

Product Advisory (PA)

Subject: Correction to the Renesas HSO-26C31, HSO-26C32, HSO-26CLV31, HSO-26CLV32, HSO-26CT31, HSO-26CT32 Datasheets and SMDs

Publication Date: 10/22/2021

Effective Date: 10/22/2021

Revision Description:

Initial Release

Description of Change:

This notice is to inform you of Datasheet/SMD corrections as below;

1. Updates to Die Characteristics section. Die Thickness Dimension is updated on datasheet and SMD. Glassivation, M1 Thickness, M2 Thickness is only updated on datasheet, no change to SMD.

Corrections are reflected in Appendix A of the notice.

Products Impacted by the change;

SMD #	Renesas Part#	SMD #	Renesas Part#	SMD #	Renesas Part#
5962F9568901V9A	HSO-26C32RH-Q	5962F9568902V9A	HSO-26CLV32RH-Q	5962F9563201V9A	HSO-26CT31RH-Q
N/A	HSO-26C32RH/SAMPLE	N/A	HSO-26CLV32RH/SAMPLE	N/A	HSO-26C31RH/SAMPLE
5962F9568903V9A	HSO-26C32EH-Q	5962F9568904V9A	HSO-26CLV32EH-Q	5962F9666301V9A	HSO-26C31RH-Q
5962F9666302V9A	HSO-26CLV31RH-Q	5962F9563101V9A	HSO-26CT32RH-Q	5962F9666303V9A	HSO-26C31EH-Q
5962F9666304V9A	HSO-26CLV31EH-Q	N/A	HSO-26CT32RH/SAMPLE		
N/A	HSO-26CLV31RH/SAMPLE	5962F9563102V9A	HSO-26CT32EH-Q		

Reason for Change:

Change corrects the datasheet and SMD to reflect the actual product characteristics. Details regarding the change are contained within Appendix A, for an updated datasheet please contact your local sales or marketing representative.

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.

Product Identification:

There have been no changes to the product, this is a documentation correction only. There will be no change in the external marking of the products.

Qualification status: Not Applicable, correction only

Sample availability: 10/22/2021

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@Renesas.COM	Europe: PCN-EU@Renesas.COM	Japan: PCN-JP@Renesas.COM	Asia Pac: PCN-APAC@Renesas.COM

Appendix A: Datasheet changes for HS0-26C32

FROM:

HS-26C32RH, HS-26C32EH

Die Characteristics

DIE DIMENSIONS:

78 mils x 123 mils
(1970µm x 3120µm)

INTERFACE MATERIALS:

Glassivation:

Type: SiO₂
Thickness: 10kÅ ± 1kÅ

Top Metallization:

M1: Mo/TiW
Thickness: 5800Å
M2: Al/Si/Cu
Thickness: 5800Å

Worst Case Current Density:

<2.0 x 10⁻⁵ A/cm²

Bond Pad Size:

110µm x 100µm

TO:

HS-26C32RH, HS-26C32EH

Die Characteristics

DIE DIMENSIONS:

78 mils x 123 mils x 19 mils ±1 mil
(1981µm x 3124µm x 483µm ±25µm)

INTERFACE MATERIALS:

Glassivation:

Type: PSG (Phosphorus Silicon Glass)
Thickness: 8kÅ ±1kÅ

Metallization:

M1: Mo/TiW (Bottom)
Thickness: 5800Å ±1kÅ
M2: Al/Si/Cu (Top)
Thickness: 10kÅ ±1kÅ

Substrate:

AVLSI1RA

Backside Finish:

Silicon

ASSEMBLY RELATED INFORMATION:

Substrate Potential (Powered Up):

Internally tied to V_{DD}

Worst Case Current Density:

< 2.0e5 A/cm²

Bond Pad Size:

110µm x 100µm

Transistor Count:

315

Datasheet changes for HS0-26C31

FROM:

HS-26C31RH, HS-26C31EH

Die Characteristics

DIE DIMENSIONS:

96.5 mils x 195 mils x 21 mils
(2450 x 4950)

INTERFACE MATERIALS:

Glassivation:

Type: PSG (Phosphorus Silicon Glass)
Thickness: 10kÅ ±1kÅ

Metallization:

M1: Mo/TiW
Thickness: 5800Å
M2: Al/Si/Cu (Top)
Thickness: 10kÅ ±1kÅ

Substrate:

AVLSI1RA

Backside Finish:

Silicon

ASSEMBLY RELATED INFORMATION:

Substrate Potential (Powered Up):

V_{DD}

ADDITIONAL INFORMATION:

Worst Case Current Density:

<2.0x10⁵ A/cm²

Bond Pad Size:

110µmx100µm

TO:

HS-26C31RH, HS-26C31EH

Die Characteristics

DIE DIMENSIONS:

96.5 mils x 195 mils x 19 mils ±1mil
(2451µm x 4953µm x 483µm ±25µm)

INTERFACE MATERIALS:

Glassivation:

Type: PSG (Phosphorus Silicon Glass)
Thickness: 8kÅ ±1kÅ

Metallization:

