

Process Change Notification

This is to inform you that a design and/or process change will be implemented to the affected product(s) and this notification is for your information and concurrence. This change is planned to take effect by 1st October, 2021.

Please contact your local Taiwan Semiconductor Field Quality Service or Customer Quality Engineer within 45 days of receipt of this notification if you require any additional data.

PCN No: PCN21007

Title: SMD Products Change of Encapsulation Material, Packing Material and Datasheet Revision

Issue Date: 2021/5/12

If you have any questions concerning this change, please contact:

Technical Contact

Name: Vince Lee
E-Mail: vince.lee@mail.tsyew.com.cn
Phone: +86 (543) 8691091 (3101)

PCN Originator

Name: Sunnie Lin
E-Mail: sunnie.lin@mail.ts.com.tw
Phone: +886 2 8913 1588 (2205)

Reliability Engineer

Name: Karen Taping
E-Mail: karen.taping@mail.ts.com.tw
Phone: +886 2 8913 1588 (2206)

PCN Type: Encapsulation Material Change, Packing Material Change and Datasheet Revision

Effectivity:

New datasheet available: 31th July, 2021

Expected 1st order date (without packing code): 1st Oct, 2021

Last Order Date (with packing code): 31th Dec, 2022

Last Delivery Date(with packing code): 30th Jun, 2023

Product Category (Description):

All diodes/rectifier devices in SMD packages: ABS, ABS-L, DBLS, DO-218AB, MBS, Micro SMA, SMA, SMB, SMC, PDFN56, SMPC, SMPC4.0, SMPC4.6U, SOD-123W, SOD-123HE, SOD-123FL, SOD-128, SMAF, Sub SMA, TO-252, TBS, Thin SMA, TO-263AB and YBS that are currently assembled and tested in Taiwan Semiconductor internal package assembly manufacturing facility and external package assembly subcontractors.

The full list products affected are listed in the "List of Affected Devices" section.

Description of Change:

Taiwan Semiconductor will implement halogen-free (green) epoxy molding for all SMD devices to be compliant to global environmental initiatives in line with IEC 61249-2-21.

Accordingly, the packing material will be standardized to 13 inch plastic reel.

In line with this change, the product datasheets will also be revised to simplify the ordering code.

1. Molding Compound

| Package | From (Non Green / Green) | To (Green) | Remarks |
|----------|--|----------------------------------|----------------------|
| DBLS | EME-1200 EK-1700G/ EK-1800G | EK-1700G/ EK-1800G | Green / Halogen Free |
| Sub SMA | EME-1100 EME-E110G | EME-E110G | Green / Halogen Free |
| TO-263AB | EME-1100/ EME-6650 EME-E110G/ EME-G630/ EME-E190 | EME-E110G/ EME-G630/ EME-E190 | Green / Halogen Free |

Note: All of the products in above packages are already qualified using halogen-free compound and in mass production for long time.

2. Packing Method and Packing Material Change

| Package | From | To | Remarks |
|--|---|--------------------------------|--|
| ABS / ABS-L / Micro SMA / SOD-123W / SOD-123HE / SOD-123FL / SOD128 / SMPC / SMPC4.0 / SMPC4.6U / SMAF / Thin SMA / SMA / SMB / SMC / PDFN56 | 13/7 inch Plastic / Blue & Black 13/7 inch Paper / White | 13 inch Plastic / Blue & Black | No potential risk in color differences |
| MBS | 13 inch Paper / White | 13 inch Plastic / Blue & Black | No potential risk in color differences |

| | | | |
|-----------------|--|--|--|
| TO-263AB / DBLS | 13 inch Plastic / Blue & Black 13 inch Paper / White Tube | 13 inch Plastic / Blue & Black | No potential risk in color differences |
| Sub SMA | 13/7 inch Plastic / Blue & Black 13/7 inch Paper / White 8/12 mm tape width different number of pieces on reel (1800, 3000, 7500, 10000) | 13 inch Plastic / Blue & Black 8mm tape width 10000 pieces | No potential risk in color differences |

Note: Detailed packing information can be accessed in TSC website.

