

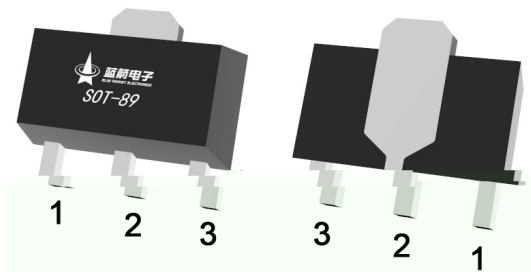
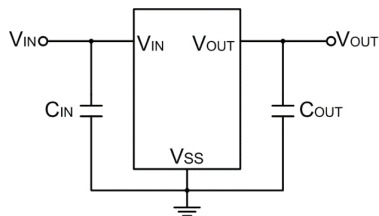
Rev.B Apr.-2024

SOT-89

Low dropout linear regulator in a SOT-89 Plastic Package .

- ◆ 2uA
- ◆ 300mA
- ◆ 200mV@100mA($V_{OUT}=3.3V$)
- ◆ $\pm 2\%$
- ◆ 70dB@1kHz
- ◆ 90uV_{RMS} 10Hz~100kHz
- ◆
- ◆
- ◆
- ◆

- ◆
- ◆
- ◆
- ◆
- ◆



PIN1 <

	V_{IN}	-0.3 to 40	V
	I_{OUT}	600	mA
	P_D	0.6	W
	T_{stg}	-40 to +125	°C
	T_A	-40 to +125	°C
10s	T_{sold}	260	°C
	HBM	2	kV
	MM	200	V

	V_{IN}				36	V
1	$V_{OUT\ E}$	$I_{OUT}=10mA$	3.234	3.3	3.366	V
2	V_{dif}	$I_{OUT}=100mA$ $V_{OUT}=3.3V$		200		mV
	I_{SS}	$I_{OUT}=0mA$		2	5	uA
	V_{load}	$V_{IN}=V_{OUT\ S} +1V$ $1mA\ I_{OUT}\ 300mA$		15	50	mV
	$\frac{V_{OUT}}{(V_{IN}*V_{OUT})}$	$I_{OUT}=10mA$ $V_{OUT\ S} +1V\ V_{IN}$ 36V		0.01	0.1	%/V
	$\frac{V_{OUT}}{(T_A*V_{OUT})}$	$I_{OUT}=10mA$ -40 T_A 125		50		ppm/
	I_{LIM}	$V_{OUT}=0.5 \times$ $V_{OUT(Normal)}, V_{IN} = 5V$	350			mA
	I_{SHORT}	$V_{OUT}=V_{SS}$		100		mA
	PSRR	$I_{OUT}=50mA\ f=100Hz$		75		dB
		$I_{OUT}=50mA\ f=1kHz$		70		
		$I_{OUT}=50mA\ f=10kHz$		55		
		$I_{OUT}=50mA\ f=100kHz$		40		