M1: Mo/TiW (Bottom)
Thickness: 5800Å ±1kÅ
M2: Al/Si/Cu (Top)
Thickness: 10kÅ ±1kÅ

Substrate:

AVLSI1RA

Backside Finish:

Silicon

ASSEMBLY RELATED INFORMATION:

Substrate Potential (Powered Up):

Internally tied to V_{DD}

ADDITIONAL INFORMATION:

Worst Case Current Density:

<2.0x10⁵ A/cm²

Bond Pad Size:

110µmx100µm

Datasheet changes for HS0-26CLV31

FROM:

HS-26CLV31RH, HS-26CLV31EH

Die Characteristics

DIE DIMENSIONS:

96.5 mils x 195 mils x 21 mils
(2450 x 4950)

INTERFACE MATERIALS:

Glassivation:

Type: PSG (Phosphorus Silicon Glass)
Thickness: 8kÅ ±1kÅ

Metallization:

Bottom: Mo/TiW
Thickness: 5800Å ±1kÅ
Top: AlSiCu (Top)
Thickness: 10kÅ ±1kÅ

Substrate:

AVLSI1RA

Backside Finish:

Silicon

ASSEMBLY RELATED INFORMATION:

Substrate Potential (Powered Up):

V_{DD}

ADDITIONAL INFORMATION:

Worst Case Current Density:

<2.0x10⁵A/cm²

Bond Pad Size:

110µm x 100µm

TO:

HS-26CLV31RH, HS-26CLV31EH

Die Characteristics

DIE DIMENSIONS:

96.5 mils x 195 mils x 19 mils ±1mil
2451µm x 4953µm x 483µm ±25µm

INTERFACE MATERIALS:

Glassivation:

Type: PSG (Phosphorus Silicon Glass)
Thickness: 8kÅ ±1kÅ

Metallization:

M1: Mo/TiW (Bottom)
Thickness: 5800Å ±1kÅ
M2: AlSiCu (Top)
Thickness: 10kÅ ±1kÅ

Substrate:

AVLSI1RA

Backside Finish:

Silicon

ASSEMBLY RELATED INFORMATION:

Substrate Potential (Powered Up):

Internally tied to V_{DD}

ADDITIONAL INFORMATION:

Worst Case Current Density:

<2.0x10⁵A/cm²

Bond Pad Size:

110µm x 100µm

Datasheet changes for HS0-26CLV32

FROM:

HS-26CLV32RH, HS-26CLV32EH

Die Characteristics

DIE DIMENSIONS:

78 mils x 123 mils x 21 mils
(1970µm x 3120µm)

INTERFACE MATERIALS:

Glassivation:

Type: PSG (Phosphorus Silicon Glass)
Thickness: 8kÅ ±1kÅ

Substrate:

AVLSI1RA, Silicon backside, V_{DD} backside potential

Metallization:

Bottom: Mo/TiW
Thickness: 5800Å ±1kÅ
Top: Al/Si/Cu
Thickness: 10kÅ ±1kÅ

Worst Case Current Density:

<2.0 x 10⁵A/cm²

Bond Pad Size:

110µm x 100µm

TO:

HS-26CLV32RH, HS-26CLV32EH

Die Characteristics

DIE DIMENSIONS:

78 mils x 123 mils x 19mils ±1mil
(1981µm x 3124µm x 483µm ±25µm)

INTERFACE MATERIALS:

Glassivation:

Type: PSG (Phosphorus Silicon Glass)
Thickness: 8kÅ ±1kÅ

Metallization:

M1: Mo/TiW (Bottom)
Thickness: 5800Å ±1kÅ
M2: Al/Si/Cu (Top)
Thickness: 10kÅ ±1kÅ

Substrate:

AVLSI1RA

Backside Finish:

Silicon

ASSEMBLY RELATED INFORMATION:

Substrate Potential (Powered Up):

Internally tied to V_{DD}

Worst Case Current Density:

< 2.0e5A/cm²

Bond Pad Size:

110µm x 100µm

Transistor Count:

315

Datasheet changes for HS0-26CT32

FROM:

HS-26CT32RH, HS-26CT32EH

Die Characteristics

DIE DIMENSIONS:

78 mils x 123 mils
(1970µm x 3120µm)

INTERFACE MATERIALS:

Glassivation:

Type: PSG (Phosphorus Silicon Glass)
Thickness: 10kÅ ±1kÅ

Top Metallization:

M1: Mo/TiW
Thickness: 5800Å
M2: Al/Si/Cu
Thickness: 10kÅ ±1kÅ

Substrate:

AVLSI1RA

Backside Finish:

Silicon

ASSEMBLY RELATED INFORMATION:

Substrate Potential:

V_{DD} (When Powered Up)

ADDITIONAL INFORMATION:

Worst Case Current Density:

<2.0 x 10⁵ A/cm²

Transistor Count:

240

Bond Pad Size:

110µm x 100µm

TO:

HS-26CT32RH, HS-26CT32EH

Die Characteristics

DIE DIMENSIONS:

