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1  /* USER CODE BEGIN Header */
2  /**
3   *
4   * @file           : main.h
5   * @brief          : Header for main.c file.
6   *                  This file contains the common defines of the application.
7   *
8   * @attention
9   *
10  * Copyright (c) 2023 STMicroelectronics.
11  * All rights reserved.
12  *
13  * This software is licensed under terms that can be found in the LICENSE file
14  * in the root directory of this software component.
15  * If no LICENSE file comes with this software, it is provided AS-IS.
16  *
17  *
18  */
19  /* USER CODE END Header */
20
21  /* Define to prevent recursive inclusion -----*/
22  #ifndef __MAIN_H
23  #define __MAIN_H
24
25  #ifdef __cplusplus
26  extern "C" {
27  #endif
28
29  /* Includes -----*/
30  #include "stm32l4xx_hal.h"
31
32  /* Private includes -----*/
33  /* USER CODE BEGIN Includes */
34  #include <stdio.h>
35  #include <string.h>
36  #include <stdbool.h>
37  /* USER CODE END Includes */
38
39  /* Exported types -----*/
40  /* USER CODE BEGIN ET */
41  enum State {
42      FRAM_0,
43      FRAM_1,
44      FRAM_2,
45      FRAM_3,
46  };
47
48  enum color_Led {
49      RED,
50      BLUE,
51      GREEN,
52      OFF,
53  };
54
55  enum trig_channel {
56      CHANNEL_0,
57      CHANNEL_1,
58      CHANNEL_2,
59      CHANNEL_3,
60  };
61
62  extern const uint32_t TAB_SIZE;
63
64  extern enum color_Led LED_STATE;
65
66  extern bool reset;
67  extern bool start;
68  extern bool acqu;
69
70  /* USER CODE END ET */
71
72  /* Exported constants -----*/
73  /* USER CODE BEGIN EC */

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74
75 /* USER CODE END EC */
76
77 /* Exported macro -----*/
78 /* USER CODE BEGIN EM */
79
80 /* USER CODE END EM */
81
82 /* Exported functions prototypes -----*/
83 void Error_Handler(void);
84
85 /* USER CODE BEGIN EFP */
86
87 /* USER CODE END EFP */
88
89 /* Private defines -----*/
90 #define WAKE_UP_Pin GPIO_PIN_13
91 #define WAKE_UP_GPIO_Port GPIOC
92 #define WAKE_UP_EXTI_IRQn EXTI15_10_IRQn
93 #define FPGA_RESET_Pin GPIO_PIN_0
94 #define FPGA_RESET_GPIO_Port GPIOC
95 #define STM_UI_MOSI_Pin GPIO_PIN_1
96 #define STM_UI_MOSI_GPIO_Port GPIOC
97 #define FPGA_PRETRIG_Pin GPIO_PIN_2
98 #define FPGA_PRETRIG_GPIO_Port GPIOC
99 #define SELECTOR_M0_Pin GPIO_PIN_0
100 #define SELECTOR_M0_GPIO_Port GPIOA
101 #define STM_FPGA_SCK_Pin GPIO_PIN_1
102 #define STM_FPGA_SCK_GPIO_Port GPIOA
103 #define SELECTOR_M1_Pin GPIO_PIN_2
104 #define SELECTOR_M1_GPIO_Port GPIOA
105 #define SELECTOR_M2_Pin GPIO_PIN_3
106 #define SELECTOR_M2_GPIO_Port GPIOA
107 #define STM_FPGA_MISO_Pin GPIO_PIN_6
108 #define STM_FPGA_MISO_GPIO_Port GPIOA
109 #define STM_FPGA_MOSI_Pin GPIO_PIN_7
110 #define STM_FPGA_MOSI_GPIO_Port GPIOA
111 #define UI_LED_G_Pin GPIO_PIN_0
112 #define UI_LED_G_GPIO_Port GPIOB
113 #define UI_LED_R_Pin GPIO_PIN_1
114 #define UI_LED_R_GPIO_Port GPIOB
115 #define UI_LED_B_Pin GPIO_PIN_2
116 #define UI_LED_B_GPIO_Port GPIOB
117 #define STM_UI_SCK_Pin GPIO_PIN_10
118 #define STM_UI_SCK_GPIO_Port GPIOB
119 #define FPGA_DONE_Pin GPIO_PIN_15
120 #define FPGA_DONE_GPIO_Port GPIOB
121 #define FPGA_DONE_EXTI_IRQn EXTI15_10_IRQn
122 #define SD_DETECT_INT_Pin GPIO_PIN_7
123 #define SD_DETECT_INT_GPIO_Port GPIOC
124 #define SELECTOR_M3_Pin GPIO_PIN_8
125 #define SELECTOR_M3_GPIO_Port GPIOA
126 #define USB_VBUS_INT_Pin GPIO_PIN_10
127 #define USB_VBUS_INT_GPIO_Port GPIOA
128 #define USB_VBUS_INT_EXTI_IRQn EXTI15_10_IRQn
129 #define ARM_BUTTON_Pin GPIO_PIN_4
130 #define ARM_BUTTON_GPIO_Port GPIOB
131 #define ARM_BUTTON_EXTI_IRQn EXTI4_IRQn
132 #define TRIG_SRC0_Pin GPIO_PIN_5
133 #define TRIG_SRC0_GPIO_Port GPIOB
134 #define TRIG_SRC1_Pin GPIO_PIN_8
135 #define TRIG_SRC1_GPIO_Port GPIOB
136 /* USER CODE BEGIN Private defines */
137 #define MEMORY_SIZE 524288
138 // #define TAB_SIZE 87381
139 #define DAC_MAX_VALUE 4096
140 #define VREF_VOLTAGE 3.3
141 /* USER CODE END Private defines */
142
143 #ifdef __cplusplus
144 }
145 #endif
146

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147  #endif /* __MAIN_H */
148
```