ACE555

Low Consumption Current High PSRR 300mA CMOS Voltage Regulator

Description

The ACE555 series are a group of positive voltage regulators manufactured by CMOS technologies with high ripple rejection, low power consumption and low dropout voltage, which can prolong battery life in portable electronics. The ACE555 series work with low-ESR ceramic capacitors, reducing the amount of board space necessary for power applications. The ACE555 series consume less than 0.1uA in shutdown mode and have fast turn-on time less than 50us.The series are very suitable for the battery-powered equipment, such as RF applications and other systems requiring a quiet voltage.

Features

- Low Dropout Voltage：150mV@150mA
- Low Quiescent Current：5μA
- High Ripple Rejection：65dB@1kHz
- Excellent Line and Load Transient Response
- Operating Voltage：2.0V～7.0V
- Output Voltage：1.2～5.0V
- High Accuracy：±1%、±2%
- Built-in Current Limiter, Short-Circuit Protection
- TTL- Logic-Controlled Shutdown Input

Application

- Cellular and Smart Phones
- Laptop, Palmtops and PDA
- Digital Still and Video Cameras
- MP3, MP4 Player
- Radio control systems
- Battery-Powered Equipment

Absolute Maximum Ratings

Parameter		Symbol	Ratings	Unit
Input Voltage		V_{IN}	V_{SS} -0.3~V_{SS}+8	V
Output Current		I_{OUT}	600	mA
Output Voltage		V_{OUT}	V_{SS} -0.3~V_{IN}+0.3	V
Power Dissipation	SOT-23-3	Pd	250	mW
	SOT-23-5	Pd	250	mW
	SC-70-5	Pd	250	mW
	DFN1*1-4	Pd	400	mW
Operating Temperature		T_{opr}	-40~85	℃
Storage Temperature		T_{stg}	-40~125	℃
Soldering Temperature & Time		T_{solder}	260℃, 10s	

Ordering information

ACE555 X XX XX + H

- Halogen - free
- Pb - free
- BM: SOT-23-3
  BN: SOT-23-5
  HN: SC-70-5
  IN: DFN1*1-4
- Output Voltage: 1.2V/1.5V/1.8V…..5.0V
- A：±1%
  B：±2%

Notes

ACE does not assume any responsibility for use as critical components in life support devices or systems without the express written approval of the president and general counsel of ACE Technology Co., LTD. As sued herein:

1. Life support devices or systems are devices or systems which, (a) are intended for surgical implant into the body, or (b) support or sustain life, and shoes failure to perform when properly used in accordance with instructions for use provided in the labeling, can be reasonably expected to result in a significant injury to the user.
2. A critical component is any component of a life support device or system whose failure to perform can be reasonably expected to cause the failure of the life support device or system, or to affect its safety or effectiveness.