
STM32
CubeMX

1. Description

1.1. Project

Project Name	interruptersequence
Board Name	NUCLEO-L552ZE-Q
Generated with:	STM32CubeMX 6.8.1
Date	04/22/2024

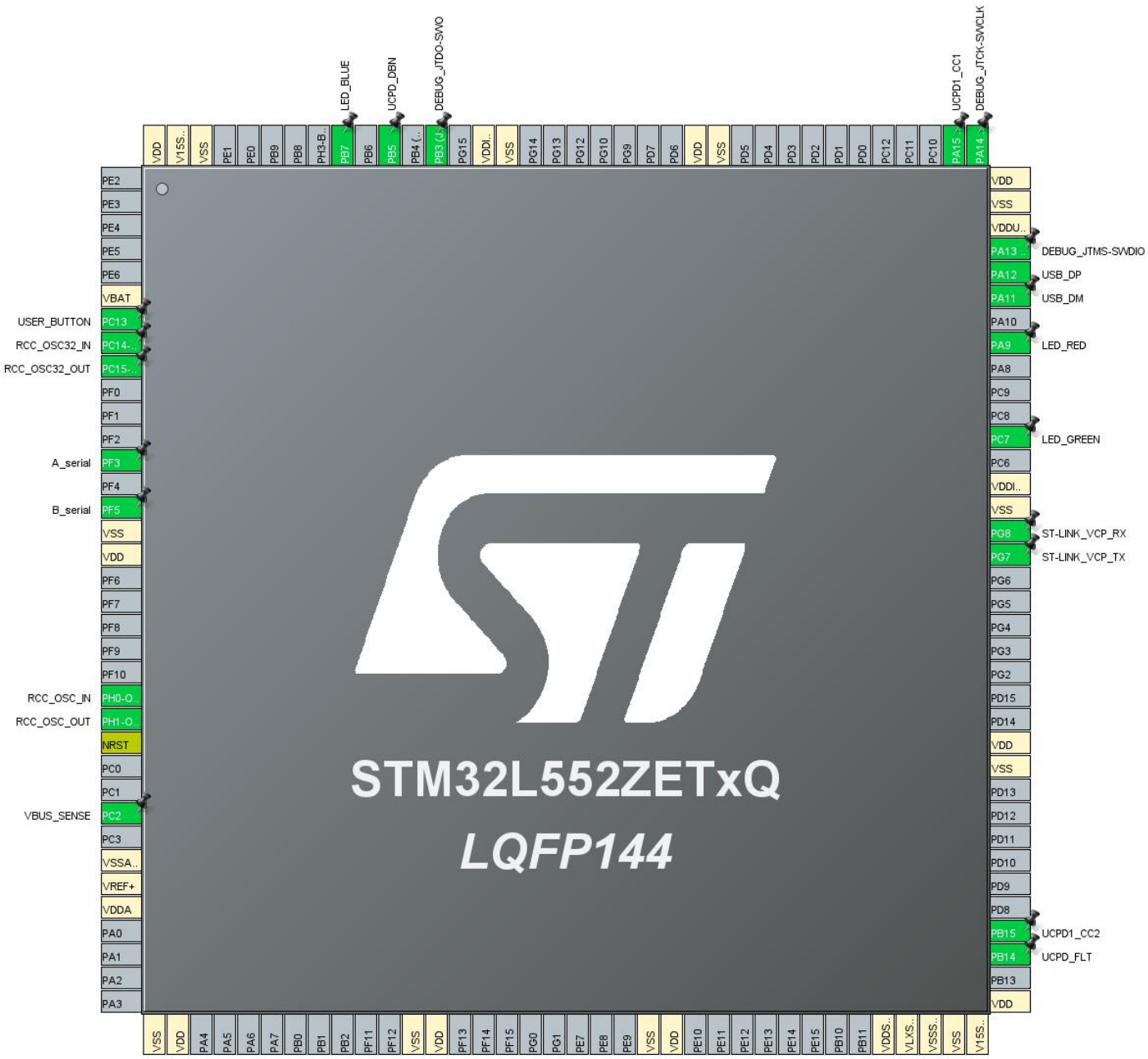
1.2. MCU

MCU Series	STM32L5
MCU Line	STM32L5x2
MCU name	STM32L552ZETxQ
MCU Package	LQFP144
MCU Pin number	144