3. Product Datasheet Revisions

| Package | From (Current Data Sheet) | To (New Data Sheet) |
|---|--|--|
| DBLS / TO-263AB | Non Green / Green Ordering Information (With Packing Code) 13/7 inch Plastic & Paper Reel & Tube | Green Ordering Information (Without Packing Code) 13 inch Plastic Reel |
| Sub SMA | Non Green / Green Ordering Information (With Packing Code) 13/7 inch Plastic & Paper Reel | Green Ordering Information (Without Packing Code) 13 inch Plastic Reel |
| ABS / ABS-L / MBS / Micro SMA / SOD-123W / SOD-123HE / SOD-123FL / SOD-128 / Thin SMA/ SMAF/ SMA/ SMB/ SMC / SMPC / SMPC4.0 / SMPC4.6U / PDFN56 | Ordering Information (With Packing Code) 13/7 inch Plastic & Paper Reel | Ordering Information (Without Packing Code) 13 inch Plastic Reel |
| TBS / YBS / TO-252 / DO-218AB | Ordering Information (With Packing Code) | Ordering Information (Without Packing Code) |

| | | |
|---|---|--|
| SOD-123W / SOD-128 / Thin SMA (TVS Products Only) | Ordering Information (With Packing Code) 13/7 inch Plastic & Paper Reel None | Ordering Information (Without Packing Code) 13 inch Plastic Reel Meets ISO 7637-2 (Pulse 1/2a/3a/3b) |
|---|---|--|

Identification and Traceability:

| Item | Identification |
|--------------|-------------------|
| Traceability | Product date code |

Qualification/Reliability Result:

Device/Package Qualification (according to AEC-Q101-D) for Green Compound

| Item | Test Condition | Reference Standard | Sample Size | Result |
|---------------------------------------|---|-------------------------------------|-------------|--------|
| External Visual (EV) | Per TSC SPEC. | JESD22-B-101 | 453*3 | Pass |
| Parameter Verification (PV) | Electrical characterization @25°C | TSC SPEC. | 25*3 | Pass |
| High Temperature Reverse Bias (HTRB) | Bias=100% or 80% Rated VR /1008hrs | MIL-STD-750-1 M1038 | 77*3 | Pass |
| Temperature Cycling (TC) | -55°C/ 15 min to 150°C/ 15 min + Delam check (or hot test) + DPA | JESD22-A-104 | 77*3 | Pass |
| Autoclave (AC) | Ta=121±2°C 15Psig (1.057kgf/cm ²), RH=100%/96hrs | JESD22-A-102 | 77*3 | Pass |
| Highly Accelerated Stress Test (HAST) | Ta: 130±2°C, R.H: 85±5% & Bias=100% Rated VR (if VR>42V, Bias=42V)/ 96hrs | JESD22-A-110 | 77*3 | Pass |
| ESD (AEC) | HBM: (C=100pf R:1500Ω)/ 6 Pulses | AEC-Q101-001 JS-001 | 30*1 | Pass |
| ESD (AEC) | CDM: (Field induced charge)/ 6 Pulses | AEC-Q101-005 JS-002 | 30*1 | Pass |
| Destructive Physical Analysis (DPA) | Per AEC-Q101 | AEC-Q101-004 Section 4 | 2*1 | Pass |
| Physical Dimension (PD) | Cpk > 1.67 | JESD22-B-100 | 30*1 | Pass |
| Solderability (SD) | Solderability test temperature: 245°C ± 5°C (Pb-free) | J-STD-002 AEC-Q005 | 10*1 | Pass |
| Thermal Resistance (TR) | Per TSC SPEC. | JESD24-3, 24-4, 24-6 as appropriate | 10*1 or 5*1 | Pass |
| Die Shear (DS) | AEC: Per TSC SPEC. Cpk > 1.67 or 1.33 | MIL-STD-750 Method 2017 | 5*1 | Pass |

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|-------------------------------------|--|---|------|------|
| Intermittent Operational Life (IOL) | ON/2mins (3.5mins/ 5mins) Off /2mins (3.5mins/ 5mins) | MIL-STD-750 Method 1037 AEC-Q101 Table 2A | 77*3 | Pass |
| Resist. To Solder Heat (RSH) | Ta=260+/-5°C, 10 secs | JEDEC JESD22-A-111 (SMD), or B-106 (PTH) | 30 | Pass |

Effect of Change:

There is no impact in product specification, functionality, quality, reliability.
Implementing the change to green compound will guarantee Taiwan Semiconductor commitment on environmental protection.

