

NEW

# Automotive Primary Buck DC/DC Converters

42V Withstand Voltage • Low Quiescent Current • 2.2MHz Operation • Spread Spectrum Function

BD9Pxx5EFV-C / MUF-C Series

**APEC**

## Features

- Strong against power supply voltage fluctuations, requires no additional capacitor to prevent overshoot
- 10 $\mu$ A quiescent current; achieves high efficiency over a wide load range
- Built-in spread spectrum function reduces EMI

## Applications

- Automotive systems (i.e. cluster, car infotainment)
- Electronic devices

DISCOVER THE **P**OWER

**ROHM**  
SEMICONDUCTOR

NEW

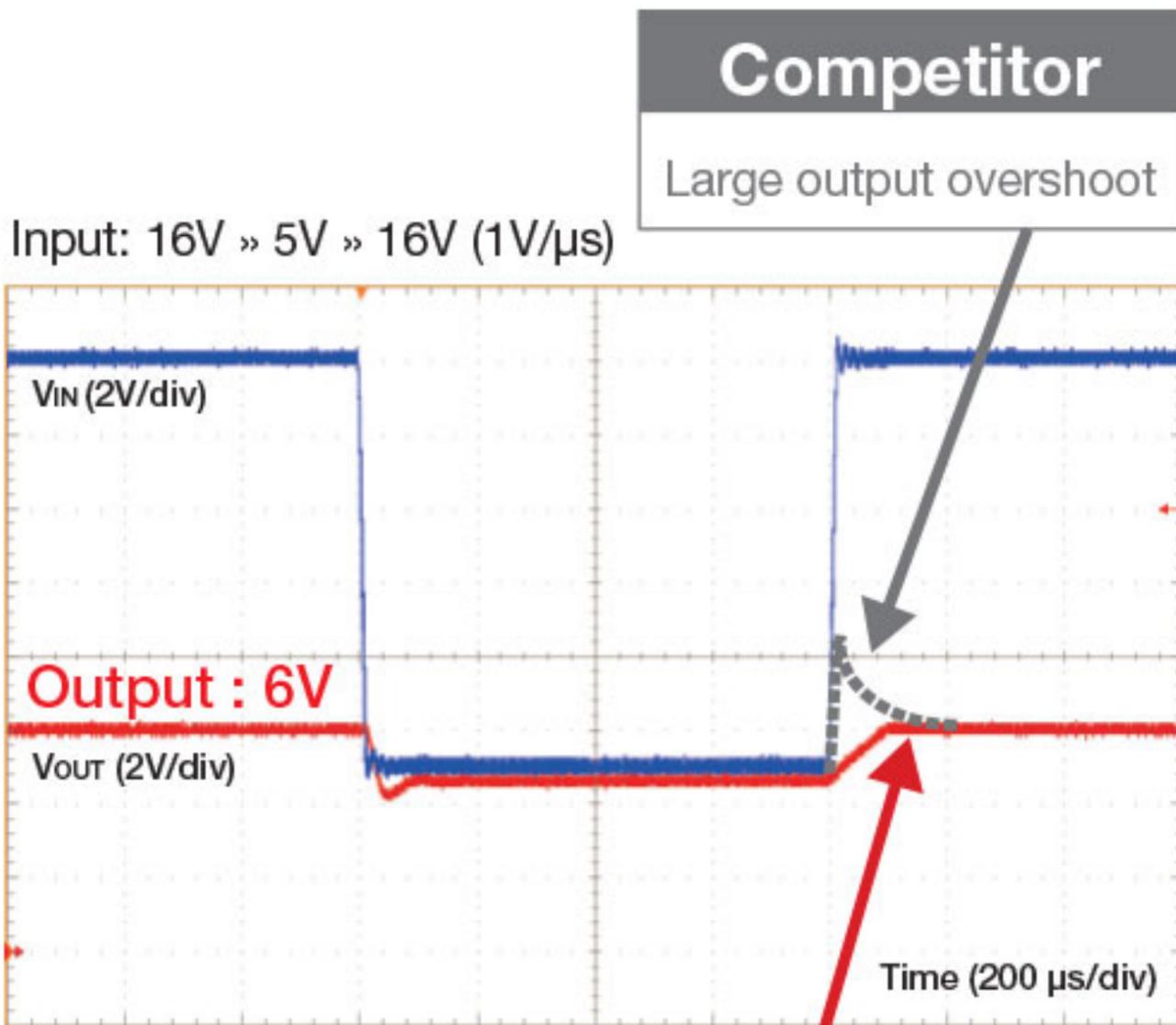
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Strong against power supply fluctuations



