

# DATA SHEET

Part No.	AN80T32
Package Code No.	HZIP007-P-0750A

Maintenance/Discontinued  
(planned maintenance type, maintenance type, planned discontinued type, discontinued type)  
Maintenance/Discontinued includes following four Product lifecycle stage

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# AN80T32

## Multi voltage regulator IC

### ■ Features

- 3 outputs voltage regulator
- Peak current protection circuit
- ASO protection circuit
- Thermal protection circuit

### ■ Applications

- For power supply

### ■ Package

- TO-2207 pins plastic package (power type with fin)

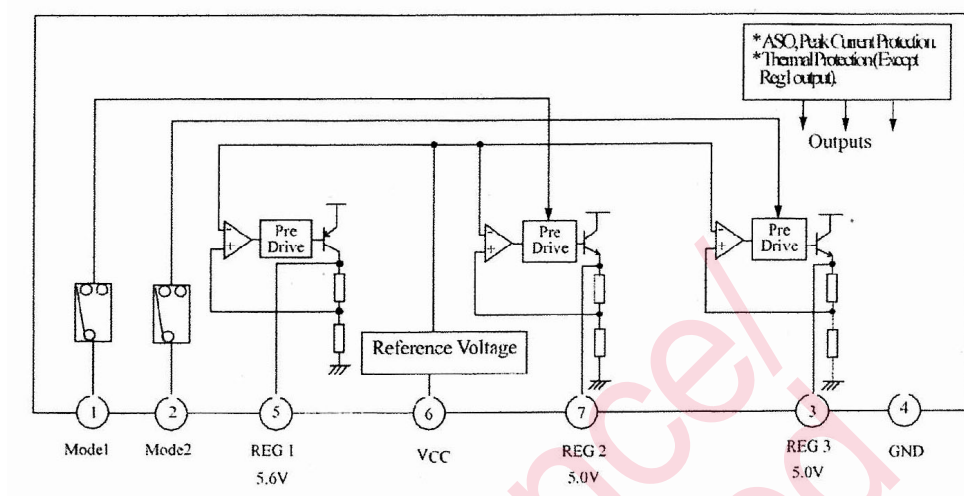
### ■ Type

- Silicon monolithic bipolar IC

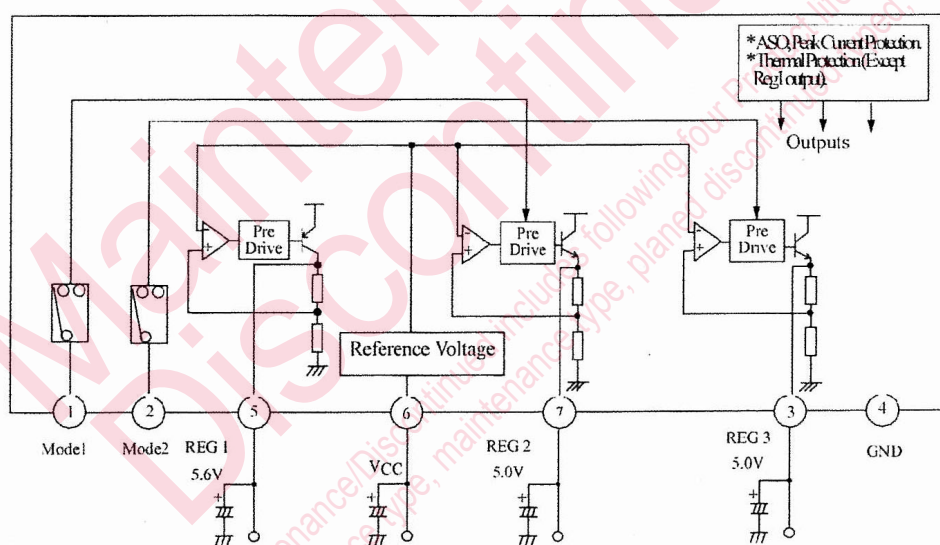
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### ■ Block Diagram



### ■ Application Circuit Example



Mode1 'OFF'	GND
Mode1 'ON'	5V
Mode2 'OFF'	GND
Mode2 'ON'	5V

- Note )
1. To prevent oscillation at each output, make sure to connect a capacitor having a capacitance of 22  $\mu\text{F}$  or greater between GND and each of the REG1 (pin 5), REG2 (pin 7), REG3 (pin 3) and  $V_{CC}$  (pin 6) pins. We recommend using a tantalum electrolytic capacitor whose capacitance is unsusceptible to temperature.
  2. When supplied a  $V_{CC}$  of 21 V or greater, IC may be damaged if REG2 or REG3 outputs are shorted to GND.
  3. When supplied a  $V_{CC}$  of 21 V or greater, IC may be damaged if REG2 or REG3 outputs are load short.

### ■ Pin Descriptions

Pin No.	Pin name	Description
1	MODE1	When MODE1 pin is 5 V, REG2 output is "H".
2	MODE2	When MODE2 pin is 5 V, REG3 output is "H".
3	REG3	When MODE2 pin is "H", REG3 output is 5.0 V ( $I_O = 500$ mA min.).
4	GND	Connected to the IC substrate.
5	REG1	When VCC on , REG1 output is 5.6 V ( $I_O = 170$ mA min.).
6	VCC	Connected to power supply.
7	REG2	When MODE1 pin is "H", REG2 output is 5.0 V ( $I_O = 250$ mA min.).

### ■ Absolute Maximum Ratings

A No.	Parameter	Symbol	Rating	Unit	Note
1	Storage temperature	$T_{stg}$	-55 to +150	°C	*1
2	Operating ambient temperature	$T_{opr}$	-30 to +85	°C	*1
3	Operating ambient pressure	$P_{opr}$	$1.013 \times 10^5 \pm 0.61 \times 10^5$	Pa	
4	Operating constant acceleration	$G_{opr}$	9 810	m/S <sup>2</sup>	
5	Operating shock	$S_{opr}$	4 900	m/S <sup>2</sup>	
6	Power supply voltage	$V_{CC}$	20.0	V	
7	Power supply current	$I_{CC}$	2.5	A	*2
8	Power dissipation	$P_D$	15	W	*3

Note ) \*1: Except these items, all other measurements are taken at  $T_a = 25^\circ\text{C}$ .

\*2: Over current limiting circuit built-in.

\*3:  $T_a = 85^\circ\text{C}$  infinite heat sink.

### ■ Operating Supply Voltage Range

Parameter	Symbol	Range	Unit	Note
Operating supply voltage range	$V_{CC}$	8.50 to 15.0	V	

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