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|--|--|
| Title of Change: | Update to FPCN23449XA-Removal of Pb Free Microdot on Marking and corrected the before case outline drawing |
| Proposed First Ship date: | 02 Jul 2021 or earlier if approved by customer |
| Contact Information: | Contact your local ON Semiconductor Sales Office or albert.reyes@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 Lalan.Ortega@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: | Product marked with date code (YW) or later may be built from current factory or from JCET. On the label of the box and reel, the ASSY LOC: JC will also indicate product assembled in JCET. Please see sample label on Page 2 at the following URL http://www.onsemi.com/pub/Collateral/LABELRM-D.PDF to see the location of the ASSY LOC. |
| Change Category: | Test Change, Assembly Change |
| Change Sub-Category(s): | Material Change, Manufacturing Site Transfer |

Sites Affected:

| ON Semiconductor Sites | External Foundry/Subcon Sites |
|------------------------|-------------------------------|
| None | AUK Dalian, China |
| | JCET, China |

Description and Purpose:

This update notification is issued to announce:

1. Remove Pb Free microdot on product marking change.
2. Corrected the POD drawing on before change table.

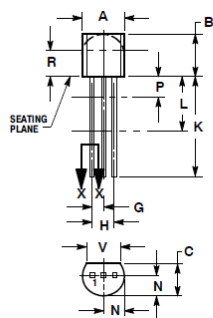
ON Semiconductor would like to inform customers of the intent to transfer assembly and test for the TO92 products listed in this notification from the current site, AUK Dalian, China to JCET CHUZHOU, China. BOM (Bill of Materials) changes are listed below:

| Components | Before Change Description | After Change Description |
|---------------|---------------------------|--------------------------|
| LeadFrame | PMC90-1/2H | LF TO92L 3L CuAg STAMPED |
| Die Attach | ABLE843-001 | DAD-87 |
| Mold Compound | EME-E120G | EMG200 |



ON Semiconductor would also like to inform customers of the intent to update case outline 29-11 for the TO92 products listed in this notification. The changes are listed below:

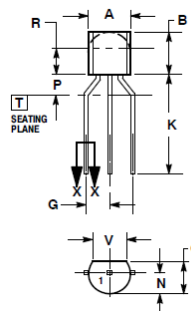
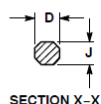
Before Change



STRAIGHT LEAD
BULK PACK

- NOTES:
1. DIMENSIONING AND TOLERANCING PER ANSI Y14.5M, 1982.
2. CONTROLLING DIMENSION: INCH.
3. CONTOUR OF PACKAGE BEYOND DIMENSION R IS UNCONTROLLED.
4. LEAD DIMENSION IS UNCONTROLLED IN P AND BEYOND DIMENSION K MINIMUM.

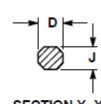
| DIM | INCHES | | MILLIMETERS | |
|-----|--------|-------|-------------|-------|
| | MIN | MAX | MIN | MAX |
| A | 0.175 | 0.205 | 4.45 | 5.20 |
| B | 0.170 | 0.210 | 4.32 | 5.33 |
| C | 0.125 | 0.165 | 3.18 | 4.19 |
| D | 0.016 | 0.021 | 0.407 | 0.533 |
| G | 0.045 | 0.055 | 1.15 | 1.39 |
| H | 0.095 | 0.105 | 2.42 | 2.66 |
| J | 0.015 | 0.020 | 0.39 | 0.50 |
| K | 0.500 | --- | 12.70 | --- |
| L | 0.250 | --- | 6.35 | --- |
| N | 0.080 | 0.105 | 2.04 | 2.66 |
| P | --- | 0.100 | --- | 2.54 |
| R | 0.115 | --- | 2.93 | --- |
| V | 0.135 | --- | 3.43 | --- |



BENT LEAD
TAPE & REEL
AMMO PACK

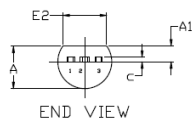
- NOTES:
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| DIM | MILLIMETERS | |
|-----|-------------|------|
| | MIN | MAX |
| A | 4.45 | 5.20 |
| B | 4.32 | 5.33 |
| C | 3.18 | 4.19 |
| D | 0.40 | 0.54 |
| G | 2.40 | 2.80 |
| J | 0.39 | 0.50 |
| K | 12.70 | --- |
| N | 2.04 | 2.66 |
| P | 1.50 | 4.00 |
| R | 2.93 | --- |
| V | 3.43 | --- |