List of Affected Devices:

| Package | Part Number | | |
|---------|-------------|------------|------------|
| DBL | DBL101G | DBL154G-T | DBL205G-T |
| | DBL102G | DBL155G | DBL206G |
| | DBL103G | DBL155G-T | DBL206G-T |
| | DBL104G | DBL156G | DBL207G |
| | DBL104G-T | DBL156G-T | DBL207G-T |
| | DBL105G | DBL157G | DBL208G |
| | DBL105G-T | DBL157G-T | DBL209G |
| | DBL106G | DBL158G | HDBL101G |
| | DBL106G-T | DBL159G | HDBL102G |
| | DBL107G | DBL201G | HDBL103G |
| | DBL107G-T | DBL202G | HDBL104G |
| | DBL151G | DBL203G | HDBL105G |
| | DBL152G | DBL204G | HDBL106G |
| | DBL153G | DBL204G-T | HDBL107G |
| | DBL154G | DBL205G | |
| ABS | ABS10 | ABS4 | EABS1G |
| | ABS10-K | ABS4-K | EABS1J |
| | ABS10-T | ABS6 | RABS20M |
| | ABS15J | ABS6-K | SBS24 |
| | ABS15LJ | ABS6-T | SBS25 |
| | ABS15M | ABS8 | SBS26 |
| | ABS2 | ABS8-K | SBS34 |
| | ABS20M | ABS8-T | SBS36 |
| | ABS20M-T | EABS1D | |
| ABS-L | RABS15M | | |
| MBS | MBS10 | MBS4 | MBS8 |
| | MBS10-K | MBS6 | MBS8-K |
| | MBS2 | MBS6-K | RMB6S |
| | RMB2S | RMB4S | |
| DBLS | DBLS101G | DBLS154G-T | DBLS205G-T |
| | DBLS102G | DBLS155G | DBLS206G |

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|-----------|------------|------------|------------|
| | DBLS103G | DBLS155G-T | DBLS206G-T |
| | DBLS104G | DBLS156G | DBLS207G |
| | DBLS104G-T | DBLS156G-T | DBLS207G-T |
| | DBLS105G | DBLS157G | DBLS208G |
| | DBLS105G-T | DBLS157G-T | DBLS209G |
| | DBLS106G | DBLS158G | HDBLS101G |
| | DBLS106G-T | DBLS159G | HDBLS102G |
| | DBLS107G | DBLS201G | HDBLS103G |
| | DBLS107G-T | DBLS202G | HDBLS104G |
| | DBLS151G | DBLS203G | HDBLS105G |
| | DBLS152G | DBLS204G | HDBLS106G |
| | DBLS153G | DBLS204G-T | HDBLS107G |
| | DBLS154G | DBLS205G | RDBLS207G |
| TBS | RTBS40M | TBS410 | TBS610 |
| | TBS406 | TBS606 | |
| | TBS408 | TBS608 | |
| DO-218AB | TLD5S10AH | TLD6S10AH | TLD8S10AH |
| | TLD5S11AH | TLD6S11AH | TLD8S11AH |
| | TLD5S12AH | TLD6S12AH | TLD8S12AH |
| | TLD5S13AH | TLD6S13AH | TLD8S13AH |
| | TLD5S14AH | TLD6S14AH | TLD8S14AH |
| | TLD5S15AH | TLD6S15AH | TLD8S15AH |
| | TLD5S16AH | TLD6S16AH | TLD8S16AH |
| | TLD5S17AH | TLD6S17AH | TLD8S17AH |
| | TLD5S18AH | TLD6S18AH | TLD8S18AH |
| | TLD5S20AH | TLD6S20AH | TLD8S20AH |
| | TLD5S22AH | TLD6S22AH | TLD8S22AH |
| | TLD5S24AH | TLD6S24AH | TLD8S24AH |
| | TLD5S26AH | TLD6S26AH | TLD8S26AH |
| | TLD5S28AH | TLD6S28AH | TLD8S28AH |
| | TLD5S30AH | TLD6S30AH | TLD8S30AH |
| | TLD5S33AH | TLD6S33AH | TLD8S33AH |
| | TLD5S36AH | TLD6S36AH | TLD8S36AH |
| | TLD5S40AH | TLD6S40AH | TLD8S40AH |
| | TLD5S43AH | TLD6S43AH | TLD8S43AH |
| YBS | RYBS30M | YBS2206G | YBS3005G |
| | YBS2204G | YBS2207G | YBS3006G |
| | YBS2205G | YBS3004G | YBS3007G |
| Micro SMA | ESH1DM | PU2BM | SS13M |
| | ESH1GM | PU2BMH | SS14M |
| | PU1BM | PU2DM | SS16M |
| | PU1BMH | PU2DMH | SS22M |
| | PU1DM | S1GM | SS23M |
| | PU1DMH | S1JM | SS24M |
| | RS1JM | RS1KM | ESH1JM |
| PDFN56 | TSN520M60 | TSN525M60 | |
| SMA | SK24A-T | SK26A-T | SK210A-T |
| | SK34A-T | SK36A-T | SK310A-T |

