
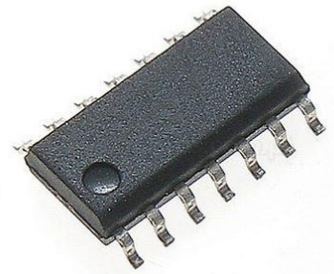


Current Mode PWM Controller 200mA 500kHz 14-Pin SOIC

Tube

Manufacturer:	Texas Instruments, Inc
Package/Case:	SOP14
Product Type:	Power Management ICs
RoHS:	RoHS Compliant/Lead free 
Lifecycle:	Active



Images are for reference only

[Inquiry](#)

General Description

The UCx84x series of control integrated circuits provide the features that are necessary to implement off-line or DC-to-DC fixed-frequency current-mode control schemes, with a minimum number of external components. The internally implemented circuits include an undervoltage lockout (UVLO), featuring a start-up current of less than 1 mA, and a precision reference trimmed for accuracy at the error amplifier input. Other internal circuits include logic to ensure latched operation, a pulse-width modulation (PWM) comparator that also provides current-limit control, and a totem-pole output stage that is designed to source or sink high-peak current. The output stage, suitable for driving N-channel MOSFETs, is low when it is in the off state.

The UCx84x family offers a variety of package options, temperature range options, choice of maximum duty cycle, and choice of turnon and turnoff thresholds and hysteresis ranges. Devices with higher turnon or turnoff hysteresis are ideal choices for off-line power supplies, while the devices with a narrower hysteresis range are suited for DC-DC applications. The UC184x devices are specified for operation from -55°C to 125°C , the UC284x series is specified for operation from -40°C to 85°C , and the UC384x series is specified for operation from 0°C to 70°C .

Key Features

Optimized for Off-Line and DC-to-DC Converters

Low Start-Up Current (< 1 mA)

Automatic Feedforward Compensation

Pulse-by-Pulse Current Limiting

Enhanced Load-Response Characteristics

Undervoltage Lockout With Hysteresis

Double-Pulse Suppression

High-Current Totem-Pole Output

Internally Trimmed Bandgap Reference

Up to 500-kHz Operation

Error Amplifier With Low Output Resistance

Description

The UCx84x series of control integrated circuits provide the features that are necessary to implement off-line or DC-to-DC fixed-frequency current-mode control schemes, with a minimum number of external components. The internally implemented circuits include an undervoltage lockout (UVLO), featuring a start-up current of less than 1 mA, and a precision reference trimmed for accuracy at the error amplifier input. Other internal circuits include logic to ensure latched operation, a pulse-width modulation (PWM) comparator that also provides current-limit control, and a totem-pole output stage that is designed to source or sink high-peak current. The output stage, suitable for driving N-channel MOSFETs, is low when it is in the off state.

The UCx84x family offers a variety of package options, temperature range options, choice of maximum duty cycle, and choice of turnon and turnoff thresholds and hysteresis ranges. Devices with higher turnon or turnoff hysteresis are ideal choices for off-line power supplies, while the devices with a narrower hysteresis range are suited for DC-DC applications. The UC184x devices are specified for operation from -55°C to 125°C , the UC284x series is specified for operation from -40°C to 85°C , and the UC384x series is specified for operation from 0°C to 70°C .

Recommended For You

UCC28064ADR

Texas Instruments, Inc

SOP16

UC3637N

Texas Instruments, Inc

DIP-18

UCC27517DBVR

Texas Instruments, Inc

SOT23-5

UCC2946TPWRQ1

Texas Instruments, Inc

TSSOP8

UCC28730QDRQ1

Texas Instruments, Inc

SOP7

UCC21222QDRQ1

Texas Instruments, Inc

SOP16

UCD9090QRGZRQ1

Texas Instruments, Inc

VQFN-48

UCC27531QDBVRQ1

Texas Instruments, Inc

SOT23-6

UCC27511AQDBVRQ1

Texas Instruments, Inc

SOT23-6

UCC2803QDRQ1

Texas Instruments, Inc
SOP8

UCC28951QPWRQ1

Texas Instruments, Inc
TSSOP24

UCC21320QDWKRQ1

Texas Instruments, Inc
SOIC-14

UCC27322QDGNRQ1

Texas Instruments, Inc
HVSSOP-8

UCC28950QPWRQ1

Texas Instruments, Inc
TSSOP24

UCC2808AQDR-2Q1

Texas Instruments, Inc
SOP8