

SOT-89 Encapsulate Three terminal voltage regulators

79L09 Three-terminal negative voltage regulator

FEATURES

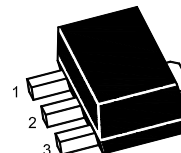
- Maximum output current
 I_{OM} : 0.1 A
- Output voltage
 V_O : -9 V
- Continuous total dissipation
 P_D : 0.5W

SOT-89 Plastic Package

1. GND

2. IN

3. OUT



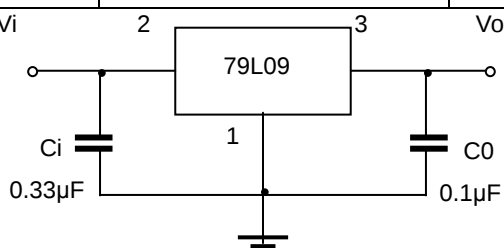
ABSOLUTE MAXIMUM RATINGS (Operating temperature range applies unless otherwise specified)

Parameter	Symbol	Value	Unit
Input Voltage	V_I	-30	V
Operating Junction Temperature Range	T_{OPR}	0—+150	°C
Storage Temperature Range	T_{STG}	-55—+150	°C

ELECTRICAL CHARACTERISTICS AT SPECIFIED VIRTUAL JUNCTION TEMPERATURE ($V_I = -16V, I_O = 40mA, C_i = 0.33\mu F, C_o = 0.1\mu F$, unless otherwise specified)

Parameter	Symbol	Test conditions	Min	Typ	Max	Unit
Output Voltage	V_O	25°C	-8.64	-9.0	-9.36	V
		-12V ≤ V_I ≤ -24V, $I_O = 1mA-40mA$	-8.55	-9.0	-9.45	V
		$I_O = 1mA-70mA$	-8.55	-9.0	-9.45	V
Load Regulation	ΔV_O	$I_O = 1mA-100mA$		19	90	mV
		$I_O = 1mA-40mA$		11	40	mV
Line Regulation	ΔV_O	-12 V ≤ V_I ≤ -24V		45	175	mV
		-13V ≤ V_I ≤ -24V		40	125	mV
Quiescent Current	I_q			4.1	6.0	mA
Quiescent Current Change	ΔI_q	-13V ≤ V_I ≤ -24V			1.5	mA
	ΔI_q	1mA ≤ V_I ≤ -40mA			0.1	mA
Output Noise Voltage	V_N	10Hz ≤ f ≤ 100KHz		58		uV
Ripple Rejection	RR	-15V ≤ V_I ≤ -24V, f=120Hz		45		dB
Dropout Voltage	V_d			1.7		V

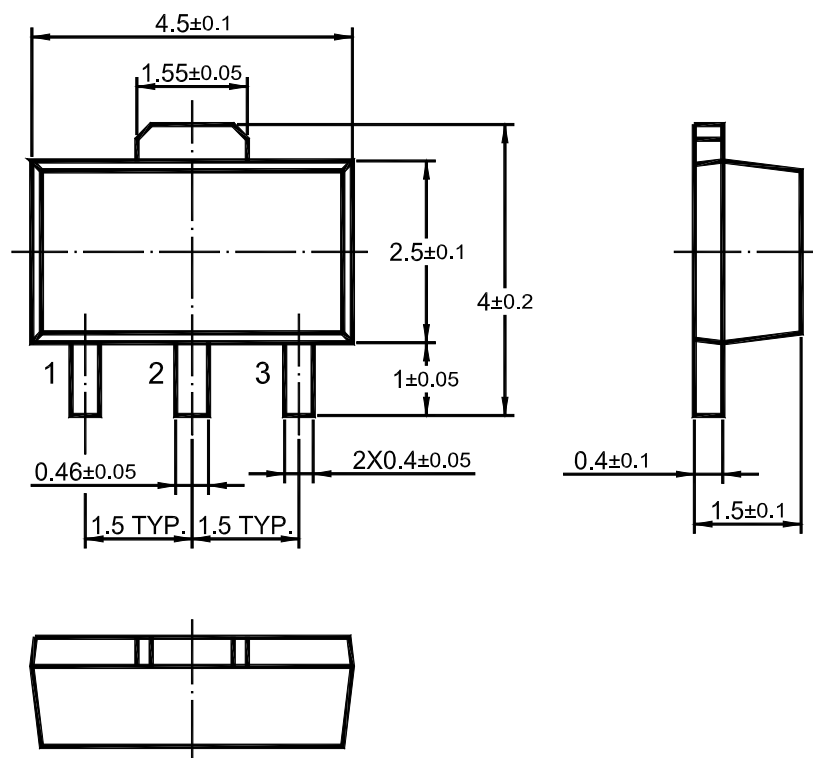
TYPICAL APPLICATION



Note: Bypass capacitors are recommended for optimum stability and transient response and should be located as close as possible to the regulators

79L09

SOT-89 PACKAGE OUTLINE



Dimensions in mm