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NEWS RELEASE

Power Integrations Expands InnoSwitch4-CZ Integrated Switcher Family to 220 W

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New high-voltage GaN switches boost efficiency to 95 percent, yielding ultra-compact USB PD 3.1 adapters

SAN JOSE, Calif.--(BUSINESS WIRE)-- **Power Integrations** (NASDAQ: **POWI**), the leader in high-voltage integrated circuits (ICs) for energy-efficient power conversion, today announced an expanded offering of the **InnoSwitch™4-CZ** family of high-frequency, zero-voltage switching (ZVS) flyback controller ICs. When paired with Power Integrations' ClampZero™ active-clamp IC and, optionally, the recently announced HiperPFS™-5 GaN-based power-factor corrector, the new ICs easily address the latest USB PD 3.1 specification for adapters and chargers up to 220 W.

Power Integrations Expands InnoSwitch4-CZ Integrated Switcher Family to 220 W (Graphic: Business Wire)

"Road warriors demand light, compact, powerful adapters capable of rapidly charging all

their mission-critical devices. The expanded power range of the new InnoSwitch4-CZ and ClampZero ICs allows charger/adapter designers to easily exceed 23 W per cubic inch for single- and multiple-output USB PD 3.1 certified designs," explained Edward Ong, senior product marketing manager at Power Integrations. "Even at 220 W of output power, the family's high efficiency minimizes waste heat; bulky heatsinks are not required on any of the active devices. The maximum switching frequency of up to 140 kHz minimizes transformer size, and the high level of integration approximately halves the number of passive components, MOSFETs and diodes that make safety-compliant PCB layout a challenge."

InnoSwitch4-CZ ICs include a robust 750 V PowiGaN™ primary switch, active clamp drive and synchronous rectification in a compact InSOP™-24D package. Secondary-side sensing – achieved using Power Integrations' FluxLink™ high-speed communications technology – provides exceptional CV/CC accuracy.

Adds Ong: "The use of a non-complementary-mode active clamp enables designs that work in both continuous (CCM) and discontinuous (DCM) modes. By operating across modes, it is much easier to support the wide load/range conditions often encountered in USB PD applications."

InnoSwitch4-CZ ICs consume less than 30 mW at no-load, including input line voltage monitoring. The ICs feature a comprehensive suite of protection features, including auto-restart or latching fault response for output over- and under-voltage; multiple output under-voltage fault thresholds; and latching or hysteretic primary over-temperature protection.

Availability & Resources

A super compact 130 W, USB PD adaptor reference design (**DER-957**) is available for designers wishing to evaluate the InnoSwitch4-CZ flyback controller IC and ClampZero active clamp IC chipset. Devices are priced starting at \$3.07 for INN4072C-TL and \$0.66 for CPZ1061M-TLXXX in 1,000-unit quantities of the chipset. For further information, contact a Power Integrations sales representative or one of the company's authorized worldwide distributors: **Digi-Key**, **Farnell**, **Mouser** and **RS Components**, or visit **power.com**.

About Power Integrations

Power Integrations, Inc. is a leading innovator in semiconductor technologies for high-voltage power conversion. The company's products are key building blocks in the clean-power ecosystem, enabling the generation of renewable energy as well as the efficient transmission and consumption of power in applications ranging from milliwatts to megawatts. For more information, please visit **www.power.com**.

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