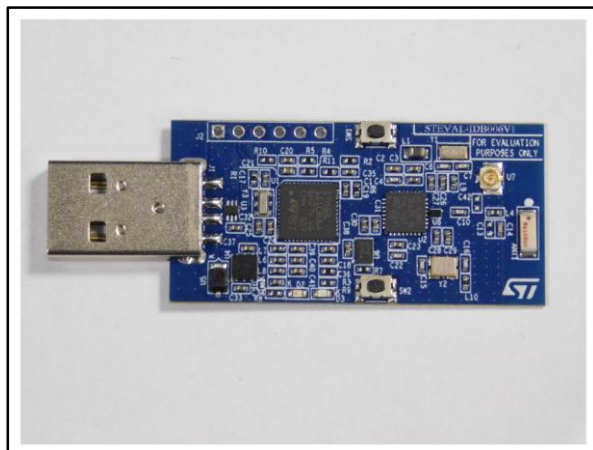


## BlueNRG-MS based Bluetooth® Smart USB

Data brief



### Features

- BlueNRG-MS based Bluetooth® Smart USB dongle for direct PC connection
- Maximum transmission power + 8 dBm
- Low power STM32L host microcontroller
- Major features of BlueNRG-MS: 7.3 mA (RX mode), 8.2 mA (TX mode at 0 dBm) maximum peak current, programmable output power from 18 dBm to +8dBm, up to 96 dB RF link budget
- USB Interface
- Bluetooth® low energy 4.1 compliant, supports both master and slave roles
- JTAG footprint connector for custom firmware development (JTAG connector not mounted)
- RoHS compliant

### Description

The STEVAL-IDB006V1 is an evaluation board based on the BlueNRG-MS low power Bluetooth® Smart IC, compliant with the Bluetooth® 4.1 specifications and able to support both master and slave roles.

The STEVAL-IDB006V1 features an onboard, low-power STM32L microcontroller. It is primarily designed to interface with BlueNRG-MS, but can also be used for custom application development. The STEVAL-IDB006V1 has a USB connector for PC GUI interaction and firmware updates.

While the board does not come with a mounted JTAG connector, the footprint area is available. When a JTAG connector is soldered, users can develop custom firmware for the STM32L microcontroller.

# 1 Schematic diagram

Figure 1: STEVAL-IDB006V1 circuit schematic (1 of 5)

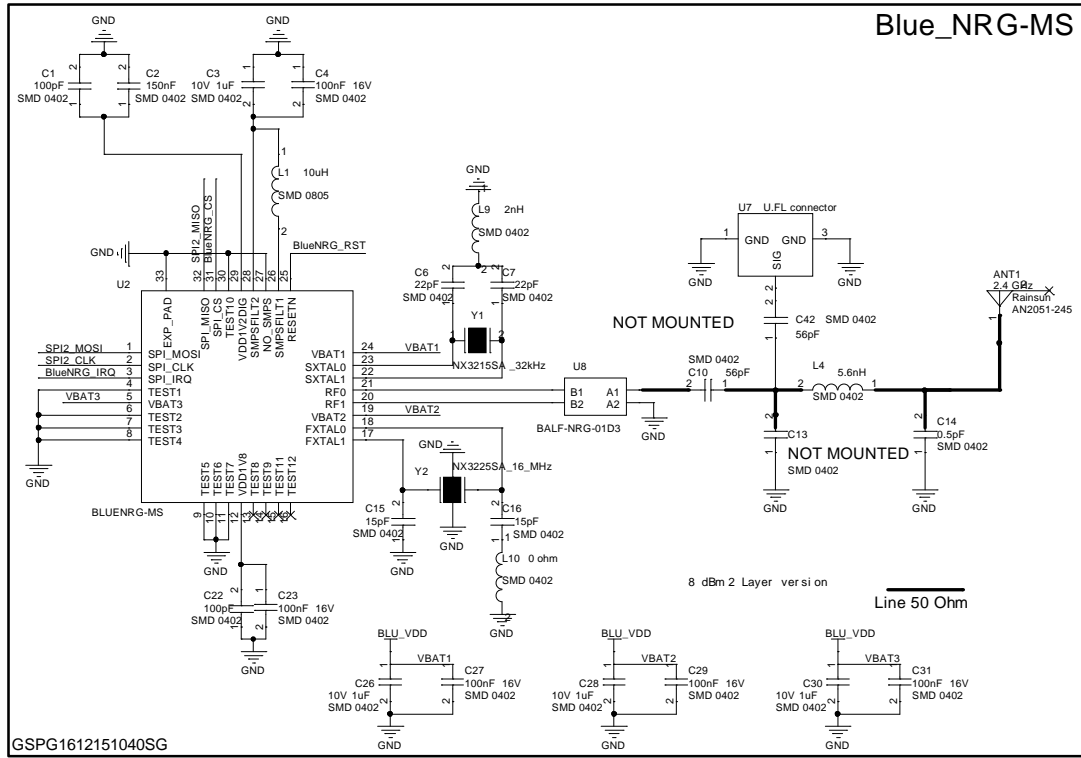


Figure 2: STEVAL-IDB006V1 circuit schematic (2 of 5)

