Project Design Phase-I Problem - Solution Fit

Date	30 September 2022
Team ID	PNT2022TMID44233
Project Name	Smart Waste Management System for Metropolitan Cities
Maximum Marks	4 Marks

Problem – Solution Fit:

1.CUSTOMER SEGMENT(S)

CS

- · Metropolitan City citizens
- People whose house near the trashcans.
- Municipal Officers
- Trashvan Dirvers & Workers

6.CUSTOMER CONSTRAINTS

CC

- Internet is necessary to use the web app
- The device may send wrong information

5.AVAILABLE SOLUTIONS

AS

The citizens can send the message about the smart dumpsters if any damage on the IoT device occured.

2.JOBS TO BE DONE/PROBLEMS

J&P

TR

- The dustbins need to empty after it got filled.
- The overflowing needs to avoid.
- Clean India should be maintained

9.PROBLEM ROOT CAUSE

RC

- High population in cities.
- · Poor waste mangement system
- High amount of wastages produced by people

7.BEHAVIOUR

BE

The sensors senses the amount of waste in trashcans and the device sends the notification to the head office, they will come and collect the wastages.

3.TRIGGERS

- To keep the city clean
- Hygienic environment

10.OUR SOLUTION

SL

Monitoring the dumpsters and send the information about the garbage level to the authenticated person to empty the trashcans using arduino device.

8.CHANNELS of BEHAVIOUR

СН

Sends the information to the head office.

8.2 OFFLINE

8.1 ONLINE

Trashvan collects the garbage from trash cans.

4.EMOTIONS BEFORE/AFTER



- Before:Unhealthy environment
- After:Clean city and healthy environment