

RELIABILITY DATA

LM124 / LM134 / LM234 / LM334

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
HERMETIC	92	8534	0041	136.57	0
SOIC/SOT/MSOP	40	8601	8601	417.31	0
TO-92	1,429	9051	9641	8,829.12	0
	1,561			9,383.00	0

• 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
TO-92	930	9051	9641	1,392.84	0
	930			1,392.84	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
SOIC/SOT/MSOP	950	9335	9604	24.05	0
TO-92	1,265	9233	0051	293.01	0
	2,215			317.06	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
HERMETIC	147	8534	0013	13.35	0
SOIC/SOT/MSOP	235	9118	9805	23.50	0
TO-92	548	9111	0051	146.03	0
	930			182.88	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
HERMETIC	132	8546	0013	1.98	0
SOIC/SOT/MSOP	294	9118	9805	29.40	0
TO-92	167	9112	0051	116.80	0
	593			148.18	0

(1) Assumes Activation Energy = 1.0 Electron Volts

(2) Failure Rate Equivalent to +55°C, 60% Confidence Level = 0.20 FITS

(3) Mean Time Between Failures in Years = 570,386

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

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