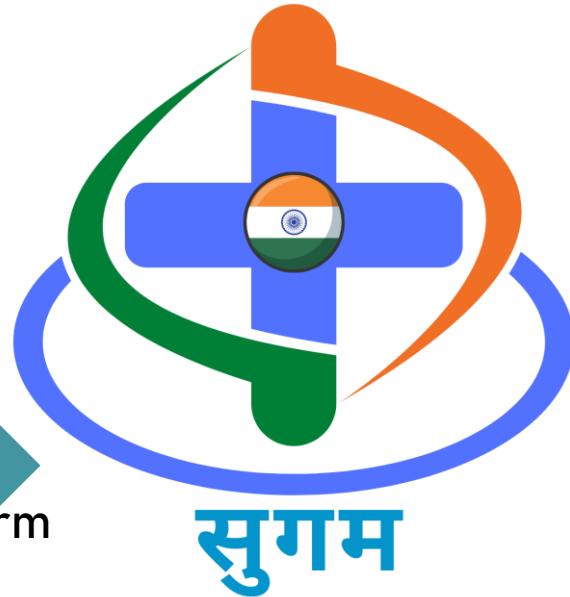




SMART INDIA
HACKATHON
2022



स्वस्थ भारत - विकसित प्रयास

Github ProtoType Link
(Click Here)

Potential Healthcare platform Startup that connects patients to Doctors and Healthcare providers around their area and provides better healthcare support system and facilities

From finding the healthcare provider to booking an appointment, online Video / Voice / Chat Consultation, getting their tests done and even ordering medicines and getting it delivered by drones.

Basic Details of the Team and Problem Statement

Ministry/Organization Name/Student Innovation: National Institute of Design Madhya Pradesh

PS Code: ST890

Problem Statement Title: Insufficient medical support system and remote villages in hill areas.

Team Name: TEAM BASIC V

Team Leader Name: Saheb Kumar

Institute Code (AISHE): U-0840

Institute Name: Indian Institute of Information Technology, Ranchi

Theme Name: Software - Robotics and Drones

Idea/Approach Details

Description :

- Video/voice/Chat consultation with healthcare experts and certified professionals. Video quality is adjustable to enable easier connection in hilly and remote areas with slower internet speeds and lack of broadband connectivity.
- Option to schedule appointments or request for doctor appointment in a given time window for less severe cases.
- Option to urgently ask for SOS or emergency medical care and priority basis dispersal of required emergency services by nearest healthcare provider or doctor or NGOs.
- Separate login for patients, doctors and healthcare workers. Login may use Firebase google login or manual email login or phone number based login.
- Ability to securely store patient data on the server using Blockchain based IPFS system, with the patient being able to provide and revoke access to medical records.
- Live location tracking of Patient On Map and Drone path tracing between drop point / landing zones in remote areas.
- Drone dispatch handling by authorized person, facilitate use of drone for supply of emergency medicines/needs

- Socket.io based realtime chat system. Chats are safe and secure from a patient privacy point of view .
- Voice to text conversion for symptoms listing for patients.
- Medical Prescription creation feature for doctors. Ability to scan prescription and upload in pdf or image format for patients as well.
- Dual (Hindi / English) Language support with intuitive graphical user interface with ample use of symbols ,figures etc. to guide.