After Change

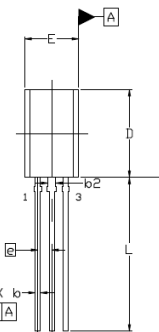
STRAIGHT LEAD



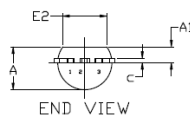
END VIEW

- NOTES:
1. DIMENSIONING AND TOLERANCING PER ASME Y14.5M, 2009.
2. CONTROLLING DIMENSION: MILLIMETERS.
3. DIMENSIONS D AND E DO NOT INCLUDE MOLD FLASH OR GATE PROTRUSIONS.
4. DIMENSION b AND b2 DOES NOT INCLUDE DAMBAR PROTRUSION. LEAD WIDTH INCLUDING PROTRUSION SHALL NOT EXCEED 0.20. DIMENSION b2 LOCATED ABOVE THE DAMBAR PORTION OF MIDDLE LEAD.

| DIM | MILLIMETERS | | |
|-----|-------------|-------|-------|
| | MIN. | NDM. | MAX. |
| A | 3.75 | 3.90 | 4.05 |
| A1 | 1.28 | 1.43 | 1.58 |
| b | 0.38 | 0.465 | 0.55 |
| b2 | 0.62 | 0.70 | 0.78 |
| c | 0.35 | 0.40 | 0.45 |
| D | 7.85 | 8.00 | 8.15 |
| E | 4.75 | 4.90 | 5.05 |
| E2 | 3.90 | --- | --- |
| e | 1.27 BSC | | |
| L | 13.80 | 14.00 | 14.20 |



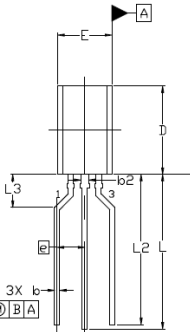
FORMED LEAD



END VIEW

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| c | 0.35 | 0.40 | 0.45 |
| D | 7.85 | 8.00 | 8.15 |
| E | 4.75 | 4.90 | 5.05 |
| E2 | 3.90 | --- | --- |
| e | 2.50 BSC | | |
| L | 13.80 | 14.00 | 14.20 |
| L2 | 13.20 | 13.60 | 14.00 |
| L3 | 3.00 REF | | |



Product marking changes are shown here:

| | From | To |
|------------------------|---|---|
| Product marking change | Trace Code Assembly Location Line 3: W(LYW) L: Wafer Lot Number YW: Assembly Start Week | Trace Code Assembly Location Line 3: JC(LYW) L: Wafer Lot Number YW: Assembly Start Week Note: No Pb Free Microdot |

**Reliability Data Summary:**QV DEVICE NAME: **LM2931AZ-5.0G / NCV2931AZ-5.0G**RMS: **S68867, O69661**PACKAGE: **TO-92**

| Test | Specification | Condition | Interval | Results |
|-------|---------------|---|----------|---------|
| HTOL | JESD22-A108 | Ta = 125°C, 100 % max rated Vcc | 504 hrs | 0 / 231 |
| HTSL | JESD22-A103 | Ta = 150°C | 504 hrs | 0 / 231 |
| TC | JESD22-A104 | Ta = -65°C to +150°C | 500 cyc | 0 / 231 |
| HAST | JESD22-A110 | 130°C, 85% RH, 18.8psig, bias | 96 hrs | 0 / 231 |
| uHAST | JESD22-A118 | 130°C, 85% RH, 18.8psig, unbiased | 96 hrs | 0 / 231 |
| DPA | AEC Q101 -004 | Destructive Physical Analysis Following TC and HAST | | 0 / 6 |
| RSH | JESD22-B106 | Ta = 265°C, 10 sec | | 0 / 90 |
| SD | JESD22-B102E | Ta = 245°C, 5 sec | | 0 / 45 |
| PD | JESD22-B100B | Per case outline | | 0 / 30 |
| LI | JESD22-B105D | Lead Fatigue (30 leads) | | 0 / 30 |

Electrical Characteristics Summary:

Electrical Characteristic are not impacted.

