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## 3.8V-32V Vin, 3A Synchronous Step-down DCDC Converter with EMI Reduction

### FEATURES

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BST	6	Power supply for the high-side power MOSFET gate driver. Must connect a 0.1uF or greater ceramic capacitor between BST pin and SW node.
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RECOMMENDED OPERATING CONDITIONS

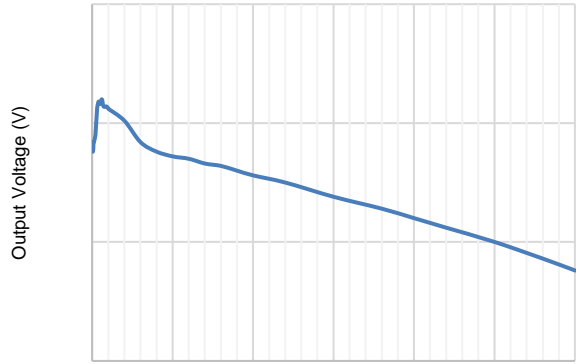

ESD RATINGS


- (1)
- (2)

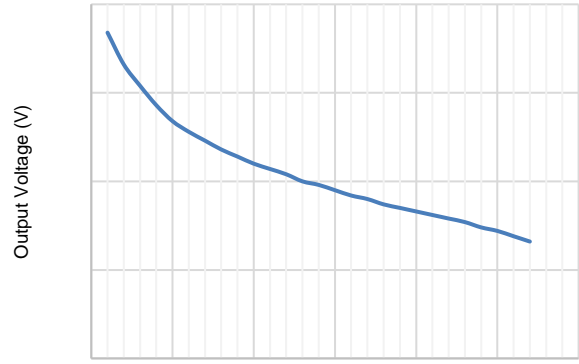
THERMAL INFORMATION


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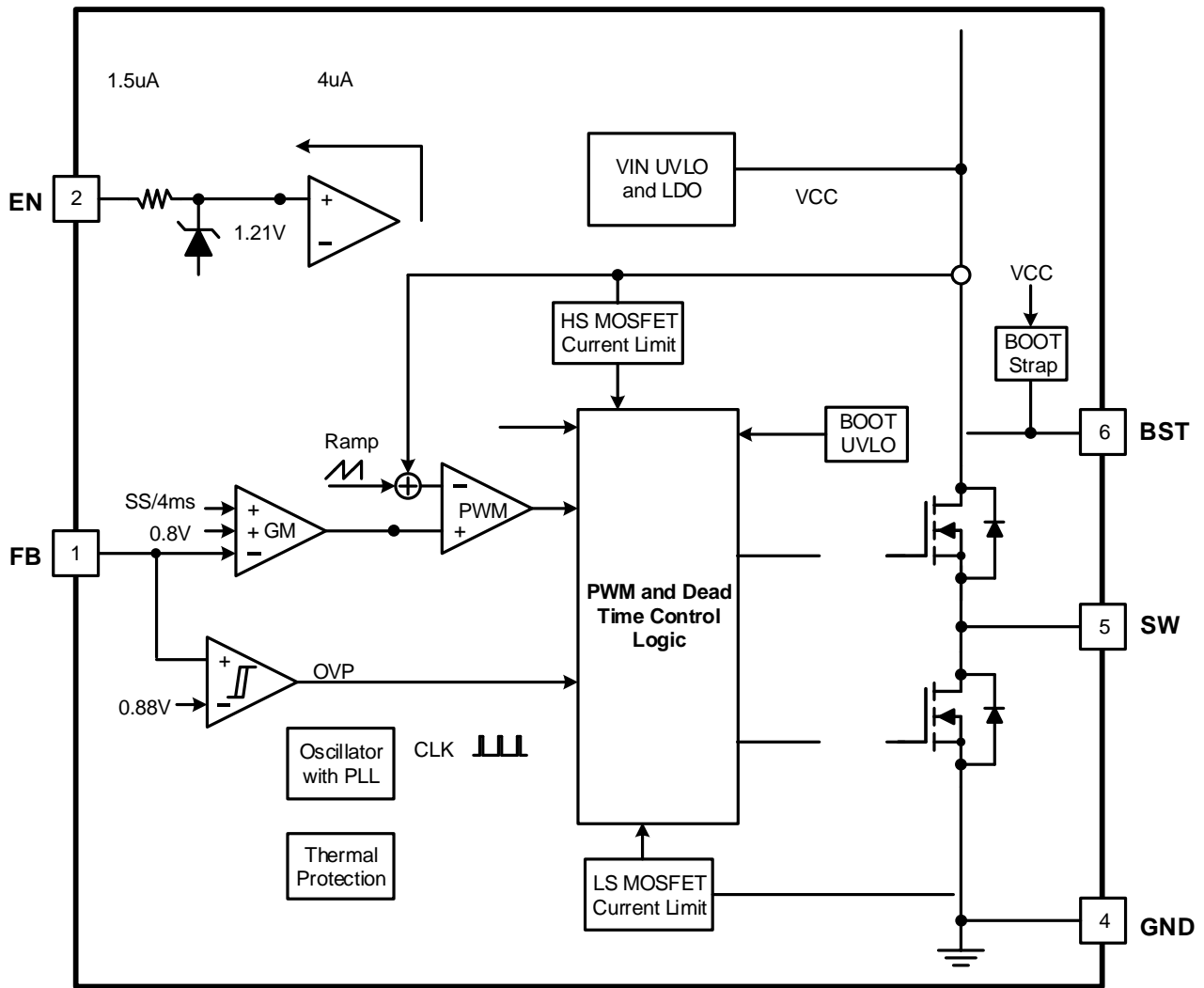


