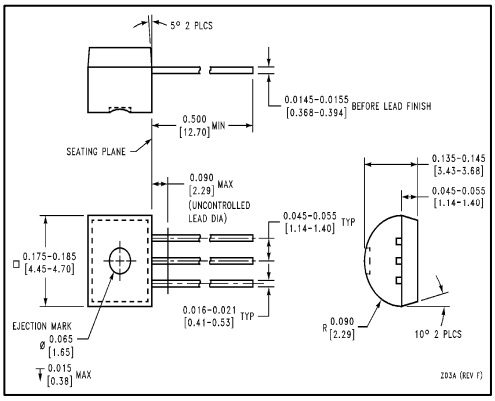
3-TERMINALS NEGATIVE VOLTAGE REGULATOR

SERIES 79L05

DESCRIPTION

The 79L05 family is monolithic fixed voltage regulator integrated circuit. They are suitable for applications that required supply current up to 100mA.

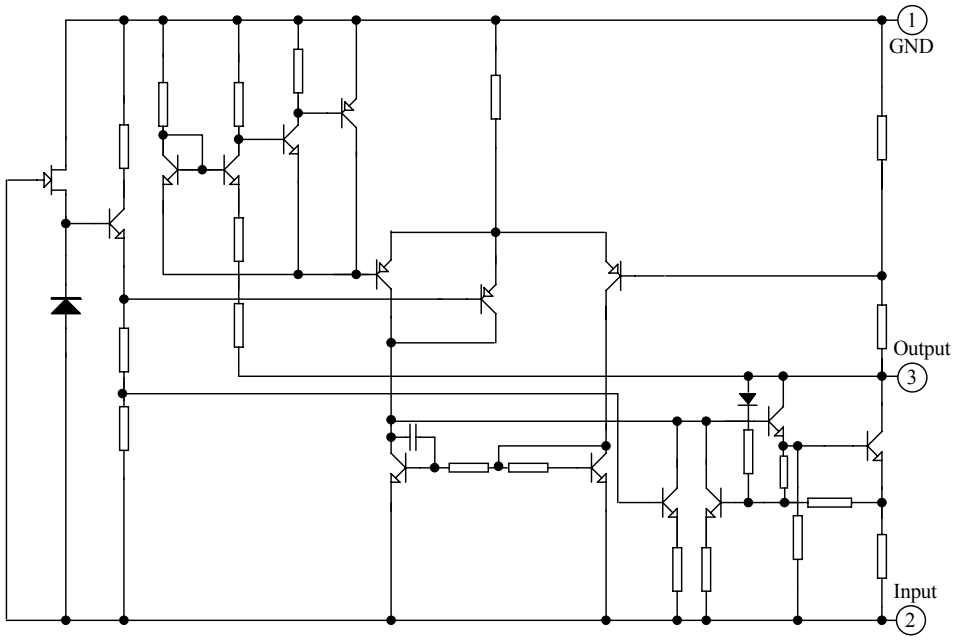
Outline Drawing



FEATURE

- Output current to 100mA
- Fixed output voltage of –5V available.
- Thermal overload shutdown protection
- Short circuit current limiting.

EQUIVALENT CIRCUIT



ABSOLUTE MAXIMUM RATINGS (Ta=25°C)

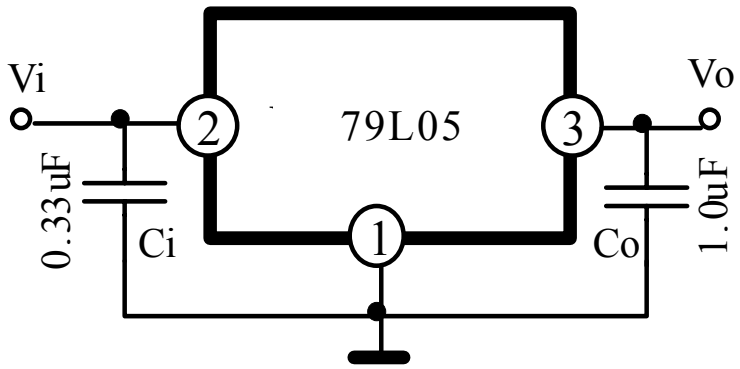
Characteristic		Symbol	Value	Unit
Input voltage	Vo=-5V~-9V	Vi	-30	V
Power Dissipation		PD	500	mW
Operating Junction Temperature Range		Topr	-20~75	°C
Storage Temperature		Tstg	-40~150	°C

ELECTRICAL CHARACTERISTICS

(unless otherwise specified: Tj=25°C, Ci=0.33μF, Co=1.0μF)

Characteristics	Test conditions	Symbol	Min.	Typ.	Max.	Unit
Output Voltage	Vin=-10V, Io=40mA	Vo	-4.8	-5.0	-5.2	V
Line Regulation	Vin=-7V~-20V, Io=40mA	Vo-Vin		15	150	mV
Load Regulation	Vin=-10V, Io=1mA~100mA	Vo-Io		7	60	mV
Quiescent Current	Vin=-10V, Io=40mA	IQ		3.5	6.0	mA
Quiescent Current Change	Io=1mA~40mA	ΔIQ		0.	0.3	mA
	Io=1mA~100mA				0.1	mA
	-20V≤V_{IN}≤-7.5V				1.5	mA
Ripple Rejection	Vin=-8V~-18V, Io=40mA, ein=1Vp-p, f=120Hz	RR	41	71		dB
Output Noise Voltage	Vin=-10V, Io=40mA, BW=10Hz~100kHz,	VNO		120		μV

TYPICAL APPLICATION CIRCUIT



CHARACTERISTIC CURVES