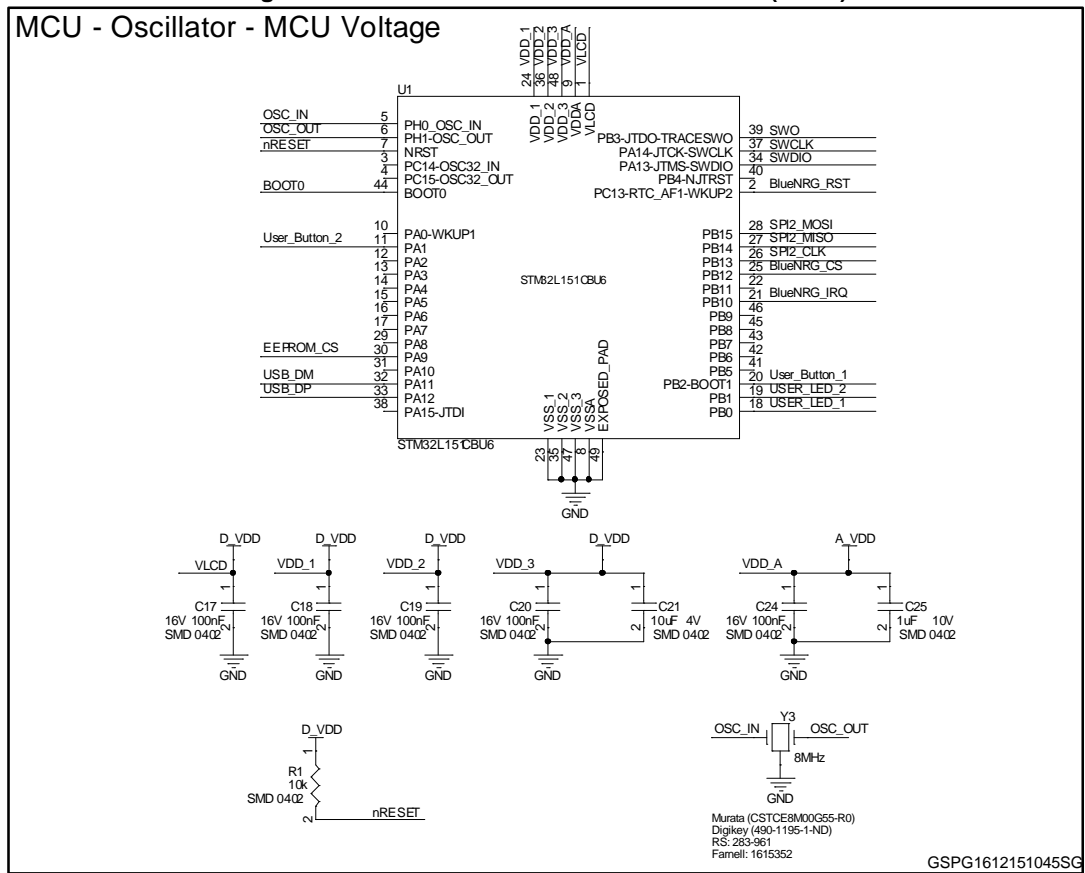


Figure 3: STEVAL-IDB006V1 circuit schematic (3 of 5)

