

RELIABILITY DATA

LM108 / 308 LT108 / 308 LT1008 LT2108

8/21/2006

• OPERATING LIFE TEST

PACKAGE TYPE	SAMPLE SIZE	OLDEST DATE CODE	NEWEST DATE CODE	K DEVICE HOURS ⁽¹⁾ AT +125°C	NUMBER OF ⁽²⁾ FAILURES
CERDIP	413	8301	9605	1,509.89	0
FLATPAK/LCC	738	8824	0322	1,590.33	0
HERMETIC	1,737	8301	0145	4,258.00	1
SIDEBRAZE	90	8416	8539	95.00	0
PLASTIC DIP	1,040	8301	9336	3,845.53	1
SOIC/SOT/MSOP	496	9743	9743	2,777.60	0
	4,514			14,076.36	2

• HIGHLY ACCELERATED STRESS TEST AT +131°C/85%RH

PACKAGE TYPE	SAMPLE SIZE	OLDEST DATE CODE	NEWEST DATE CODE	K DEVICE HOURS ⁽⁴⁾ AT +85°C	NUMBER OF FAILURES
PLASTIC DIP	50	9316	9316	65.00	0
SOIC/SOT/MSOP	195	9246	9727	714.08	0
	245			779.08	0

• PRESSURE COOKER TEST AT 15 PSIG, +121°C

PACKAGE TYPE	SAMPLE SIZE	OLDEST DATE CODE	NEWEST DATE CODE	K DEVICE HOURS	NUMBER OF FAILURES
PLASTIC DIP	3,048	9222	9910	97.08	0
SOIC/SOT/MSOP	743	9246	9727	37.36	0
	3,791			134.44	0

• TEMP CYCLE FROM -65°C to +150°C

PACKAGE TYPE	SAMPLE SIZE	OLDEST DATE CODE	NEWEST DATE CODE	K DEVICE CYCLES	NUMBER OF FAILURES
CERDIP	350	8319	9720	88.20	0
FLATPAK/LCC	273	8824	0322	27.30	0
HERMETIC	605	8335	0145	81.36	0
SIDEBRAZE	418	8416	0121	39.10	0
PLASTIC DIP	373	9245	9910	37.98	0
SOIC/SOT/MSOP	295	9248	9541	29.50	0
	2,314			303.43	0

• THERMAL SHOCK FROM -65°C to +150°C

PACKAGE TYPE	SAMPLE SIZE	OLDEST DATE CODE	NEWEST DATE CODE	K DEVICE CYCLES	NUMBER OF FAILURES
CERDIP	305	8319	9720	54.83	0
FLATPAK/LCC	120	8902	0322	3.25	0
HERMETIC	335	8335	9915	52.67	0
SIDEBRAZE	378	8416	0121	5.57	0
PLASTIC DIP	300	9245	9910	30.00	0
SOIC/SOT/MSOP	295	9248	9727	29.50	0
	1,733			175.81	0

(1) Assumes Activation Energy = 1.0 Electron Volts

(2) Failure Rate Equivalent to +55°C, 60% Confidence Level = 0.44 FITS

(3) Mean Time Between Failures in Years = 259,266

(4) Assumes 20X Acceleration from 85°C to +131°C

Note: 1 FIT = 1 Failure in One Billion Hours.