	V _{ON}	BW=10Hz to 100kHz		90		uV _{RMS}
	T _{SD}			160		
	T _{SD}			20		

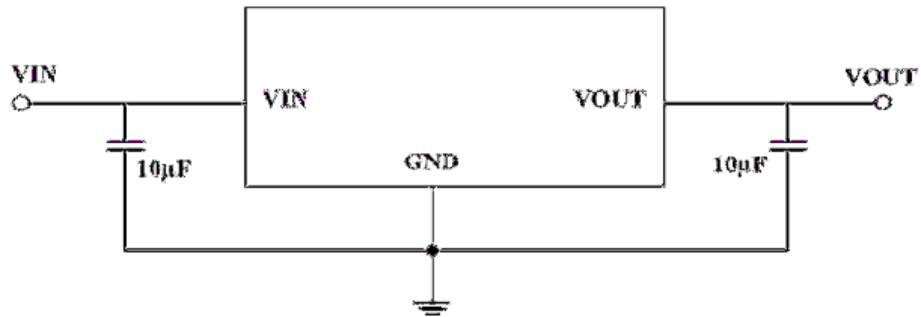
(1) V_{OUT E}

V_{OUT S}

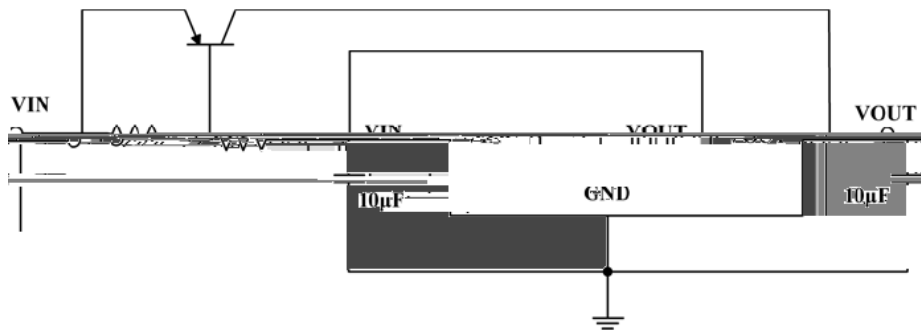
V_{OUT}

V_{OUT}*98%

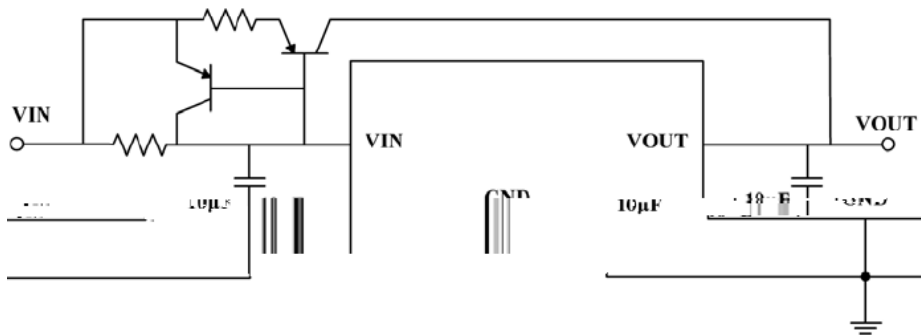
/ Basic Application



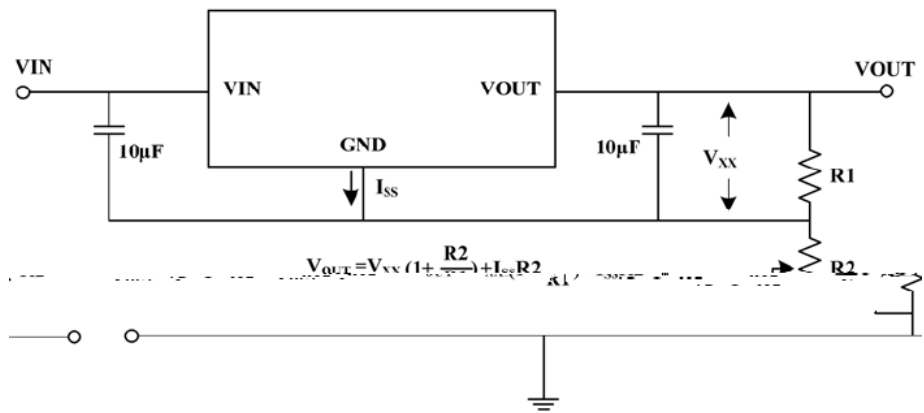
/ High Output Current Voltage Regulator



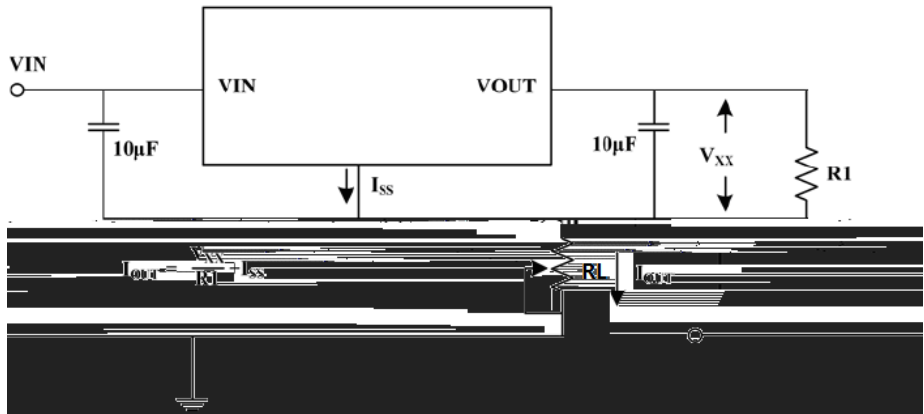
/ Short-Circuit Protection



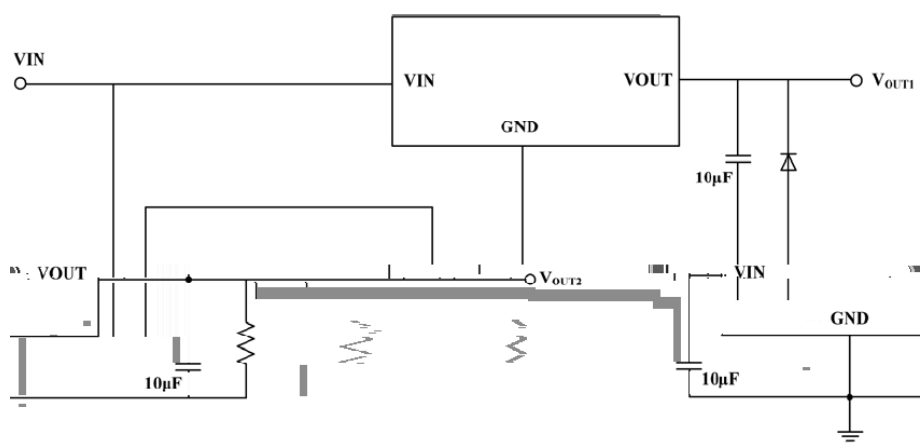
/ Circuit for Increasing Output Voltage



