



Power ICs Article Archive (By Issue)

Power IC News Sponsored by Renesas

This document is a list of the power IC articles published in the How2Power Today newsletter. Products listed here include

- Power supply controllers
- Gate drivers
- Linear regulators
- Switching regulators and
- Point-of-load dc-dc converters
- Battery charger and battery management ICs
- ORing controllers
- LED drivers
- Wireless charging ICs

While most are monolithic semiconductor devices, some may be multi-chip modules or modules that copackage chips and magnetics or passives—the commonality is that all these products are housed in IC style packages. Integrated circuits using hybrid construction or open-frame PCB construction are generally not included here.

Products are listed here using the following format:

Issue date:

Article title, Part number/product name

[For more details...](#)(link to article)

For articles on discrete power semiconductors and modules, see the Discrete Power Semis and Modules Archive. For more on point of-load regulators and dc-dc converters, including hybrid and pc-board-based devices, see the Board-Mounted Power Converter Article Archive.

January 2021:

PMBus-Compliant Buck Regulators Deliver Up To 40 A In 5-mm x 7-mm Package, Vishay Siliconix SiC45x family of microBUCK regulators

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Automotive DC-DC Converters Offer Stable Output, Fast Response And High Efficiency, ROHM's BD9P series dc-dc converters

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February 2021:

Receiver IC Puts Wireless Charging Speeds On Par With 60-W Adapters, Renesas Electronics' P9418 60-W wireless power receiver IC

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24-V Dual-Channel Gate Driver For Large Power Switches, Infineon Technologies' 2ED24427N01F low-side gate driver with an integrated thermal pad

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March 2021:

Laser Driver IC Could Spur Burst Of Activity In Lidar Applications, Efficient Power Conversion's EPC21601 laser driver IC

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Smart Controller Combines Motion Control Engine With Three-Phase Gate Driver, Infineon Technologies' IMD110 iMOTION Smart Driver series

[For more details...](#)

Class-D Amp For High-Definition Audio Adds Safety-Related Diagnostics, STMicroelectronics' HFDA801A high-resolution audio amplifier

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NSREC Notes:

Space Power Components Answer Calls For Higher Performance, Lower Cost

- **Bringing Higher Reliability To Plastic Parts, Renesas's Intersil space plastic products including the ISL73033SEH low-side driver and 100-V GaN FET, the ISL71001SLH/SEHM 6-A synchronous buck regulator, the ISL71610SLHM digital isolator with passive input, and the ISL71710SLHM digital isolator with active input**

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- **A PWM Controller Fast Enough For GaN**, Apogee Semiconductor's AFP1422 radiation-hardened PWM controller
- **Smart Power Switch Controller Brings Greater Integration**, CAES's UT36/UT05PFD103 smart power switch controller
- **Higher Current And Wider Input Range For Point-Of-Load Converters**, Texas Instruments' TPS7H4001-SP space-grade 18-A buck converter and TPS7H4010-SEP space-enhanced plastic 3.5-V to 32-V, 6-A buck converter
[For more details...](#)

January 2020:

Photocouplers Shrink Designs For Industrial Automation And Solar Inverters, Renesas' RV1S92xxA and RV1S22xxA photocouplers

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PMIC Powers Application-Processor-Based Systems, STMicroelectronics' STPMIC1 power-management IC

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February 2020:

Highly Robust Gate Drivers Achieve AEC-Q100 Automotive Qualification, Power Integrations' SID1181KQ SCALE-iDriver gate driver

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PMIC For Automotive Surround View Camera Systems, Renesas Electronics' ISL78083 automotive camera PMIC

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Rad Hard Regulator Integrates Synchronous Buck And LDO For Satellites, Renesas Electronics' ISL70005SEH synchronous buck and low dropout regulator

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March 2020:

40-A Buck Converter IC Is Stackable Up to 160 A, Texas Instruments' TPS546D24A 40-A buck converter

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April 2020:

What We Missed At APEC: Silicon Carbide Marches On And Other Power Product News, Power Integrations' PowiGaN, SiC SCALE iDriver gate driver, BRD 1167/1267 bridge switch motor driver ICs; Rohm Semiconductor's BM6112 isolated gate driver; Infineon Technologies' IR3887M, IR3888M and IR3889M OptiMOS iPOL regulators with Fast COT; the FOD8334, NCD57000 and NCP51530 gate drivers; Texas Instruments' TPS546D24A 40-A stackable buck converter, the TPSM53604 36-V input, 4-A output buck power module, the UCC12050/40 500-mW isolated dc-dc power supply; Efficient Power Conversion's EPC2152 80-V, 12.5-A power stage IC (driver plus eGaN FET half-bridge).

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Low-Cost ICs Provide Advanced Velocity Control Of Servo Motors, Performance Motion Devices' Juno Velocity Control ICs

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Synchronous-Rectification Controller Cuts BOM Costs For Power Adapters, STMicroelectronics' SRK1001 secondary-side synchronous-rectification controller

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May 2020:

GaN Power Switch Increases Output Of Display PSUs To 75 W, Power Integrations' InnoSwitch3-MX isolated switcher IC family

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PMIC Cuts Solution Size, Extends Battery Life For Wearables And Hearables, Maxim Integrated Products' MAX77654 power management IC

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ACF Controllers Push Power Adapters To Higher Efficiency Using Silicon Only, Silanna Semiconductor's SZ1110 and SZ1130 active-clamp flyback controllers

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Flexible And Rugged Controller Simplifies Power For Smart Devices, STMicroelectronics' VIPer222 controller for high-voltage converters

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June 2020:

Automotive LED Driver Ensures Stable Lighting During Battery Voltage Drops, ROHM Semiconductor's BD18336NUF-M LED driver IC

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Thermally Efficient PFC Controller IC Enables 100-W Adapters With No Heatsinks, Power Integrations' HiperPFS-4 ICs

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Outer Loop Control ICs For Brushless DC And DC Brush Motors, Performance Motion Devices' Juno Outer Loop Control ICs

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July 2020:

Voltage Regulator ICs Take Monolithic Integration to Another Level, Empower Semiconductor's EP70xx Integrated Voltage Regulators

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Configurable Mixed-Signal IC Adds High-Voltage Capability For Driving Motors, Dialog Semiconductor's SLG47105 HV PAK IC

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100-V Half-Bridge MOSFET Drivers Offer Ruggedness And High Performance, Renesas Electronics' HIP2211 and HIP2210 half-bridge MOSFET drivers

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Switcher IC Powers EV Subsystems Directly From 400-Vdc Bus, Power Integrations' AEC-Q100-qualified version of its LinkSwitch-TN2 switcher IC

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SiC-Based Three-Phase Driver Module Delivers 80 A Peak, Is Fully Integrated, Apex Microtechnology's SA310 three-phase driver