1.3. Core(s) information

Core(s)	ARM Cortex-M33

2. Pinout Configuration



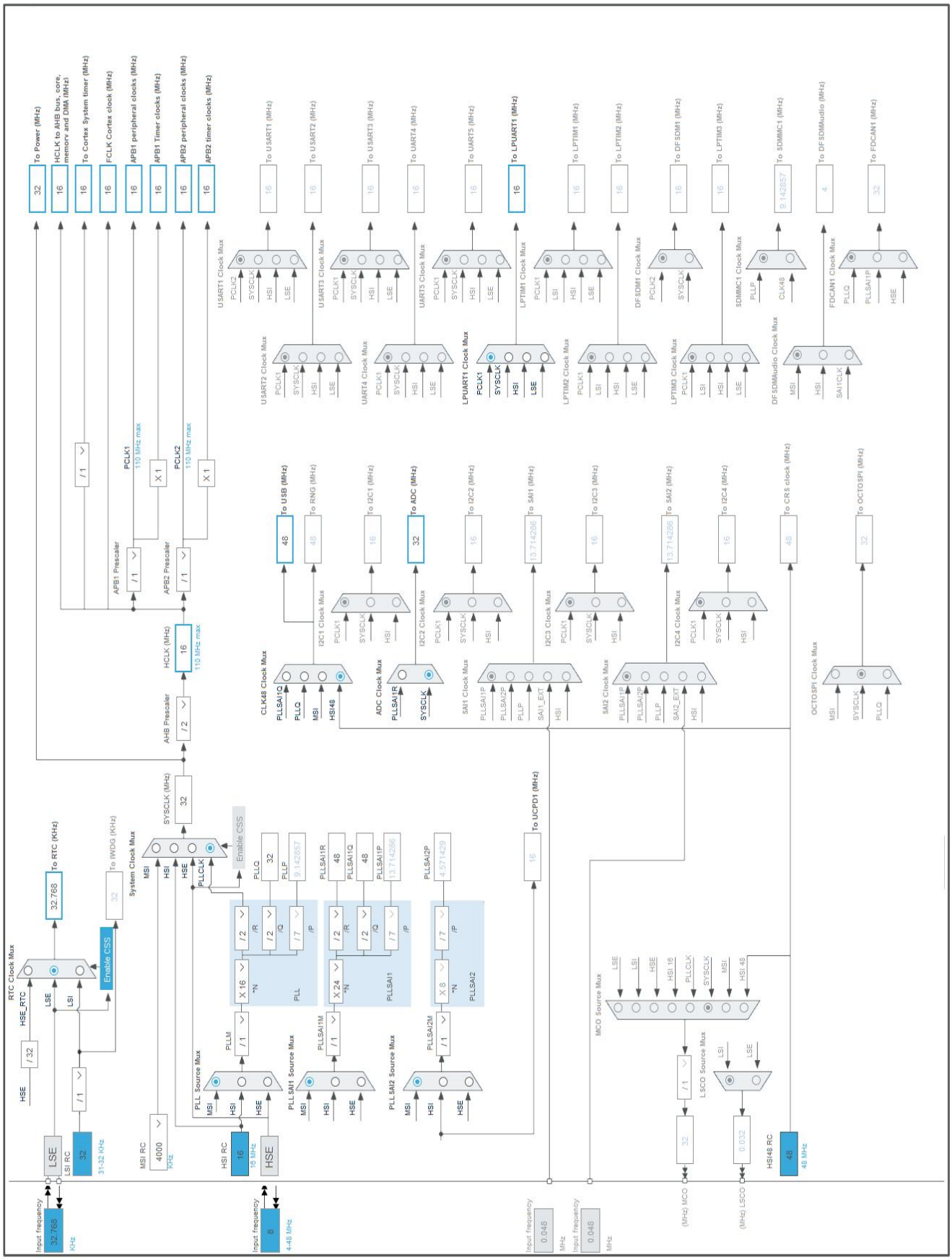
3. Pins Configuration

Pin Number LQFP144	Pin Name (function after reset)	Pin Type	Alternate Function(s)	Label
6	VBAT	Power		
7	PC13	I/O	PWR_WKUP2	USER_BUTTON
8	PC14-OSC32_IN (PC14)	I/O	RCC_OSC32_IN	
9	PC15-OSC32_OUT (PC15)	I/O	RCC_OSC32_OUT	
13	PF3 *	I/O	GPIO_Output	A_serial
15	PF5 *	I/O	GPIO_Output	B_serial
16	VSS	Power		
17	VDD	Power		
23	PH0-OSC_IN (PH0)	I/O	RCC_OSC_IN	
24	PH1-OSC_OUT (PH1)	I/O	RCC_OSC_OUT	
25	NRST	Reset		
28	PC2	I/O	ADC1_IN3	VBUS_SENSE
30	VSSA/VREF-	Power		
31	VREF+	Power		
32	VDDA	Power		
37	VSS	Power		
38	VDD	Power		
48	VSS	Power		
49	VDD	Power		
58	VSS	Power		
59	VDD	Power		
68	VDDSMPS	Power		
69	VLXSMPS	Power		
70	VSSSMPS	Power		
71	VSS	Power		
72	V15SMPS	Power		
73	VDD	Power		
75	PB14	I/O	GPIO_EXTI14	UCPD_FLT
76	PB15	I/O	UCPD1_CC2	
83	VSS	Power		
84	VDD	Power		
92	PG7	I/O	LPUART1_TX	ST-LINK_VCP_TX
93	PG8	I/O	LPUART1_RX	ST-LINK_VCP_RX
94	VSS	Power		
95	VDDIO2	Power		
97	PC7 *	I/O	GPIO_Output	LED_GREEN

Pin Number LQFP144	Pin Name (function after reset)	Pin Type	Alternate Function(s)	Label
101	PA9 *	I/O	GPIO_Output	LED_RED
103	PA11	I/O	USB_DM	
104	PA12	I/O	USB_DP	
105	PA13 (JTMS/SWDIO)	I/O	DEBUG_JTMS-SWDIO	
106	VDDUSB	Power		
107	VSS	Power		
108	VDD	Power		
109	PA14 (JTCK/SWCLK)	I/O	DEBUG_JTCK-SWCLK	
110	PA15 (JTDI)	I/O	UCPD1_CC1	
120	VSS	Power		