/ Constant Current Regulator

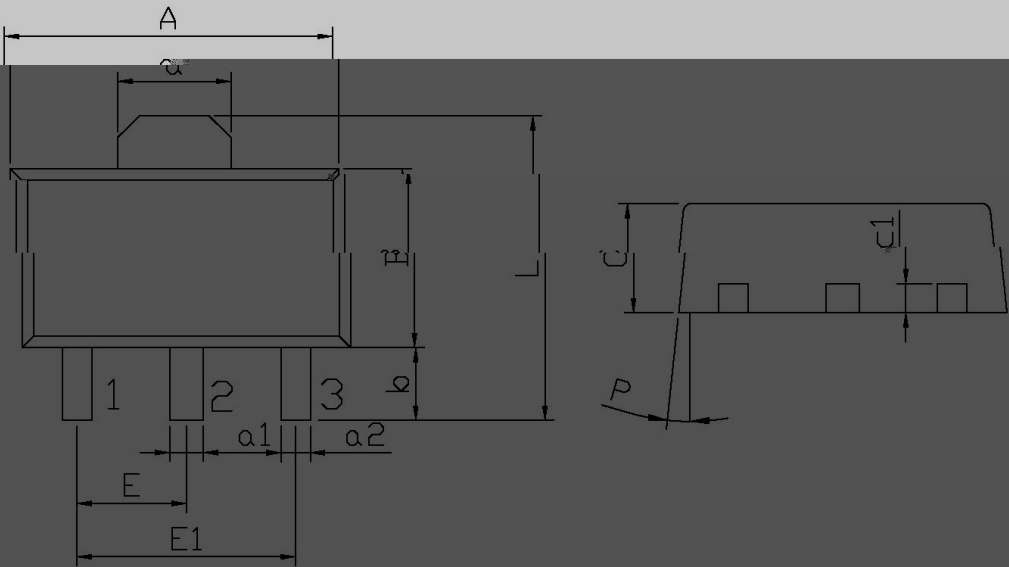


/ Double Output Circuit

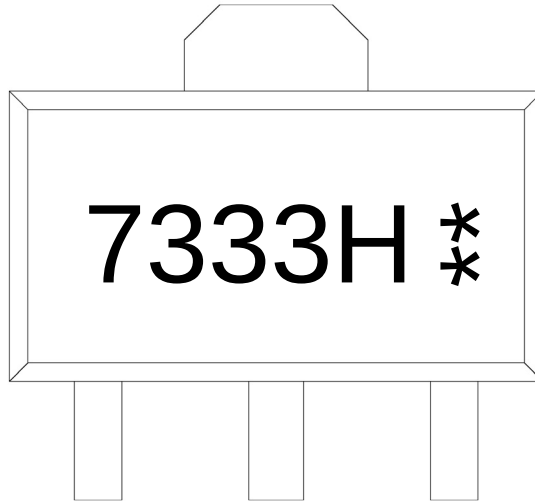


SOT-89

单位: mm



Symbol	Dimensions In. Millimeters		Symbol	Dimensions In. Millimeters	
	Min	Max		Min	Max
A	4.4	4.7	a1	0.35	0.50
a	1.45	1.65	a2	0.30	0.50
L	3.878	4.478	C	1.40	1.70
E	1.40	1.60	c1	0.35	0.50
E1	2.80	3.20	P	6°	
b	0.80	1.20			



7333H

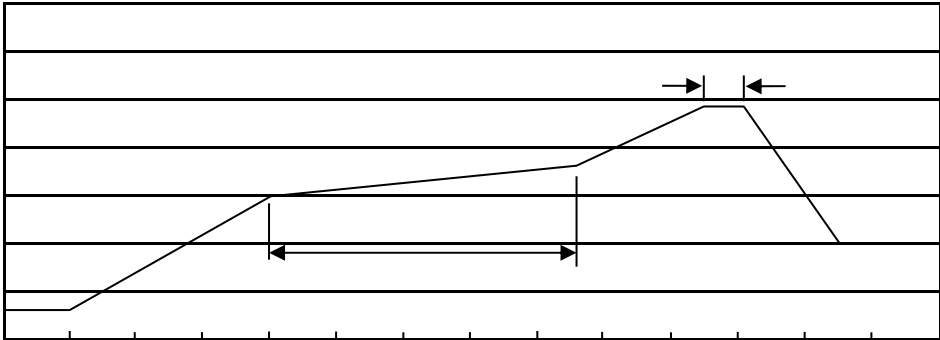
**

Note:

7333H: Product Type Code

** : Lot No. Code, code change with Lot No

Temperature Profile for IR Reflow Soldering(Pb-Free)



Note:

- 1

150 180

60 90sec;

1.Preheating:150~180 , Time:60~90sec.
- 2

245±5

5±0.5sec;

2.Peak Temp.:245±5 , Duration:5±0.5sec.
- 3

2 10 /sec.

3. Cooling Speed: 2~10 /sec.

260±5

10±1 sec.

Temp.:260±5℃

Time:10±1 sec

/ REEL

Package Type 封装形式	Units 包装数量					Dimension 包装尺寸 (unit: mm³)		
	只 卷盘	卷盘 盒	只 盒	盒 箱	只 箱		盒	箱
SOT-89	1,000	10	10,000	4	40,000	7 ×12	210×205×205	445×435×230