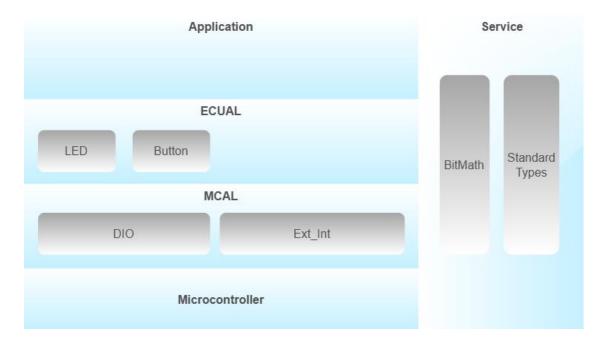
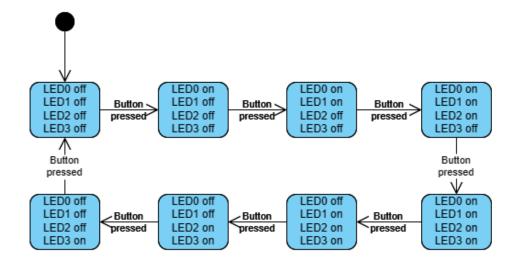
LED SEQUENCE V 2.0

LAYERED ARCHITECTURE

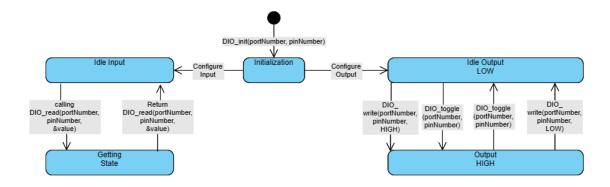


STATE MACHINE DIAGRAM

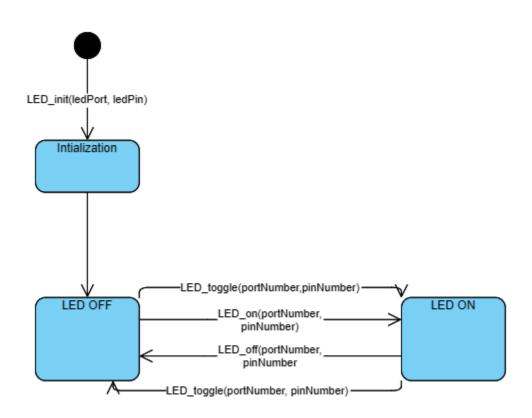


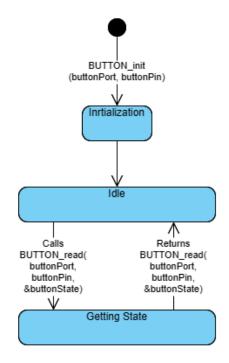
DRIVERS APIS STATE DIAGRAMS

DIO

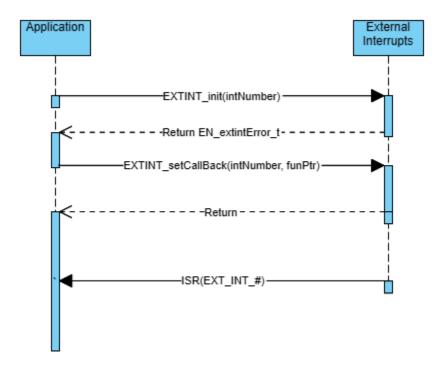


LED





EXTERNAL INTERRUPTS



```
API
1
EN d
```

```
1. DIO
EN dioError t DIO init(uint8 t portNumber, uint8 t pinNumber, uint8 t direction);
EN dioError t DIO write(uint8 t portNumber, uint8 t pinNumber, uint8 t value);
EN dioError t DIO toggle(uint8 t portNumber, uint8 t pinNumber);
EN dioError t DIO read(uint8 t portNumber, uint8 t pinNumber, uint8 t *value);
   2. EXTERNAL INTERRUPTS
EN_extintError_t EXTINT_Init (uint8_t intNumber);
void EXTINT setCallBackInt (uint8 t intNumber, void (*funPtr) (void));
   3. LED
EN ledError t LED init(uint8 t ledPort, uint8 t ledPin);
EN_ledError_t LED_on(uint8_t ledPort,uint8_t ledPin);
EN_ledError_t LED_off(uint8_t ledPort,uint8_t ledPin);
EN ledError t LED toggle(uint8 t ledPort,uint8 t ledPin);
   4. BUTTON
EN buttonError t BUTTON init(uint8 t buttonPort, uint8 t buttonPin);
EN buttonError t BUTTON read(uint8 t buttonPort, uint8 t buttonPin, uint8 t *buttonState);
   5. APP
void APP_initModules(void);
void APP ledSequenceV 1 (void);
void button1Task (void);
```