

Description

The MT7110 Ultra Low Quiescent Current Low Dropout (LDO) Linear Regulator is ideal for use in industrial and battery operated systems. These devices operate from an input voltage of 2.5 V to 5.5V, deliver up to 250mA of output current, and consume only 1μA of quiescent current at no load. The internal P_Channel pass device keeps the quiescent current low even at full load. The enable pin EN is compatible with standard CMOS logic. The MT7110 is stable with 1.0μF output capacitor. The MT7110 also comes with thermal shutdown and thermal foldback current limit to protect the device during fault conditions. MT7110 have fixed 1.2V, 1.65V, 1.8V, 2.5V and 3.3V output voltage. These devices are available in space saving SOT23_5L packages.

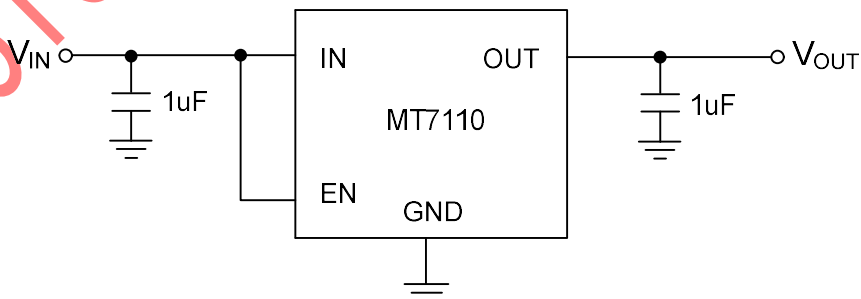
Features

- Low 1μA Quiescent Current
- Input Voltage Range 2.5V to 5.5V
- Stable Operation with a 1μF ceramic capacitor
- Support 200mA Continue, 250mA Peak Output Current
- Low Dropout Voltage:
150mV at 3.3V_{OUT}/100mA,
250mV at 3.3V_{OUT}/200mA
- High Accuracy Output Voltage ±2%
- Fixed Output Voltage: 1.2V, 1.65V, 1.8V, 2.5V, 3.3V
- Thermal Foldback Current Limit Protection
- Quick Output Discharge in Shutdown
- CMOS Logic Level-Compatible Enable Pin
- Available in SOT23-5L Package
- Pb-Free (ROHS compliant)

Applications

- Ultra-Low Power Microcontrollers
- Cellular/Cordless Handsets
- Portable/Battery-Powered Equipment

Typical Application

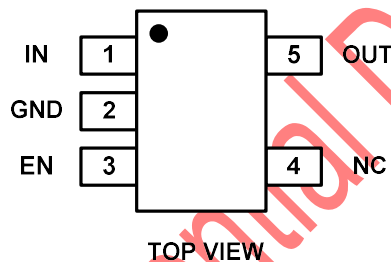


Ordering Information

Part No.	Marking	Temp. Range	Package	Remark	MOQ
MT7110JSBR	7110J ywwxx	-40°C ~85°C	SOT235L	1.2V	3000/Tape & Reel
MT7110WSBR	7110W ywwxx	-40°C ~85°C	SOT235L	1.65V	3000/Tape & Reel
MT7110DSBR	7110D ywwxx	-40°C ~85°C	SOT235L	1.8V	3000/Tape & Reel
MT7110ESBR	7110E ywwxx	-40°C ~85°C	SOT235L	2.5V	3000/Tape & Reel
MT7110SSBR	7110S ywwxx	-40°C ~85°C	SOT235L	3.3V	3000/Tape & Reel

Note: y: Year, w: Week, xx: Control Code

Pin Configuration



Pin Description

PIN NO.	PIN NAME	DESCRIPTION
1	IN	Input supply. Bypass IN to GND with 0.1μF ceramic capacitor.
2	GND	Ground pin.
3	EN	Driving the enable pin (EN) over 1.2V turns on the regulator. Driving this pin below 0.4V puts the regulator in to shutdown mode, reducing operating current to 0μA. VIN sources a 50nA pull-up current to EN pin.
4	NC	Not connected.
5	OUT	Regulated output voltage pin. Bypass OUT to GND with 1μF ceramic capacitor.