



Final Product/Process Change Notification

Document #:FPCN22812X

Issue Date:15 May 2020

Title of Change:	CAT25320 and CAT93C66 FAB Transfer LAPIS (formerly OKI) to Gresham.
Proposed First Ship date:	22 Aug 2020 or earlier if approved by customer
Contact Information:	Contact your local ON Semiconductor Sales Office or Wirasa.Nontharith@onsemi.com
PCN Samples Contact:	Contact your local ON Semiconductor Sales Office or <PCN.samples@onsemi.com>. Sample requests are to be submitted no later than 30 days from the date of first notification, Initial PCN or Final PCN, for this change. Samples delivery timing will be subject to request date, sample quantity and special customer packing/label requirements.
Additional Reliability Data:	Contact your local ON Semiconductor Sales Office or Francis.Lualhati@onsemi.com
Type of Notification:	This is a Final Product/Process Change Notification (FPCN) sent to customers. FPCNs are issued 90 days prior to implementation of the change. ON Semiconductor will consider this change accepted, unless an inquiry is made in writing within 30 days of delivery of this notice. To do so, contact PCN.Support@onsemi.com
Marking of Parts/ Traceability of Change:	Marking Style will be change and the CS code (Custom Source 2 digit country code of wafer fabrication) on the label will be changed from JP to US.
Change Category:	Wafer Fab Change, Mark
Change Sub-Category(s):	Shipping/Packaging/Marking, Fab Transfer

Sites Affected:**ON Semiconductor Sites**

ON Semiconductor, Philippines
ON Semiconductor Gresham, Oregon, US

External Foundry/Subcon Sites

Subcons Thailand
External Foundry Japan

Description and Purpose:

ON Semiconductor would like to notify our customers of our qualification ON Semiconductor Gresham, Oregon, US as insourcing FAB Transferred from LAPIS (formerly OKI). Reliability qualification was completed with passing results. This is an industrial level qualification.

There is no change in all other materials except Die Source. The Marking Style will be change as illustration below.

	Before Change Description	After Change Description
Die Source	Foundry in Japan	ON Semi Fab in Oregon US

	From	To
CAT25320VI-GT3 Product marking change		



	From	To												
CAT25320YI-GT3 Product marking change	Device Table <table> <tr> <th>Device</th><th>Device Marking Per MBOI</th><th>Case Number</th></tr> <tr> <td>CAT25320YI-GT3</td><td>Mark as indicated here below: Line 1: 532F Line 2: 4N2ZZZ</td><td>945A, (C112)</td></tr> </table> Special Marking Notes: 532: Product Code 4N: Assembly Location Code 5: Black "V" for Lead Break (N/A) Y: Production Year (last digit) M: Production Month: 1-9 (Jan-Sep) O, N, D (Oct-Dec) ZZZ: Last three digits of assembly lot number Front Side Mark: Back Side Mark: None	Device	Device Marking Per MBOI	Case Number	CAT25320YI-GT3	Mark as indicated here below: Line 1: 532F Line 2: 4N2ZZZ	945A, (C112)	Device Table <table> <tr> <th>Device</th><th>Device Marking Per MBOI</th><th>Case Number</th></tr> <tr> <td>CAT25320YI-GT3F</td><td>Mark as indicated here below: Line 1: 532F Line 2: 7M5AAA (* assembly site code) Y: Production Year (last digit) M: Production Month: 1-9 (Jan-Sep) O, N, D (Oct-Dec) AAA: last 3 char of assembly lot number ●: Pb-free microdot</td><td>945A, (C112)</td></tr> </table>	Device	Device Marking Per MBOI	Case Number	CAT25320YI-GT3F	Mark as indicated here below: Line 1: 532F Line 2: 7M5AAA (* assembly site code) Y: Production Year (last digit) M: Production Month: 1-9 (Jan-Sep) O, N, D (Oct-Dec) AAA: last 3 char of assembly lot number ●: Pb-free microdot	945A, (C112)
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CAT93C66VI-GT3 Product marking change	Device Table <table> <tr> <th>Device</th><th>Device Marking Per MBOI</th><th>Case Number</th></tr> <tr> <td>CAT93C66VI-GT3</td><td>Mark as indicated here below: Line 1: CSI Logo/AVG Line 2: 93C66D Line 3: 196ZZZ</td><td>7518D (C034)</td></tr> </table> Special Marking Notes: CSI: Assembly Location Code 9: Black "V" for NonPb/Lead Break C: Product Revision: Based as "12" 93C66: Product Name 1: Temperature Range (-/+ Industrial) Y: Production Year (last digit) M: Production Month (one digit) 1-9 (Jan-Sep) O, N, D (Oct-Dec) ZZZ: Last three digits of assembly lot number FRONT SIDE MARK: BACK SIDE MARK: None	Device	Device Marking Per MBOI	Case Number	CAT93C66VI-GT3	Mark as indicated here below: Line 1: CSI Logo/AVG Line 2: 93C66D Line 3: 196ZZZ	7518D (C034)	Device Table <table> <tr> <th>Device</th><th>Device Marking Per MBOI</th><th>Case Number</th></tr> <tr> <td>CAT93C66VI-GT3</td><td>Mark as indicated here below: Line 1: 93C66D Line 2: 196ZZZ Notes: 93C66D: Product Code 196: Assembly Location Code Y: Production Year (last digit) M: Production Month (one digit) 1-9 (Jan-Sep) O, N, D (Oct-Dec) ZZZ: Last 3 digits of Assembly Lot Number ●: Pb-free microdot</td><td>7518D (C034)</td></tr> </table>	Device	Device Marking Per MBOI	Case Number	CAT93C66VI-GT3	Mark as indicated here below: Line 1: 93C66D Line 2: 196ZZZ Notes: 93C66D: Product Code 196: Assembly Location Code Y: Production Year (last digit) M: Production Month (one digit) 1-9 (Jan-Sep) O, N, D (Oct-Dec) ZZZ: Last 3 digits of Assembly Lot Number ●: Pb-free microdot	7518D (C034)
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Reliability Data Summary:

QV DEVICE NAME CAT25320VI-GT3

RMS 60123 and RMS 60918

PACKAGE 8L SOIC

Test	Specification	Condition	Interval	Results
EDR/HTSL	AEC Q100-005	Endurance preconditioning - 1 Mil cycles@ Room temp, High Temp Data Retention: Ta=150°C for 1008 hrs.	1008 hrs	0/240
HTOL	JA108	TA=150C, bias at 1.2X Nominal (not to exceed Max rated) (NVM endurance 1 Million cycle preconditioning must be performed prior to HTOL stress.)	1008 hrs	0/240
ELFR	AECQ100-008	TA=150C, bias at 1.2X Nominal (not to exceed Max rated)	24 hrs	0/2300
PC	J STD 020A, JESD22-A113	Solder reflow MSL 1 at 260C		0/720
HAST	JESD22-A110	Temp = 130C, 85% RH, ~ 18.8 psig, bias = 100% of rated V or 100V max	96 hrs	0/239
TC	JESD22-A104	Temp = -65°C to +150°C	500 cycles	0/240
UFAST	JESD22-A118	Temp = 130C, RH=85%, ~18.8 psig	96 hrs	0/240
SAT	12MSB17722C	Scanning Acoustical Topography ,Pre post MSL, TC500		0/120
CDPA WP	12MSB17722C	Custom Destructive Physical Analysis - Wire Pull Post TC		0/90

Electrical Characteristics Summary: Available upon request

**List of Affected Parts:**

Note: Only the standard (off the shelf) part numbers are listed in the parts list. Any custom parts affected by this PCN are shown in the customer specific PCN addendum in the PCN email notification, or on the **PCN Customized Portal**.

Part Number	Qualification Vehicle
CAT25320VI-GT3	CAT25320VI-GT3
CAT25320YI-GT3	CAT25320VI-GT3
CAT93C66VI-GT3	CAT25320VI-GT3

Japanese translation of the notification starts here.
通知の日本語訳はここから始まります。

Note: *The Japanese version is for reference only. In case of any differences between the English and Japanese version, the English version shall control.*

注：日本語版は参照用です。英語版と日本語版の違いがある場合は、英語版が優先されます。



最終製品 / プロセス変更通知

文書番号# : FPCN22812X

発行日: 15 May 2020

変更件名:	CAT25320 と CAT93C66 のウェハー工場を LAPIS (以前の OKI) からグreshamに移管
初回出荷予定日:	22 Aug 2020 またはお客様からの承認が得られた場合はそれ以前。
連絡先情報:	現地のオン・セミコンダクター営業所または Wirasa.Nontharith@onsemi.com にお問い合わせください。
サンプル:	現地のオン・セミコンダクター営業所または <PCN.Samples@onsemi.com> にお問い合わせください。 サンプルは、この変更の初回通知、初回 PCN の日付から 30 日以内に要求してください。 サンプル納入時は、依頼日、数量、特別梱包材/ラベル条件によって異なります。
追加の信頼性データ:	お客さまの地域のオン・セミコンダクター営業所または Francis.Lualhati@onsemi.com にお問い合わせください。
通知種別:	これは、お客様宛の最終製品 / プロセス変更通知 (FPCN) です。FPCN は、変更実施の 90 日前に発行されます。 オン・セミコンダクターは、この通知の送付から 30 日以内に書面による問い合わせがない限り、この変更が承諾されたものとみなします。お問い合わせは、<PCN.Support@onsemi.com> 宛てにお願いします。
変更部品の識別:	マーキングスタイルが変更され、さらにラベル上の CS コード (カスタムソース: ウェハー製造拠点の 2 桁の国コード) は JP から US に変更されます。

