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|  |
| SOVY |
| Digital Calculator PO1\_DGC\_GDD |

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# Document Status

|  |  |
| --- | --- |
| Name | SOVY |
| Version | 1.0 |
| Status | Proposed |
| Author | Nour Elgammal |
| Date | 16/4/2021 |

# Document History

|  |  |  |  |
| --- | --- | --- | --- |
| Version | Author | Date | Change |
| 1.0 | Nour Elgammal | 16/4/2021 | Initial Creation. |

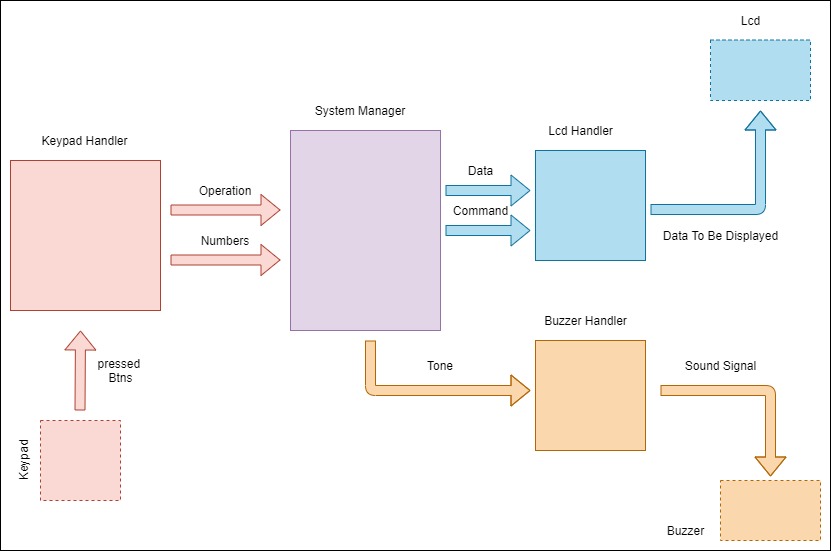
# Reference Documents

|  |  |  |  |
| --- | --- | --- | --- |
| Ref. No. | Doc. Name | Version | Status |
| 1 | PO1\_DGC\_SRS\_DigitalCalculator | 1.4 | proposed |
| 2 | PO1\_DGC\_GDD\_DigitalCalculator | 1.3 | Proposed |

# Project Description

“Sovy” is a simple digital calculator that performs basic mathematical operations and displays the operation on an LCD-screen, with an ON/OFF button and keypad for user input.

# Software Context Diagram



# 6. Component’s Application Programming Interfaces (API’s)

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Req\_ID** | | Req\_PO1\_\_DGC\_CDD\_overall\_001-V1.0 | | | | |
| **Covers** | | Req\_PO1\_DGC\_GDD\_016-V1.0  Req\_1ST123\_SRS\_overall\_026-V1.1  Req\_1ST123\_SRS\_overall\_027-V1.1 | | | | |
| **Author** | Nour Elgammal | **Date** | 16/4/2021 | | | |
| **API\_Name** | ReturnStatus\_e Buzzer\_SetState(u8 State) | **Scope** | Public | | | |
| **Description** | | It sets the buzzer state according to its configuration file which configures its port and pin. | | | | |
| **Parameters** | | **Type** | | **Name** | **Description** | **Range** |
| u8 | | State | Buzzer state to set its pin to this state  High -> 1  Low -> 0 | u8 |
| **Return** | | ReturnStatus\_e | | NA | STD\_ERORR  E\_OK -> If the function initialized the LCD successfully  E\_NOK -> If any problem occurred while initializing the LCD | NA |
| **Algorithm** | |  | | | | |