

EL2038D Die

1 GHz Operational Amplifier

EL2038D

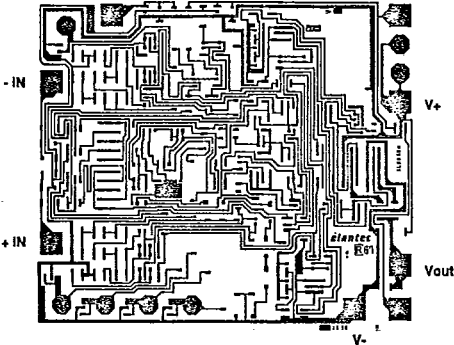
T-79-07-10

Absolute Maximum Ratings (T_A = 25°C)

V _S	Voltage between V+ and V-	35V
ΔV _{IN}	Differential Input Voltage	6V
I _{OP}	Output Current, Peak	50 mA
I _{OC}	Output Current, Continuous	30 mA
T _J	Maximum Junction Temperature	175°C

Important Note:
For AC electrical characteristics, refer to the typical electrical table and performance curves in the package data sheet. These characteristics are guaranteed but not tested in die form. Unless otherwise noted, all tests are pulsed tests, therefore T_J=T_C=T_A.

Test Level	Test Procedure
I	100% production tested in wafer form. See remarks under Electrical Testing in the General Die section.



Die Size:
71 x 82 MILS



DC Electrical Characteristics v_S = ±15V, R_L = 1kΩ, T_A = 25°C

Parameter	Description	Min	Typ	Max	Test Level	Units
V _{OS}	Offset Voltage		0.5	2	I	mV
I _B	Bias Current		5	15	I	μA
I _{OS}	Offset Current		1	4	I	μA
V _{CM}	Common Mode Range	±11	±12		I	V
A _{VOL}	Large Signal Voltage Gain (Note 1)	10k	15k		I	V/V
CMRR	Common-Mode Rejection Ratio (Note 2)	60			I	dB
V _O	Output Voltage Swing	±11			I	V
I _O	Output Current (Note 4)	±25			I	mA
I _S	Supply Current		13	17	I	mA
PSRR	Power Supply Rejection Ratio (Note 3)	60	85		I	dB

Note 1: V_O = ±10V.
Note 2: Two tests are performed. V_{CM} = 0V to +10V and V_{CM} = 0V to -10V.
Note 3: Two test are performed. V+ = +15V, and V- is changed from -5V to -15V. V- = -15V, and V+ is changed from +5V to +15V.
Note 4: R_L = 200Ω.

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