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|------|----------|-------------|------------|
| SMB | ES2D-T | HS3GB-K | S2K-T |
| | ES2G-T | HS3JB-K | S2M-T |
| | ES2J-T | HS3KB-K | S3DB-K |
| | ES3DB-A | HS3MB-K | S3GB-K |
| | ES3GB-A | RS3DB-T | S3JB-K |
| | ES3JB-A | RS3GB-T | S3KB-K |
| | HS2D-T | RS3JB-T | S3MB-K |
| | HS2G-T | RS3KB-T | RS2D-T |
| | HS2J-T | RS3MB-T | RS2G-T |
| | HS2K-T | S2D-T | RS2J-T |
| | HS2M-T | S2G-T | RS2K-T |
| | HS3DB-K | S2J-T | RS2M-T |
| SMC | ES3D-A | RS3B-K | 5.0SMDJ17A |
| | ES3G-A | RS3D-K | 5.0SMDJ18A |
| | ES3J-A | RS3G-K | 5.0SMDJ20A |
| | S3A-T | RS3J-K | 5.0SMDJ22A |
| | S3B-T | RS3K-K | 5.0SMDJ24A |
| | S3D-T | RS3M-K | 5.0SMDJ26A |
| | S3G-T | S5AC-K | 5.0SMDJ28A |
| | S3J-T | S5BC-K | 5.0SMDJ30A |
| | S3K-T | S5DC-K | 5.0SMDJ33A |
| | S3M-T | S5GC-K | 5.0SMDJ36A |
| | ES5D-T | S5JC-K | 5.0SMDJ40A |
| | ES5G-T | S5KC-K | 5.0SMDJ43A |
| | ES5J-T | S5MC-K | 5.0SMDJ45A |
| | HS3D-K | S8GC-T | 5.0SMDJ48A |
| | HS3G-K | S8JC-T | 5.0SMDJ51A |
| | HS3J-K | S8KC-T | 5.0SMDJ54A |
| | HS3K-K | S8MC-T | 5.0SMDJ58A |
| | HS3M-K | RS5D-T | 5.0SMDJ60A |
| | HS5D-A | RS5G-T | 5.0SMDJ64A |
| | HS5G-A | RS5J-T | 5.0SMDJ70A |
| | HS5J-K | RS5K-T | 5.0SMDJ75A |
| | HS5K-K | RS5M-T | 5.0SMDJ78A |
| | HS5M-K | 5.0SMDJ100A | 5.0SMDJ85A |
| | RS3A-K | 5.0SMDJ16A | 5.0SMDJ90A |
| SMAF | ES1DF-T | HS2GAF-T | RS2KAF-T |
| | ES1GF-T | HS2JAF-T | RS2MAF-T |
| | ES1JF-T | HS2KAF-T | S1DF-T |
| | ES2DAF-T | HS2MAF-T | S1GF-T |
| | ES2GAF-T | RS1DF-T | S1JF-T |
| | ES2JAF-T | RS1GF-T | S1KF-T |
| | HS1DF-T | RS1JF-T | S1MF-T |
| | HS1GF-T | RS1KF-T | S2DAF-T |
| | HS1JF-T | RS1MF-T | S2GAF-T |
| | HS1KF-T | RS2DAF-T | S2JAF-T |
| | HS1MF-T | RS2GAF-T | S2KAF-T |
| | HS2DAF-T | RS2JAF-T | S2MAF-T |