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Dual-Channel Buck Converters Feature Low EMI And Stackable Outputs, Analog Devices' LT8650S, LT8652S and LT8653S Silent Switcher converter ICs

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August 2020:

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Switcher IC Eases Operation From High-Voltage EV Batteries, Power Integrations' InnoSwitch3-AQ flyback switcher IC

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Versatile LED Driver Powers A Host of Automotive Applications, Taiwan Semiconductor's TS19501 dimmable LED driver

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High-Speed Current Sensor With High Accuracy Supports Faster Switching Frequencies, Allegro MicroSystems' ACS37002 Hall-effect current sensor

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Buck-Boost Chargers Deliver Greater Power Density For USB And Wireless Dual-Input Charging, Texas Instruments' BQ25790 and BQ25792 buck-boost battery charger ICs

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Interleaved PFC Digital Power Controller Features Mechanical Inrush Control, STMicroelectronics' STNRGPF02 two-channel interleaved PFC controller

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September 2020:

Kit Speeds Design Of Rad Hard Power ICs And Other Mixed-Signal Chips, Apogee Semiconductor's TalRad Process Design Kit

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Highly Integrated Automotive-Grade Buck Converters Power In-Cabin Electronics, Dialog Semiconductor's DA913X-A dc-dc converters

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CMOS LED ICs Replace Legacy Bipolar Drivers, Taiwan Semiconductor's TSCR4 linear CMOS LED driver ICs

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October 2020:

Efficient GaN-Powered LED Drivers Target Smart-Lighting Designs, Power Integrations' LYT6078C LED driver IC

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Buck-Boost Converter With Ultra-Low Quiescent Current Powers Sensors And Other Devices, Renesas Electronics' ISL9122A buck-boost regulator

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Devices Copackage Silicon Half-Bridge Driver And 650-V GaN Transistors, STMicroelectronics' MasterGaN1 GaN half bridge with integrated drivers

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November 2020:

Power IC Shrinks Input Bulk Capacitor, Reduces Inrush Current, Power Integrations' MinE-CAP power IC

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Isolated IGBT/SiC MOSFET Gate Driver Benefits HEV/EV Applications, Texas Instruments' UCC5870-Q1 IGBT/SiC MOSFET gate driver

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80-V DC-DC Controllers Provide Extra Voltage Margin For Data Center, Telecom Applications, Renesas Electronics' ISL81801 and ISL81802 dc-dc controllers

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Automotive GaN FET Includes Driver, Protection And Active Power Management, Texas Instruments' LMG3522R030-Q1, LMG3525R030-Q1, LMG3422R050, LMG3425R050, LMG3422R030 and LMG3425R030 600-V and 650-V GaN FETs with integrated driver, protection and temperature reporting

[For more details...](#)

Modules Protect 5-V And Lower Designs From Overvoltage, Advanced Linear Devices' SABMBOVP family of overvoltage protection PCBs

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Automotive Gate Drivers Target 48-V Battery Systems, Allegro MicroSystems' AMT49100, AMT49101, AMT49502, A89503 and the A89500 three-phase and half-bridge gate drivers

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December 2020:

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Automotive-Qualified High-Side Switch ICs With User-Definable Protection, ROHM's V2HD045EFU-C, BV2HC045EFU-C and BV2HD070EFU-C two-channel high-side switch ICs

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Buck Regulators Deliver High Efficiency, Small Size For USB-PD Applications, Silanna Semiconductor's SZPL3102A/3103A dc-dc converters

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Low-Noise Buck Converters With Ferrite-Bead Compensation Eliminate LDOs, Texas Instruments' TPS62912 and TPS62913 switching regulators

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LED Drivers Come In DFN With Side-Wettable Flanks, Nexperia's NCR32xPAS/NCR42xPAS LED driver ICs

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January 2019:

Receiver Chip Enables Wireless Charging In Smaller Devices, Energous' DA2223 four-port RF-to-dc wireless power chip

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Energy-Harvesting Embedded Controller May Eliminate Batteries In IoT Devices, Renesas' R7F0E embedded controller

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February 2019:

Buck Regulators Deliver Compact Solutions For Powering Next-Gen Chipsets, Alpha and Omega Semiconductor's AOZ2367QI and AOZ2368QI EZBuck regulators

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March 2019:

SiC-MOSFET Gate Driver Improves Efficiency And Safety, Power Integrations' SIC1182K SCALE-iDriver SiC-MOSFET gate driver

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PMIC Supports Thermal Energy Harvesting With Low-Voltage Startup, e-peas' AEM20940 power management IC

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April 2019:

6-A Buck Converter Achieves Tiny Size, High Efficiency Using Novel Architecture, Murata Manufacturing's MYMGA1R86RELC2RA dc-dc converter
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Gate Driver Uses AI To Bring Soft Switching Benefits To Inverters, Pre-Switch's 3-phase gate-drive solution
[For more details...](#)

Chipset Makes Flybacks More Efficient In Powering Displays, Power Integrations' InnoMux chipset
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Regulator Uses Less Power, Fewer Parts Than Conventional Cap-Drop Designs, Texas Instruments' TPS7A78 ac-dc linear regulator
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PMBus Power Modules Deliver High Power Density For FPGAs, DSPs, ASICs And Memory, Renesas Electronics' ISL8280M and ISL8282M hybrid digital dc-dc PMBus power modules
[For more details...](#)

1000-A Voltage Regulator Solution For Next-Gen AI And 5G Networking, Infineon Technologies' XDPE132G5C digital PWM multiphase controller and TDA21475 70-A power stage
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Regulated LED Driver For Automotive Applications, Taiwan Semiconductor's TSCR421 low-side constant-current regulator
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Isolated ICs Ensure Precise Current And Voltage Measurements, Silicon Labs' Si89xx family of isolated analog amplifiers, voltage sensors and delta-sigma modulator devices
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May 2019:

AC-DC Converter ICs Add Built-In 1700-V SiC MOSFET For More Compact Designs, ROHM Semiconductor's BM2SCQ12xT-LBZ series ac-dc converter ICs
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Rad-Tolerant PWM Controller And GaN FET Driver Come In Plastic Packages For SmallSats, Renesas Electronics' ISL71043M PWM controller and ISL71040M GaN FET driver [For more details...](#)

Fully Integrated Active Clamp Flyback Controller Extends Benefits To 60-W AC Adapters, Silanna Semiconductor's SZ1105 active-clamp flyback controller [For more details...](#)

Isolated Gate Drivers Integrate Sensing For IGBTs And SiC MOSFETs, Texas Instruments' UCC21710-Q1, UCC21732-Q1 and UCC21750 isolated gate drivers [For more details...](#)

June 2019:

Programmable Multi-Channel LDO Packs High PSRR And Low Noise For Powering Smart Phone Cameras, Dialog Semiconductor's SLG51000 configurable mixed-signal integrated circuit [For more details...](#)

Smart Class D Amplifier Delivers Louder, Richer Sound From Micro Speakers, Maxim Integrated Products' MAX98390 smart amplifier [For more details...](#)

Six-Channel Controller Improves Precision And Performance For Stepper Motors, TRINAMIC Motion Control's TMC6214 motor controller and driver module [For more details...](#)

July 2019:

80-V Buck LED Drivers Perform Highly Accurate Dimming, Infineon Technologies' ILD8150/E LED driver ICs [For more details...](#)

Switching Regulator Operates With Input Up To 61 V, STMicroelectronics' A7987 automotive switching regulator [For more details...](#)

August 2019:

Offline Switcher ICs Adopt GaN For Higher Power Output And Efficiency, Power Integrations' INN3X79C and INN3X70C offline switcher ICs

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15-Mbps Photocouplers Withstand Harsh Industrial Applications, Renesas' RV1S9x60A photocouplers

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Regulator's Low Quiescent Current Extends Battery Life For IoT Devices, Texas Instruments' TPS62840 synchronous stepdown converter

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Configurable Mixed-Signal ICs Are Now Available For Automotive Applications, Dialog Semiconductor's SLG46620-A Configurable Mixed-Signal IC

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September 2019:

Battery Management IC Maximizes Cell Life And Driving Range For Hybrids And EVs, Renesas Electronics' ISL78714 Li-ion battery management IC

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Buck-Boost Converter Extends Battery Life For IoT, Wearable, And Portable Devices, ROHM's BD83070GWL synchronous buck-boost converter IC

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X-Capacitor Discharge ICs Enable Faster Discharge, Power Integrations' CAPZero-3 X-capacitor discharge ICs

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Charger's Low Termination Current Increases Battery Capacity, Texas Instruments' BQ25619 switching battery charger IC

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ICs Simplify USB Type-C Power Delivery, Enable HostFlexing And PDBalancing, Microchip Technology's USB705x SmartHub devices with support for power delivery and UPD301A USB type-C PD controller

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Power Amplifier IC Delivers High Voltage And High Current, Apex Microtechnology's PA164 high-voltage operational amplifier

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October 2019:

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Backlight LED Driver Is Compatible With 3- To 12-in. Vehicle LCD Panels,
ROHM Semiconductor's BD81A76EFV-M LED driver IC

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Silent Motor Controller Enables Battery-Powered Stepper Motors To Run in Stealth Mode, TRINAMIC's TMC2300 motor driver IC

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POLs Increase Efficiency For Server, Networking And Telecom Applications,
Infineon Technologies' OptiMOS IR3826(A)M integrated point-of-load regulators

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Tiny LDO Cuts Quiescent Current To <25 nA, Texas Instruments' TPS7A02 low-power low-dropout regulator

[For more details...](#)

November 2019:

PoE Products Ease Powering Of Pre-standard And 802.3bt-2018-Compliant PDs, Microchip Technology's IEEE 802.3bt-2018-compliant PoE injectors and midspans and power sourcing equipment (PSE) chipsets including the PD69208M, PD69204T4 and PD69208T4 PSE managers and PD69210 PoE controller

[For more details...](#)

LED Drivers Support Dynamic Automotive Lighting From Front To Rear, Texas Instruments' TPS92520-Q1, TPS92682-Q1 and TPS929120-Q1 LED drivers

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January 2018:

Dual-Mode Battery Charge ICs Enable Simultaneous USB PD And Wireless Charging, ROHM's BD99954GW/MWV dual-input boost-buck charging ICs

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February 2018:

Rad-Hard GaN Devices Propel Space Power Supplies To Higher Performance, Renesas Electronics' ISL7002xSEH GaN FETs and ISL70040SEH GaN FET driver

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Fully Integrated Regulators Have PMBUS, SVID And PVID Functionality,
Infineon Technologies' IR38x63/5 integrated point-of-load regulators

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Buck Regulator Delivers High Current With High Power Density For 24-V Inputs,
Vicor's PI3325-00-LGIZ Cool-Power ZVS buck regulator

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March 2018:

Dynamically Configurable Offline Switcher IC Supports USB PD 3.0 + PPS,
Power Integrations' InnoSwitch3-Pro configurable flyback switcher ICs

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DC-DC Converter Runs Up To 10 Years On Coin-Cell Battery,
ROHM Semiconductor's BD70522GUL dc-dc converter IC

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GaN Power ICs Make Adapters Smaller, Support Fast Charging,
Navitas Semiconductor's 27-W and 65-W USB-PD reference designs

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Feature Rich PoE Chips Power IP Cameras And Other IoT Applications,
Silicon Labs' Si3406x and Si3404 PoE powered device ICs

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April 2018:

4-V to 42-V Input Buck Regulators Occupy 2.6-mm x 3.0-mm Footprint,
Maxim Integrated Products' MAXM17532 and MAXM15462 dc-dc power modules

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PWM Controller-MOSFETs Combo Enables Robust SMPS Designs Up To 43 W,
Infineon Technologies' CoolSET

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Stepup Power Module Supports 48-V GPUs In Legacy 12-V Data Centers,
Vicor's 2317 NBM power module

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LDO Packs High Performance In Tiny Footprint,
STMicroelectronics' STLQ020 low-dropout voltage regulator

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May 2018:

Power Supply ICs Are Honed For High-Fidelity Audio, ROHM Semiconductor's BD372xx series linear regulators

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PMICs Boast Better Efficiency And Solution Size For Powering Processors, Renesas Electronics' ISL91302B, ISL91301A and ISL91301B power management ICs

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USB Type-C Data Line Protection IC Responds To Overvoltages In 15 ns, Kinetic Technologies' KTU1101 USB type-C port protector

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400-V Linear Regulators Deliver Constant LED Current In Compact Packages, Diodes' AL5890 linear constant-current regulator

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"Deep Sleep" Load Switch Prevents Battery Discharge During Product Shipment, GLF Integrated Power's GLF76321 IQSmart load switch IC

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June 2018:

LDOs Boast 98-dB PSRR, Benefitting Imaging And Wireless Applications, ON Semiconductor's NCP16x and NCV816x series LDOs

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Bidirectional Bus Converters Deliver 750 W For Data Center, Automotive Apps, Vicor's 2317 NBM, a bidirectional nonisolated fixed-ratio converter

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July 2018:

Dual-Core Digital Signal Controller Eases Code Development By Separate Design Teams, Microchip Technology's dsPIC33CH digital signal controller

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Gate Driver Core Is Optimized For SiC MOSFET Modules, AgileSwitch's ASC1 SiC MOSFET gate driver core

