

Step-Down Switching Regulator IC with Power Saving PWM/PFM control

■ GENERAL DESCRIPTION

The **NJU7631** is a low voltage operation high-speed switching regulator control IC for step-down converter, with PWM/PFM switching control. It can improve a switching efficiency on light load with automatically changing between PWM and PFM controls. It incorporates a totem pole output, which can drive an external MOS-FET easily. The NJU7631 also has a soft-start function, dead time control and timer latch for short circuit protection and their times are all adjustable with external parts. It is available in a small and thin 8-lead MSOP (TVSP) package.

■ PACKAGE OUTLINE

■ FEATURES

- Automatic PWM/PFM Control
- Operating Voltage 2.2V to 8V
- Wide Oscillator Range 300kHz to 1MHz
- Maximum Duty Cycle 100%
- Quiescent Current 800 μ A typ.
- Soft-Start Function Internal : 16ms typ. or adjustable
- Dead Time Control
- Timer Latch for Short Circuit Protection
- C-MOS Technology
- Package Outline NJU7631RB1 : MSOP8 (TVSP8)*

*MEET JEDEC MO-187-DA/ THIN TYPE

■ PRODUCT VARIATION

■ PIN CONFIGURATION

PIN FUNCTION

1. OUT
2. V⁺
3. FB
4. IN