

FEATURES

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REVISION HISTORY

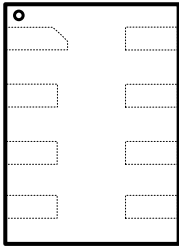
DEVICE ORDER INFORMATION

						MSL

ABSOLUTE MAXIMUM RATINGS

			o
			o

PIN CONFIGURATION



PIN FUNCTIONS

RECOMMENDED OPERATING CONDITIONS

ESD RATINGS

THERMAL INFORMATION

ELECTRICAL CHARACTERISTICS

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EN & PG				

TYPICAL CHARACTERISTICS

FUNCTIONAL BLOCK DIAGRAM

The diagram illustrates the functional blocks of the SCT1000 voltage regulator. Key components and connections include:

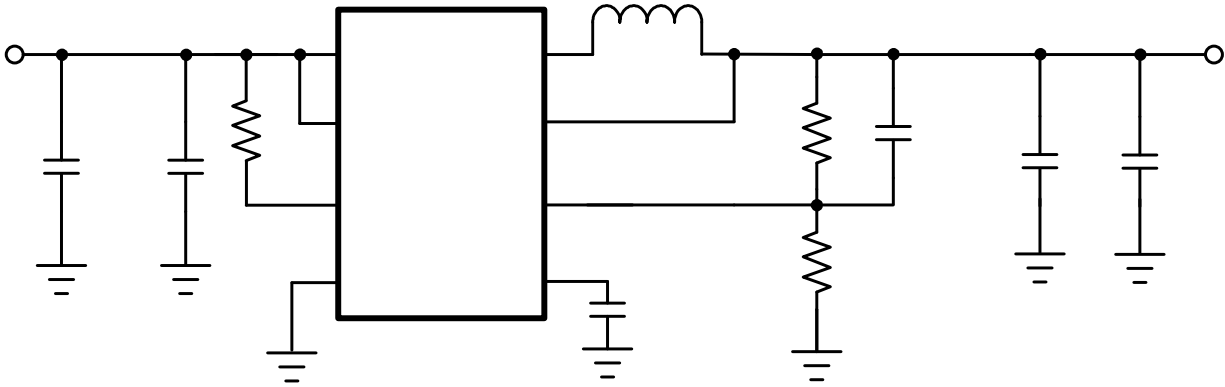
- Input (VIN):** Connected to the high-side MOSFET driver and the feedback divider.
- High-Side MOSFET Driver:** Controls the MOSFET (M1) to regulate the output voltage.
- Feedback Divider:** Consists of resistors R1 and R2, providing feedback from the output to the control loop.
- Control Loop:** Includes a compensation network (C1, R1, R2) and a voltage divider (R1, R2) to maintain the output voltage.
- Reference Voltage:** A precision reference voltage (VREF) is used for comparison.
- Current Sense Amplifier:** Monitors the current through the MOSFET to provide over-current protection.
- Output (VOUT):** The regulated output voltage, connected to the load.
- Internal Blocks:** The diagram shows the internal structure of the MOSFET driver, including the gate driver and the current sense amplifier.