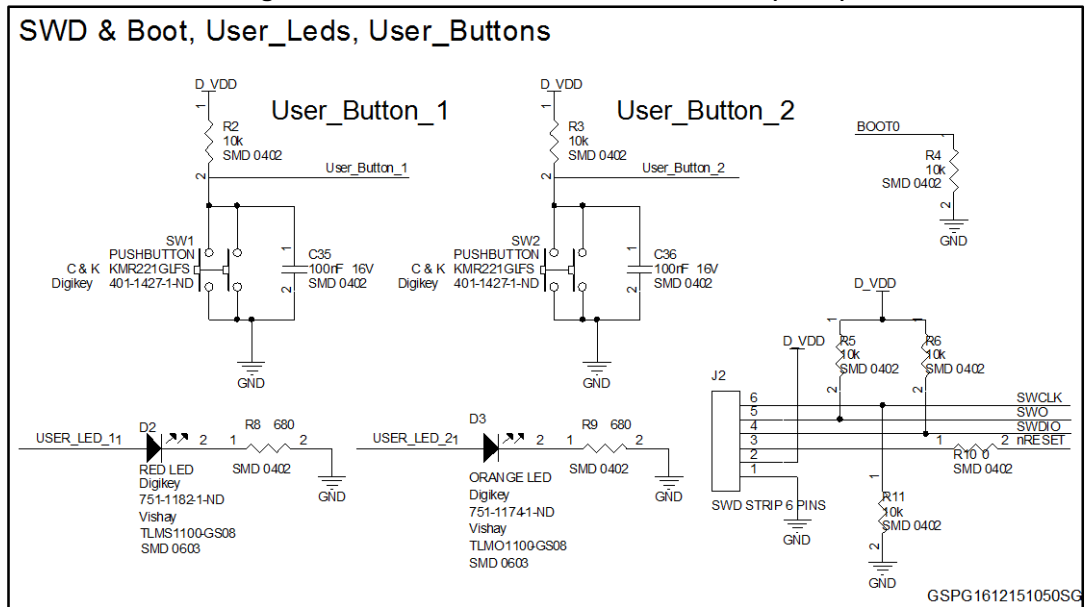


Figure 4: STEVAL-IDB006V1 circuit schematic (4 of 5)

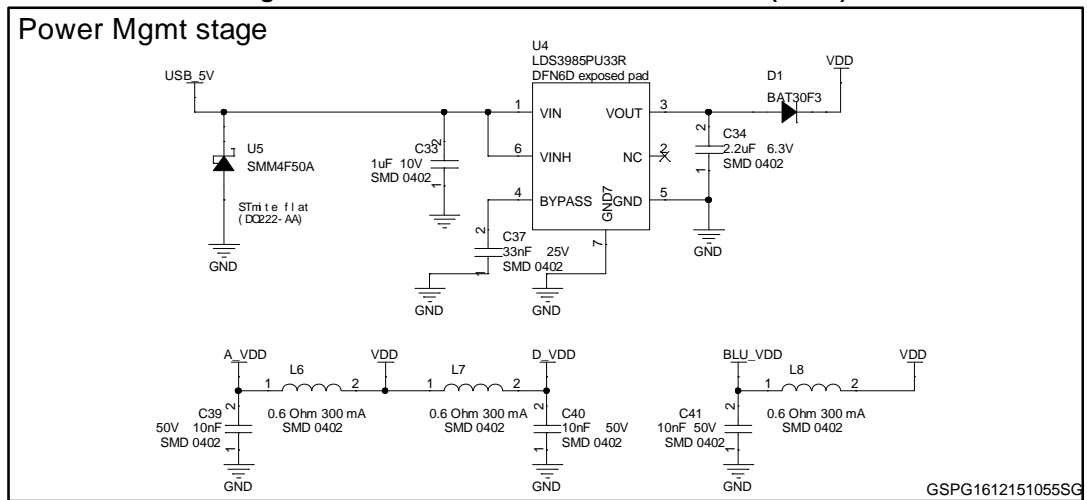
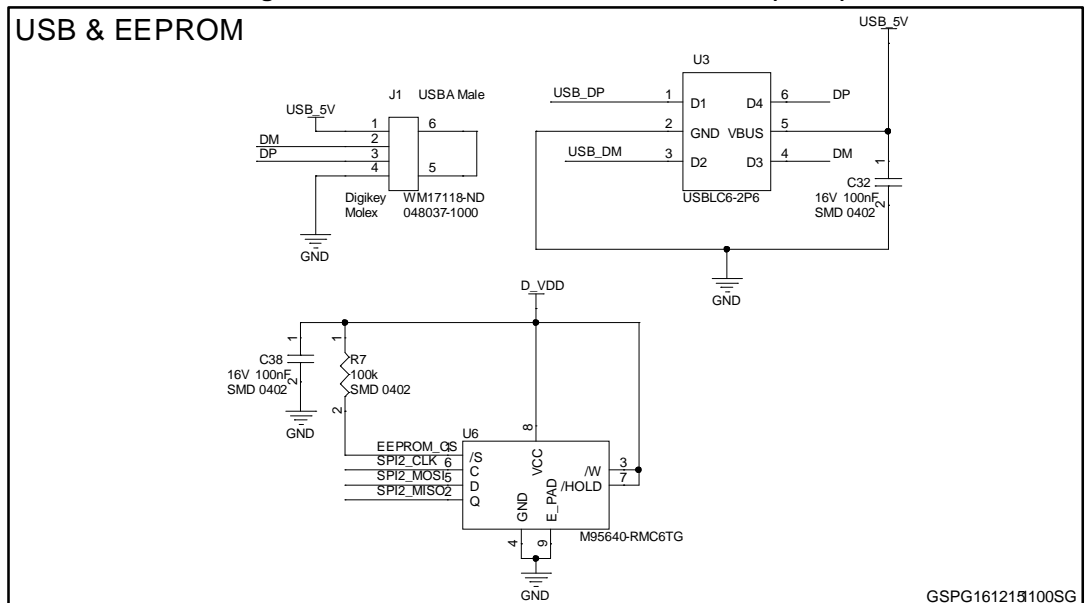


Figure 5: STEVAL-IDB006V1 circuit schematic (5 of 5)



## 2 Revision history

Table 1: Document revision history

Date	Version	Changes
18-Dec-2015	1	Initial release.

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