

uuci Emeup		
	Product No	Package
	SSC2001S	SOP8

# SSC2000 Series

# **Power Factor Correction (PFC) Controller IC** of Continuous Conduction Mode (CCM) type, for High Power-High Efficiency Applications

#### ■ General Descriptions

The SSC2000 series products are power factor correction (PFC) controller ICs of Continuous Conduction Mode (CCM). The product achieves high power CCM systems, with few external components and no multiplier by the average current control method.

#### Features

- Continuous Conduction Mode (CCM) The mode enables the low peak current recommended for high power supplies.
- Average Current Control Method The method requires no input line voltage sensing and no multiplier, and achieves simple systems with few external components.
- Pulse Width Modulation (PWM) + Frequency Modulation Function The function superposes the modulated frequency according to Duty value, on the internally fixed PWM frequency of 65 kHz(TYP).
- Maximum Duty Cycle : 94% (TYP)
- Built-in High Speed Response for Dynamic Load Changes
- Error Amplifier Reference Voltage : 3.5V (TYP)
- Brown-In / Brown-Out Function The function enables the oscillation start/stop by externally rated input voltage and makes protections at low input voltage.
- Various Protections

Overvoltage Protection (OVP)	Auto-Restart
V Underveltage Leekout (UVLO)	Auto Doctort

V <sub>CC</sub> Olider voltage Lockout (O	(LO) Auto-Restart
Overcurrent Protection (OCP)	Auto-Restart

Two Overcurrent Detection Thresholds : Input Current Limitation (OCPL)

Peak Current Limitation (OCPH)

Output Open Loop Detection (OLD)------ Auto-Restart

## ■ Applications

 Power Factor Correction Circuits for Middle to High Output Power Applications AC/DC Power Supplies,

Digital Consumer Equipments; Large Screen LCD-TVs, PDP-TVs, etc.,

OA Equipments; Computers, Severs, Monitors, etc.,

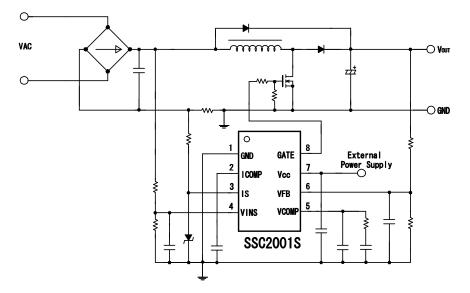
Communication Devices, Others



SOP-8

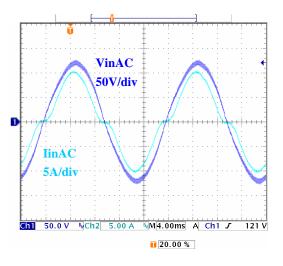


### **Typical Application Circuit**

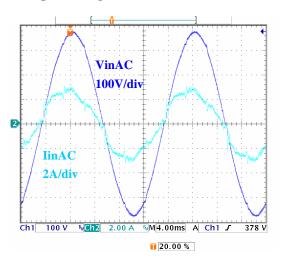


## **Typical Operation Waveforms** Output Power P<sub>OUT</sub> : 250W (380V, 0.66A)

#### **Input Voltage: 85VAC**



Input Voltage: 265VAC



Warning The contents in this document are subject to changes, for improvement and other purposes, without notice.

- Make sure that this is the latest version of the document before use.

  The operation and circuit examples in this document are provided for reference purposes only. Sanken assumes no liability for violation of industrial property, intellectual property, or other rights of Sanken or third parties, that stem from these examples. • The user must take responsibility for considering and determining which objects the products in this document are used with.
- Although Sanken will continue to improve the quality and reliability of its products, semiconductor products, by their nature, have certain fault and failure rates. The user must take responsibility for designing and checking to secure the device and system so that a part failure may not lead to human injury, fire, damages, or other losses. • The contents in this document must not be transcribed or copied without Sanken's written consent.

# SANKEN ELECTRIC CO.,LTD.