## Project Design Phase-2 Solution Requirements (Functional & Nonfunctional)

| Date         | 17 October 2022                            |
|--------------|--|
| Team ID      | PNT2022TMID16227                           |
| Project Name | Gas Leakage Monitoring and Alerting System |

## **Functional Requirements:**

Following are the functional requirements of the proposed solution.

| FR No. | Functional Requirement (Epic) | Sub Requirement (Story / Sub-Task)          |
|--------|-------------------------------|---|
|        |                               |   |
| FR-1   | User Registration             | Registration through Form                   |
|        |                               | Online Payment for the service              |
| FR-2   | User Access                   | Access the details using web browser        |
|        |                               | Access the details using mobile application |
| FR-3   | User alert                    | Gets alert as an SMS message                |
|        |                               | Gets alert alarm in the working area.       |

## **Non-Functional Requirements:**

Following are the non-functional requirements of the proposed solution.

| NFR No. | Non-Functional Requirement | Description   |
|---------|----------------------------|---|
| NFR-1   | Usability                  | The device must be usable by the customer anywhere  |
| NFR-2   | Security                   | Data from the sensors are stored securely and away from other data  |
| NFR-3   | Reliability                | Data can be retrieved anytime and no data is discarded without customer knowledge   |
| NFR-4   | Performance                | No performance delay in case of large number of data or more parameters   |
| NFR-5   | Availability               | The device doesn't fail even under harsh conditions.  Device continues to send parameters, even after an alert situation. |
| NFR-6   | Scalability                | Device must be capable of measuring conditions even in a larger industry  |