Output Current (mA)



Input Voltage (V)

# FUNCTIONAL BLOCK DIAGRAM



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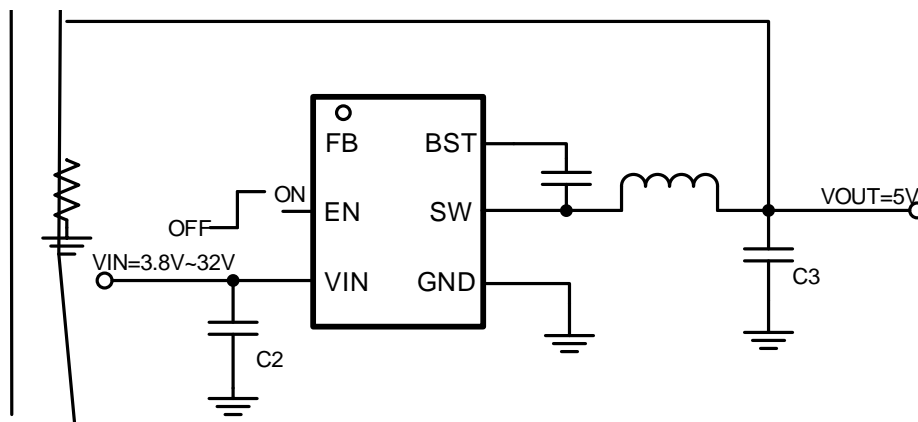






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## APPLICATION INFORMATION



Design Parameters	Example Value
Input Voltage	24V

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(3)

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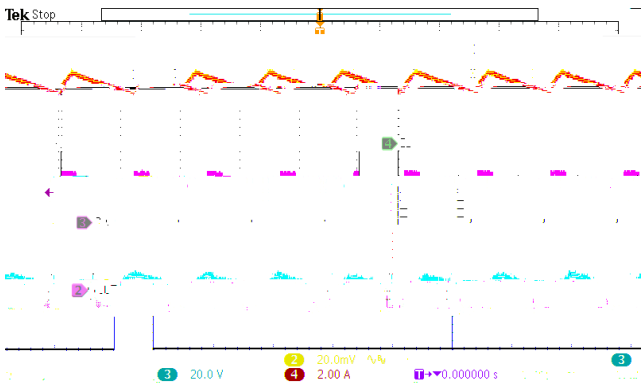