OPERATION

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APPLICATION INFORMATION



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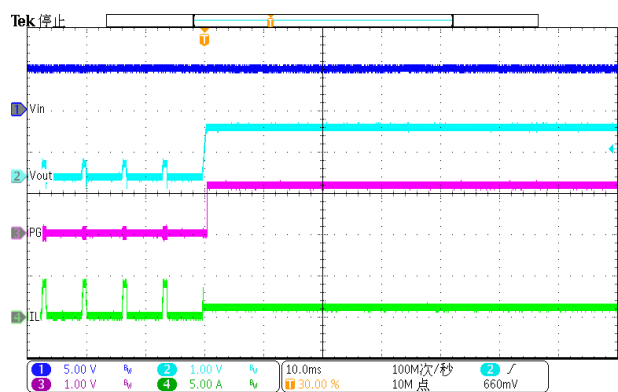
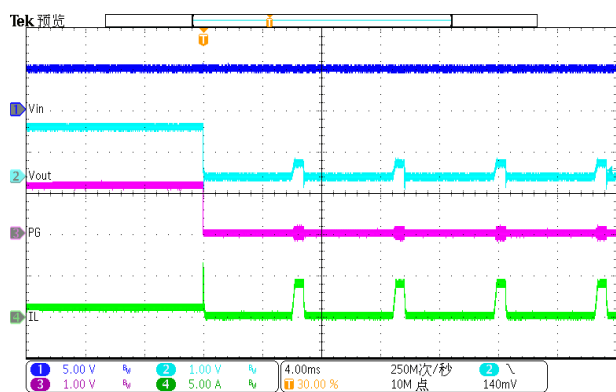
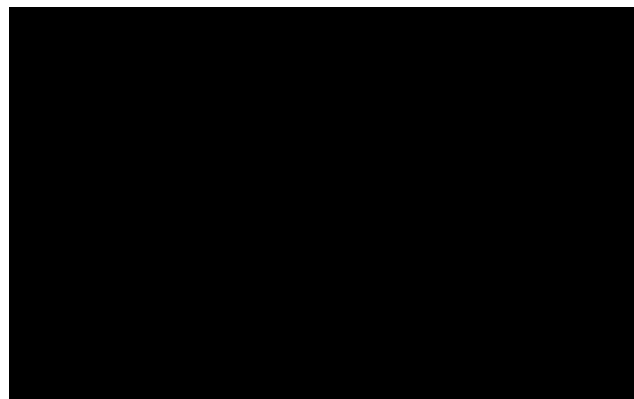
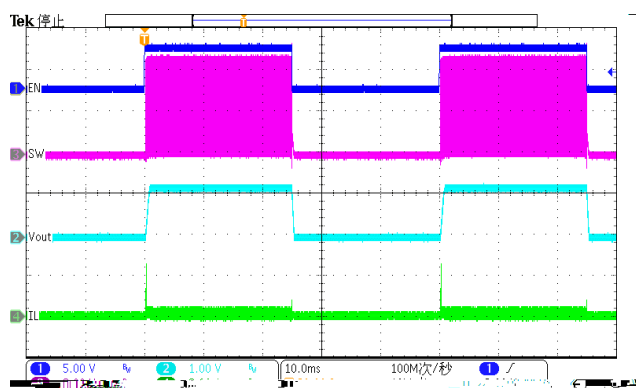
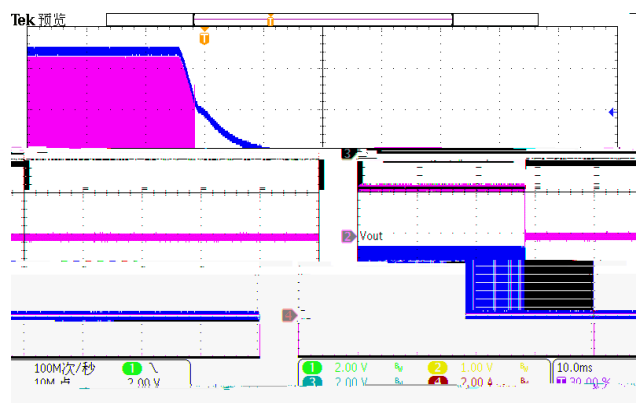
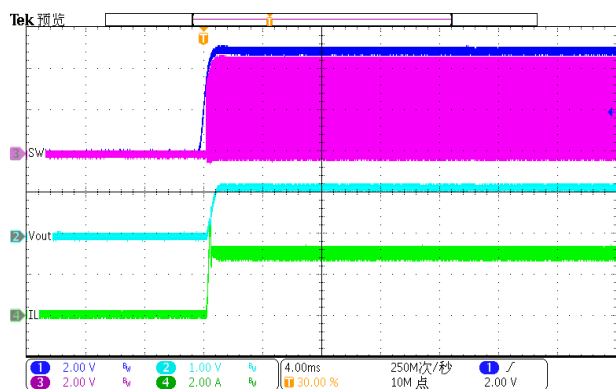