## ROHM's BD9Pxx5

Requires no additional capacitor  
to prevent overshoot  
(minimizes output fluctuations)

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**ROHM**  
SEMICONDUCTOR

NEW

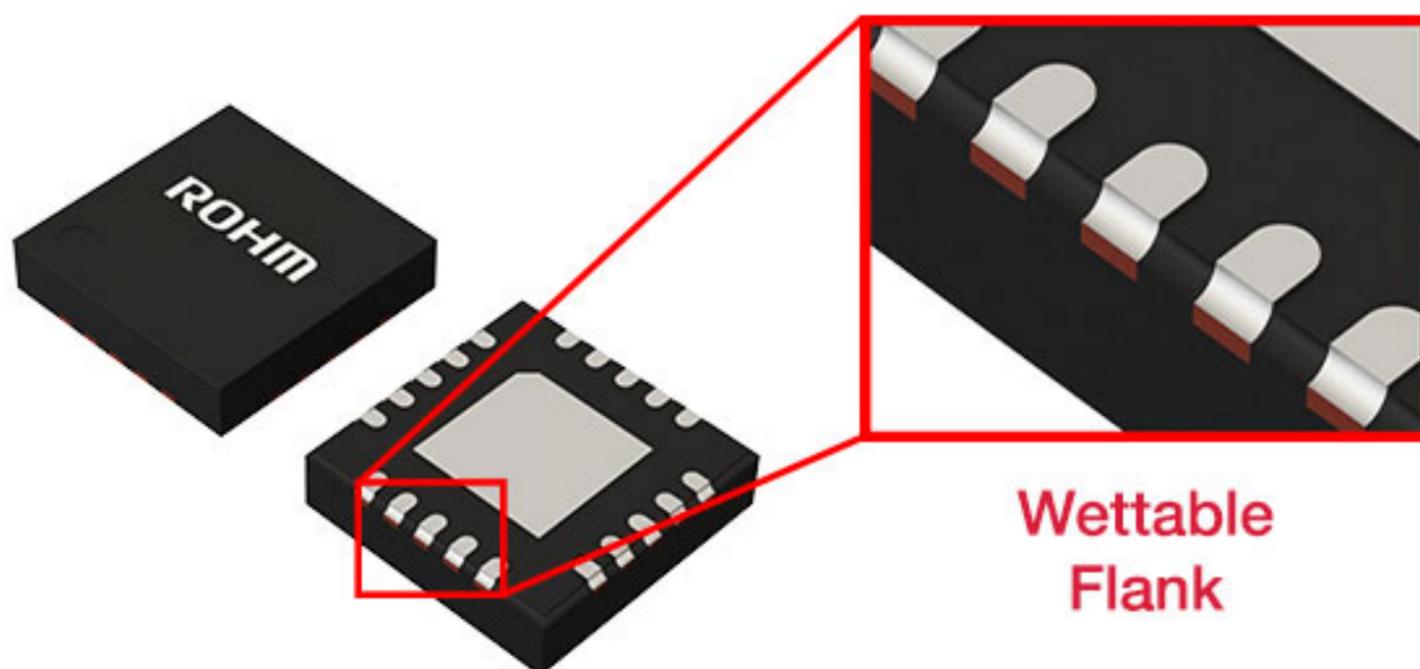
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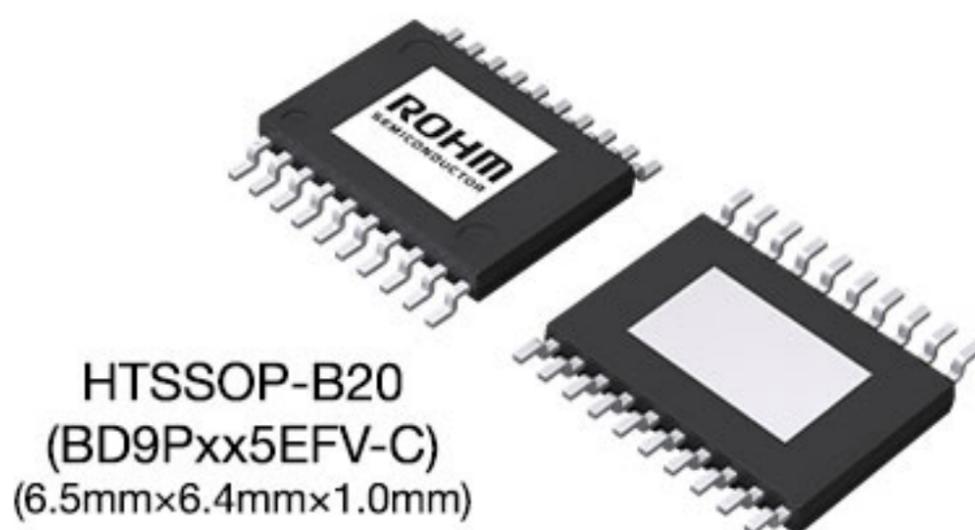
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**APEC**

