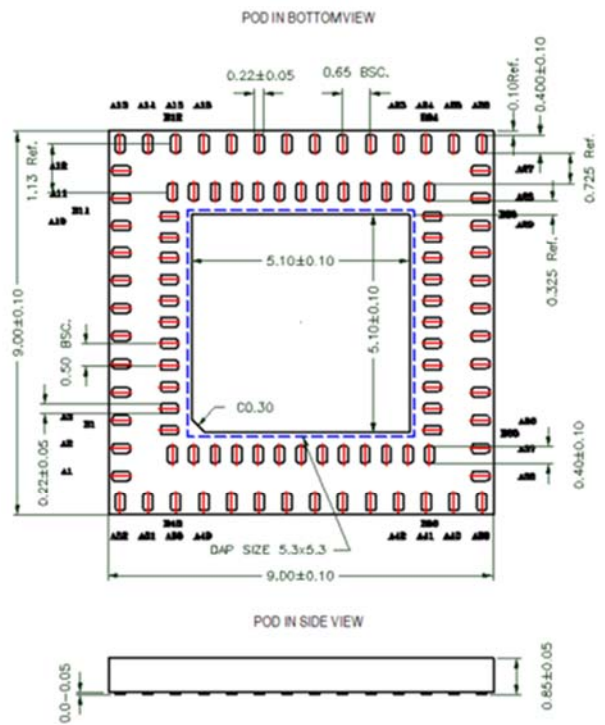
Description of Change:

This notification is to advise our customers that Renesas is changing leadframe supplier from CWTC, Japan to Rokko, Malaysia due to the current supplier has ceased the operation. There will be no change to the leadframe base material, Eftec-64T as well as the package outline drawing since the new supplier follows exactly the existing supplier's leadframe drawing.

POD Current Leadframe Supplier
(CWTC, Japan)



POD New Leadframe Supplier
(Rokko, Malaysia)



No change in moisture sensitive level as a result of this change.

The current inventories are expected to deplete by end of February 2023. We request customers to acknowledge receipt of this notification within 30 days of the date of this PCN notification or Renesas will consider the change as approved by customers.

Affected Product List: Refer Appendix B.

Reason for Change:

The existing leadframe supplier ceased the operation.

Impact on Fit, Form, Function, Quality & Reliability:

The change is expected will have no impact on the form, fit, function, quality, reliability and environmental compliance of the products.

Product Identification:

Cut off Assembly lot# will be shared upon request.

Qualification Status: Preliminary qual completed. Refer Appendix A.

Sample Availability Date: 4 weeks from sample booking date

Device Material Declaration: Available upon request

Note:

1. Acknowledgement must be received by Renesas within 30 days or Renesas will consider the change as approved.
2. 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 idt-pcn@lm.renesas.com

Appendix A - Qualification Results
Affected Packages: VFQFPN-100

Qual Vehicle: VFQFPN-100

Qual Plan & Results: Tests are in accordance with AEC-Q006 recommended tests.

Seq. #	Qual Step / Stress Test	Temperature Cycling [JESD22-A104] [TC] (-55°C / 125°C)	Unbiased Temperature/Humidity [JESD22-A118] [UHAST] (130°C / 85% RH / <u>Unbiased</u>)	High Temperature Storage Life [JESD22-A103] [HTSL] (150°C)
1	Initial Sampling	77/0, x3 lots	77/0, x3 lots	45/0, x3 lots
2	CSAM @ T0	77/0, x3 lots	77/0, x3 lots	NA
3	Preconditioning to MSL3	77/0, x3 lots	77/0, x3 lots	NA
4	CSAM post PC	77/0, x3 lots	77/0, x3 lots	NA
5	ATE Test	77/0, x3 lots	77/0, x3 lots	NA
6	Stress Test, 1x	1000 cyc	96 hrs	500 hrs
7	ATE Test	77/0, x3 lots	77/0, x3 lots	NA
8	CSAM post-1x stress	22/0, x3 lots	NA	NA
9a	Ball + Stitch Pull	3/0, x3 lots	NA	NA
9b	Ball Shear	3/0, x3 lots	NA	NA
10	Cross Section	1/0, x3 lots	NA	NA
11	Stress Test, 2x	2000 cyc	NA	1000 hrs
12	ATE Test	70/0, x3 lots	NA	45/0, x3 lots
13	CSAM post-2x stress	End of Jan '23	NA	NA
14a	Ball + Stitch Pull	End of Jan '23	NA	NA
14b	Ball Shear	End of Jan '23	NA	NA
15	Cross Section	End of Jan '23	NA	2/0, x3 lots