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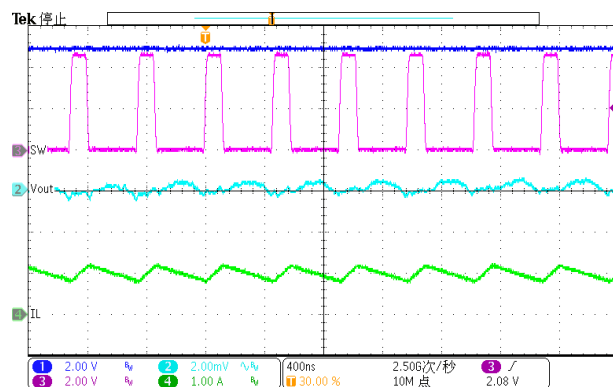
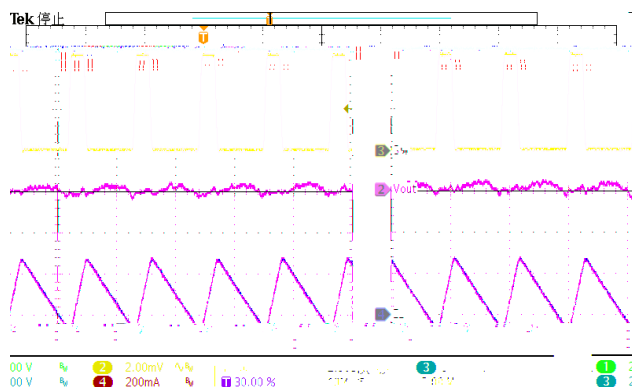
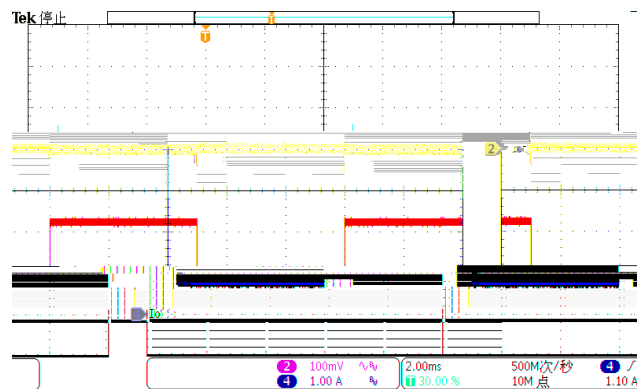
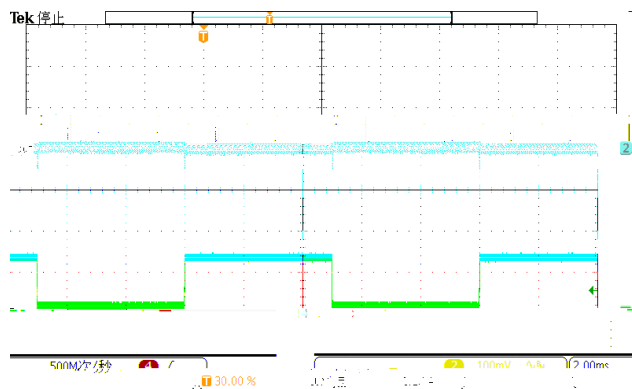
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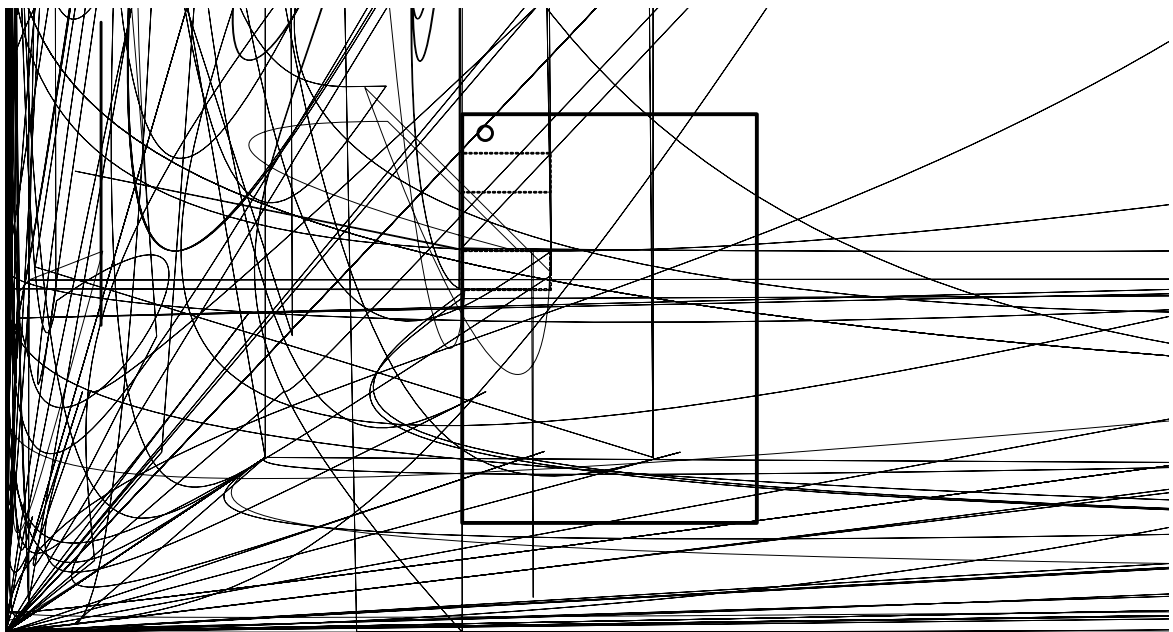


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TAPE AND REEL INFORMATION