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 |
|----------------|-----------------------|
| MC78L18ACPRAG | LM2931AZ-5.0G |
| MC78L05ACPRAG | LM2931AZ-5.0G |
| MC78L24ACPG | LM2931AZ-5.0G |
| MC78L15ACPG | LM2931AZ-5.0G |
| MC78L12ACPG | LM2931AZ-5.0G |
| MC78L12ABPRPG | LM2931AZ-5.0G |
| MC78L12ABPG | LM2931AZ-5.0G |
| MC78L09ACPG | LM2931AZ-5.0G |
| MC78L08ACPG | LM2931AZ-5.0G |
| MC78L05ACPG | LM2931AZ-5.0G |
| LM2931Z-5.0RPG | LM2931AZ-5.0G |
| LM2931Z-5.0G | LM2931AZ-5.0G |
| TL431CLPRAG | LM2931AZ-5.0G |
| TL431BCLPRAG | LM2931AZ-5.0G |



| | |
|-----------------|---------------|
| MC78L08ABPG | LM2931AZ-5.0G |
| TL431ACLPRPG | LM2931AZ-5.0G |
| TL431ACLPG | LM2931AZ-5.0G |
| SC431ILPRAG | LM2931AZ-5.0G |
| MC78L05ABPREG | LM2931AZ-5.0G |
| MC78L05ABPRAG | LM2931AZ-5.0G |
| MC78L05ABPG | LM2931AZ-5.0G |
| LM317LZRPG | LM2931AZ-5.0G |
| LM317LZRAG | LM2931AZ-5.0G |
| LM317LZG | LM2931AZ-5.0G |
| LM317LBZRPG | LM2931AZ-5.0G |
| MC78L24ACPRPG | LM2931AZ-5.0G |
| MC78L24ABPG | LM2931AZ-5.0G |
| MC78L15ACPRPG | LM2931AZ-5.0G |
| MC78L15ABPRAG | LM2931AZ-5.0G |
| MC78L15ABPG | LM2931AZ-5.0G |
| TL431ACLPRAG | LM2931AZ-5.0G |
| TL431AILPG | LM2931AZ-5.0G |
| TL431AILPRAG | LM2931AZ-5.0G |
| TL431AILPRPG | LM2931AZ-5.0G |
| TL431BCLPG | LM2931AZ-5.0G |
| TL431BCLPRMG | LM2931AZ-5.0G |
| TL431BILPG | LM2931AZ-5.0G |
| TL431BILPRAG | LM2931AZ-5.0G |
| TL431BVLPG | LM2931AZ-5.0G |
| TL431BVLPRAG | LM2931AZ-5.0G |
| TL431CLPG | LM2931AZ-5.0G |
| TL431CLPRMG | LM2931AZ-5.0G |
| TL431CLPRPG | LM2931AZ-5.0G |
| TL431ILPG | LM2931AZ-5.0G |
| TL431ILPRAG | LM2931AZ-5.0G |
| TL431ILPRPG | LM2931AZ-5.0G |
| LM2931AZ-5.0G | LM2931AZ-5.0G |
| LM2931AZ-5.0RAG | LM2931AZ-5.0G |