121	VDD	Power		
129	VSS	Power		
130	VDDIO2	Power		
132	PB3 (JTDO/TRACESWO)	I/O	DEBUG_JTDO-SWO	
134	PB5 *	I/O	GPIO_Output	UCPD_DBN
136	PB7 *	I/O	GPIO_Output	LED_BLUE
142	VSS	Power		
143	V15SMPS	Power		
144	VDD	Power		

* The pin is affected with an I/O function

4. Clock Tree Configuration



5. Software Project

5.1. Project Settings

Name	Value
Project Name	interruptersequence
Project Folder	C:\Users\Kriti Jain\STM32CubeIDE\workspace_1.12.1\interruptersequence
Toolchain / IDE	STM32CubeIDE
Firmware Package Name and Version	STM32Cube FW_L5 V1.5.1
Application Structure	Advanced
Generate Under Root	Yes
Do not generate the main()	No
Minimum Heap Size	0x200
Minimum Stack Size	0x400

5.2. Code Generation Settings

Name	Value
STM32Cube MCU packages and embedded software	Copy only the necessary library files
Generate peripheral initialization as a pair of '.c/.h' files	No
Backup previously generated files when re-generating	No
Keep User Code when re-generating	Yes
Delete previously generated files when not re-generated	Yes
Set all free pins as analog (to optimize the power consumption)	No
Enable Full Assert	No

5.3. Advanced Settings - Generated Function Calls

Rank	Function Name	Peripheral Instance Name
1	SystemClock_Config	RCC
2	MX_GPIO_Init	GPIO
3	MX_ADC1_Init	ADC1
4	MX_LPUART1_UART_Init	LPUART1
5	MX_RTC_Init	RTC
6	MX_UCPD1_Init	UCPD1
7	MX_USB_PCD_Init	USB
8	MX_TIM2_Init	TIM2

