

# THV1021

## 2ch Buck, Boost and Inverting Controller

### General Description

THine's new 2ch Buck/Boost & Inverting controller enables simple & low cost multi-channel power supply system design. Ch-1 is selectable Buck/Boost controller, ch-2 is selectable Inverting / Buck converter.

All channels are PWM controllers and are designed to make phase compensation easy for output ceramic capacitors.

SS\_1,2, DTC\_1,2, and SCP pins help to design user defined soft start time, dead time and timer latch delay time. Utilizing those pins and P\_GOOD 1,2, the ensured sequence control can be easily set and linked to the external circuit.

This IC is suitable for power supply system of TFT LCD bias and for system board with multi-channel power supply.

### Features

- TSSOP 24Pin package
- Input Voltage range : 4.2 to 18.0V
- Push Pull output for direct Power Mos driving
- Optimized for Ceramic output capacitor
- Complete PWM mode controller
- Adjustable switching frequency 200kHz to 1MHz by external resistor
- Timer Latch Protection
- System UVLO Function
- Adjustable Soft Start time by external capacitor
- Adjustable Timer Latch Delay time by external capacitor
- Adjustable Dead Time Control by external resistor
- Ch1 is Buck/Boost controller
- Ch2 is Buck/Inverting controller

### Applications

- TFT LCD Bias voltage supply
- TV/monitor set
- General use

### Pin Assignment