Figure 14. SW node waveform and Output Ripple  
VIN=24V, IOU=3A

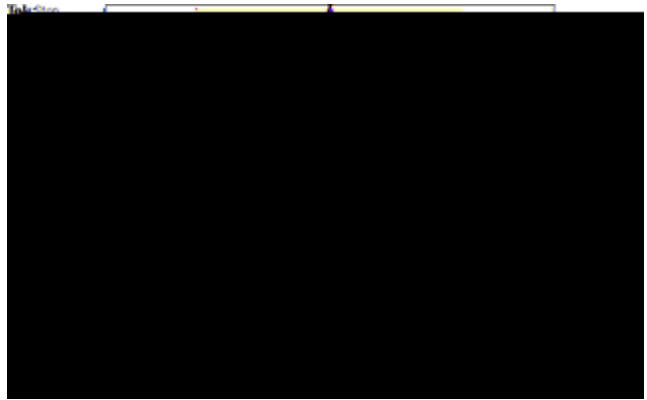


Figure 15. SW node Waveform and Output Ripple  
VIN=24V, IOU=10mA

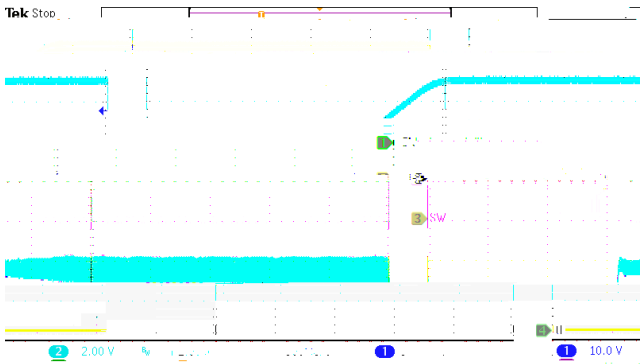


Figure 16. Power Up  
VIN=24V, VOUT=5V, IOU=3A

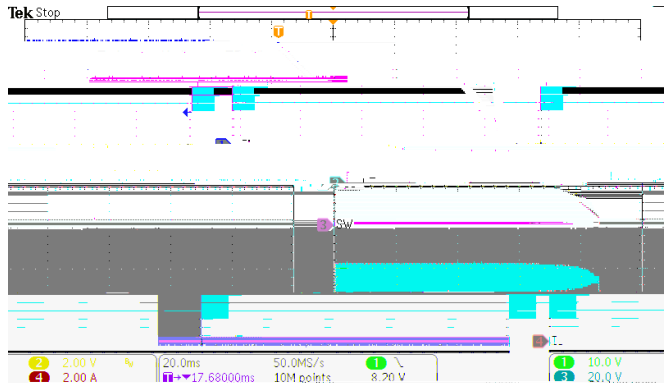


Figure 17. Power Down  
VIN=24V, VOUT=5V, IOU=3A

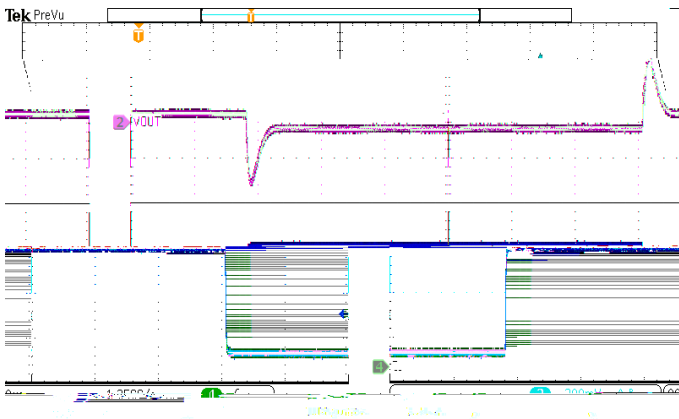


Figure 18. Load Transient  
VOUT=5V, IOU=0.3A to 2.7A, SR=250mA/us

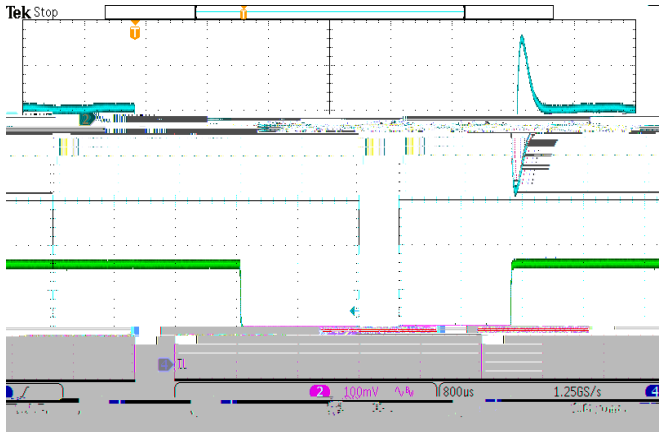


Figure 19. Load Transient  
VOUT=5V, IOU=0.75A to 2.25 A, SR=250mA/us

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## PACKAGE INFORMATION



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## RELATED PARTS

PN	DESCRIPTION	COMMENTS
<b>SCT2320</b> <b>SCT2321</b>	3.8V-32V Vin, 2A Synchronous Step-down DCDC Converter with	