



High-Voltage I2C Controlled Overvoltage Protection Load Switch

NX30P6093

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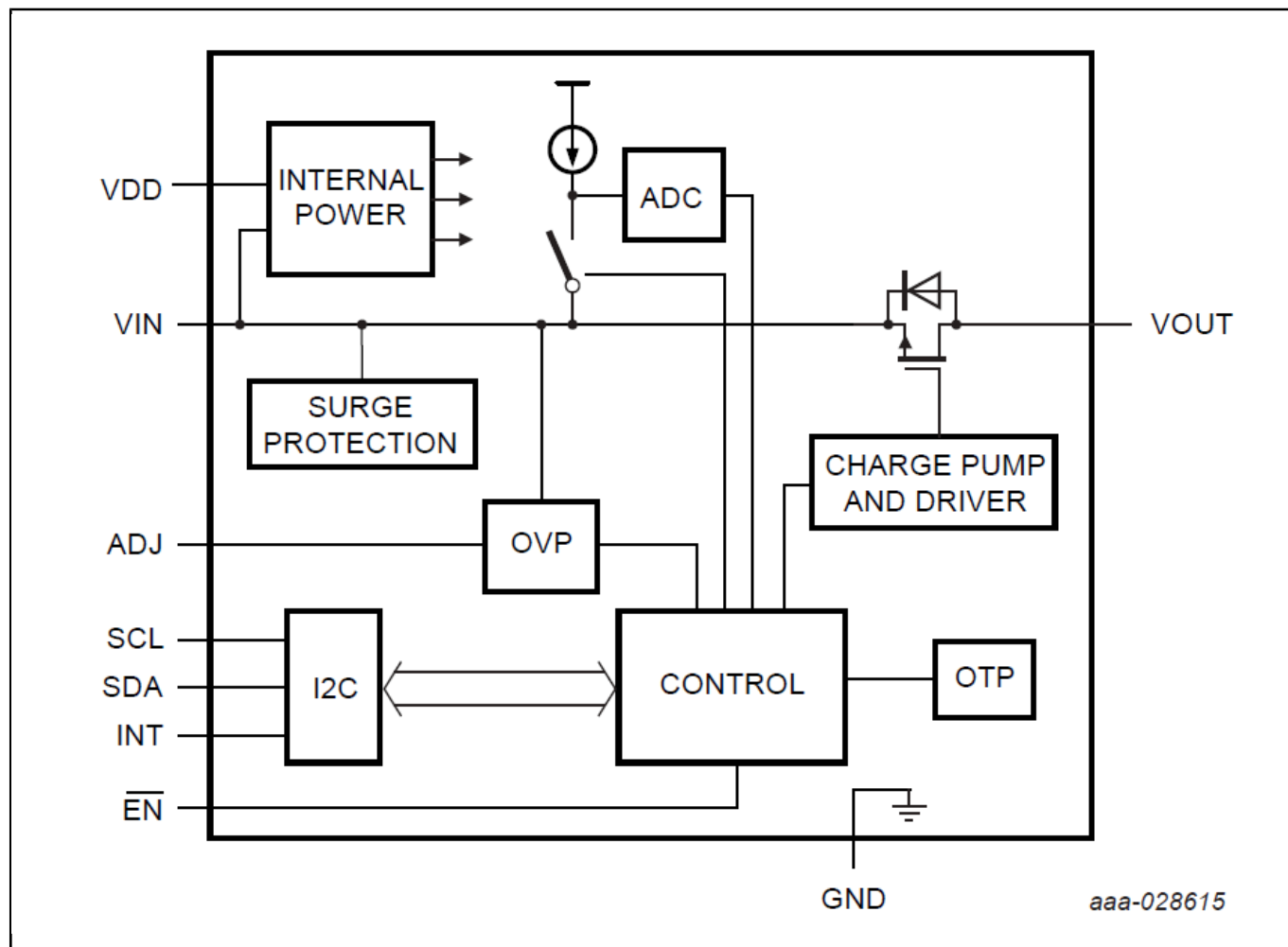
NX30P6093 is an 8 A I²C controlled overvoltage protection load switch for USB Type-C and PD applications. It includes under voltage lockout, overvoltage lockout, and overtemperature protection circuits, designed to automatically isolate the power switch terminals when a fault condition occurs. It features input pin impedance detection function, providing USB power supply pin status to the system to avoid short circuit damage for the Type-C port power supply pin.

NX30P6093 has a default overvoltage protection threshold, and the OVLO threshold can be adjusted by both external resistor divider on ADJ pin and an internal I²C register. A 22.5 ms debounce time is deployed every time before the device is switched ON, followed by a soft start to limit the inrush current.

Designed for operation from 2.8 V to 20.0 V, it can be used in USB Type-C and PD power control applications to offer essential protection and enhance system reliability.

NX30P6093 is offered in a small 20-bump 1.7 x 2.16 mm, 0.4 mm pitch WLCSP package.

NX30P6093 Block Diagram Block Diagram



View additional information for [High-Voltage I2C Controlled Overvoltage Protection Load Switch](#).

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