

Date Created : 2007/04/12  
Date Issued On : 2007/04/27  
PCN# : Q1071005-A

DESIGN/PROCESS CHANGE NOTIFICATION -- FINAL

This is to inform you that a design and/or process change will be made to the following product(s). This notification is for your information and concurrence.

If you require data or samples to qualify this change, please contact **Fairchild Semiconductor within 30 days of receipt of this notification.**

Updated process quality documentation, such as FMEAs and Control Plans, are available for viewing upon request.

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

Technical Contact:

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Implementation of change:

Expected 1st Device Shipment Date: 2007/05/21

Earliest Year/Work Week of Changed Product: 0721

Change Type Description: Bond Wire Diameter

Description of Change (From): 1. Die attach method: Two chip die attach 2. Wire size & QTY:20mil \*2ea per chip 3. Ass'y site for TO-220: SP, FSSZ Jedec, SHEDCL

Description of Change (To): 1. Die attach method: Dual chip die attach 2. Wire size & QTY:15mil \*1ea per chip 3. Ass'y site for TO-220: SP, FSSZ Jedec, SHEDCL, FSSZ none Jedec, Enoch.

Reason for Change : Improvement of productivity for Schottky diodes mounting on TO-220(Non jedec & Jedec type) . Different wire size and QTY of Schotky diodes have made low productivity in current assembly line. Assembly sites for Schottky diodes are also limited due to requiring of multi-chip mounting technology which is two chip mounting on TO-220(Non jedec & Jedec type). So, We align ass'y BOM to other products in the same in-house or subcontracts assembly line for better productivity without any electrical performance shift.

Qual/REL Plan Numbers : Q20060442

Qualification :

The qualification plan is intended to meet our criteria for qualifying an alternative assembly and test site the overall quality and reliability of our products

**Results/Discussion**

Test: (Autoclave)

Lot	Device	96-HOURS	Failure Code		
Q20060442AAACLV	MBRP3010NTU	0/77			
<b>Test: (Power Cycle)</b>					
Lot	Device	5000-CYCLES	Failure Code		
Q20060442AAPRCL	MBRP3010NTU	0/77			
<b>Test: (Temperature Humidity Biased Test)</b>					
Lot	Device	168-HOURS	500-HOURS	1000-HOURS	Failure Code
Q20060442AATHBT	MBRP3010NTU	0/77			
			0/77		
				0/77	
<b>Test: -65C, 150C (Temperature Cycle)</b>					
Lot	Device	200-CYCLES	500-CYCLES	Failure Code	
Q20060442AATMCL1	MBRP3010NTU	0/77			
Q20060442AATMCL1	MBRP3010NTU		0/77		

Product Id Description : Some Schottky diodes packaged in TO-220(Non jedec & Jedec type) . The products affected by this change are listed below in the "Affected FSIDs" section

**Affected FSIDs :**

FYP1004DNTU	FYP1004DNTU_NL	FYP1010DNTU
FYP1010DNTU_NL	FYP1045DNTU	FYP1504DNTU
FYP1545DNTU	FYP2004DNTU	FYP2006DNTU
FYP2006DNTU_NL	FYP2010DNTU	FYP2010DNTU_F080
FYP2010DNTU_NL	FYP2045DNTU	MBR20S100CT
MBR20S100CTTU	MBR3030CTTU	MBRP1545NTU
MBRP2045NTU	MBRP2045NTU_NL	MBRP3010NTU
MBRP3010NTU_NL	MBRP3045NTU	MBRP3045NTU_F080
MBRP3045NTU_NL		