

Product Advisory (PA)

Subject: Product Improvement – Design and Datasheet Change for the Listed Intersil ISL9238* Products

Publication Date: 9/8/2017

Effective Date: 9/8/2017

Revision Description:

Revision 0: Initial Release

Description of Change:

This notice is to advise our customers of a minor, design revision for the Intersil ISL9238* products. The change doubles the programmable range of the phase comparator threshold offset in both the forward and reverse Buck and Buck-Boost modes. The LSB weight was doubled, thereby increasing both the step size and overall range.

Products impacted by the change are:

ISL9238HRTZ ISL9238HRTZ-T7A ISL9238HRTZ-TKS2568 ISL9238IRTZ-T
ISL9238HRTZ-T ISL9238HRTZ-TK ISL9238IRTZ

Reason for Change:

The change improves the detectability of when the phase node crosses through 0V. This improves the light load efficiency of the part. Please refer Appendix A for details. The updated data sheet is available on the Intersil web site at: [ISL9238* Datasheet](#)

Product Identification:

There will be no change in the external marking of the packaged parts. Product affected by this change is identifiable via Intersil's internal traceability system and a register that can be used to identify revision of the product (see appendix A for details). Revision 2 material is effective date code 1732.

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

The change will have no impact on the form, fit, function, quality, reliability and environmental compliance of the devices. Both the old and new versions have no impact to customer designs using the default setting (000 = 0mV).

Qualification status: Not applicable

Sample availability: 9/8/2017

Device material declaration: Available upon request

Questions or requests pertaining to this change notice, including additional data or samples, must be sent to Intersil within 30 days of the publication date.

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

Appendix A:
Added register to Table 2:

REGISTER NAMES	REGISTER ADDRESS	READ/ WRITE	NUMBER OF BITS	DESCRIPTION	DEFAULT
Revision ID	0x44	R	8	Revision ID register - Read only 0x01 - Rev1 0x02 - Rev2	N/A

Table 12 changes

From:

TABLE 12. CONTROL0 REGISTER 0x39H

BIT	BIT NAME	DESCRIPTION
<15:13>	Forward Buck and Buck-Boost Phase Comparator Threshold Offset	Bit<15:13> adjusts phase comparator threshold offset for forward buck and buck-boost 000 = 0mV 001 = 0.5mV 010 = 1mV 011 = 1.5mV 100 = -2mV 101 = -1.5mV 110 = -1mV 111 = -0.5mV
<12:10>	Forward and Reverse Boost Phase Comparator Threshold Offset	Bit<12:10> adjusts phase comparator threshold offset for forward and reverse boost 000 = 0mV 001 = 0.5mV 010 = 1mV 011 = 1.5mV 100 = -2mV 101 = -1.5mV 110 = -1mV 111 = -0.5mV
<9:8>	Reverse Buck and Buck-Boost Phase Comparator Threshold Offset	Bit<9:8> adjusts phase comparator threshold offset for forward and reverse boost 00 = 0mV 01 = 1mV 10 = -2mV 11 = -1mV

To:

TABLE 12. CONTROL0 REGISTER 0x39H

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