6. Power Consumption Calculator report

6.1. Microcontroller Selection

Series	STM32L5
Line	STM32L5x2
MCU	STM32L552ZETxQ
Datasheet	DS12737_Rev5

6.2. Parameter Selection

Temperature	25
Vdd	3.0

6.3. Battery Selection

Battery	Li-SOCL2(A3400)
Capacity	3400.0 mAh
Self Discharge	0.08 %/month
Nominal Voltage	3.6 V
Max Cont Current	100.0 mA
Max Pulse Current	200.0 mA
Cells in series	1
Cells in parallel	1

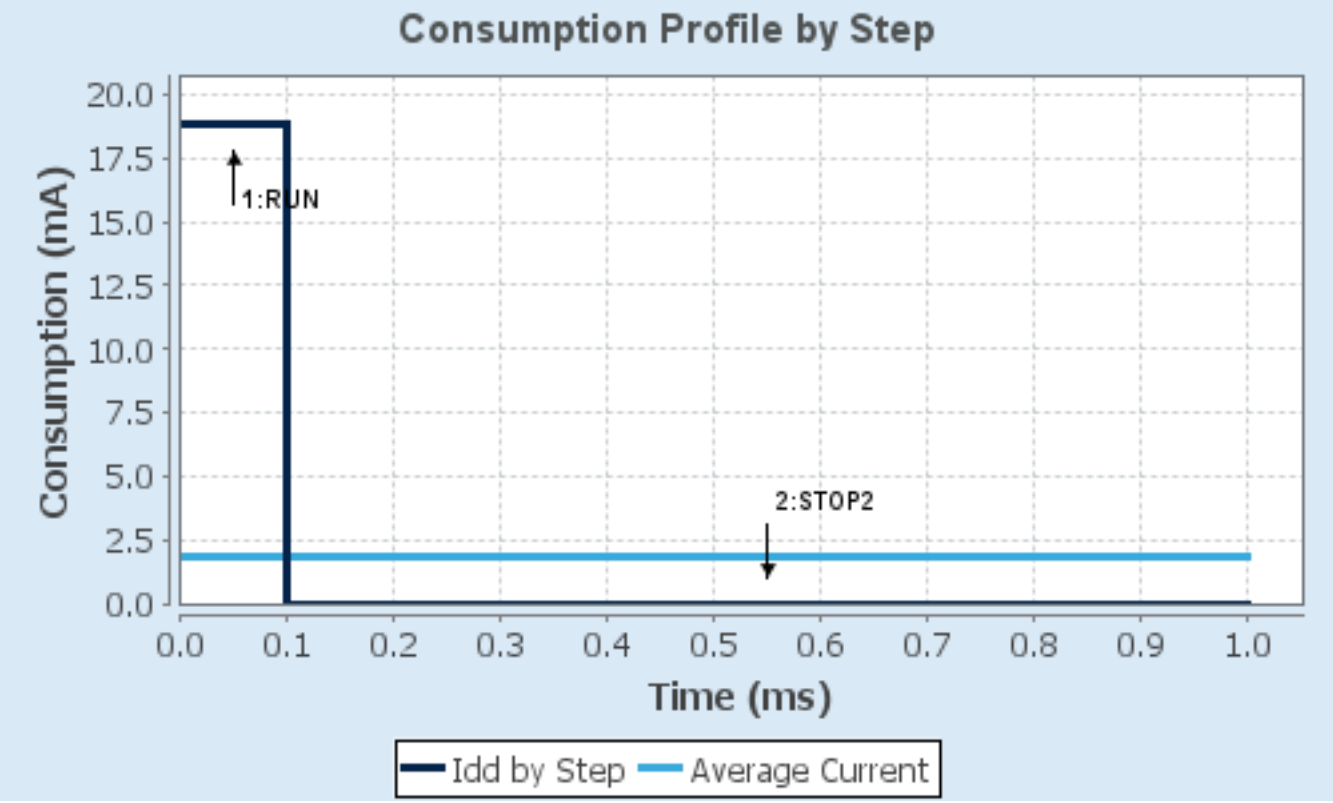
6.4. Sequence

Step	Step1	Step2
Mode	RUN	STOP2
Vdd	3.0	3.0
Voltage Source	Battery	Battery
Range	Range0-High	NoRange
Fetch Type	FLASH/SingleBank	NA
CPU Frequency	110 MHz	0 Hz
Clock Configuration	HSE BYP PLL	ALL CLOCKS OFF
Clock Source Frequency	4 MHz	0 Hz
Peripherals		
Additional Cons.	0 mA	0 mA
Average Current	18.8 mA	3.83 µA
Duration	0.1 ms	0.9 ms
DMIPS	138.0	0.0
Ta Max	102.29	105
Category	In DS Table	In DS Table

6.5. Results

Sequence Time	1 ms	Average Current	1.88 mA
Battery Life	2 months, 14 days, 5 hours	Average DMIPS	137.5 DMIPS

6.6. Chart


Consumption Profile by Step
Consumption (mA)
20.0
17.5
15.0
12.5
10.0
7.5
5.0
2.5
0.0
1:RUN
2:STOP2
0.0
0.1
0.2
0.3
0.4
0.5
0.6
0.7
0.8
0.9
1.0
Time (ms)
Idd by Step
Average Current

7. Peripherals and Middlewares Configuration

7.1. ADC1

IN3: IN3 Single-ended

7.1.1. Parameter Settings:

ADCs_Common_Settings:

Mode	Independent mode

ADC_Settings:

Clock Prescaler	Asynchronous clock mode divided by 1
Resolution	ADC 12-bit resolution
Data Alignment	Right alignment
Scan Conversion Mode	Disabled
Continuous Conversion Mode	Disabled
Discontinuous Conversion Mode	Disabled
DMA Continuous Requests	Disabled
End Of Conversion Selection	End of single conversion
Overrun behaviour	Overrun data preserved
Low Power Auto Wait	Disabled

