**Project Design Phase-II**

**Solution Requirements (Functional & Non-functional)**

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| Date | 28 October 2022 |
| Team ID | PNT2022TMID05666 |
| Project Name | Smart Waste Management System For Metropolitan Cities |
| Maximum Marks | 4 Marks |

**Functional Requirements:**

Following are the functional requirements of the proposed solution.

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| **FR No.** | **Functional Requirement (Epic)** | **Sub Requirement (Story / Sub-Task)** |
| FR-1 | User Registration | Registration through Form: User may register through given form.It can be done by using mobile phones  Registration through Gmail: User can register using their gmail and you will get a activation mail  Registration through LinkedIN: If user is a LinkedIn user they can register through linkedin |
| FR-2 | User Confirmation | Confirmation via Email: Once you enter your mail the user will receive a 6 digit OTP.Type the given OTP to verify your mail  Confirmation via OTP: 678090 |
| FR-3 | Plan waste collection routes. | The tool semi-automates waste collection route planning. Based on current bin fill-levels and predictions of reaching full capacity, you are ready to respond and schedule waste collection.  You can compare planned vs. executed routes to identify any inconsistencies. |
| FR-4 | Eliminate unefficient picks. | Eliminate the collection of half-empty bins.  The sensors recognize picks.  By using real-time data on fill-levels and pick recognition, we can show you how full the bins you collect are The report shows how full the bin was when picked. You immediately see any inefficient picks below 80% full. |

**Non-functional Requirements:**

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

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| **FR No.** | **Non-Functional Requirement** | **Description** |
| NFR-1 | Usability | quality of a user's experience when interacting with products |
| NFR-2 | Security | securing the premises and personnel by staying on patrol and monitoring |
| NFR-3 | Reliability | probability that a product, system, or service will perform its intended function adequately for a specified period |
| NFR-4 | Performance | an act of neat, attentive to detail, consistent while following certain procedures |
| NFR-5 | Availability | the readiness to perform for a specified purpose, under pre-determined conditions, when called |
| NFR-6 | Scalability | the measure of a system's ability to increase or decrease in performance and cost in response to changes in application and system processing demands. |