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|-----------------------|-------------|--------------|--------------|
| SMPC (TO-277A) | TPAR3D | TPUH6D | TSP15H150S |
| | TPAR3G | TPUH6J | TSP15H200S |
| | TPAR3J | TSP10H200S | TSP15U100S |
| | TPAU3D | TSP10H45S | TSP15U120S |
| | TPAU3G | TSP10H60S | TSP15U50S |
| | TPAU3J | TSP10U100S | TSP20U60S |
| | TPMR10D | TSP10U120S | TSP3H150S |
| | TPMR10G | TSP10U45S | TSP8A100S |
| | TPMR10J | TSP10U60S | UG305P |
| | TPMR6G | TSP12U120S | TSP15H120S |
| | TPMR6J | | |
| SMPC4.0 | TSPB10U45S | TSPB15U50S | TSPB5H120S |
| | TSPB15U100S | TSPB20U80S | TSPB5H150S |
| | TSPB15U45S | TSPB5H100S | |
| SMPC4.6U (TO-277A) | TSUP10M45SH | TUAS8M | 1K5SMPC24APH |
| | TSUP10M60SH | TUAU6GH | 1K5SMPC27APH |
| | TSUP15M45SH | TUAU6JH | 1K5SMPC30APH |
| | TSUP15M60SH | 1K5SMPC12APH | 1K5SMPC33APH |
| | TSUP5M45SH | 1K5SMPC13APH | 1K5SMPC36APH |
| | TSUP5M60SH | 1K5SMPC15APH | 1K5SMPC39APH |
| | TUAS8D | 1K5SMPC16APH | 1K5SMPC43APH |
| | TUAS8G | 1K5SMPC18APH | 1K5SMPC47APH |
| | TUAS8J | 1K5SMPC20APH | 1K5SMPC51APH |
| | TUAS8K | 1K5SMPC22APH | |
| SOD-123FL | ES1DFL | HS1MFL | RS2DFL |
| | ES1GFL | HS2DFL | RS2GFL |
| | ES1JFL | HS2GFL | RS2JFL |
| | ES2DFL | HS2JFL | RS2KFL |
| | ES2GFL | HS2KFL | RS2MFL |
| | ES2JFL | HS2MFL | S1GFL |
| | HS1AFL | RS1AFL | S1JFL |
| | HS1BFL | RS1BFL | S1MFL |
| | HS1DFL | RS1DFL | S2DFL |
| | HS1FFL | RS1GFL | S2GFL |
| | HS1GFL | RS1JFL | S2JFL |
| | HS1JFL | RS1KFL | S2KFL |
| | HS1KFL | RS1MFL | S2MFL |
| SOD-123HE | RS1JLS | SS110LS | TSSE3H45 |
| | RS1KLS | SS115LS | TSSE3H60 |
| | RS1MLS | SS12LS | TSSE3U45 |
| | S1DLS | SS13LS | TSSE3U60 |
| | S1GLS | SS14LS | SS16LS |
| | S1JLS | S1KLS | S1MLS |
| SOD-123W | BZD27C100PW | HS1DLW | SMF33A |
| | BZD27C110PW | HS1GLW | SMF36A |
| | BZD27C11PW | HS1JLW | SMF40A |
| | BZD27C120PW | HS1KLW | SMF43A |
| | BZD27C12PW | HS1MLW | SMF45A |