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August 2018:

EMI-Compliant Buck Converters Speed Time To Market, Maxim Integrated Products' CISPR 22- and EN 55022-compliant Himalaya stepdown converters and power modules

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Resonant Controller With PFC Targets Power Supplies And LED Drivers, Infineon Technologies' ICL5102 resonant controller IC

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September 2018:

Half-Bridge Gate Driver IC Enhances Reliable Start-Up Operation, Infineon Technologies' IRS2007S 200-V half-bridge gate-driver IC

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PMICs Power Next-Generation Mobile Consumer Applications, Maxim Integrated Products' MAX77714 and MAX77752 power-management ICs

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Power Monitoring IC Measures AC And DC Power With High Accuracy, Microchip Technology's MCP39F511A dual-mode power monitoring IC

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48-V Input Buck Regulators Offer BGA Option, Vicor's PI354x-00-BGIZ Cool-Power ZVS buck regulator

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October 2018:

Half H-Bridge Module Combines SiC MOSFETs with Integrated Gate Drive, Apex Microtechnology's SA110 SiC half H-bridge module

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Buck Converters Support Sensors And Cameras For Assisted Driving, ROHM Semiconductor's BD9S series automotive synchronous buck converters

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Buck-Boost Controllers Deliver True Bidirectional Power Conversion For Industrial Battery-Powered Applications, Renesas Electronics' ISL81601 and ISL81401 bidirectional four-switch synchronous buck-boost controllers

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Smart Switch Supports Fuel Savings In Automotive Power Trains, Infineon Technology's TLE9104SH smart quad-channel powertrain switch

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USB Type-C And USB Power Delivery Controllers Have Fully Integrated Power Paths, Texas Instruments' TPS65987D and TPS65988 USB Type-C and USB PD controllers

[For more details...](#)

Digital Signal Controller Accelerates DSP Performance for Time-Critical Control Applications, Microchip Technology's dsPIC33CK digital signal controllers

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November 2018:

600-V GaN FET Power Stages Boost Performance For Applications Up To 10 kW, Texas Instruments' LMG34x family of 600-V GaN power stages

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Automotive Buck-Boost Chipset Meets Demands Of Start-Stop Vehicle Systems, Rohm's BD8P250MUF-C + BD90302NUF-C buck-boost chipset

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Rad Hard Current Sources For Sensing Subsystems In Satellites, Renesas Electronics' ISL70591SEH and ISL70592SEH rad hard current sources

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Flyback Switcher ICs Bring High Efficiency To Three-Phase 480-V Industrial Applications, Power Integrations' LinkSwitch-XT2 offline switcher ICs

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LDO's Miserly Iq Prolongs Battery Life While 1-mm² Footprint Saves Space, Microchip Technology's MCP1811 linear low dropout regulator (LDO)

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BLDC Motor Driver Eliminates Heatsinks, Slashes Certification Time For Appliance Designs, Power Integrations' BridgeSwitch half-bridge motor driver IC family [For more details...](#)

Buck/Boost Regulator Simplifies Power Backup Using Supercaps, Maxim Integrated's MAX38888 reversible buck/boost regulator [For more details...](#)

Half-Bridge Drivers Enhance Design Of 12-V to 48-V Automotive Hybrid Powertrains, Renesas Electronics' ISL784x4 100-V half-bridge drivers [For more details...](#)

Isolated High-Side Power Switch Offers SPI And Many Other Features, STMicroelectronics' ISO8200AQ isolated octal high-side smart power switch [For more details...](#)

ORing FET Controller Protects Automotive Electrical Systems, Maxim Integrated's MAX16141 36-V ORing FET controller [For more details...](#)

January 2017:

Power IC Model Library For PSpice Adds Automotive Test, From EMA Design Automation, ver.4.2 of AEi Systems' Power IC Model Library [For more details...](#)

February 2017:

GaN Power ICs Enter The Market, Navitas Semiconductor's NV6131, NV6105 and NV6115 iDrive Gallium Nitride power ICs [For more details...](#)

Battery Charger Extends Backup Battery Life In Automotive eCall Systems, Intersil's ISL78693 3.6-V battery charger IC [For more details...](#)

Motor Driver IC Requires Only Four External Components, Allegro MicroSystems Europe's A3916 motor driver IC [For more details...](#)

Intelligent Power Modules Offer More Packages, More Features For Appliances, STMicroelectronics' SLLIMM nano series of Intelligent Power Modules for motor drives

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March 2017:

Inductorless Converter Delivers 10 A With Over 98% Efficiency, Dialog Semiconductor's DA9313 switched-capacitor dc-dc converter

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48-V Buck Regulator Delivers 20 A In Less Than 740-mm² Footprint, Vicor's PI3525-00-LGIZ 48-V Cool-Power ZVS buck regulator

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Buck-Boost Controller Is Tailored To Dual Automotive Battery Systems, Texas Instruments' LM5170-Q1 multiphase bidirectional dc-dc current controller.

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Power IC Combines Fifth-Gen Flyback Controller With Latest MOSFETs, Infineon Technologies's Gen5 CoolSET power ICs

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May 2017:

Buck Converter Optimizes DC Fan Motor Control For Refrigerators, Rohm's BD9227F buck converter for dc fan motors

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100-V Power Stage Module Satisfies Cloud Infrastructure Requirements, ON Semiconductor's FDMF8811 100-V bridge power stage module

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10-A Power Modules Provide Complete Stepdown Solutions In Tiny Footprints, Texas Instruments' TPSM84A21 and TPSM84A22 stepdown power modules

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PMIC Increases Power Efficiency For Digital SLR Cameras, Dialog Semiconductor's DA6102 integrated power management IC

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LED Driver ICs Combine High Efficiency, Small Size, *Peregrine Semiconductor's ARC3C family of LED driver ICs*

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June 2017:

A New Power Management Tool For Portable Product Designers, *Silego Technology's SLG46580 GreenPAK programmable mixed-signal IC*

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Power Management IC Is 91% Efficient, *Reduces Space Needs 40%, Intersil's ISL91211 PMIC*

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Stepdown Converters Cut Power Dissipation And Size For Industrial Applications, *Maxim Integrated's MAX17572 and MAX17574 Himalaya synchronous stepdown dc-dc converters*

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Synchronous Rectifier Controller Eases Power System Design, *ON Semiconductor's FAN6248 synchronous rectifier controller for LLC resonant converters*

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July 2017:

GaN Power ICs Enable Smallest Power Adapters For Ultra-Thin TVs And Laptops, *Navitas Semiconductor's 150-W ac-dc reference design using GaN power ICs*

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August 2017:

PMICs Increase Battery Life In "Hearables", *Maxim Integrated's MAX77650/MAX77651 power management ICs (PMICs)*

