CPU 5-Bit Synchronous **Buck Controller**

The CS5159 is a 5 bit synchronous dual N Channel buck controller. It is designed to provide unprecedented transient response for today's demanding high density, high speed logic. The regulator operates using a proprietary control method, which allows a 100 ns response time to load transients. The CS5159 is designed to operate over a 4.25 16 V range (V_{CC}) using 12 V to power the IC and 5.0 V or 12V as the main supply for conversion.

The CS5159 is specifically designed to power Pentium processors and other high performance core logic. It includes the following features: on board, 5 bit DAC, short circuit protection, 1.0% output tolerance, V_{CC} monitor, and programmable Soft Start capability. The CS5159 is available in 16 pin surface mount.

Features

PIERSER OFFICER OFFICER Dual N Channel Design Excess of 1.0 MHz Operation 100 ns Transient Response 5 Bit DAC Backward Compatible with Adjustable CS5157 30 ns Gate Rise/Fall Times 1.0% DAC Accuracy 5.0 V & 12 V Operation Remote Sense Programmable Soft Start Lossless Short Circuit Protection V_{CC} Monitor