



Test Procedure for the NCV6324CGEVB Evaluation Board

Test Procedure of Evaluation Board

1. Prepare equipments as below list.
 - a. DC power supply
 - b. Electronic load
 - c. Multimeters
 - d. Oscilloscope
2. Check jumper setup to make sure it is a right default configuration for the device under test.
3. Set the power supply to 3.6 V with a current limit higher than 1 A, and then disable the output of the power supply.
4. Connect the power supply to the evaluation board's connectors V_{in+} and V_{in-} .
5. Disable output of the electronic load and connect it to the evaluation board's connectors V_{o+} and V_{o-} .
6. Enable the output of the power supply and check the 1.8 V output voltage of the evaluation board.
7. Set the electronic load to 10 mA and enable its output. Typical input supply current is about 6 mA.
8. Monitor the output voltage and SW node signal using an oscilloscope. The converter should operate in DCM with similar waveforms as shown in Figure 5(a).
9. Increase the electronic load to 1.0 A. Typical input supply current is about 565 mA.
10. Monitor the output voltage and SW node signal using the oscilloscope. The converter should operate in CCM with similar waveforms as shown in Figure 5(b). The switching frequency is about 3 MHz.
11. After the test is done, make sure to disable the output of power supply before remove power connectors to protect the device from damage caused by possible high voltage spike in input.