

## SPZB250 module for the STR9 dongle

Data brief

### Features

- SPZB250 radio communication module based on the SN250 ZigBee® network processor
- LIS302DL digital MEMS in LGA14 package (optional). It can be accessed by the ZigBee network processor through an I<sup>2</sup>C bus
- STLM75 temperature sensor or compatible device in SO-8 package (optional). It is connected to the ZigBee network processor through an I<sup>2</sup>C bus
- Digital interfaces: one I<sup>2</sup>C and one SPI interface which can be used indifferently by the SN250 ZigBee network processor to interface with the STR9 dongle
- Supply voltage
- The extension board can be supplied externally from the STR9 dongle or internally by an on-board Li-ion battery. The battery has a capacity of 65 mAh which allows approximately one hour of operation. It is charged through a mini-USB connector. Two LEDs can be used to monitor the charging:
  - Red LED: charge in progress
  - Green LED: charge completed
- 1 button connected to the SN250 ZigBee network processor wake-up input
- 3 LEDs connected to the SN250 ZigBee network processor:
  - Yellow LED: device connected
  - Green LED: transmission ongoing
  - Red LED: general purpose
- A debug port
- RoHS compliant



The SN250 integrates a 2.4 GHz IEEE 802.15.4-compliant transceiver with a 16-bit XAP2b microprocessor. It features embedded Flash and RAM memories, as well as peripherals to help design ZigBee-based applications.

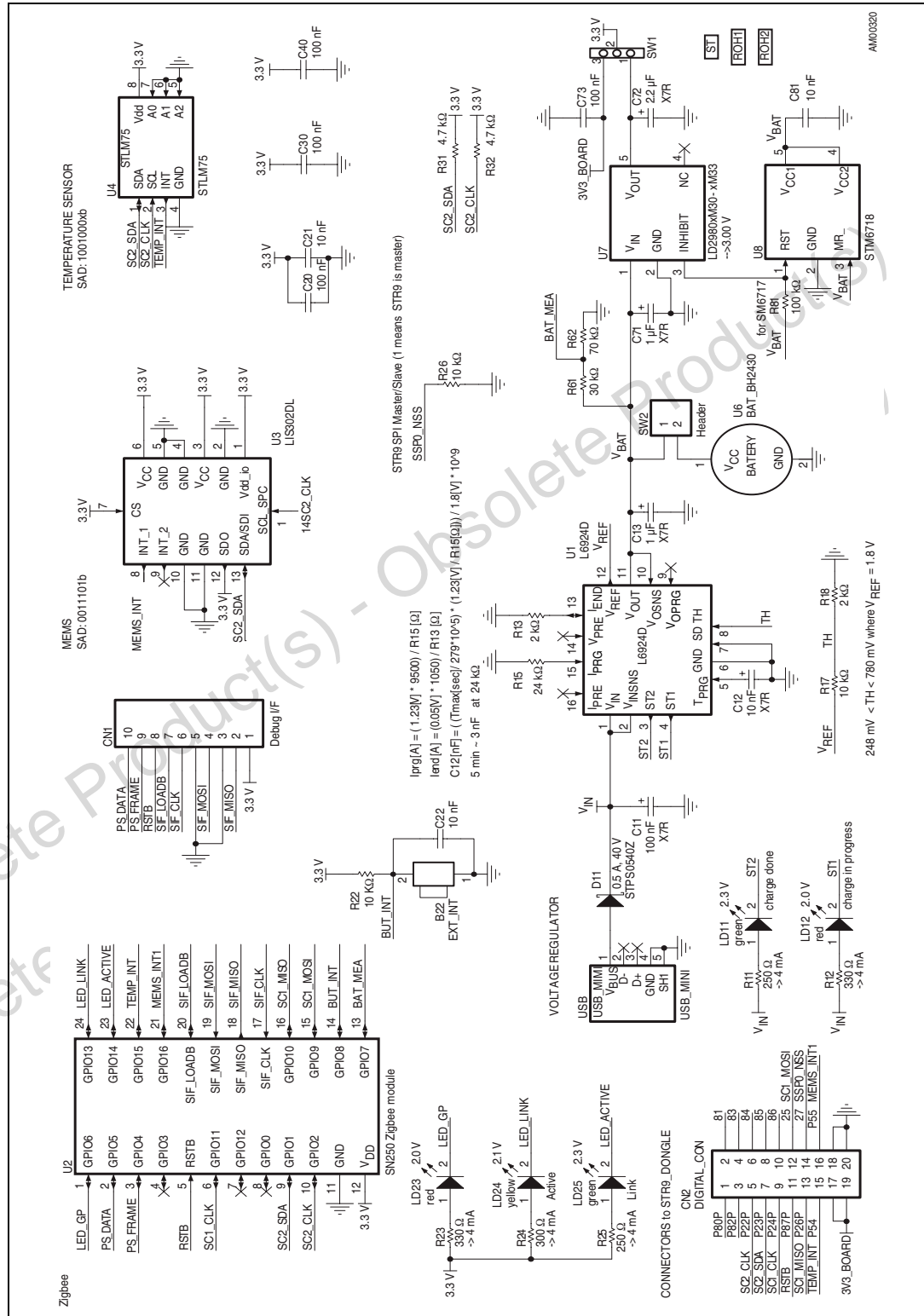
The extension board is supplied with demonstration firmware loaded in the SN250 Flash memory. The firmware source code is not provided by ST.

### Description

The STEVAL-IFS009V1 demonstration board operates in standalone mode. Alternatively, it can be used as an SN250 ZigBee interface with an application using the STR9 dongle.

# 1 Circuit schematic

Figure 1. STEVAL-IFS009V1 extension board schematic



## 2 Revision history

Table 1. Document revision history

Date	Revision	Changes
22-Nov-2010	1	Initial release.

Obsolete Product(s) - Obsolete Product(s)  
Obsolete Product(s) - Obsolete Product(s)

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