

Project Configuration Report

ecen5823-assignment8-adna4700

Target Device:

Target Part: EFR32BG13P632F512GM48

Boards:

- Wireless Starter Kit Mainboard (BRD4001A Rev A01)
- EFR32BG13 2.4 GHz 10 dBm Radio Board (BRD4104A Rev A00)

Target SDK

Gecko SDK Suite v3.2.7: Amazon, Bluetooth 3.2.8, Bluetooth Mesh 2.1.8, Flex 3.2.7.0, MCU 6.1.7.0, Micrium OS Kernel, OpenThread 1.2.7.0 (GitHub-a935fc51f), Platform 3.2.5.0, Wi-SUN 1.1.2.0, Z-Wave SDK 7.16.3.0
SDK Version: 3.2.7

Project Generators

- Simplicity IDE Project

Installed Software Components:

- Application

- *Utility*

- Assert**

- Configurable: true

- Configs: app_assert_config.h

- Log**

- Sources: app_log.c

- Configurable: true

- Configs: app_log_config.h

- Bluetooth

- *Feature*

- Advertiser**

- Configurable: true

- Configs: sl_bluetooth_advertiser_config.h

- Connection**

- Configurable: true

- Configs: sl_bluetooth_connection_config.h

- Scanner**

- Configurable: false

- *GATT*

Configuration

Configurable: true

Configs: gatt_configuration.btconf

- *OTA*

OTA DFU

Sources: sl_ota_dfu.c

Configurable: true

Configs: ota_dfu.xml

- *Stack*

Bluetooth Core

Sources: sl_bt_mbedtls_context.c

Configurable: true

Configs: sl_bluetooth_config.h

GATT Client

Configurable: false

GATT Server

Configurable: false

Security Manager

Configurable: false

System

Configurable: false

• Platform

- *Board*

• Radio Board

BRD4104A

Configurable: false

- *Bootloader*

Bootloader Application Interface

Sources: btl_interface_storage.c, btl_interface.c

Configurable: false

- *Device*

• EFR32BG13P

EFR32BG13P632F512GM48

Sources: system_efr32bg13p.c, startup_efr32bg13p.c, startup_efr32bg13p.s

Configurable: true

Configs: device.yaml

- *Driver*

GLIB Graphics Library

Sources: glib_font_narrow_6x8.c, glib_line.c, glib_string.c, bmp.c, glib.c, glib_polygon.c, glib_font_number_16x20.c, glib_circle.c, glib_font_normal_8x8.c, glib_rectangle.c, glib_bitmap.c

Configurable: false

GLIB driver for SHARP Memory LCD

Sources: dmd_memlcd.c

Configurable: false

- I2C

I2CSPM

Configurable: true

Configs: sl_i2cspm_sensor_config.h

- *Peripheral*

I2C

Sources: em_i2c.c

Configurable: false

LETIMER

Sources: em_letimer.c

Configurable: false

- *Radio*

RAIL Utility, PTI

Sources: sl_rail_util_pti.c

Configurable: true

Configs: sl_rail_util_pti_config.h

- *Utilities*

Component Catalog

Configurable: false

- Status Code

Status Code Strings

Sources: sl_status.c

Configurable: true

Configs: sl_status_string_config.h

- Services

Simple MPU

Sources: sl_mpu.c

Configurable: false

- IO Stream

IO Stream: USART

Configurable: true

Configs: sl_iostream_usart_vcom_config.h

Pins:

Pin #	Pin Name	Function	Custom Pin Name	Software Component
25	PA0	USART0_TX		IO Stream: USART (vcom)
26	PA1	USART0_RX		IO Stream: USART (vcom)
27	PA2	USART0_CTS		IO Stream: USART (vcom)
28	PA3	USART0_RTS		IO Stream: USART (vcom)
29	PA4			
30	PA5	GPIO mode		Board Control
31	PB11			
32	PB12	PTI_DOUT		RAIL Utility, PTI
33	PB13	PTI_DFRAME		RAIL Utility, PTI
35	PB14			
36	PB15			
47	PC10	I2C0_SCL		I2CSPM (sensor)
48	PC11	I2C0_SDA		I2CSPM (sensor)
43	PC6	USART1_TX		Memory LCD with usart SPI driver
44	PC7			
45	PC8	USART1_CLK		Memory LCD with usart SPI driver
46	PC9			
19	PD10			
20	PD11			
21	PD12			
22	PD13	GPIO mode		Memory LCD with usart SPI driver
23	PD14	GPIO mode		Memory LCD with usart SPI driver
24	PD15	GPIO mode		Board Control
1	PF0			
2	PF1			
3	PF2			
4	PF3			
5	PF4			
6	PF5			
7	PF6			
8	PF7			

Peripherals:

Peripheral	Software Component	Custom Peripheral Name
ACMP0		
ACMP1		
ADC0		
CMU		

DBG		
ETM		
GPIO		
I2C0	I2CSPM (sensor)	
I2C1	I2CSPM (sensor)	
LESENSE		
LETIMER0		
LEUART0		
LFXO		
MODEM		
PCNT0		
PRS Channel CH0		
PRS Channel CH1		
PRS Channel CH2		
PRS Channel CH3		
PRS Channel CH4		
PRS Channel CH5		
PRS Channel CH6		
PRS Channel CH7		
PRS Channel CH8		
PRS Channel CH9		
PRS Channel CH10		
PRS Channel CH11		
PTI	RAIL Utility, PTI	
TIMER0		
TIMER1		
USART0	IO Stream: USART (vcom)	
USART1	IO Stream: USART (vcom)	
USART2	IO Stream: USART (vcom)	
VDAC0		
WTIMER0		