ADC_Regular_ConversionMode:

Enable Regular Conversions	Enable
Enable Regular Oversampling	Disable
Number Of Conversion	1
External Trigger Conversion Source	Regular Conversion launched by software
External Trigger Conversion Edge	None
Rank	1
Channel	Channel 3
Sampling Time	2.5 Cycles
Offset Number	No offset

ADC_Injected_ConversionMode:

Enable Injected Conversions	Disable

Analog Watchdog 1:

Enable Analog WatchDog1 Mode	false

Analog Watchdog 2:

Enable Analog WatchDog2 Mode	false

Analog Watchdog 3:

Enable Analog WatchDog3 Mode	false

7.2. DEBUG

Debug: Trace Asynchronous Sw

7.3. LPUART1

Mode: Asynchronous

7.3.1. Parameter Settings:

Basic Parameters:

Baud Rate	209700
Word Length	8 Bits (including Parity)
Parity	None
Stop Bits	1

Advanced Parameters:

Data Direction	Receive and Transmit
Single Sample	Disable
ClockPrescaler	1
Fifo Mode	FIFO mode disable
Txfifo Threshold	1 eighth full configuration
Rxfifo Threshold	1 eighth full configuration

Advanced Features:

TX Pin Active Level Inversion	Disable
RX Pin Active Level Inversion	Disable
Data Inversion	Disable
TX and RX pins Swapping	Disable
Overrun	Enable
DMA on RX Error	Enable
MSB First	Disable

7.4. PWR

mode: Wake-Up 1

mode: save power of non-active UCPD - deactive Dead Battery pull-up

7.5. RCC

High Speed Clock (HSE): Crystal/Ceramic Resonator

Low Speed Clock (LSE) : Crystal/Ceramic Resonator

7.5.1. Parameter Settings:

System Parameters:

VDD voltage (V)	3.3
Flash Latency(WS)	1 WS (2 CPU cycle)

RCC Parameters:

HSI Calibration Value	64
MSI Calibration Value	0
MSI Auto Calibration	Disabled
HSE Startup Timout Value (ms)	100
LSE Startup Timout Value (ms)	5000
LSE Drive Capability	LSE oscillator low drive capability