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|---------|-------------|---------|-----------|
| | BZD27C130PW | HSDLW | SMF48A |
| | BZD27C13PW | HSGLW | SMF5.0A |
| | BZD27C150PW | HSJLW | SMF51A |
| | BZD27C15PW | HSKLW | SMF54A |
| | BZD27C160PW | HSMLW | SMF58A |
| | BZD27C16PW | RS1DLW | SMF6.0A |
| | BZD27C180PW | RS1GLW | SMF6.5A |
| | BZD27C18PW | RS1JLW | SMF60A |
| | BZD27C200PW | RS1KLW | SMF64A |
| | BZD27C20PW | RS1MLW | SMF7.0A |
| | BZD27C220PW | S15DLW | SMF7.5A |
| | BZD27C22PW | S15GLW | SMF70A |
| | BZD27C24PW | S15JLW | SMF75A |
| | BZD27C27PW | S15KLW | SMF78A |
| | BZD27C30PW | S15MLW | SMF8.0A |
| | BZD27C33PW | S1DLW | SMF8.5A |
| | BZD27C36PW | S1GLW | SMF85A |
| | BZD27C39PW | S1JLW | SMF9.0A |
| | BZD27C43PW | S1KLW | SMF90A |
| | BZD27C47PW | S1MLW | SMLW |
| | BZD27C51PW | SDLW | SS110LW |
| | BZD27C56PW | SGLW | SS115LW |
| | BZD27C62PW | SJLW | SS14LW |
| | BZD27C68PW | SKLW | SS16LW |
| | BZD27C75PW | SMF100A | SS210LW |
| | BZD27C82PW | SMF10A | SS215LW |
| | BZD27C91PW | SMF11A | SS220LW |
| | ES15DLW | SMF12A | SS24LW |
| | ES15GLW | SMF13A | SS26LW |
| | ES15JLW | SMF14A | SS310LW |
| | ES1DLW | SMF15A | SS315LW |
| | ES1GLW | SMF16A | SS320LW |
| | ES1JLW | SMF17A | SS34LW |
| | ESDLW | SMF18A | SS36LW |
| | ESGLW | SMF20A | TSDGLW |
| | ESJLW | SMF22A | TSSW3U45 |
| | HS15DLW | SMF24A | TSSW3U60 |
| | HS15GLW | SMF26A | UF1DLW |
| | HS15JLW | SMF28A | UF1GLW |
| | HS15KLW | SMF30A | UF1JLW |
| | HS15MLW | | |
| SOD-128 | ES1BFS | HS2MFS | SMA4S20AH |
| | ES1BFSH | HS2MFSH | SMA4S21AH |
| | ES1DFS | RS1DFS | SMA4S22AH |
| | ES1DFS H | RS1GFS | SMA4S24AH |
| | ES1GFS | RS1JFS | SMA4S25AH |
| | ES1GFSH | RS1KFS | SMA4S26AH |
| | ES1JFS | RS1MFS | SMA4S30AH |

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|---------|------------|------------|-----------|
| | ES1JFSH | RS2DFS | SMA4S33AH |
| | ES2BFS | RS2DFSH | SMA4S36AH |
| | ES2BFSH | RS2GFS | SMA4S39AH |
| | ES2DFS | RS2GFSH | SMA4S40AH |
| | ES2DFSH | RS2JFS | SMA4S43AH |
| | ES2GFS | RS2JFSH | SMA4S47AH |
| | ES2GFSH | RS2KFS | SMA4S51AH |
| | ES2JFS | RS2KFSH | SMA4S56AH |
| | ES2JFSH | RS2MFS | SMA4S60AH |
| | ESH1DFSH | RS2MFSH | SMA6S12AH |
| | ESH2DFSH | RS3MFS | SMA6S15AH |
| | ESH3DFSH | S1DFS | SMA6S18AH |
| | HS1DFS | S1GFS | SMA6S20AH |
| | HS1DFSH | S1JFS | SMA6S21AH |
| | HS1GFS | S1KFS | SMA6S22AH |
| | HS1GFSH | S1MFS | SMA6S24AH |
| | HS1JFS | S2DFS | SMA6S25AH |
| | HS1JFSH | S2DFSH | SMA6S26AH |
| | HS1KFS | S2GFS | SMA6S30AH |
| | HS1KFSH | S2GFSH | SMA6S33AH |
| | HS1MFS | S2JFS | SMA6S36AH |
| | HS1MFSH | S2JFSH | SMA6S39AH |
| | HS2DFS | S2KFS | SMA6S40AH |
| | HS2DFSH | S2KFSH | SMA6S43AH |
| | HS2GFS | S2MFS | SMA6S47AH |
| | HS2GFSH | S2MFSH | SMA6S51AH |
| | HS2JFS | SMA4S12AH | SMA6S56AH |
| | HS2JFSH | SMA4S15AH | SMA6S60AH |
| | HS2KFS | SMA4S18AH | TSS83L45 |
| | HS2KFSH | | |
| Sub SMA | BZD17C100P | BZD27C20P | RS1GL |
| | BZD17C11P | BZD27C220P | RS1JL |
| | BZD17C120P | BZD27C22P | RS1KL |
| | BZD17C12P | BZD27C24P | RS1ML |
| | BZD17C13P | BZD27C27P | RSFAL |
| | BZD17C15P | BZD27C30P | RSFBL |
| | BZD17C16P | BZD27C33P | RSFDL |
| | BZD17C180P | BZD27C36P | RSFGL |
| | BZD17C18P | BZD27C39P | RSFJL |
| | BZD17C200P | BZD27C43P | RSFKL |
| | BZD17C220P | BZD27C47P | RSFML |
| | BZD17C24P | BZD27C51P | S1AL |
| | BZD17C27P | BZD27C56P | S1BL |
| | BZD17C33P | BZD27C62P | S1DL |
| | BZD17C36P | BZD27C68P | S1GL |
| | BZD17C39P | BZD27C75P | S1JL |
| | BZD17C43P | BZD27C82P | S1KL |
| | BZD17C47P | BZD27C91P | S1ML |