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Smart Gate Driver Photocoupler Features Improved Desaturation Sensing, *Toshiba America Electronic Components' TLP5214A smart gate driver photocoupler*

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September 2017:

Offline Flyback Switcher ICs Deliver 94% Efficiency Over Line And Load, Power Integrations' InnoSwitch3 family of offline flyback switcher ICs

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October 2017:

Power Amplifier ICs Deliver High Voltage, High Output Current In Compact Package, Apex Microtechnology's PA164 and PA165 power amplifiers

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Buck Converter IC Delivers Extreme Voltage Stepdown For Mild Hybrid Vehicles, ROHM Semiconductor's BD9V100MUF-C dc-dc converter IC

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IC Boosts Power Measurement Accuracy In Windows 10 Devices, Microchip Technology's PAC1934 power and energy monitoring chip

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40-A Buck Converter Chip Features Novel Control Topology, Texas Instruments' TPS543C20 synchronous buck converter IC

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November 2017:

Power ICs Offer Many Options For Expanded Power Delivery Via USB Type C

- *USB-C Buck-Boost Regulator Enables Bidirectional Voltage Regulation For Tablets, Ultrabooks And Power Banks, Intersil's ISL95338 USB-C buck-boost regulator*
- *Reference Design Simplifies Development Of USB Type-C Rechargeable Battery Packs, Silicon Labs' USB type-C rechargeable battery pack reference design*
- *Buck-Boost Battery Charge Controllers Maximize Input Power For 1S To 4S Applications, Texas Instruments' bq25703A and bq25700A synchronous charge controllers*
- *Eval Boards Ease Development Of USB PD Applications From Mobile To 100 W, Rohm's USB power delivery (USBPD) compatible transmitter/receiver evaluation boards*

Power ICs Article Archive (By Issue)

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- *Robust USB Type-C Controllers With Internal Protection Save Space And Enhance Safety, STMicroelectronics' STUSB4710 and STUSB1602 USB Type-C-certified port-controller ICs*
- *USB-PD Interface IC Is Optimized For Power Supplies, Dialog Semiconductor's iW656 state-machine-based USB Power Delivery interface IC*
- *Power Converter ICs Complete Smartphone Direct Charging Solution, Dialog Semiconductor's DA9318 series of power converter ICs (can be combined with the iW656 listed above)*
- *18-W USB PD Reference Design Delivers High Efficiency And Compact Footprint, Power Integrations' DER-567 USB PD compliant, ac-dc power converter reference design*
- *Complete USB Type-C Solutions For Rapid Charging And High-Speed Data Transfer, ON Semiconductor's portfolio of solutions for the implementation of USB type-C applications includes intelligent charge controllers, port control ICs, data multiplexers, integrated re-drivers, high voltage protection switches, and ESD protection components*
- *USB-C Buck-Boost Battery Chargers Add 5-V To 20-V Reverse Boost For USB On-The-Go Charging, Intersil's ISL9238 and ISL9238A single-chip battery chargers*
- *USB-C Buck-Boost Battery Charger Reduces BOM Costs, Intersil's single-chip ISL9237 Narrow VDC battery charger*

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Power Supply Sequencers Are Rad Hard, Intersil's ISL70321SEH and ISL73321SEH quad power supply sequencers

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Digital POL Generates Five Outputs In Compact, Infineon Technologies' IRPS5401 digital point-of-load regulator

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Chip Enables Faster Wireless Charging Of Smartphones And Tablets, STMicroelectronics' STWBC-EP wireless-charging controllers

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December 2017:

5-A Peak-Current Gate Drivers Reduce System Complexity And Cost, Power Integrations' SID1102K gate driver IC

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Power ICs Article Archive (By Issue)

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Nanopower PMICs Extend Battery Life For IoT Products, Dialog Semiconductor's DA9230 and DA9231 nanopower PMICs

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January 2016:

16-Cell Li-ion Monitor Eases Battery Management For Hybrids, EVs And Grid Storage, Texas Instruments' bq76PL455A-Q1 battery monitor and protector

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Monolithic Sync Buck Regulator Operates Efficiently Up to 18 V, Alpha and Omega Semiconductor's AOZ3101 synchronous buck regulator.

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Tiny Low-Side Drivers Ease Power System Design, Infineon Technologies' IR44252L, IR44272L, and IR44273L low-side drivers

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February 2016:

Power Management ICs Are Optimized For Intel's Skylake Core Processor, Rohm's BD99991GW and BD99992GW power management ICs

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Reference Design For Medium-Power Wireless Power Receiver Is Qi-Certified, Reference design using the BD57015GW wireless power receiver IC

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March 2016:

Isolated Gate Drivers Offer High Noise Immunity, Enabling Fast Switching, Silicon Labs' Si827x ISOdriver family of isolated gate drivers

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Highly Integrated Multi-Phase Boost Controllers Simplify Automotive Designs, Intersil's ISL78227 and ISL78229 two-phase synchronous boost controllers

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Controllers Feature Ultra-Stable On-Resistance For Power Rail Switching, Silego Technology's SLG59H100xV integrated power controllers

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April 2016:

GaN Power ICs Integrate Power FET With Gate Drive And Logic, Navitas Semiconductor's 650-V GaN Power ICs

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June 2016:

POL Modules Offer High Density For Battery-Powered Industrial Applications, Intersil's ISL8205M and ISL8202M stepdown power modules

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January 2015:

15-W Qi-compliant Wireless Charging Solution Charges Larger Devices Faster, Freescale Semiconductor's WPR1516 and MWCT1012 wireless charging chips

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February 2015:

Digital Controllers Support VR12/12.5 And PMBus, Powervation's PV3103, PV3104, and PV3202 digital dc-dc controllers

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March 2015:

GaN FETs + Driver Module Lowers Barriers To GaN-Based Power Design, Texas Instruments' LMG5200 integrated half-bridge GaN FET power-stage

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200-mA Linear Regulator Pushes Operating Temperature To 175°C, CISSOID's CMT-ANTARES 5-V linear regulator

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April 2015:

Top Five Products And Demos Seen at APEC 2015

- Altera's Enpirion EM1130A 30-A Point-Of-Load Converter

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- *Intersil's ISL8272M 50-A Point-Of-Load Converter*

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May 2015:

Power Op Amp Improves Circuit Protection, Lowers Quiescent Current For Piezo Transducers, Apex Microtechnology's MP118FD power operational amplifier

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DSCs Offer Lower Latency, Live Update And More For Digital Power Supply Designs, Microchip Technology's dsPIC33EP "GS" family of digital signal controllers

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June 2015:

Controllers Simplify Digital Power Conversion And Enhance Performance, STMicroelectronics' STNRG digital-controller family

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IC Speeds Charging Of Li-ion Batteries, Texas Instruments' bq2589x single-cell Li-on charger