Power Parameters:

Power Regulator Voltage Scale	Power Regulator Voltage Scale 2

7.6. RTC

mode: Activate Clock Source

7.6.1. Parameter Settings:

General:

Hour Format	Hourformat 24
Asynchronous Predivider value	127
Synchronous Predivider value	255

7.6.2. TZSC Privilegeable RTC:

Privilege RTC:

RTC full privilege	Disable

Backup register:

Start zone 1	RTC_BKP_DR0
Start Zone 2	RTC_BKP_DR0
start zone 3	RTC_BKP_DR0

Privilege Backup register :

Backup Register PrivZone	Non-privilege

Privilege RTC Feature:

RTC_FEATURE_INIT	Non-Privilege
RTC_FEATURE_ALRA	Non-Privilege
RTC_FEATURE_ALRB	Non-Privilege
RTC_FEATURE_CAL	Non-Privilege
RTC_FEATURE_TS	Non-Privilege
RTC_FEATURE_WUT	Non-Privilege

7.7. SYS

Timebase Source: SysTick

7.8. TIM2

Clock Source : Internal Clock

7.8.1. Parameter Settings:

Counter Settings:

Prescaler (PSC - 16 bits value)	**999 ***
Counter Mode	Up
Counter Period (AutoReload Register - 32 bits value)	**600 ***
Internal Clock Division (CKD)	No Division
auto-reload preload	Disable

Trigger Output (TRGO) Parameters:

Master/Slave Mode (MSM bit)	Disable (Trigger input effect not delayed)
Trigger Event Selection TRGO	Reset (UG bit from TIMx_EGR)

7.9. UCPD1

UCPD Mode: Source

7.9.1. Parameter Settings:

Version	1.0

7.10. USB

mode: Device (FS)

7.10.1. Parameter Settings:

Basic Parameters:

Speed	Full Speed 12MBit/s
Physical interface	Internal Phy
Sof Enable	Disabled

Power Parameters:

Low Power	Disabled
Link Power Management	Disabled

Battery Charging	Disabled

*** User modified value**

8. System Configuration

8.1. GPIO configuration

IP	Pin	Signal	GPIO mode	GPIO pull/up pull down	Max Speed	User Label
ADC1	PC2	ADC1_IN3	Analog mode	No pull-up and no pull-down	n/a	VBUS_SENSE
DEBUG	PA13 (JTMS/SWDIO)	DEBUG_JTMS-SWDIO	n/a	n/a	n/a	
	PA14 (JTCK/SWCLK)	DEBUG_JTCK-SWCLK	n/a	n/a	n/a	
	PB3 (JTDO/TRACESWO)	DEBUG_JTDO-SWO	n/a	n/a	n/a	
LPUART1	PG7	LPUART1_TX	Alternate Function Push Pull	No pull-up and no pull-down	Low	ST-LINK_VCP_TX
	PG8	LPUART1_RX	Alternate Function Push Pull	No pull-up and no pull-down	Low	ST-LINK_VCP_RX
PWR	PC13	PWR_WKUP2	n/a	n/a	n/a	USER_BUTTON
RCC	PC14-OSC32_IN (PC14)	RCC_OSC32_IN	n/a	n/a	n/a	
	PC15-OSC32_OUT (PC15)	RCC_OSC32_OUT	n/a	n/a	n/a	
	PH0-OSC_IN (PH0)	RCC_OSC_IN	n/a	n/a	n/a	
	PH1-OSC_OUT (PH1)	RCC_OSC_OUT	n/a	n/a	n/a	
UCPD1	PB15	UCPD1_CC2	Analog mode	No pull-up and no pull-down	n/a	
	PA15 (JTDI)	UCPD1_CC1	Analog mode	No pull-up and no pull-down	n/a	
USB	PA11	USB_DM	Alternate Function Push Pull	No pull-up and no pull-down	Low	
	PA12	USB_DP	Alternate Function Push Pull	No pull-up and no pull-down	Low	
GPIO	PF3	GPIO_Output	Output Push Pull	No pull-up and no pull-down	Low	A_serial
	PF5	GPIO_Output	Output Push Pull	No pull-up and no pull-down	Low	B_serial
	PB14	GPIO_EXTI14	External Interrupt Mode with Rising edge trigger detection	No pull-up and no pull-down	n/a	UCPD_FLT
	PC7	GPIO_Output	Output Push Pull	No pull-up and no pull-down	Low	LED_GREEN
	PA9	GPIO_Output	Output Push Pull	No pull-up and no pull-down	Low	LED_RED
	PB5	GPIO_Output	Output Push Pull	No pull-up and no pull-down	Low	UCPD_DBN
	PB7	GPIO_Output	Output Push Pull	No pull-up and no pull-down	Low	LED_BLUE