| | |
|-----------------|---------------|
| LM2931AZ-5.0RPG | LM2931AZ-5.0G |
| LM2931Z-5.0RAG | LM2931AZ-5.0G |
| LM317LBZG | LM2931AZ-5.0G |
| MC78L05ACPRMG | LM2931AZ-5.0G |
| MC78L08ABPRAG | LM2931AZ-5.0G |
| LM317LZRMG | LM2931AZ-5.0G |
| MC78L08ACPREG | LM2931AZ-5.0G |
| MC78L08ACPRPG | LM2931AZ-5.0G |
| MC78L09ABPRPG | LM2931AZ-5.0G |
| MC78L12ACPREG | LM2931AZ-5.0G |
| MC78L12ACPRPG | LM2931AZ-5.0G |
| MC78L15ABPRPG | LM2931AZ-5.0G |
| MC78L18ACPRPG | LM2931AZ-5.0G |
| MC78L24ACPRAG | LM2931AZ-5.0G |
| MC79L05ACPRMG | LM2931AZ-5.0G |
| MC79L05ACPRPG | LM2931AZ-5.0G |
| MC79L15ACPREG | LM2931AZ-5.0G |
| MC79L18ABPRPG | LM2931AZ-5.0G |
| MC79L18ACPG | LM2931AZ-5.0G |
| MC79L24ABPG | LM2931AZ-5.0G |
| MC79L24ACPG | LM2931AZ-5.0G |
| MC79L24ACPRMG | LM2931AZ-5.0G |
| MC79L24ACPRPG | LM2931AZ-5.0G |
| LM317LBZRAG | LM2931AZ-5.0G |
| MC78L05ACPRPG | LM2931AZ-5.0G |
| MC78L08ACPRAG | LM2931AZ-5.0G |
| MC78L12ACPRAG | LM2931AZ-5.0G |
| MC78L15ACPRAG | LM2931AZ-5.0G |
| LM317LZREG | LM2931AZ-5.0G |
| MC78L05ABPRMG | LM2931AZ-5.0G |
| MC78L05ACPREG | LM2931AZ-5.0G |
| MC78L08ABPRPG | LM2931AZ-5.0G |
| MC78L09ABPRAG | LM2931AZ-5.0G |
| MC78L12ACPRMG | LM2931AZ-5.0G |



Final Product/Process Change Notification

Document #:FPCN23449XA1

Issue Date:20 Apr 2021

| | |
|---------------|---------------|
| MC78L18ABPG | LM2931AZ-5.0G |
| MC78L18ACPG | LM2931AZ-5.0G |
| MC78L18ACPRMG | LM2931AZ-5.0G |

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# : FPCN23449XA1

発行日: 20 Apr 2021

| | | |
|----------------|--|-----------------------|
| 変更件名: | FPCN23449XA の更新: マーキングから鉛フリーマイクロドットの削除と以前のケースアウトライン図面の修正 | |
| 初回出荷予定日: | 02 Jul 2021 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 < albert.reyes@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: | 最寄りのオン・セミコンダクター営業所または < Lalan.Ortega@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: | 日付コードが (YW) 以降の製品は、現在の工場または JCET で製造されたことになります。梱包箱およびリールのラベル上の ASSY LOC: JC は、製品が JCET で組み立てられたことを示します。ASSY LOC の場所を確認するには、 http://www.onsemi.com/pub/Collateral/LABELRM-D.PDF の 2 ページ目にあるサンプルラベルを参照してください。 | |
| 変更カテゴリ: | 組立の変更, 検査の変更 | |
| 変更サブカテゴリ: | 製造拠点の移管, 材料の変更 | |
| 影響を受ける拠点: | | |
| オン・セミコンダクター拠点: | 外部製造工場 / 下請業者拠点: | |
| なし | AUK Dalian, China | |
| | JCET, China | |
| 説明および目的: | <p>本更新通知は以下の内容をお知らせするものです。</p> <ol style="list-style-type: none">製品マーキングから鉛フリーマイクロドットを削除。変更前の表の POD 図面を修正。 <p>オン・セミコンダクターは、本通知に記載されている TO92 製品の組立および検査拠点を現在の AUK 大連 (中国) から JCET 滁州 (中国) に移管する意向であることをお客様にお知らせいたします。BOM (部品表) の変更は以下に記載した通りです。</p> | |
| 材料 | 変更前の表記 | 変更後の表記 |
| リードフレーム | PMC90-1/2H | LF TO92L 3L CuAg スタンプ |
| ダイ接着剤 | ABLE843-001 | DAD-87 |
| モールド・コンパウンド | EME-E120G | EMG200 |

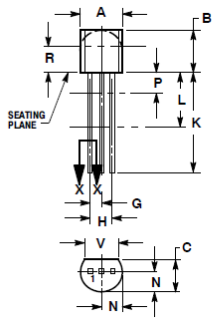
最終製品 / プロセス変更通知

文書番号 : FPCN23449XA1

発行日 : 20 Apr 2021

オン・セミコンダクターは、本通知に記載されている TO92 製品のケースアウトライン 29-11 を変更する意向があることもお客様にお知らせいたします。 変更内容については以下をご覧ください。

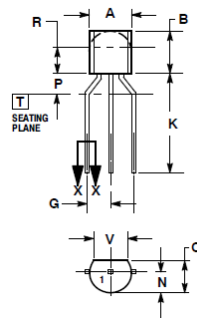
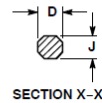
変更前:



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BULK PACK

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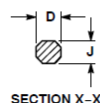
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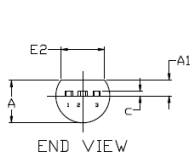
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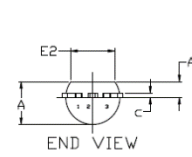
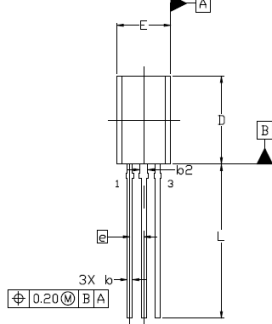
変更後:



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 2. CONTROLLING DIMENSION: MILLIMETERS.
 3. DIMENSIONS D AND E DO NOT INCLUDE MOLD FLASH OR GATE PROTRUSIONS.
 4. DIMENSION b AND b2 DOES NOT INCLUDE DAMBAR PROTRUSION. LEAD WIDTH INCLUDING PROTRUSION SHALL NOT EXCEED 0.20. DIMENSION b2 LOCATED ABOVE THE DAMBAR PORTION OF MIDDLE LEAD.

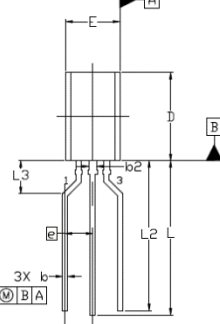
| DIM | MILLIMETERS | | |
|-----|-------------|-------|-------|
| | MIN. | NDM. | MAX. |
| A | 3.75 | 3.90 | 4.05 |
| A1 | 1.28 | 1.43 | 1.58 |
| b | 0.38 | 0.465 | 0.55 |
| b2 | 0.62 | 0.70 | 0.78 |
| c | 0.35 | 0.40 | 0.45 |
| D | 7.85 | 8.00 | 8.15 |
| E | 4.75 | 4.90 | 5.05 |
| E2 | 3.90 | --- | --- |
| e | 1.27 BSC | | |
| L | 13.80 | 14.00 | 14.20 |



END VIEW

- NOTES:
1. DIMENSIONING AND TOLERANCING PER ASME Y14.5M, 2009.
 2. CONTROLLING DIMENSION: MILLIMETERS.
 3. DIMENSIONS D AND E DO NOT INCLUDE MOLD FLASH OR GATE PROTRUSIONS.
 4. DIMENSION b AND b2 DOES NOT INCLUDE DAMBAR PROTRUSION. LEAD WIDTH INCLUDING PROTRUSION SHALL NOT EXCEED 0.20. DIMENSION b2 LOCATED ABOVE THE DAMBAR PORTION OF MIDDLE LEAD.

| DIM | MILLIMETERS | | |
|-----|-------------|-------|-------|
| | MIN. | NDM. | MAX. |
| A | 3.75 | 3.90 | 4.05 |
| A1 | 1.28 | 1.43 | 1.58 |
| b | 0.38 | 0.465 | 0.55 |
| b2 | 0.62 | 0.70 | 0.78 |
| c | 0.35 | 0.40 | 0.45 |
| D | 7.85 | 8.00 | 8.15 |
| E | 4.75 | 4.90 | 5.05 |
| E2 | 3.90 | --- | --- |
| e | 2.50 BSC | | |
| L | 13.80 | 14.00 | 14.20 |
| L2 | 13.20 | 13.60 | 14.00 |
| L3 | 3.00 REF | | |



製品マーキングの変更について:

| | 変更前 | 変更後 |
|------------|--|---|
| 製品マーキングの変更 | 3 行目にマークされるトレースコードの組立場所: W(LYW) L: ウェハロット番号 YW: 組立開始週 | 3 行目にマークされるトレースコードの組立場所: JC(LYW) L: ウェハロット番号 YW: 組立開始週 注: 鉛フリーマイクロドットなし |

最終製品 / プロセス変更通知

文書番号# : FPCN23449XA1

発行日: 20 Apr 2021

信頼性データの要約:

デバイス名: LM2931AZ-5.0G / NCV2931AZ-5.0G

RMS : S68867, O69661

パッケージ: TO-92

| テスト | 仕様 | 条件 | 間隔 | 結果 |
|-------|---------------|---|---------|---------|
| HTOL | JESD22-A108 | Ta = 125°C, 100 % max rated Vcc | 504 hrs | 0 / 231 |
| HTSL | JESD22-A103 | Ta = 150°C | 504 hrs | 0 / 231 |
| TC | JESD22-A104 | Ta = -65°C to +150°C | 500 cyc | 0 / 231 |
| HAST | JESD22-A110 | 130°C, 85% RH, 18.8psig, bias | 96 hrs | 0 / 231 |
| uHAST | JESD22-A118 | 130°C, 85% RH, 18.8psig, unbiased | 96 hrs | 0 / 231 |
| DPA | AEC Q101 -004 | Destructive Physical Analysis Following TC and HAST | | 0 / 6 |
| RSH | JESD22-B106 | Ta = 265°C, 10 sec | | 0 / 90 |
| SD | JESD22-B102E | Ta = 245°C, 5 sec | | 0 / 45 |
| PD | JESD22-B100B | Per case outline | | 0 / 30 |
| LI | JESD22-B105D | Lead Fatigue (30 leads) | | 0 / 30 |

電気的特性の要約:

電気的特性への影響はありません。

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 |
|---------------|---------------|
| MC78L18ACPRMG | LM2931AZ-5.0G |
| MC78L18ACPRAG | LM2931AZ-5.0G |
| MC78L18ACPG | LM2931AZ-5.0G |
| MC78L18ABPG | LM2931AZ-5.0G |
| MC78L12ACPRMG | LM2931AZ-5.0G |
| MC78L09ABPRAG | LM2931AZ-5.0G |
| MC78L08ABPRPG | LM2931AZ-5.0G |
| MC78L05ACPREG | LM2931AZ-5.0G |
| MC78L05ACPRAG | LM2931AZ-5.0G |
| MC78L05ABPRMG | LM2931AZ-5.0G |
| LM317LZREG | LM2931AZ-5.0G |
| MC78L24ACPG | LM2931AZ-5.0G |
| MC78L15ACPRAG | LM2931AZ-5.0G |
| MC78L15ACPG | LM2931AZ-5.0G |

最終製品 / プロセス変更通知

文書番号# : FPCN23449XA1

発行日: 20 Apr 2021

| | |
|-----------------|---------------|
| MC78L12ACPRAG | LM2931AZ-5.0G |
| MC78L12ACPG | LM2931AZ-5.0G |
| MC78L12ABPRPG | LM2931AZ-5.0G |
| MC78L12ABPG | LM2931AZ-5.0G |
| MC78L09ACPG | LM2931AZ-5.0G |
| MC78L08ACPRAG | LM2931AZ-5.0G |
| MC78L08ACPG | LM2931AZ-5.0G |
| MC78L05ACPRPG | LM2931AZ-5.0G |
| MC78L05ACPG | LM2931AZ-5.0G |
| LM317LBZRAG | LM2931AZ-5.0G |
| LM2931Z-5.0RPG | LM2931AZ-5.0G |
| MC79L24ACPRPG | LM2931AZ-5.0G |
| MC79L24ACPRMG | LM2931AZ-5.0G |
| MC79L24ACPG | LM2931AZ-5.0G |
| MC79L24ABPG | LM2931AZ-5.0G |
| MC79L18ACPG | LM2931AZ-5.0G |
| MC79L18ABPRPG | LM2931AZ-5.0G |
| MC79L15ACPREG | LM2931AZ-5.0G |
| MC79L05ACPRPG | LM2931AZ-5.0G |
| MC78L15ABPRPG | LM2931AZ-5.0G |
| MC78L12ACPRPG | LM2931AZ-5.0G |
| MC78L12ACPREG | LM2931AZ-5.0G |
| MC78L09ABPRPG | LM2931AZ-5.0G |
| MC78L08ACPRPG | LM2931AZ-5.0G |
| MC78L08ACPREG | LM2931AZ-5.0G |
| LM317LZRMG | LM2931AZ-5.0G |
| MC78L08ABPRAG | LM2931AZ-5.0G |
| MC78L08ABPG | LM2931AZ-5.0G |
| MC78L05ACPRMG | LM2931AZ-5.0G |
| LM317LBZG | LM2931AZ-5.0G |
| LM2931Z-5.0RAG | LM2931AZ-5.0G |
| LM2931Z-5.0G | LM2931AZ-5.0G |
| LM2931AZ-5.0RPG | LM2931AZ-5.0G |
| LM2931AZ-5.0RAG | LM2931AZ-5.0G |