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July 2015:

New Type Of Power Module Offers Greater Integration, Path To Cost Reduction, Maxim Integrated's Himalaya power modules

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Hermetically Sealed Linear Regulators Offer Dramatically Lower Cost And A Range Of Grades, Datel's LVR-7815 linear voltage regulators

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700-V Gate Driver ICs Increase System Reliability And Shrink Board Space, Infineon Technologies' IR7xxxS series of 700-V HVICs

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August 2015:

Integrated Power Switch Features Reverse-Current Blocking, Silego Technology's SLG59M1603V integrated power switch

Power ICs Article Archive (By Issue)

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Controller IC Eases Application Of SiC MOSFETs In AC-DC Power Supplies,
Rohm's BD7682FJ-LB ac-dc converter control IC

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September 2015:

IC Extends Life Of Multi-Cell Li-ion Batteries, *Intersil's ISL94203 Li-ion battery monitor*

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October 2015:

Gate Driver Shrinks Delay And Board Space For Server Power Supplies,
Texas Instruments' UCC27714 high-speed, low-side gate driver

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Charger Interface IC Eases Implementation Of Quick Charge 3.0 Protocol,
Power Integrations' CHY103D charger-interface IC

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November 2015:

Bus Converter Modules Are Non-Isolated And Bidirectional, *Vicor's non-isolated, bidirectional bus converter modules (NBMs)*

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PWM Controllers Feature 40-V Operation And PMBus Interface, *Microchip Technology's MCP19118 and MCP19119 digitally enhanced power analog controllers*

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Wireless Charging Solution Is Adopted By Tier I Computer Makers,
Semtech's TS80K wireless charging platform

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December 2015:

Smart Diode Controller Delivers Reverse Polarity Protection With No I_Q,
Texas Instruments' LM74610-Q1 smart diode controller

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Power ICs Article Archive (By Issue)

Power IC News Sponsored by Renesas

Medium-Power Wireless Transmitter Reference Design Is Certified To Qi V 1.2, Rohm's wireless power reference design

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15-W Wireless Power Receiver IC Complies With Qi V1.2, Toshiba America Electronic Components' TC7766WBG wireless power receiver

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January 2014:

380-V Input Bus Converter Raises Efficiency And Power Density To Benefit HVDC Power Distribution, Vicor's VI Chip bus converter module built in the ChiP platform

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February 2014:

Controller Cuts Cost For Qi-compliant Wireless Chargers, Texas Instruments' bq500412 Qi-compliant wireless power transmitter manager

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750-mA POL Requires Just 30-mm² Of Board Space, Texas Instruments' LMR22007 750-mA switching regulator

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High-Temperature, High-Voltage DC-DC Converters Reduce Design Time For Down-Hole Applications, International Rectifier's HTH27022S and HTM27092S dc-dc converters

[For more details...](#)

March 2014:

PMIC Reduces Board Space, Noise, And Power Consumption In Automotive Instrument Clusters, Maxim Integrated's MAX16993 automotive power management IC

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VTM Current Multiplier In New ChiP Packaging Will Support VR12.5 Applications, Vicor's VRM solution compliant with Intel's VR12.5 voltage regulation specification

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Power ICs Article Archive (By Issue)

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Tiny Stepdown Regulators Deliver Extended Voltage And Temp Ranges,
ROHM Semiconductor's BD9G101G dc-dc converter IC and BU90002GWZ 6-MHz synchronous stepdown regulator IC

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April 2014:

PWM Controllers And Modules Offer Optimized Power Solutions For VR12.5,
International Rectifier's CHiL digital controllers and PowIRstage devices

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Flyback ICs Limit Standby Power to <30-mW For Offline Supplies,
Texas Instruments' UCC28910 700-V flyback switcher and UCC28630 PWM controller

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Driver Stage Tailors Power Conversion Solution To High-Performance FPGAs,
Altera's ET4040 monolithic 40-A driver plus synchronous MOSFET powertrain

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May 2014:

Gate Drivers For Automotive Applications Feature Fast Propagation Delays,
Texas Instruments' UCC275xx-Q1 family of single- and dual-channel gate drivers

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July 2014:

MCUs With High-Res Timer Ease Transition To Digital Power Control,
STMicroelectronics' STM32F334 Digital Power microcontrollers

[For more details...](#)

High-Rel Dual Output DC-DC Converters Target Satellite Power Systems,
International Rectifier's D series rad-tolerant two output dc-dc converters

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August 2014:

Highly Integrated Digital Power Monitors Work With Supplies Up To 60 V,
Intersil's ISL2802x family of digital power monitors

Power ICs Article Archive (By Issue)

Power IC News Sponsored by Renesas

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DC-DC Converters Push Limits On Power Density For A Range Of Applications, Vicor's ChiP DCM and HD Brick dc-dc converters

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September 2014:

Tiny Li-ion Charger Targets Wearable Applications, Texas Instruments' bq25100 single-cell Li-ion charger

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Switching Regulators Offer High Operating Voltage, Wide Temp Range, Small Size, ROHM Semiconductor's BD9G101G and BU9000xGWZ switching regulators

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November 2014:

PMIC Keeps Automotive MCUs Running Reliably Under Start-Stop Operation, Rohm's BD39001EKV-C power management IC

[For more details...](#)

PowerSoCs Are Automotive Qualified And Ready To Power FPGAs, Altera's nine new Altera Enpirion AEC-Q100 qualified power system-on-chip (PowerSoC) devices from the EP53xx and EN63xx families

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December 2014:

Wireless Power Chipset Offers 10-W Solution, Texas Instruments' bq51025 wireless charging receiver and bq500215 wireless power transmitter controller

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January 2013:

High-Efficiency Stepper Motor Driver IC Targets Office Automation Equipment, ON Semiconductor's LV8702V stepper-motor-driver IC

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Power ICs Article Archive (By Issue)

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Low-Power Buck Converter Aims To Accelerate Energy Harvesting Designs,
Texas Instruments' TPS62736 Nano-power Buck Converter

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February 2013:

Single-Stage LED Driver Cuts BOM Cost in Price-Sensitive Retrofit Bulbs,
iWatt's iW3626 single-stage LED driver

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Robust Angular Position Sensor Finds Use In Transmission Control Unit,
Austriamicrosystems' AS5134 angular position sensor

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Hybrid Power Controller Chip Delivers Benefits of Analog + Digital Control,
Microchip Technology's MCP19111 digitally enhanced power analog controller with integrated synchronous driver

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March 2013:

Gate Drivers Are Optimized For IGBTs And SiC FETs, *Texas Instruments' UCC27531 and UCC27532 single-channel output stage gate drivers*

