Requirements on Button Driver

Team X

Contents

Scope of document:

This document specifies requirements on the module Button Driver.

Functional overview:

The Button driver initializes the Button, reads the value on the button's pin, and sets the state pull-up for the button.

Requirement specifications:

Functional Requirements:

Configuration and initialization:

1- **[SRS_Button_211] The Button Driver shall support symbolic names for the Button.**

Type:	Valid
Description:	The Button driver shall allow the static configuration of the following symbolic names: ● Button port ● Button pin
Rationale:	Provide human-readable symbolic names for Button
Use cases	--
Dependencies	--
Supporting material	--

2- **pins.[SRS_Button_212] The Button driver shall provide a service that initializes the Button.**

Type:	Valid
Description:	The Button driver shall provide a service that initializes Button pin as input
Rationale:	Basic functionality
Use cases	Initialize the Button
Dependencies	[SRS_Button_211]
Supporting material	--

Normal operation:

1- [SRS_Button_213] The Button driver shall provide a service read button pin

Type:	Valid
Description:	The Button driver shall provide a service that reads the value of the button pin. This value may be high or low.
Rationale:	Basic functionality
Use cases	Read the value of button pin
Dependencies	[SRS_Button_211] , [SRS_Button_212]
Supporting material	--

2- [SRS_Button_214] The Button driver shall provide a service that make button state as pull up.

Type:	Valid
Description:	The Button driver shall provide a service that makes the button pull up which button's pin will be input and high.
Rationale:	Basic functionality
Use cases	makes button's pin as pull up.
Dependencies	[SRS_Button_211] , [SRS_Button_212]
Supporting material	--