

Cypress Semiconductor Qualification Report

QTP# 98422 VERSION 1.0

May, 1999

**Nitto MP-8000 Molding Compound
160 Ld Plastic Quad Flat Pack (PQFP)
(CY7C611)
Asat, Hong Kong Assembly**

CYPRESS TECHNICAL CONTACT FOR QUALIFICATION DATA:

Ed Russell
Reliability Director
(408) 432-7069

PLASTIC PACKAGE/ASSEMBLY DESCRIPTION			
Package Outline, Type, or Name:	160 Ld PQFP (CY7C611)		
Mold Compound Name/Manufacturer:	Nitto MP-8000		
Lead Frame material:	Copper		
Lead Finish, composition:	Solder Plated, 85%Sn, 15%Pb		
Die Attach Area Plating:	Silver		
Die Attach Method:	Epoxy	Die Attach Material:	Ablestik 84-1LMISR4
Wire Bond Method:	Thermosonic	Wire Material/Size:	Gold / 1.3 mil
JESD22-A112 Moisture Sensitivity Level	Level 5		
Assembly Line ID and Process ID:	Asat, Hong Kong (HK-A)		

Note: Please contact a Cypress Representative for other packages availability.

RELIABILITY TESTS PERFORMED

Stress/Test	Test Condition (Temp/Bias)	Result P/F
Temperature Cycle	JEDEC22, Condition B, -55°C to 125°C Precondition: JESD22 Moisture Sensitivity Level 5 DB+ 72 Hrs., 30°C/60%RH	P
Resistance to solvents	Cypress Spec 25-00016	P
X-Ray	Cypress Spec 12-000149	P
Acoustic Microscopy Test	Cypress Spec 25-000104	P

RELIABILITY TEST DATA

QTP#: 98422

DEVICE	ASSY-LOC	FABLOT#	ASSYLOT#	DURATION	S/S	REJ	FAIL MODE
STRESS: HIGH TEMPERATURE STORAGE (165C, NO BIAS)							
CY7C611A-NC	ASAT-B	2829585	619813226	336	48	0	
CY7C611A-NC	ASAT-B	2829585	619813226	1000	48	0	
STRESS: TC JEDEC22 COND. B, -55 TO 125C, PRECOND. DBAKE + 72 HRS 30C/60%RH							
CY7C611A-NC	ASAT-B	2829585	619813226	500	48	0	
CY7C611A-NC	ASAT-B	2829585	619813226	1500	48	0	
CY7C611A-NC	ASAT-B	2830635	619813227	500	48	0	
CY7C611A-NC	ASAT-B	2830635	619813227	1500	48	0	
CY7C611A-NC	ASAT-B	2830635	619813228	500	48	1	Top-side crack
CY7C611A-NC	ASAT-B	2830635	619813228	1500	47	0	