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Universal Lighting Controller Promises To Enhance Many Applications,
STMicroelectronics' STLUX385 digital controller for lighting and power supply applications

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Upgraded Design Tool, New Firmware Enhance Capabilities Of Digital Controller, *Powerivation's PowerSMART design tool and firmware for the PV3012*

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Synchronous Rectifier Controller With Sync Function Simplifies SMPS Designs, *International Rectifier's IR1169 high-speed synchronous rectifier controller*

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April 2013:

Power ICs Article Archive (By Issue)

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User-Defined Power Modules Take Configurability To A New Level, Vicor's User-Defined, VI Chip PRM Modules

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Smart Bypass Diode Lowers Power Dissipation, Texas Instruments' SM74611 smart bypass diode

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Buck Converter Delivers 25 A From A 5-mm x 6-mm PQFN, International Rectifier's IR3847 Gen3 SupIRBuck voltage regulator

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May 2013:

Single-Stage LED Drivers Deliver High Dimmer Compatibility At Competitive BOM Cost, Cirrus Logic's CS1615/16 single-stage LED driver ICs

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Fast-Switching Solid-State Relays Consume Ultra-Low Power, Electronic Design & Research's μ R2M and μ D2M series solid-state relays

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June 2013:

PMIC Reduces Thermal Stress On Application Processors In Mobil Devices, ams' AS3721 PMIC and AS3729 point-of-load power stage

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Single-Stage LED Drivers Enable Wide Bulb Dimming Range With Lower BOM Cost, iWatt's iW3606 and iW3608 dimmable single-stage, LED drivers

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July 2013:

Low-Cost Gate Drivers Handle Wide Operating Voltage Range, IXYS Integrated Circuits Division's IX4426, IX4427, and IX4428 dual low-side gate driver ICs

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Wide-Input Linear Regulator Works At Very High Temperatures, CISSOID's CHT-RIGEL adjustable linear regulator

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Class D Amplifier Improves Efficiency For Driving Brush-Type Motors, Apex Microtechnology's SA160DP H-Bridge motor driver/amplifier

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DC-DC Converters Meet MIL-HDBK-1547 And Aerospace TOR Requirements, VPT's SVR series rad-hard dc-dc converters and EMI filters for space

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August 2013:

Controller In SOT-23 Shrinks Boost PFC Circuits, International Rectifier's IRS2505L PFC boost IC

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Versatile LED Driver Features Adjustable Frequency And Low-Side Current Sense, Texas Instruments' TPS92690 n-channel controller for dimmable LED drives

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October 2013:

Current-Sharing LDOs Double Current Capability For Harsh Environments, Texas Instruments' TPS7H1101-SP and the TPS7H1201-HT LDOs

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Digital PWM Controller Cuts BOM Cost, Standby Power In Smartphones, Dialog Semiconductor's iW1679 PWM controller

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November 2013:

Envelope Tracking Power Chips Boost Efficiency In Smartphones, Texas Instruments' LM3290 buck-boost converter and LM3291 linear amplifier

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Buck Controller Features Inductor DCR-Based Overcurrent Protection, Texas Instruments' LM27403 synchronous buck controller

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Power ICs Article Archive (By Issue)

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December 2013:

HV Amplifier IC Slashes Noise For Improved Accuracy In Positioning Systems, Apex Microtechnology's PA44X 350-V amplifier ICs

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PFC Controller Extends Range On Switching Frequency, Lowers Losses In Shunt Resistor, Texas Instruments' UCC28180 CCM PFC controller

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January 2012:

Energy Measurement ICs Optimize Cost And Performance For Smart Meters, Cirrus Logics' CS5484/80/90 analog front end ICs for energy measurement

[For more details...](#)

Gate-Driver IC Simplifies Power Train Design In Hybrid And Electric Vehicles, International Rectifier's AU1R0815S automotive-qualified gate-driver IC

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February 2012:

Gate Drivers Work With Silicon Or GaN FETs, Texas Instruments' LM5114 low-side gate driver

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Digital PWM Controllers Deliver Small, Efficient Multiphase Solutions, International Rectifier's third-generation family of CHiL digital PWM controllers

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Digital Controller Provides Flexibility And Performance For Isolated Supplies, Texas Instruments' UCD3138 digital controller for isolated power supplies

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Hot Swap Controller Emulates MOSFET Thermal Performance, The Picor Cool-Swap PI2211 hot swap controller and circuit breaker from Vicor

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DC-DC Converters Deliver 334 W/in³ For Industrial And Military Applications, The Picor Cool-Power PI3106 isolated dc-dc converter from Vicor

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Full-Bridge Drivers Feature Braking Control And Extreme Speed, Electronic Design & Research's high-speed full-bridge isolated (HS-FBI) H7GvvDaa/e drivers

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March 2012:

Digital LED Controller Is Compatible With Nearly All TRIAC Dimmers, Cirrus Logics' CS161X digital LED controller

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Wireless Power Chipset Shrinks Footprint And Lowers Cost, Integrated Device Technology's wireless power transmitter and receiver ICs

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Adjustable 500-mA LDO Operates To 225°C, Cissoid's CHT-Vega 225°C Adjustable 500-mA LDO

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April 2012:

Power Booster Increases Slew Rate And Bandwidth, Adds Second Channel, Cirrus Logics' PB63 dual power booster amplifier

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May 2012:

Digital LED Controller Features Two-Color Mixing, Cirrus Logic's CS163X family of digital LED controllers

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June 2012:

Isolated ADCs Simplify Line Voltage Monitoring For Solar Inverters And Power Supplies, Silicon Laboratories' Si890x isolated ADCs for mains line monitoring

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Power ICs Article Archive (By Issue)

Power IC News Sponsored by Renesas

July 2012:

Zero-Voltage Switching Boosts POL Efficiency To 98%, Vicor's Picor PI33XX Cool-Power ZVS buck regulator series [For more details...](#)

Offline Switcher ICs Extend Benefits Of Primary-Side Regulation Up To 90 W, Power Integrations' LinkSwitch-HP family of off-line switcher ICs [For more details...](#)

August 2012:

Rad-Hard Power Converters Ride Intermediate Bus Into Space

Monolithic Point-of-Load Regulators (POLs)

- Texas Instruments' TPS50601-SP 6-A POL for harsh environments
- Intersil's ISL70001 and ISL70002 6-A and 12-A SEE immune synchronous buck regulators
- Intersil's ISL75051SRH radiation-tolerant ultra-low dropout regulator
- Peregrine Semiconductor's PE9915x family of rad-hard buck regulators with integrated switches

[For more details...](#)

September 2012:

CMOS-Based Isolators Are Pin, Footprint Compatible With Standard Optocouplers, Silicon Laboratories' Si87xx CMOS-based digital isolators

