

# **High Efficiency Off-Line CC/CV Switch**

# **FEATURES**

- Constant-Current (CC) and Constant-Voltage (CV) with Primary Side Control
- Proprietary technology enabling high efficiency and fast dynamic response
- Satisfy DoE Level 6/CoC tier2 efficiency requirements
- No audible noise over entire operating range
- > Optimization for capacitive loading
- Built-in power NPN
- > Built-in Cable Compensation
- > Built-in Line Compensation
- Primary-side feedback eliminates opto-coupler and TL431
- > Cycle-by-Cycle Current Limiting
- > Over Temperature Protection
- > VCC Over Voltage Protection
- > CV Open-loop Protection
- Excellent capacitive loading start-up performance

# TYPICAL APPLICATION

- Adapter/Charger for Cell/Cordless Phones,
  PDAs, MP3 and Other Portable Apparatus
- Standby and Auxiliary Power Supplies
  Set Top Boxes (STB)
- > Adapter for ADSL / WiFi Wireless
- > AC/DC LED Driver applications

### DESCRIPTION

The FT8391Nxx controller device is optimized for high-performance, low power switching mode power supply applications. The FT8391NXX facilitates CC/CV charger design by eliminating an opto-coupler and TL431. Its highly integrated functions such as Under Voltage Lockout (UVLO), Leading Edge Blanking (LEB) and builtin cable compensation offer the users a high efficiency and low cost solution for AC/DC power applications.

Power supplies built with FT8391Nxx can achieve both highest average efficiency, fast dynamic load response and super low standby power. FT8391Nxx satisfy DoE Level 6/CoC tier2 efficiency requirements with production margin.

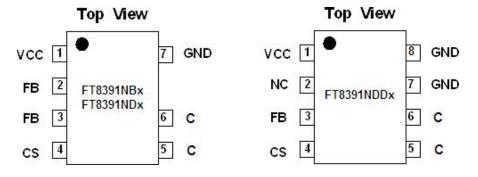
Furthermore, FT8391Nxx features fruitful protections like Open Circuit Protection and Over Temperature Protection to eliminate the external protection circuits and provide reliable operations.

FT8391NBx/NDx is available in SOP7 package. FT8391NDDx is available in DIP8 packag



# AC INPUT

# TYPICAL APPLICATION CIRCUIT AND PIN ASSIGNMENT



FT8391NBx FT8391NDx	FT8391 NDDx	Name	Description
1	1	VCC	Supply voltage
	2	NC	No connection
2/3	3	FB	Output voltage feedback pin
4	4	CS	Primary current sense
5/6	5/6	С	the Collector of the power NPN
7	7/8	GND	Ground