

# STMicroelectronics Unveils the World's First Vertical Deflection Booster for Slim CRT Displays

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STMicroelectronics, a world leader in vertical drivers for CRT (Cathode Ray Tube) displays, introduced today the world's first vertical-deflection booster for Slim CRTs. The STV8179F meets the need in large-size, reduced-depth CRT monitors for high output-current levels and flyback voltages, coupled with low heat dissipation.

The emerging concept of Slim CRT combines form-factor benefits of flat panels with all the inherent advantages of CRT technology, such as superb sharpness, bright colors, and outstanding contrast, at an attractive price. Slim tubes approximate the depth of LCD and Plasma TVs at about a third of the cost.

The vertical booster drives the vertical coil of the deflection yoke to scan the electron beam over the screen. This, in conjunction with horizontal deflection and beam modulation, creates viewable images. In Slim CRT displays, very high output currents are needed to drive the coil, as the beam swings over wider deflection angles, compared to conventional CRTs. The STV8179F provides a peak-to-peak current up to 3.6A in operating mode, which already meets the requirements for the large-size second-generation Slim CRT products, roadmapped for 2007.

The advanced design of the STV8179F also sustains high output flyback voltages, up to 100V, to allow short retrace times required in 2H and High-Definition TVs. The new vertical deflection booster utilizes ST's proprietary architecture based on 'external flyback,' which decreases the supply voltage - and thus reduces the dissipation rate in the IC - with no impact on the flyback voltage.

The STV8179F builds on the success of its market-proven predecessors, TDA8177F and STV9379FA, and, as a first-to-market product, it clearly demonstrates the Company's determination to invest in products supporting the latest CRT technologies.

Alongside traditional linear amplifiers (Class AB), ST also develops and markets a family of vertical deflection boosters with the advanced "Class D" mode of operation (based on Pulse Width Modulation). "Class D" boosters significantly reduce power dissipation in the integrated circuit, eliminating the need for heat sink.

STV8179F's Heptawatt package is pin-to-pin compatible with all ST's linear vertical boosters. First evaluation samples will be available in April 2005. Volume production is set to start in July 2005, with planned pricing in the range of \$ 0.90-0.99 per unit in quantities of 1,000 units.

STMicroelectronics sold 111 million vertical boosters for CRT

applications (monitors and TVs) in 2004, accounting for a market share of about 50% and a sequential year-over-year growth of 39%.

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