## Packages



VQFN20FV4040  
(BD9Pxx5MUF-C)  
(4.0mm×4.0mm×1.0mm)



HTSSOP-B20  
(BD9Pxx5EFV-C)  
(6.5mm×6.4mm×1.0mm)

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**ROHM**  
SEMICONDUCTOR

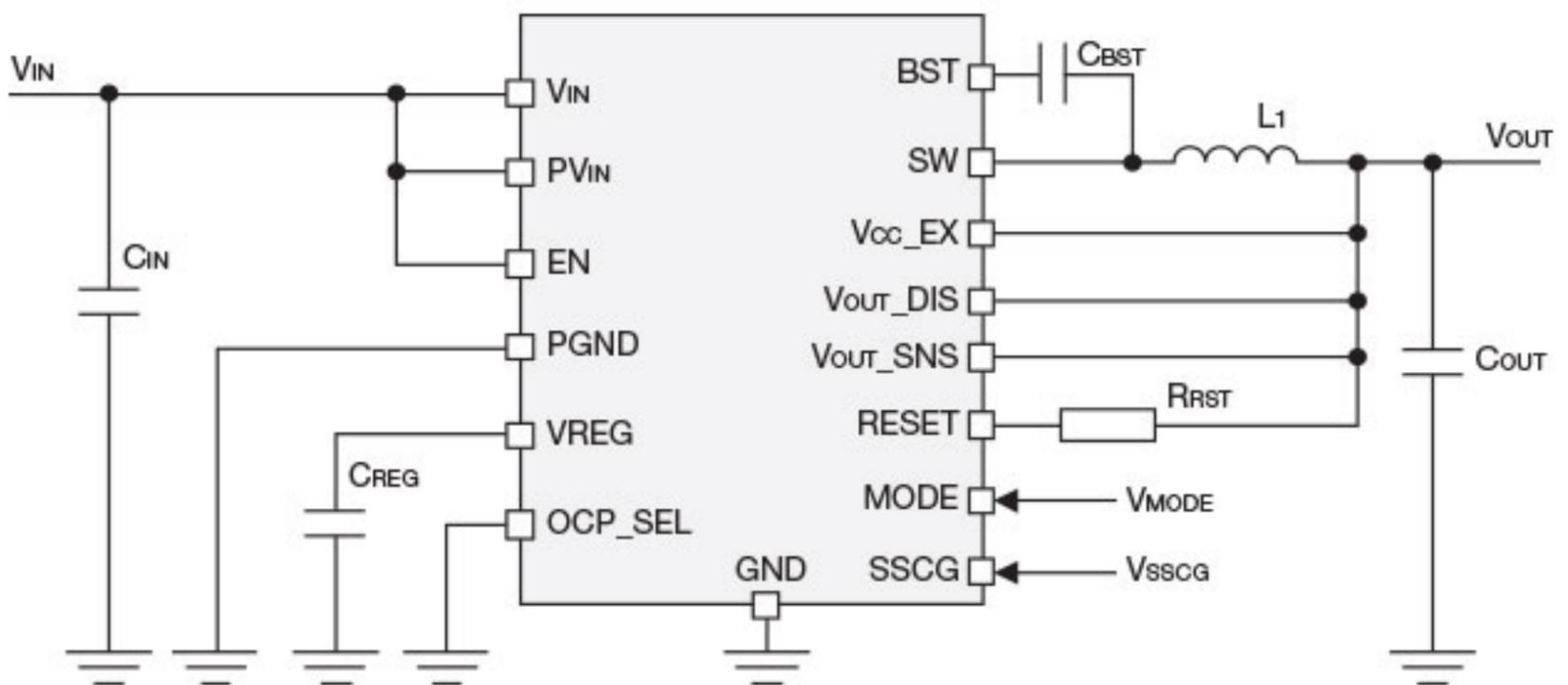
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## Application circuit diagram