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SSL LED Drivers Feature Flickerless Performance And Digital Dimming Control, iWatt's iW3616 and iW3617 digital LED drivers

[For more details...](#)

October 2012:

PSS Flyback Controller Eyes Low-Cost Networking Adapters, CamSemi's C2283 primary-side sensing flyback controller

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PFC Controller Integrates Numerous Protection Features, MagnaChip Semiconductor's MAP8800 PFC controller

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Power ICs Article Archive (By Issue)

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December 2012:

Module Is Fully Encapsulated 30-A POL Converter, Intersil's ISL8225M 30-A fully-encapsulated POL power module

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January 2011:

Digital LED Drivers Deliver Flicker-Free Dimming And Hot-Plug Support, iWatt's iW3612/iW3602 digitally controlled, offline power supply controllers for dimmable LED luminaires

[For more details...](#)

4-A Regulator Shrinks To 2-mm x 2-mm Footprint, Maxim Integrated Products' MAX15040 4-A, synchronous switching regulator

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March 2011:

DSCs Expand Feature Set To Support More Complex Digital Power Apps, Microchip Technology's 16-bit dsPIC GS series of digital signal controllers

[For more details...](#)

April 2011:

Driver IC Simplifies Design, Increases Efficiency For High-Power LED lighting, International Rectifier's IRS2548D switched-mode power supply control IC with integrated PFC control

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Receiver Chip Shrinks Qi-Compliant Wireless Power Designs, Texas Instruments' bq51013 wireless power receiver IC

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May 2011:

Highly Integrated Controller Works With BJTs To Cut Cost of Lamp Ballasts, STMicroelectronics L6520 lamp ballast controller IC

Power ICs Article Archive (By Issue)

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Chip Integrates PFC And Lamp Ballast Control In SO-8 Package,
International Rectifier's Combo8 IRS2580DS PFC + Half-Bridge Ballast IC

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August 2011:

High-Temperature Components For Power Design

- *Automotive-Grade Boost Controller Boasts Wide Input Range, ON Semiconductor's NCV8871 nonsynchronous boost controller*
- *Forward Converter Chipset Is Specified Over -55°C to 125°C Range, Linear Technology's LT1952/-1 single-switch forward controller, LTC3900 synchronous rectifier driver, and LT4430 secondary-side optodriver*

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October 2011:

Digital Power Products

- *Digital Controller Provides Real-Time Adaptive Loop Compensation, Powervation's PV3012 dual-phase digital dc-dc controller*
- *Analog Buck Controllers Feature PMBus Interface, Texas Instruments' TPS40400 2-MHz single-channel controller and TPS40422 dual-channel controller*
- *Digital Power Controllers Deliver High Efficiency, International Rectifier's IR3541, IR3536, and IR3538 multiphase digital PWM controllers*
- *POL Regulators Offer Vertical Mount For Space-Critical Applications, Ericsson's BMR4622002 and BMR4632002 3E digital point-of-load voltage regulators*
- *Buck Regulators Deliver Highly Integrated Designs, Summit Microelectronics' SMB220 and SMB221 10-A and 20-A digitally programmable buck regulators*
- *Multi-Rail Digital PMUs Pack Numerous Features, Akros Silicon's EnergySense family of multi-output, digital dc-dc power management unit ICs*

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February 2010:

Modules Make Simple Switchers Even Simpler, *National Semiconductor's LMZ series of Simple Switcher power modules*

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Power ICs Article Archive (By Issue)

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Driver IC Lights Up to 12 White LEDs in Series, Alpha & Omega
Semiconductor's AOZ1950 white LED backlight driver

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April 2010:

Control IC Simplifies HID Ballast Design, International Rectifier's IRS2573D
HID ballast controller IC

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LDOs Deliver CMOS Advantages and Robustness, ON Semiconductor's NCP69x
families of 1-A CMOS LDOs

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ICs Control Discharge Of X Capacitors, Reduce Losses in EMI Filters, Power
Integrations' CAPZero family of zero-loss automatic X-capacitor discharge ICs

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May 2010:

Buck-Boost Converter Slashes Board Space Requirements, TPS63020 buck-
boost converter IC

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June 2010:

Digital PFC Controllers Battle Analog Chips On Performance And Price,
Cirrus Logic's CS1500 and CS1600 digital power factor correction controller ICs

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DC-DC Converters Deliver Fast Response and High Efficiency, Semtech's
SC173, SC174, and SC493 EcoSpeed dc-dc converter ICs

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DC-DC Converters Increase Efficiency for DDR Memory Applications,
Enpirion's 8-A EV1380 and the 4-A EV1340 dc-dc converters

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Low-Side Driver IC Targets Automotive Applications, International Rectifier's
AUIRS4426S is a dual-channel low-side driver IC

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Power ICs Article Archive (By Issue)

Power IC News Sponsored by Renesas

July 2010:

Embedded CPU Makes Power Management IC More Functional and Flexible In Portable Designs, Integrated Device Technology's P95020 portable power management IC

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Controller Exploits BJT To Cut Standby Power And Cost, CamSemi's C2163 primary-side sensing controller

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Boost Converters Feature Tiny Packaging and Low Input Voltage, Semtech's SC120, SC121 and SC122 boost converter ICs

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August 2010:

Shunt Regulator Minimizes Standby Power For Always-On Applications, Supertex's SR10 capacitor-coupled switched-shunt regulator

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Battery-Monitoring IC Cuts Cost In Hybrid And Electric Vehicles, Maxim Integrated Products' MAX11068 12-cell battery-monitoring IC

[For more details...](#)

September 2010:

High-Side Active ORing Devices Deliver Fast Response for Intermediate Bus Applications, A subsidiary of Vicor, Picor's PI2007 and PI2127 high-side active ORing devices

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Negative 36-V LDO Delivers Low-Noise Performance, Texas Instruments' TPS7A30 negative 36-V low dropout regulator

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Power Chip Builds Efficient, Low-Cost Supplies for Industrial Applications, iWatt's iW1810 digitally controlled PWM IC with built-in BJT

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Power ICs Article Archive (By Issue)

Power IC News Sponsored by Renesas

October 2010:

Point-Of-Load Regulators Extend Functionality and Performance, International Rectifier's IR3837M, IR3838M and IR3839M SupIRBuck point-of-load voltage regulator

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November 2010:

High-Temperature Controller And Driver Improve Performance Of SiC Switches, Cissoid's high-temperature Themis controller and Atlas push-pull driver stage

[For more details...](#)

Modules Shrink Point-of-Load Converters For Portable and Industrial Applications, Texas Instruments' 600-mA TPS82671 and 6-A TPS84620 point-of-load power converters

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October 2009:

A Slew of Improved Specs for Piezoelectric Drivers, Cirrus Logic's PA107DP and MP103FCFC hybrid power amps

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