## STEVAL-IDB002V1

## Bluetooth® SMART board based on the BlueNRG low energy network processor

Data brief


## Features

- BlueNRG low power Bluetooth low energy network coprocessor
- STM32L external microcontroller
- Associated BlueNRG development kit including documentation, firmware for STM32L and GUI
- JTAG debug connector
- Bluetooth low energy 4.0 master and slave compliant
- Very low power consumption:7.3 mA RX and 8.3 mA TX at +0 dBm
- Maximum transmission power: +8 dBm
- Excellent receiver sensitivity ( -88 dBm )
- SPI interface for external microcontroller
- iOS App available
- Android App available
- RoHS compliant


## Description

The STEVAL-IDB002V1 is a product evaluation board based on the BlueNRG device. The BlueNRG is a Bluetooth low energy 4.0 compliant low power network coprocessor. The STEVALIDB002V1 is composed of an RF daughterboard and a microcontroller motherboard. The RF daughterboard features the BlueNRG device, an SMA connector for an antenna or measuring instruments and an SPI connector for external microcontroller. The motherboard is based on the STM32L, acting as external microcontroller driving the BlueNRG device. A JTAG connector allows development of firmware on the microcontroller.

## 1 Schematic diagram

Figure 1: BlueNRG circuit schematic


Table 1: Document revision history

| Date | Version | Changes |
| :--- | :--- | :--- |
| 15-Oct-2013 | 1 | Initial release. |
| 18-Dec-2015 | 2 | Updated features on the cover page. |

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