変更カテゴリ: ウェハファブの変更, 製品表示変更

変更サブカテゴリ: 出荷/パッケージング/表記, ウェハファブの変更

影響を受ける拠点:

オン・セミコンダクター拠点:

ON Semiconductor, Philippines
ON Semiconductor Gresham, Oregon, US

外部製造工場 / 下請業者拠点:

Subcons Thailand
External Foundry Japan

説明および目的:

オン・セミコンダクターは、LAPIS (以前の OKI) から移管の内製化ウェハー工場として、オン・セミコンダクターのグresham (オレゴン州、米国) の認定をお客様にお知らせします。信頼性認定は合格判定で完了しています。これは産業用認定です。

ダイソース以外の全ての材料に変更はありません。マーキングスタイルは以下のイラストレーションのように変更されます。

	変更前の表記	変更後の表記
ダイソース	Foundry in Japan	ON Semiconductor Fab in Oregon US

	変更前	変更後
CAT25320VI-GT3 製品マーキング変更	Device: CAT25320VI-GT3 Device Marking Per M801 Mark as indicated here below: Line 1: (CS) Laps (AWC) Line 2: 033004 Line 3: 196222 Special Marking Notes W: Assembly location Code Z: Mark "H" for Heat Sink (HSP) Product Name: 25320VI T: Temperature Range (I = Industrial) Y: Production Year (last digit) M: Production Month: 1-9 (Jan-Sep), O, N, D (Oct-Dec) AAA: last 3 digits of assembly lot number 0222: Last four digits of assembly lot number Case Number: 7518D (CS34) Front Side Mark: Back Side Mark: None	Device Table Device: CAT25320VI-GT3F Device Marking Per M801 Mark as indicated here below: Line 1: 25320F Line 2: 7800AA (* = assembly site code) Y: Production Year (last digit) M: Production Month: 1-9 (Jan-Sep), O, N, D (Oct-Dec) AAA: last 3 digits of assembly lot number ●: Pin-free indicated Case Number: 7518D (CS34) Front Side Mark: Back Side Mark: None



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信頼性データの要約:

デバイス名: CAT25320VI-GT3

RMS: 60123 and RMS 60918

パッケージ: 8L SOIC

テスト	仕様	条件	間隔	結果
EDR/HTSL	AEC Q100-005	Endurance preconditioning - 1 Mil cycles@ Room temp, High Temp Data Retention: Ta=150°C for 1008 hrs.	1008 hrs	0/240
HTOL	JA108	TA=150C, bias at 1.2X Nominal (not to exceed Max rated) (NVM endurance 1 Million cycle preconditioning must be performed prior to HTOL stress.)	1008 hrs	0/240
ELFR	AECQ100-008	TA=150C, bias at 1.2X Nominal (not to exceed Max rated)	24 hrs	0/2300
PC	J STD 020A, JESD22-A113	Solder reflow MSL 1 at 260C		0/720
HAST	JESD22-A110	Temp = 130C, 85% RH, ~ 18.8 psig, bias = 100% of rated V or 100V max	96 hrs	0/239
TC	JESD22-A104	Temp = -65°C to +150°C	500 cycles	0/240
UHA	JESD22-A118	Temp = 130C, RH=85%, ~18.8 psig	96 hrs	0/240
SAT	12MSB17722C	Scanning Acoustical Topography, Pre post MSL, TC500		0/120
CDPA WP	12MSB17722C	Custom Destructive Physical Analysis - Wire Pull Post TC		0/90

電気的特性の要約: ご要望に応じてご提出いたします。



最終製品 / プロセス変更通知

文書番号# : FPCN22812X

発行日: 15 May 2020

影響を受ける部品の一覧:

注: 部品一覧には標準部品番号 (既製品) のみが記載されています。本 PCN の影響を受けるカスタム部品番号は、PCN メールで提供される顧客個別の付録、または PCN カスタマイズポータルに記載されています。

部品番号	認定試験用ピークル
CAT25320VI-GT3	CAT25320VI-GT3
CAT25320YI-GT3	CAT25320VI-GT3
CAT93C66VI-GT3	CAT25320VI-GT3