78 mils x 123 mils x 19 mils ±1mil
(1981µm x 3124µm x 483µm ±25µm)

INTERFACE MATERIALS:

Glassivation:

Type: PSG (Phosphorus Silicon Glass)
Thickness: 8kÅ ±1kÅ

Metallization:

M1: Mo/TiW (Bottom)
Thickness: 5800Å ±1kÅ
M2: Al/Si/Cu (Top)
Thickness: 10kÅ ±1kÅ

Substrate:

AVLSI1RA

Backside Finish:

Silicon

ASSEMBLY RELATED INFORMATION:

Substrate Potential (Powered Up):

Internally tied to V_{DD}

Worst Case Current Density:

< 2.0e5 A/cm²

Bond Pad Size:

110µm x 100µm

Transistor Count:

315

Datasheet changes for HS0-26CT31

FROM:

HS-26CT31RH, HS-26CT31EH

Die Characteristics

DIE DIMENSIONS:

96.5 milx195 milsx21 mils
(2450x4950)

INTERFACE MATERIALS:

Glassivation:

Type: PSG (Phosphorus Silicon Glass)
Thickness: 10kÅ ± 1kÅ

Metallization:

M1: Mo/TiW
Thickness: 5800Å
M2: Al/Si/Cu (Top)
Thickness: 10kÅ ±1kÅ

Substrate:

AVLSI1RA

Backside Finish:

Silicon

ASSEMBLY RELATED INFORMATION:

Substrate Potential (Powered Up):

V_{DD}

ADDITIONAL INFORMATION:

Worst Case Current Density:

<2.0x10⁵ A/cm²

Bond Pad Size:

110µmx100µm

TO:

HS-26CT31RH, HS-26CT31EH

Die Characteristics

DIE DIMENSIONS:

96.5 mils x 195 mils x 19 mils ±1mil
2451µm x 4953µm x 483µm ±25µm

INTERFACE MATERIALS:

Glassivation:

Type: PSG (Phosphorus Silicon Glass)
Thickness: 8kÅ ±1kÅ

Metallization:

M1: Mo/TiW (Bottom)
Thickness: 5800Å ±1kÅ
M2: Al/Si/Cu (Top)
Thickness: 10kÅ ±1kÅ

Substrate:

AVLSI1RA

Backside Finish:

Silicon

ASSEMBLY RELATED INFORMATION:

Substrate Potential (Powered Up):

Internally tied to V_{DD}

ADDITIONAL INFORMATION:

Worst Case Current Density:

<2.0x10⁵ A/cm²

Bond Pad Size:

110µmx100µm

Summary

SMD #	Renesas Part#	Die Dimension		Glassivation type/thickness		M1 Thickness		M2 Thickness	
		OLD	NEW	OLD	NEW	OLD	NEW	OLD	NEW
5962F9568901V9A	HSO-26C32RH-Q	Datasheet=78 x 123 x 21 mils SMD=78 x 123 x 21 mils	78 x 123 x 19mils +/-1mil	SIO2 10kA +/-1kA	PSG 8kA +/-1kA	5800A	5800A +/-1kA	5800A	10kA +/-1kA
N/A	HSO-26C32RH/SAMPLE								
5962F9568903V9A	HSO-26C32EH-Q								
5962F9666302V9A	HSO-26CLV31RH-Q	Datasheet=96.5 x 195 x 21 mils SMD=96.5 x 195 x 21 mils	96.5 x 195 x 19 mils +/-1mil	No Change	No Change	No Change	No Change	No Change	No Change
5962F9666304V9A	HSO-26CLV31EH-Q								
N/A	HSO-26CLV31RH/SAMPLE								
5962F9568902V9A	HSO-26CLV32RH-Q	Datasheet=78 x 123 x 21 mils SMD=78 x 123 x 21 mils	78 x 123 x 19 mils +/-1mil	No Change	No Change	No Change	No Change	No Change	No Change
N/A	HSO-26CLV32RH/SAMPLE								
5962F9568904V9A	HSO-26CLV32EH-Q								
5962F9563101V9A	HSO-26CT32RH-Q	Datasheet=78 x 123 x 21 mils SMD=78 x 123 x 21 mils	78 x 123 x 19mils +/-1mil	PSG 10kA +/-1kA	PSG 8kA +/-1kA	5800A	5800A +/-1kA	No Change	No Change
N/A	HSO-26CT32RH/SAMPLE								
5962F9563102V9A	HSO-26CT32EH-Q								
5962F9563201V9A	HSO-26CT31RH-Q	Datasheet=96.5 x 195 x 21 mils SMD=78 x 123 x 21 mils	96.5 x 195 x 19 mils +/-1mil	PSG 10kA +/-1kA	PSG 8kA +/-1kA	5800A	5800A +/-1kA	No Change	No Change
N/A	HSO-26CT31RH/SAMPLE								
5962F9666301V9A	HSO-26C31RH-Q								
5962F9666303V9A	HSO-26C31EH-Q								