Appendix B – Affected Product List

P9145NHGI	P9180-I5NHGI	P91E0A-G0NHGI	P91E0A-P1NHG28
P9145NHGI8	P9180-I5NHGI8	P91E0A-G0NHGI8	P91E0A-P1NHG8
P9146-00NHGI	P9180-I6NHGI	P91E0A-G1NHG	P91E0A-Q1NHG
P9146-00NHGI8	P9180-I6NHGI8	P91E0A-G1NHG2	P91E0A-Q1NHG2
P9146-M0NHGI	P9180-M0NHGI	P91E0A-G1NHG28	P91E0A-Q1NHG28
P9146-M0NHGI8	P9180-M0NHGI8	P91E0A-G1NHG8	P91E0A-Q1NHG8
P9146-Q0NHGI	P9180-M1NHGI	P91E0A-G2NHG	P91E0A-S2NHGI
P9146-Q0NHGI8	P9180-M1NHGI8	P91E0A-G2NHG2	P91E0A-S2NHGI8
P9180-00NHGI	P9180-M2NHGI	P91E0A-G2NHG28	P91E0A-V0NHGI
P9180-00NHGI8	P9180-M2NHGI8	P91E0A-G2NHG8	P91E0A-V0NHGI8
P9180A-00NHGI	P9180-M3NHGI	P91E0A-G3NHG	P91E0A-V1NHG
P9180A-00NHGI8	P9180-M3NHGI8	P91E0A-G3NHG2	P91E0A-V1NHG2
P9180A-A1NHGI	P9180NHGI	P91E0A-G3NHG28	P91E0A-V1NHG28
P9180A-A1NHGI8	P9180NHGI8	P91E0A-G3NHG8	P91E0A-V1NHG8
P9180A-D0NHGI	P9180-Q0NHGI	P91E0A-H1NHG	P91E0A-V1NHGI
P9180A-D0NHGI8	P9180-Q0NHGI8	P91E0A-H1NHG2	P91E0A-V1NHGI8
P9180A-D2NHGI	P91E0A-00NHG	P91E0A-H1NHG28	P91E0-C0NHGI
P9180A-D2NHGI8	P91E0A-00NHG2	P91E0A-H1NHG8	P91E0-C0NHGI8
P9180A-I0NHGI	P91E0A-00NHG28	P91E0A-H2NHG	P91E0-D0NHGI
P9180A-I0NHGI8	P91E0A-00NHG8	P91E0A-H2NHG2	P91E0-D0NHGI8
P9180A-I5NHGI	P91E0A-00NHGI	P91E0A-H2NHG28	P91E0-G5NHGI
P9180A-I5NHGI8	P91E0A-00NHGI8	P91E0A-H2NHG8	P91E0-G5NHGI8
P9180A-I6NHGI	P91E0A-01NHG	P91E0A-H4NHG	P91E0-I5NHGI
P9180A-I6NHGI8	P91E0A-01NHG8	P91E0A-H4NHG2	P91E0-I5NHGI8
P9180A-I7NHGI	P91E0A-01PNHG	P91E0A-H4NHG28	P91E0-I6NHGI
P9180A-I7NHGI8	P91E0A-01PNHG2	P91E0A-H4NHG8	P91E0-I6NHGI8
P9180A-M1NHGI	P91E0A-01PNHG28	P91E0A-H5NHG2	P91E0-I7NHGI
P9180A-M1NHGI8	P91E0A-01PNHG8	P91E0A-H5NHG28	P91E0-I7NHGI8
P9180A-M2NHGI	P91E0A-AI5NHG	P91E0A-H6NHG2	P91E0-I8NHGI
P9180A-M2NHGI8	P91E0A-AI5NHG2	P91E0A-H6NHG28	P91E0-I8NHGI8
P9180A-M4NHGI	P91E0A-C0NHGI	P91E0A-H7NHG2	P91E0-I9NHGI
P9180A-M4NHGI8	P91E0A-C0NHGI8	P91E0A-H7NHG28	P91E0-I9NHGI8
P9180ANHGI	P91E0A-C1NHG	P91E0A-I5NHGI	P91E0-N0NHGI
P9180ANHGI8	P91E0A-C1NHG2	P91E0A-I5NHGI8	P91E0-N0NHGI8
P9180A-V0NHGI	P91E0A-C1NHG28	P91E0A-I8NHGI	P91E0-R0NHGI
P9180A-V0NHGI8	P91E0A-C1NHG8	P91E0A-I8NHGI8	P91E0-R0NHGI8
P9180A-X1NHGI	P91E0A-ENNHG	P91E0A-L1NHG	P91E0-S1NHGI
P9180A-X1NHGI8	P91E0A-ENNHG2	P91E0A-L1NHG2	P91E0-S1NHGI8
P9180A-X3NHGI	P91E0A-ENNHG28	P91E0A-L1NHG28	P91E0-X1NHGI
P9180A-X3NHGI8	P91E0A-ENNHG8	P91E0A-L1NHG8	P91E0-X1NHGI8

P9180-I0NHGI	P91E0A-F0NHGI	P91E0A-N0NHGI	P91E0-X2NHGI
P9180-I0NHGI8	P91E0A-F0NHGI8	P91E0A-N0NHGI8	P91E0-X2NHGI8
P9180-I1NHGI	P91E0A-G0NHG2	P91E0A-P1NHG	
P9180-I1NHGI8	P91E0A-G0NHG28	P91E0A-P1NHG2	