



ZHEJIANG UNIÜ-NE Technology CO., LTD
浙江宇力微新能源科技有限公司



U0343 Data Sheet

V 2.6

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5.5V 3A 1.2MHz Synchronous Step-Down Regulator

General Description

The U0343 is a high-efficiency monolithic synchronous buck regulator using a constant frequency, current mode architecture. The device is available in an adjustable version. Supply current with no load is 40uA and drops to <1uA in shutdown. The 2.5V to 5.5V input voltage range makes the U0343 ideally suited for single Li-Ion battery powered applications. 100% duty cycle provides low dropout operation, extending battery life in portable systems. PWM/PFM mode operation provides very low output ripple voltage for noise sensitive applications.

Switching frequency is internally set at 1.2MHz, allowing the use of small surface mount inductors and capacitors. Low output voltages are easily supported with the 0.6V feedback reference voltage.

The U0343 is offered in a low profile (1mm) 5-pin, thin SOT package, and is available in an adjustable version.

Key Features

- High Efficiency: Up to 96%
- 2.5V to 5.5V Input Voltage Range
- 1.2MHz Constant Frequency Operation
- Up to 3.0A Current Output
- No Schottky Diode Required
- PFM Mode for High Efficiency in Light Load
- Over temperature Protected
- Low Quiescent Current: 40µA
- Short Circuit Protection
- Inrush Current Limit and Soft Start
- Low Dropout Operation: 100% Duty Cycle
- SOT23-5 package

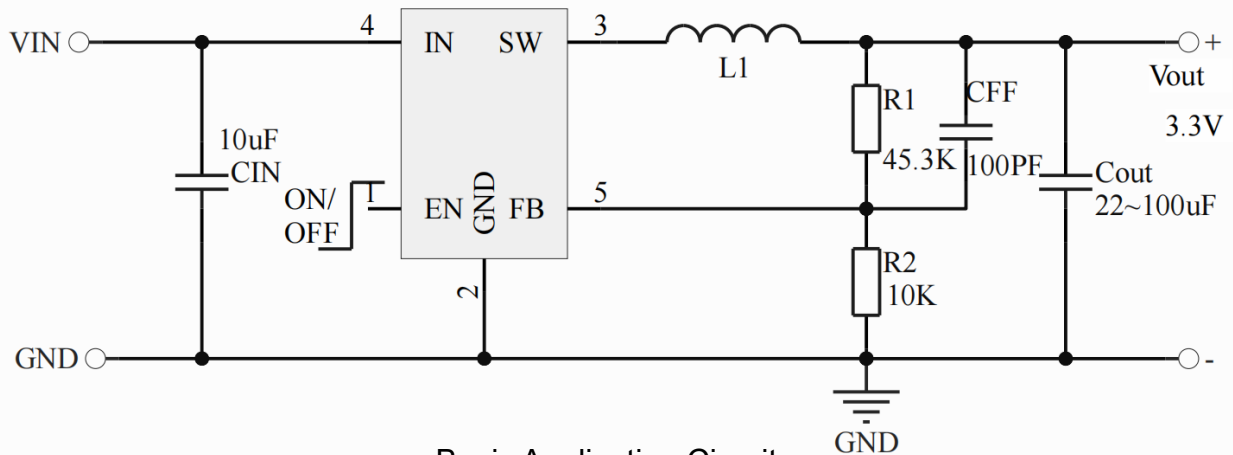
Applications

- Cellular and Smart Phones
- Wireless and DSL Modems
- PDAs
- Portable Instruments
- Digital Still and Video Cameras
- PC Cards

Packages



Typical Application Circuit



Basic Application Circuit

1.版本记录

DATE	REV.	DESCRIPTION
2018/04/19	1.0	First Release
2019/05/21	2.0	Change the header
2021/11/12	2.5	Layout adjustment
2023/12/08	2.6	Optimize input and output capacitance

2.免责声明

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3.联系我们

浙江宇力微新能源科技有限公司

总部地址：绍兴市越城区斗门街道袍渎路25号中节能科创园45幢4/5楼

电话：0575-85087896（研发部）

传真：0575-88125157

E-mail: htw@uni-semic.com

无锡地址：无锡市锡山区先锋中路6号中国电子（无锡）数字芯城1#综合楼503室

电话：0510-85297939

E-mail: zh@uni-semic.com

深圳地址：深圳市宝安区西乡街道南昌社区宝源路泳辉国际商务大厦410

电话：0755-84510976

E-mail: htw@uni-semic.com