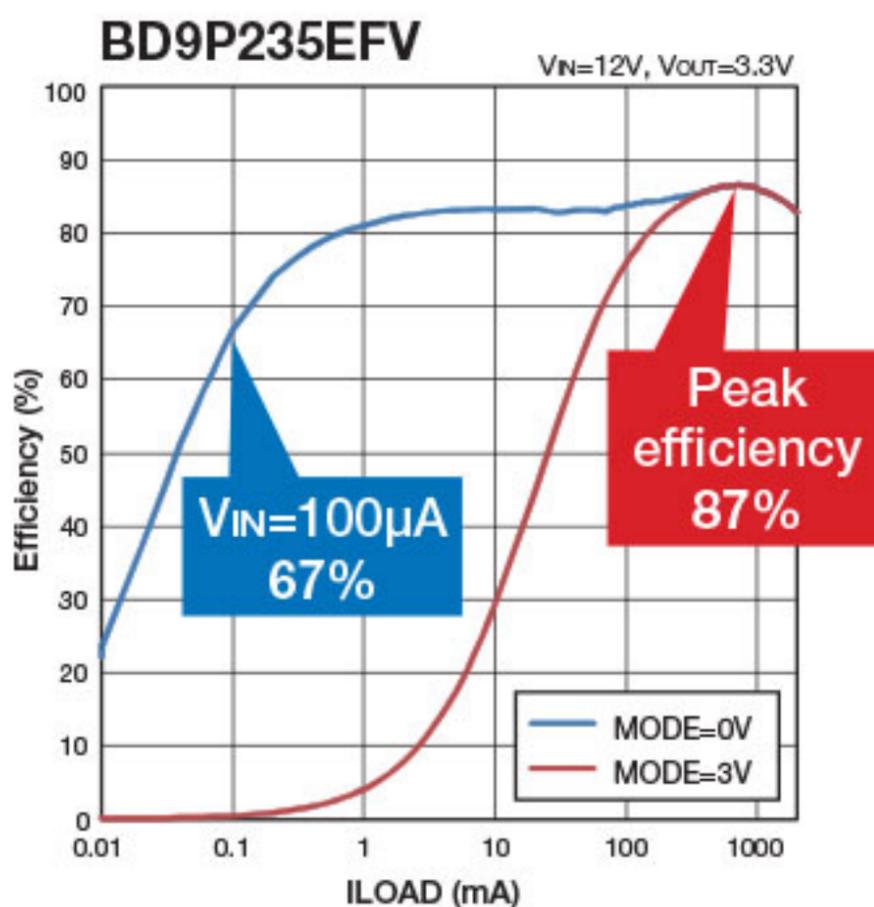
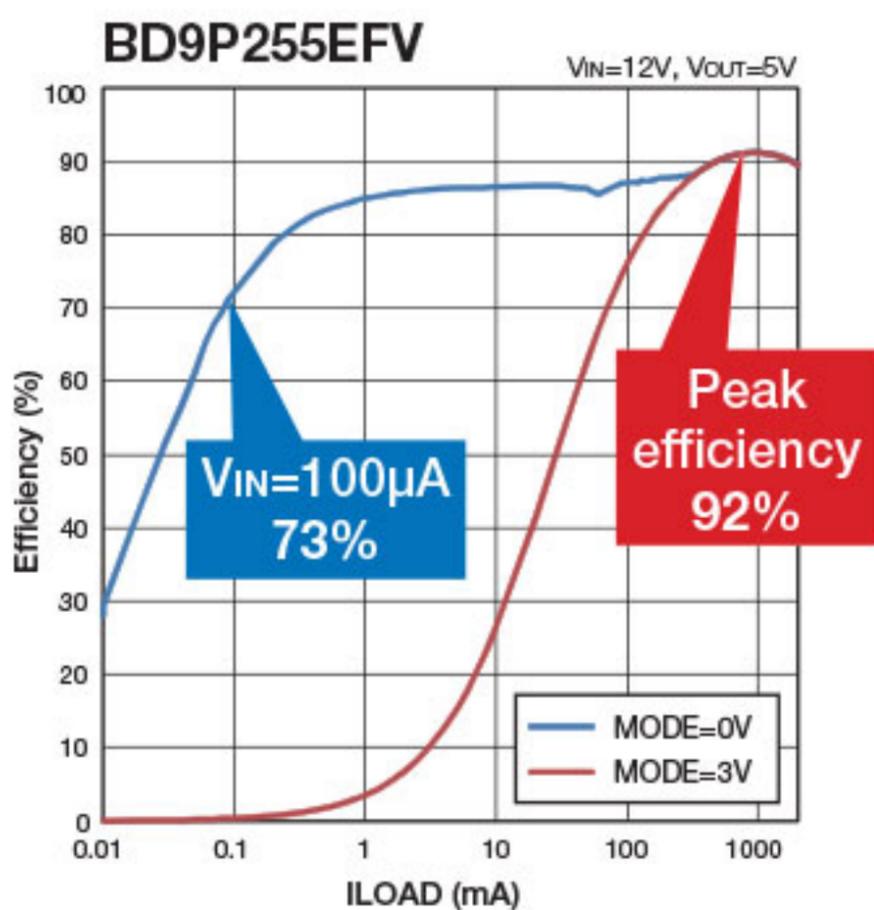
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Light load mode ensures high efficiency over a wide load range



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## Lineup

Series	BD9Px05-C	BD9Px35-C	BD9Px55-C
FET	Nch / Nch	Nch / Nch	Nch / Nch
V <sub>IN</sub>	3.5V to 40V	3.5V to 40V	3.5V to 40V
Freq	2.2MHz	2.2MHz	2.2MHz
V <sub>OUT</sub>	0.8V to 8.5V	3.3V	5V
Output Current	1A	<b>NEW</b> BD9P105EFV <b>NEW</b> BD9P105MUF	<b>NEW</b> BD9P135EFV <b>NEW</b> BD9P135MUF
	2A	<b>NEW</b> BD9P205EFV <b>NEW</b> BD9P205MUF	<b>NEW</b> BD9P235EFV <b>NEW</b> BD9P235MUF
	3A	☆ BD9P305EFV ☆ BD9P305MUF	☆ BD9P335EFV ☆ BD9P335MUF

☆ : Under Development

DISCOVER THE POWER

