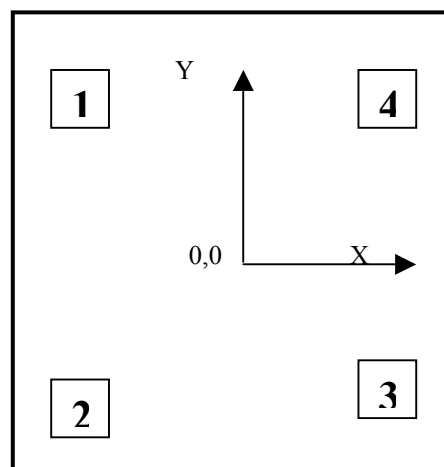


L7809**CHIP FOR THREE-TERMINAL POSITIVE VOLTAGE REGULATOR IC****Features:**

- ◆ Output Current in Excess of 1.5A ($T_j=25^{\circ}\text{C}, P_D \leq 15\text{W}$)
- ◆ No External Components Required
- ◆ Internal Short Circuit Current Limiting
- ◆ Internal Thermal Overload Protection
- ◆ Output Transistor Safe-Area Compensation
- ◆ Output Voltage Offered in 4% Tolerance

Physical Characteristics:

Wafer Diameter.....	100±0,5mm
Wafer Thickness.....	280±20 μm
Die size.....	1.4 x 1.9 mm ²
Scribe Width.....	100 μm
Metallization Bottom.....	Ti-Ni-Ag
	Ti-Ni – 0.5-0.7 μm
	Ag - 0.5-0.7 μm
Passivation.....	PSG



- ◆ Maximum Input Voltage – 36V
- ◆ Operation Junction Temperature Range – $-40^{\circ}\text{C} \sim 125^{\circ}\text{C}$

Pad #	Pad name	Discription	Bond Pad (μm)	X	Y
1	IN	Input	230x230	-610	247
2	GND	Ground	230x230	-610	-626
3	OUT	Output	230x230	372	-560
4	OUT	Output	230x230	372	247

ELECTRICAL CHARACTERISTICS CHIPS ON WAFER

($V_{in}=15\text{V}$, $I_o=0.5\text{A}$, $C_i=0.33\mu\text{F}$, $C_o=0.1\mu\text{F}$, $T_j = 25^{\circ}\text{C}$, unless otherwise noted.)

Characteristic	Symbol	Test Condition	Min	Max	Unit
Output Voltage	V_o		8.65	9.35	V
Output Voltage	V_o	$5.0\text{mA} \leq I_o \leq 1.0\text{A}$; $11.5\text{V} \leq V_{in} \leq 24\text{V}$ $0^{\circ}\text{C} \leq T_j \leq 125^{\circ}\text{C}$	8.55	9.45	V
Line Regulation	ΔV_v	$11.5\text{V} \leq V_{in} \leq 26\text{V}$; $11.5\text{V} \leq V_{in} \leq 17\text{V}$		180 90	mV
Load Regulation	ΔV_i	$5.0\text{mA} \leq I_o \leq 1.5\text{A}$ $0.25\text{A} \leq I_o \leq 0.75\text{A}$		180 90	mV
Quiescent Current	I_b			8.0	mA
Quiescent Current Change	ΔI_b	$11.5\text{V} \leq V_{in} \leq 26\text{V}$, $5\text{mA} \leq I_o \leq 1.0\text{A}$		1.0 0.5	mA