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| | BZD17C51P | ES1AL | SS110L |
| | BZD17C62P | ES1BL | SS115L |
| | BZD17C68P | ES1CL | SS12L |
| | BZD17C75P | ES1DL | SS13L |
| | BZD27C100P | ES1FL | SS14L |
| | BZD27C10P | ES1GL | SS15L |
| | BZD27C110P | ES1HL | SS16L |
| | BZD27C11P | ES1JL | SS19L |
| | BZD27C120P | HS1AL | SS210L |
| | BZD27C12P | HS1BL | SS215L |
| | BZD27C130P | HS1DL | SS22L |
| | BZD27C13P | HS1FL | SS23L |
| | BZD27C150P | HS1GL | SS24L |
| | BZD27C15P | HS1JL | SS25L |
| | BZD27C160P | HS1KL | SS26L |
| | BZD27C16P | HS1ML | SS29L |
| | BZD27C180P | RS1AL | SS310L |
| | BZD27C18P | RS1BL | SS34L |
| | BZD27C200P | RS1DL | SS36L |
| Thin SMA | ES1BAL | RS1GAL | SMA4F12AH |
| | ES1BALH | RS1GALH | SMA4F15AH |
| | ES1DAL | RS1JAL | SMA4F18AH |
| | ES1DALH | RS1JALH | SMA4F20AH |
| | ES1GAL | RS1KAL | SMA4F21AH |
| | ES1GALH | RS1KALH | SMA4F22AH |
| | ES1JAL | RS1MAL | SMA4F24AH |
| | ES1JALH | RS1MALH | SMA4F25AH |
| | ES2BAL | RS2DAL | SMA4F26AH |
| | ES2BALH | RS2DALH | SMA4F30AH |
| | ES2DAL | RS2GAL | SMA4F33AH |
| | ES2DALH | RS2GALH | SMA4F36AH |
| | ES2GAL | RS2JAL | SMA4F39AH |
| | ES2GALH | RS2JALH | SMA4F40AH |
| | ES2JAL | RS2KAL | SMA4F43AH |
| | ES2JALH | RS2KALH | SMA4F47AH |
| | HS1DAL | RS2MAL | SMA4F51AH |
| | HS1DALH | RS2MALH | SMA4F56AH |
| | HS1GAL | S1DAL | SMA4F60AH |
| | HS1GALH | S1DALH | SMA6F12AH |
| | HS1JAL | S1GAL | SMA6F15AH |
| | HS1JALH | S1GALH | SMA6F18AH |
| | HS1KAL | S1JAL | SMA6F20AH |
| | HS1KALH | S1JALH | SMA6F21AH |
| | HS1MAL | S1KAL | SMA6F22AH |
| | HS1MALH | S1KALH | SMA6F24AH |
| | HS2DAL | S1MAL | SMA6F25AH |
| | HS2DALH | S1MALH | SMA6F26AH |
| | HS2GAL | S2DAL | SMA6F30AH |

