GreenChip Synchronous Rectifier Controller

TEA2093

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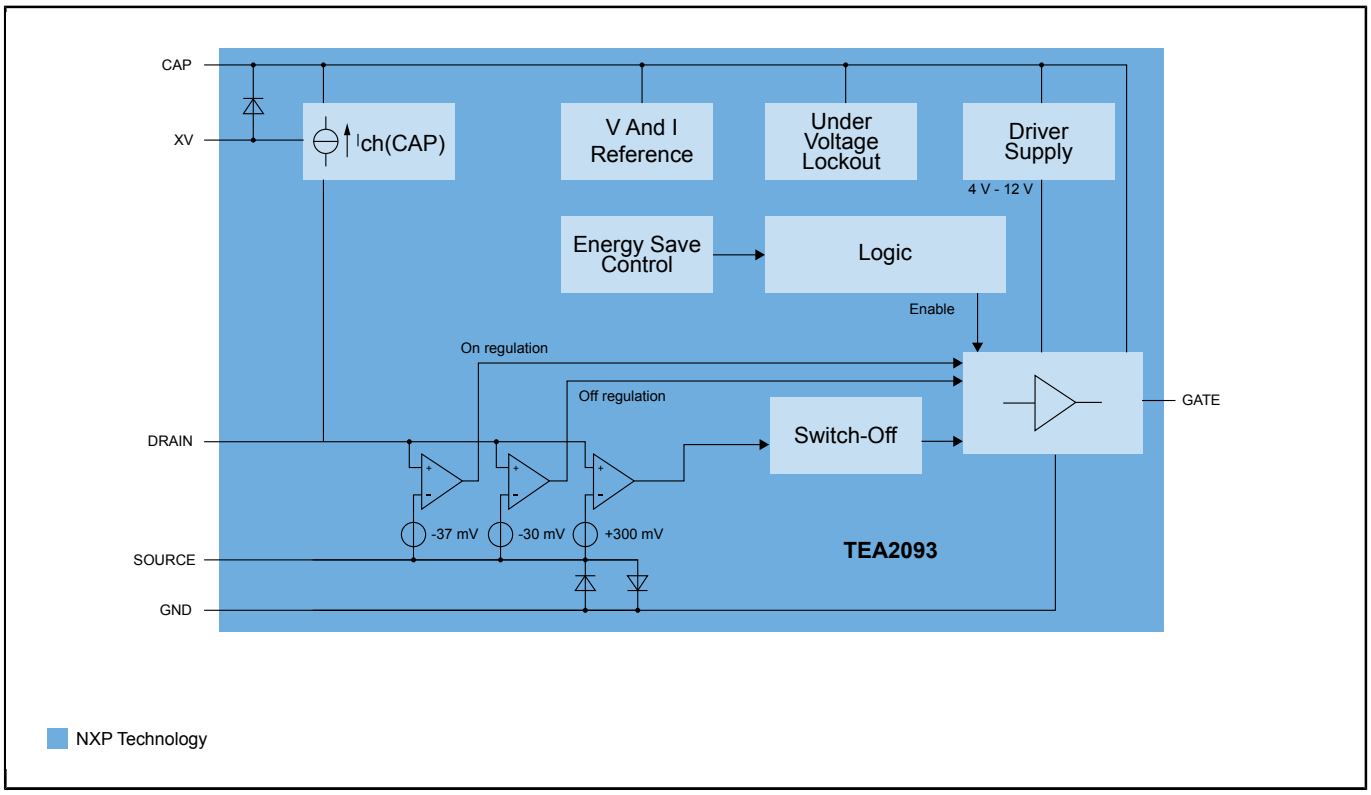
The TEA2093TS is a member of a new generation of synchronous rectifier (SR) controller ICs for switched-mode power supplies. It includes an adaptive gate drive for maximum efficiency at any load.

This device is a dedicated controller IC for synchronous rectification on the secondary side of asymmetrical half-bridge flyback and standard flyback converters. It incorporates the sensing stage and driver stage for driving the SR MOSFET, which is rectifying the output of the secondary transformer winding.

The TEA2093 can generate its own supply voltage for battery-charging applications with low-output voltage or for applications with high-side rectification. The TEA2093TS is fabricated in a silicon-on-insulator (SOI) process.

GreenChip Synchronous Rectifier Controller Block Diagram



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