8.2. DMA configuration

nothing configured in DMA service

8.3. NVIC configuration

8.3.1. NVIC

Interrupt Table	Enable	Preenmption Priority	SubPriority
Non maskable interrupt	true	0	0
Hard fault interrupt	true	0	0
Memory management fault	true	0	0
Prefetch fault, memory access fault	true	0	0
Undefined instruction or illegal state	true	0	0
System service call via SWI instruction	true	0	0
Debug monitor	true	0	0
Pendable request for system service	true	0	0
System tick timer	true	0	0
TIM2 global interrupt	true	0	0
PVD/PVM1/PVM2/PVM3/PVM4 interrupts through EXTI lines 16/35/36/37/38	unused		
Flash non-secure global interrupt	unused		
RCC non-secure global interrupt	unused		
EXTI line14 interrupt	unused		
ADC1 and ADC2 interrupts	unused		
LPUART1 global interrupt / LPUART1 wake-up interrupt through EXTI line 31	unused		
USB FS global interrupt / USB FS wake-up interrupt through EXTI line 34	unused		
FPU global interrupt	unused		
UCPD1 interrupt / UCPD1 wake-up interrupt through EXTI line 41	unused		

8.3.2. NVIC Code generation

Enabled interrupt Table	Select for init sequence ordering	Generate IRQ handler	Call HAL handler
Non maskable interrupt	false	true	false
Hard fault interrupt	false	true	false
Memory management fault	false	true	false
Prefetch fault, memory access fault	false	true	false
Undefined instruction or illegal state	false	true	false
System service call via SWI instruction	false	true	false
Debug monitor	false	true	false
Pendable request for system service	false	true	false
System tick timer	false	true	true
TIM2 global interrupt	false	true	true

*** User modified value**

9. System Views

9.1. Category view

9.1.1. Current

10. Docs & Resources

Type	Link
BSDL files	https://www.st.com/resource/en/bsdl_model/stm32l5_bsdl.zip
IBIS models	https://www.st.com/resource/en/ibis_model/stm32l5_ibis.zip
Presentations	https://www.st.com/resource/en/product_presentation/stm32-stm8_embedded_software_solutions.pdf
Presentations	https://www.st.com/resource/en/product_presentation/stm32_eval-tools_portfolio.pdf
Presentations	https://www.st.com/resource/en/product_presentation/stm32_stm8_functional-safety-packages.pdf
Presentations	https://www.st.com/resource/en/product_presentation/stm32-usb-c-pd-solutions-presentation.pdf
Presentations	https://www.st.com/resource/en/product_presentation/stm32-stm8_software_development_tools.pdf
Presentations	https://www.st.com/resource/en/product_presentation/microcontrollers_stm32l5_series_product_overview.pdf
Presentations	https://www.st.com/resource/en/product_presentation/microcontrollers-stm32-family-overview.pdf
Brochures	https://www.st.com/resource/en/brochure/brstm32ulp.pdf
Flyers	https://www.st.com/resource/en/flyer/flstm32l5.pdf
Flyers	https://www.st.com/resource/en/flyer/flstm32nucleo.pdf
Application Notes	https://www.st.com/resource/en/application_note/an1181-electrostatic-discharge-sensitivity-measurement-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an1709-emc-design-guide-for-stm8-stm32-and-legacy-mcus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an2606-stm32-microcontroller-system-memory-boot-mode-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an2639-soldering-recommendations-and-package-information-for-leadfree-ecopack-mcus-and-mpus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an2867-oscillator-