最終製品 / プロセス変更通知

文書番号 : FPCN23449XA1

発行日 : 20 Apr 2021

| | |
|---------------|---------------|
| LM2931AZ-5.0G | LM2931AZ-5.0G |
| TL431ILPRPG | LM2931AZ-5.0G |
| TL431ILPRAG | LM2931AZ-5.0G |
| TL431ILPG | LM2931AZ-5.0G |
| TL431CLPRPG | LM2931AZ-5.0G |
| TL431CLPRMG | LM2931AZ-5.0G |
| TL431CLPRAG | LM2931AZ-5.0G |
| TL431CLPG | LM2931AZ-5.0G |
| TL431BVLPRAG | LM2931AZ-5.0G |
| TL431BVLPG | LM2931AZ-5.0G |
| TL431BILPRAG | LM2931AZ-5.0G |
| TL431BILPG | LM2931AZ-5.0G |
| TL431BCLPRMG | LM2931AZ-5.0G |
| TL431BCLPRAG | LM2931AZ-5.0G |
| TL431BCLPG | LM2931AZ-5.0G |
| TL431AILPRPG | LM2931AZ-5.0G |
| TL431AILPRAG | LM2931AZ-5.0G |
| TL431AILPG | LM2931AZ-5.0G |
| TL431ACLPRAG | LM2931AZ-5.0G |
| TL431ACLPRPG | LM2931AZ-5.0G |
| TL431ACLPG | LM2931AZ-5.0G |
| SC431ILPRAG | LM2931AZ-5.0G |
| MC78L05ABPREG | LM2931AZ-5.0G |
| MC78L05ABPRAG | LM2931AZ-5.0G |
| MC78L05ABPG | LM2931AZ-5.0G |
| LM317LZRP | LM2931AZ-5.0G |
| LM317LZRAG | LM2931AZ-5.0G |
| MC78L15ABPG | LM2931AZ-5.0G |
| MC78L15ABPRAG | LM2931AZ-5.0G |
| MC78L15ACPRPG | LM2931AZ-5.0G |
| MC78L24ABPG | LM2931AZ-5.0G |
| MC78L24ACPRPG | LM2931AZ-5.0G |
| LM317LBZRP | LM2931AZ-5.0G |
| LM317LZG | LM2931AZ-5.0G |

最終製品 / プロセス変更通知

文書番号# : FPCN23449XA1

発行日: 20 Apr 2021

| | |
|---------------|---------------|
| MC78L18ACPRPG | LM2931AZ-5.0G |
| MC78L24ACPRAG | LM2931AZ-5.0G |
| MC79L05ACPRMG | LM2931AZ-5.0G |