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|-----------------------------------|---------------|---------------|--------------|
| | HS2GALH | S2DALH | SMA6F33AH |
| | HS2JAL | S2GAL | SMA6F36AH |
| | HS2JALH | S2GALH | SMA6F39AH |
| | HS2KAL | S2JAL | SMA6F40AH |
| | HS2KALH | S2JALH | SMA6F43AH |
| | HS2MAL | S2KAL | SMA6F47AH |
| | HS2MALH | S2KALH | SMA6F51AH |
| | RS1DAL | S2MAL | SMA6F56AH |
| | RS1DALH | S2MALH | SMA6F60AH |
| TO-252 (D-PAK) | TSSD10L100SW | TSSD10L60SW | TSSD20L200SW |
| | TSSD10L150SW | TSSD20L100SW | TSSD20L45SW |
| | TSSD10L200SW | TSSD20L150SW | TSSD20L60SW |
| | TSSD10L45SW | | |
| TO-263AB (D ² -PAK) | GPAS1001 | MBRS20150CT-Y | SRAS2020 |
| | GPAS1002 | MBRS20200CT-Y | SRAS2030 |
| | GPAS1003 | MBRS2035CT | SRAS2040 |
| | GPAS1004 | MBRS2045CT | SRAS2050 |
| | GPAS1005 | MBRS2045CT-Y | SRAS2060 |
| | GPAS1006 | MBRS2050CT | SRAS2090 |
| | GPAS1007 | MBRS2060CT | SRAS8100 |
| | MBRS10100 | MBRS2060CT-Y | SRAS8150 |
| | MBRS10100CT | MBRS2090CT | SRAS820 |
| | MBRS10100CT-Y | MBRS20H100CT | SRAS830 |
| | MBRS10150 | MBRS20H150CT | SRAS840 |
| | MBRS10150CT | MBRS20H200CT | SRAS850 |
| | MBRS10150CT-Y | MBRS25100CT | SRAS860 |
| | MBRS1035 | MBRS25150CT | SRAS890 |
| | MBRS1035CT | MBRS2535CT | SRS10100 |
| | MBRS1045 | MBRS2545CT | SRS10150 |
| | MBRS1045CT | MBRS2550CT | SRS1020 |
| | MBRS1045CT-Y | MBRS2560CT | SRS1030 |
| | MBRS1050 | MBRS2590CT | SRS1040 |
| | MBRS1050CT | MBRS25H45CT | SRS1050 |
| | MBRS1060 | MBRS3045CT | SRS1060 |
| | MBRS1060CT | MBRS30H45CT | SRS1090 |
| | MBRS1060CT-Y | MBRS4060CT | SRS16100 |
| | MBRS1090 | MBRS6040CT | SRS1620 |
| | MBRS1090CT | SFAS1008G | SRS1630 |
| | MBRS10H100CT | SFAS801G | SRS1640 |
| | MBRS10H150CT | SFAS802G | SRS1650 |
| | MBRS10H200CT | SFAS803G | SRS1660 |
| | MBRS15100CT | SFAS804G | SRS1690 |
| | MBRS15100CT-Y | SFAS805G | SRS20100 |
| | MBRS15150CT | SFAS806G | SRS20150 |
| | MBRS15150CT-Y | SFAS807G | SRS2020 |
| | MBRS15200CT-Y | SFAS808G | SRS2030 |
| | MBRS1535CT | SFS1001G | SRS2040 |
| | MBRS1545CT | SFS1002G | SRS2050 |

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| MBRS1545CT-Y | SFS1003G | SRS2060 |
| MBRS1550CT | SFS1004G | SRS2090 |
| MBRS1560CT | SFS1005G | TSD10H100CW |
| MBRS1560CT-Y | SFS1006G | TSD10H120CW |
| MBRS1590CT | SFS1007G | TSD10H150CW |
| MBRS15H45CT | SFS1008G | TSD10H200CW |
| MBRS16100 | SFS1601G | TSD10L200CW |
| MBRS16150 | SFS1602G | TSD20H100CW |
| MBRS1635 | SFS1603G | TSD20H120CW |
| MBRS1645 | SFS1604G | TSD20H150CW |
| MBRS1650 | SFS1605G | TSD20H200CW |
| MBRS1660 | SFS1606G | TSD30H100CW |
| MBRS1690 | SFS1607G | TSD30H120CW |
| MBRS20100CT | SFS1608G | TSD30H150CW |
| MBRS20100CT-Y | SRAS20100 | TSD30H200CW |
| MBRS20150CT | SRAS20150 | UGS5J |