	design-guide-for-stm8afals-stm32-mcus-and-mpus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an3126-audio-and-waveform-generation-using-the-dac-in-stm32-products-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an3155-usart-protocol-used-in-the-stm32-bootloader-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an3156-usb-dfu-protocol-used-in-the-stm32-bootloader-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an3236-increase-the-number-of-touchkeys-for-touch-sensing-applications-on-mcus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an3960-esd-considerations-for-touch-sensing-applications-on-mcus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4013-stm32-crossseries-timer-overview-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4221-i2c-protocol-used-in-the-stm32-bootloader-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4229-how-to-implement-a-vocoder-solution-using-stm32-microcontrollers-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4277-using-stm32-device-pwm-shutdown-features-for-motor-control-and-digital-power-conversion-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4286-spi-protocol-used-in-the-stm32-bootloader-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4299-improve-conducted-noise-robustness-for-touch-sensing-applications-on-mcus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4310-sampling-capacitor-selection-guide-for-touch-sensing-applications-on-mcus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4312-design-with-

	surface-sensors-for-touch-sensing-applications-on-mcus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4316-tuning-a-touch-sensing-application-on-mcus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4566-extending-the-dac-performance-of-stm32-microcontrollers-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4635-minimization-of-power-consumption-using-lpuart-for-stm32-microcontrollers-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4655-virtually-increasing-the-number-of-serial-communication-peripherals-in-stm32-applications-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4750-handling-of-soft-errors-in-stm32-applications-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4759-using-the-hardware-realtime-clock-rtc-and-the-tamper-management-unit-tamp-with-stm32-microcontrollers-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4776-generalpurpose-timer-cookbook-for-stm32-microcontrollers-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4803-highspeed-si-simulations-using-ibis-and-boardlevel-simulations-using-hyperlynx-si-on-stm32-mcus-and-mpus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4989-stm32-microcontroller-debug-toolbox-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5027-interfacing-pdm-digital-microphones-using-stm32-mcus-and-mpus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5105-getting-started-with-touch-sensing-control-on-stm32-microcontrollers-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5138-migrating-from-stm32l4-and-stm32l4-to-stm32l5-series-microcontrollers-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5211-getting-started-

	with-stm32l5-series-hardware-development-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5213-stm32l5-series-microcontroller-ultralowpower-features-overview-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5224-stm32-dmamux-the-dma-request-router-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5424-stm32cube-firmware-examples-for-stm32l5-series-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5543-enhanced-methods-to-handle-spi-communication-on-stm32-devices-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5600-stm32l5-series-gpio-usage-with-trustzone-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5447-overview-of-secure-boot-and-secure-firmware-update-solution-on-arm-trustzone-stm32-microcontrollers-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5347-arm-trustzone-features-for-stm32l5-and-stm32u5-series-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4899-stm32-microcontroller-gpio-hardware-settings-and-lowpower-consumption-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5612-esd-protection-of-stm32-mcus-and-mpus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5156-introduction-to-stm32-microcontrollers-security-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5212-using-stm32-cache-to-optimize-performance-and-power-efficiency-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an2548-using-the-stm32f0f1f3cxgxlx-series-dma-controller-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4991-how-to-wake-up-an-stm32-microcontroller-from-lowpower-mode-with-the-usart-or-the-lpuart-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4838-introduction-to-

	memory-protection-unit-management-on-stm32-mcus-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5348-introduction-to-fdcan-peripherals-for-stm32-product-classes-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an4230-random-number-generation-validation-using-nist-statistical-test-suite-for-stm32-microcontrollers-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5050-getting-started-with-octospi-and-hexadecaspi-interface-on-stm32-microcontrollers-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5371-migration-from-stm32l5-series-to-stm32u5-series-microcontrollers-stmicroelectronics.pdf
Application Notes	https://www.st.com/resource/en/application_note/an5225-introduction-to-usb-typec-power-delivery-for-stm32-mcus-and-mpus-stmicroelectronics.pdf
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