Appendix A: Changed Products

PCN#: FPCN23449XA1
Issue Date: Apr 19, 2021

| Product | Customer Part Number | Qualification Vehicle | New Part Number | Replacement Supplier |
|----------------|----------------------|-----------------------|-----------------|----------------------|
| MC78L18ACPRAG | | LM2931AZ-5.0G | NA | |
| MC78L05ACPRAG | | LM2931AZ-5.0G | NA | |
| MC78L24ACPG | | LM2931AZ-5.0G | NA | |
| MC78L15ACPG | | LM2931AZ-5.0G | NA | |
| MC78L12ACPG | | LM2931AZ-5.0G | NA | |
| MC78L12ABPRPG | | LM2931AZ-5.0G | NA | |
| MC78L12ABPG | | LM2931AZ-5.0G | NA | |
| MC78L09ACPG | | LM2931AZ-5.0G | NA | |
| MC78L08ACPG | | LM2931AZ-5.0G | NA | |
| MC78L05ACPG | | LM2931AZ-5.0G | NA | |
| LM2931Z-5.0RPG | | LM2931AZ-5.0G | NA | |
| LM2931Z-5.0G | | LM2931AZ-5.0G | NA | |
| TL431CLPRAG | | LM2931AZ-5.0G | NA | |
| TL431BCLPRAG | | LM2931AZ-5.0G | NA | |
| MC78L08ABPG | | LM2931AZ-5.0G | NA | |
| TL431ACLPG | | LM2931AZ-5.0G | NA | |
| MC78L05ABPREG | | LM2931AZ-5.0G | NA | |
| MC78L05ABPRAG | | LM2931AZ-5.0G | NA | |
| MC78L05ABPG | | LM2931AZ-5.0G | NA | |
| LM317LZRP | | LM2931AZ-5.0G | NA | |
| LM317LZRAG | | LM2931AZ-5.0G | NA | |
| LM317LZG | | LM2931AZ-5.0G | NA | |
| LM317LBZRP | | LM2931AZ-5.0G | NA | |
| MC78L24ACPRPG | | LM2931AZ-5.0G | NA | |
| MC78L24ABPG | | LM2931AZ-5.0G | NA | |
| MC78L15ACPRPG | | LM2931AZ-5.0G | NA | |
| MC78L15ABPRAG | | LM2931AZ-5.0G | NA | |
| MC78L15ABPG | | LM2931AZ-5.0G | NA | |
| TL431ACLPRAG | | LM2931AZ-5.0G | NA | |
| TL431AILPG | | LM2931AZ-5.0G | NA | |
| TL431AILPRAG | | LM2931AZ-5.0G | NA | |
| TL431AILPRPG | | LM2931AZ-5.0G | NA | |
| TL431BCLPG | | LM2931AZ-5.0G | NA | |
| TL431BCLPRMG | | LM2931AZ-5.0G | NA | |
| TL431BILPG | | LM2931AZ-5.0G | NA | |
| TL431BILPRAG | | LM2931AZ-5.0G | NA | |
| TL431BVLPG | | LM2931AZ-5.0G | NA | |
| TL431BVLPRAG | | LM2931AZ-5.0G | NA | |
| TL431ILPG | | LM2931AZ-5.0G | NA | |
| TL431CLPG | | LM2931AZ-5.0G | NA | |
| TL431ILPRAG | | LM2931AZ-5.0G | NA | |
| LM2931AZ-5.0G | | LM2931AZ-5.0G | NA | |


Appendix A: Changed Products
PCN#: FPCN23449XA1
Issue Date: Apr 19, 2021

| Product | Customer Part Number | Qualification Vehicle | New Part Number | Replacement Supplier |
|-----------------|----------------------|-----------------------|-----------------|----------------------|
| LM2931AZ-5.0RAG | | LM2931AZ-5.0G | NA | |
| LM2931Z-5.0RAG | | LM2931AZ-5.0G | NA | |
| LM2931AZ-5.0RPG | | LM2931AZ-5.0G | NA | |
| LM317LBZG | | LM2931AZ-5.0G | NA | |
| MC78L05ACPRMG | | LM2931AZ-5.0G | NA | |
| MC78L08ABPRAG | | LM2931AZ-5.0G | NA | |
| MC78L09ABPRPG | | LM2931AZ-5.0G | NA | |
| MC78L12ACPRPG | | LM2931AZ-5.0G | NA | |
| MC79L05ACPRPG | | LM2931AZ-5.0G | NA | |
| MC79L05ACPRMG | | LM2931AZ-5.0G | NA | |
| MC79L15ACPREG | | LM2931AZ-5.0G | NA | |
| MC79L18ACPG | | LM2931AZ-5.0G | NA | |
| MC79L24ACPG | | LM2931AZ-5.0G | NA | |
| MC79L24ABPG | | LM2931AZ-5.0G | NA | |
| LM317LBZPRAG | | LM2931AZ-5.0G | NA | |
| MC78L05ACPRPG | | LM2931AZ-5.0G | NA | |
| MC78L12ACPRAG | | LM2931AZ-5.0G | NA | |
| MC78L05ABPRMG | | LM2931AZ-5.0G | NA | |
| MC78L15ACPRAG | | LM2931AZ-5.0G | NA | |
| MC78L05ACPREG | | LM2931AZ-5.0G | NA | |
| MC78L09ABPRAG | | LM2931AZ-5.0G | NA | |
| MC78L12ACPRMG | | LM2931AZ-5.0G | NA | |
| MC78L18ACPG | | LM2931AZ-5.0G | NA | |
| MC78L18ABPG | | LM2931AZ-5.0G | NA | |