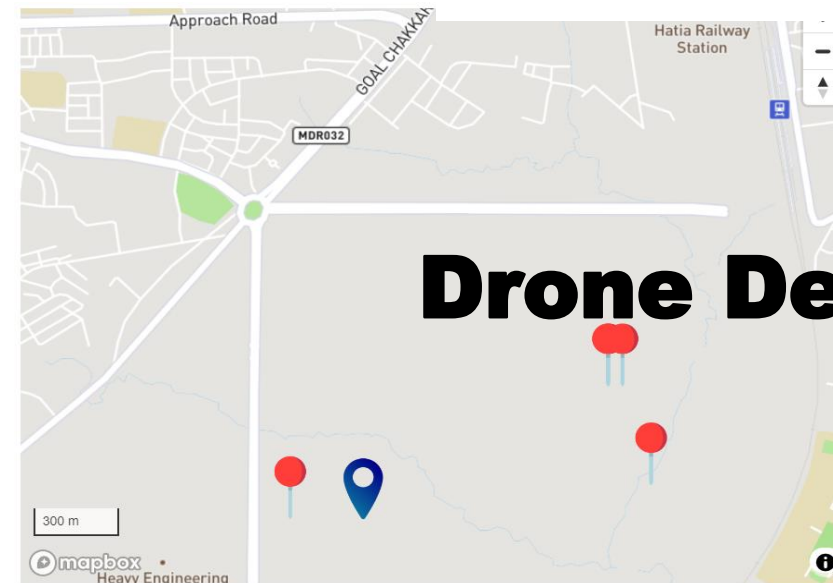
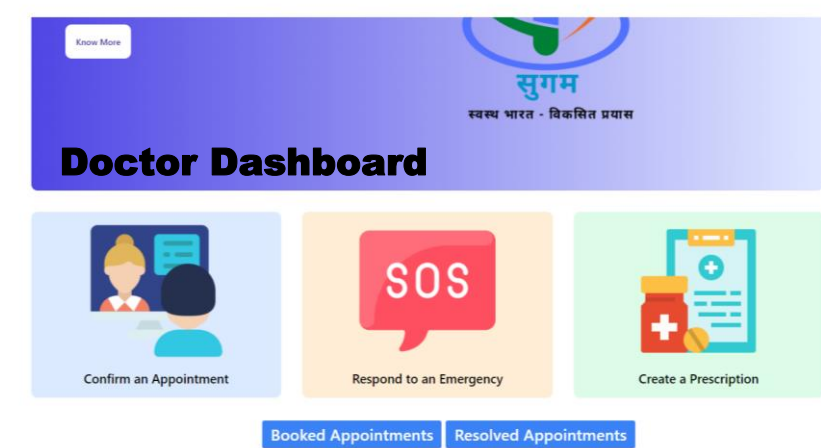
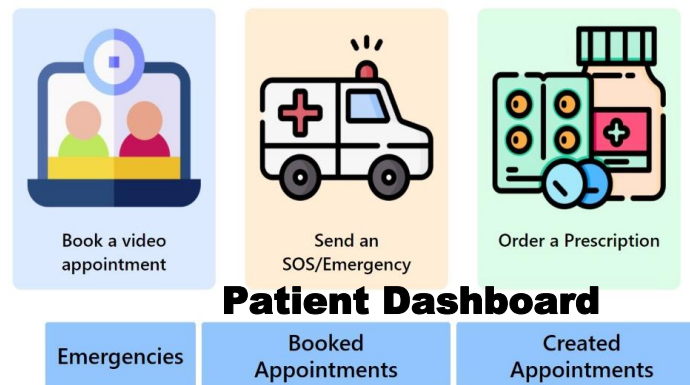
Technology Stack:

- Front End- ReactJS , Tailwind CSS ,GPS based MapBox, Redux, Material UI , PeerJS
- Back end- NodeJS, Express , MongoDB, Socket.io ,Firebase Authorisation
- Blockchain Based IPFS file storage
- Machine learning Based Model for Symptoms Prediction

Idea/Approach Details

Use Cases :

- Providing basic Healthcare facilities for older people, women and children in remote hilly areas.
- For ordering required medicines and get them delivered within a specific timeframe
- For creating SOS during emergency situations like labor pains
- For keeping track of periods and monthly changes that can aid family planning, pregnancy prevention and general healthcare for women
- Instant health advice via realtime chat
- Reminders for healthcare or medicine updates
- Basic health and hygiene tips can be displayed during loading or in a separate section, such as COVID guidelines.
- To provide voluntary healthcare services in inaccessible areas



Drone Delivery

Prototype Video Walkthrough (Click Here)

Github ProtoType Link (Click Here)

Dependencies / Show stoppers :

- Network issue
- Lack of Tech awareness among older People
- Drone availability and maintenance
- Shortage of medical resources

Team Member Details

Team Leader Name: Saheb Kumar

Branch : B.Tech

Stream : CSE

Year : 3rd

Team Member 1 Name: Anurag Tiwari

Branch : B.Tech

Stream : ECE

Year : 3rd

Team Member 2 Name: Charmi Mehta

Branch : B.Tech

Stream : CSE

Year : 3rd

Team Member 3 Name: Ishan Madhav

Branch : B.Tech

Stream : CSE

Year : 3rd

Team Member 4 Name: Bibhash Kumar

Branch : B.Tech

Stream : CSE

Year : 3rd

Team Member 5 Name: Vinayak Singh

Branch : B.Tech

Stream : ECE

Year : 3rd

Team Mentor 1 Name: Mr Bharat Singh

Category (Academic/Industry): Academic

Expertise (AI/ML/Blockchain etc): CS

Domain Experience (in years): 10

Team Mentor 2 Name: Mr Santosh Mahto

Category (Academic/Industry): Academic

Expertise : Electronics & Communication

Domain Experience (in years): 10