

## Product Change Notice (PCN)

**Subject:** Firmware update for Clock Matrix part 8A34005

**Publication Date:** 2/17/2022

**Effective Date:** 5/17/2022

### Revision Description:

Revision 1. To remove the following bullet points from "Reason for Change" section:  
Automatic ToD transmission via PWM, Align phase of selected outputs via GPIO pins, GPIO pins to be used for phase measurement using output TDC, Use PWM to transmit & receive clocks that are asynchronous with the PWM carrier. The removed bullets are not applicable to 8A34005.

### Description of Change:

This notice is to advise our customers that the firmware for the affected product list will be updated from version 5.2.2 to version 5.3.4. This is firmware update only and there is no change to the device.

The current firmware version 5.2.2 will be discontinued and replaced by the new firmware version 5.3.4 as of the effective date on this notice. The Last Time Buy (LTB) date for the current firmware version 5.2.2 will be May 17, 2022.

### Affected Product List:

|                 |                 |                 |                 |
|-----------------|-----------------|-----------------|-----------------|
| 8A34005-000NLG  | 8A34005-001NLG  | 8A34005-002NLG  | 8A34005-003NLG  |
| 8A34005-000NLG8 | 8A34005-001NLG8 | 8A34005-002NLG8 | 8A34005-003NLG8 |

### Reason for Change:

Added programmable options for the following:

- Closed-loop pull-in to the DPLL fast-lock algorithm
- 3-mode of SYSREF functionality (one-shot, pulse mode, continuous) on all device clock outputs.
- ~~— Automatic ToD transmission via PWM.~~
- ~~— Align phase of selected outputs via GPIO pins.~~
- ~~— GPIO pins to be used for phase measurement using output TDC.~~
- ~~— Use PWM to transmit & receive clocks that are asynchronous with the PWM carrier.~~

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

There is no change to the form, fit, function, quality and reliability of the device.

**Product Identification:** FW revision ID is hard-coded in OTP registers. New FW can be identified by FW\_Hotfix=4. If using older version this field will read "2".

**Qualification Status:** This is firmware update only. Successful regression testing of the version 5.3.4 firmware has been completed.

**Sample Availability Date:** 3/1/2022

**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 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 [idt-pcn@lm.renesas.com](mailto:idt-pcn@lm.renesas.com)**