

HEALTH CONNECT: STREAMLINED DOCTORS APPOINTMENT AND HEALTH RECORD MANAGEMENT

Application Name: Health Connect

Live Website URL: <https://ibm-hack456.web.app/>

Github Repo: <https://github.com/smartinternz02/SBSPS-Challenge-9992-HealthConnect-Streamlined-Doctors-Appointment-and-Health-Record-Management.git>

Team Members:

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- M. Mounish

1. INTRODUCTION

1.1 Overview

In the age of advanced technology, the healthcare industry is embracing innovative solutions to streamline processes and enhance patient care. Our Health Record Management Web Application stands at the forefront of this transformation, offering a comprehensive and user-friendly platform designed to revolutionize the way health care services are accessed and managed. With a myriad of features aimed at simplifying the healthcare experience for both patients and medical professionals, our app redefines the concept of efficient health care management.

Our Health Record Management Web Application serves as a versatile and integrated platform those units patients, doctors, and administrators in a cohesive ecosystem. From finding nearby doctors and scheduling appointments to maintaining thorough and up-to-date health records, this app addresses the entire spectrum of healthcare

management needs. Seamlessly bridging the gap between patients and medical practitioners, our app ensures a smoother, more efficient and patient-centric approach to healthcare.

1.2 Purpose

The application will start by signing up or logging the user With Health Connect application. The signup and login screen which will be useful to the user to manage their activities in the application. The application provides four main user functionalities namely Doctor Discovery, Appointment Booking, Health Records Management, Prescription Tracking.

- **Doctor Discovery:** Finding the right medical professional is a breeze with our app's intuitive doctor discovery feature. Users can easily search for doctor based specialties, locations, availability, and patient reviews, empowering them to make informed decisions about their healthcare.
- **Appointment Booking:** The app enables users to book appointments with their chosen doctors in real-time. Patients can select preferred dates and time, view available slots, and receives confirmation notifications, minimizing waiting times and enhancing convenience.
- **Health Records Management:** Our app serves as a secure repository for maintaining comprehensive health records. Patients can store medical history, prescriptions, test result and treatment plans digitally, eliminating the need for manual record-keeping and ensuring accurate information sharing between medical visits.
- **Prescription Tracking:** Medical professionals can prescribe medications electronically, and patients can conveniently access and track their prescriptions with in the app. This feature enhances medication adherence and helps prevent any misunderstandings or error.

2 LITERATURE SURVEY

2.1 Existing problem

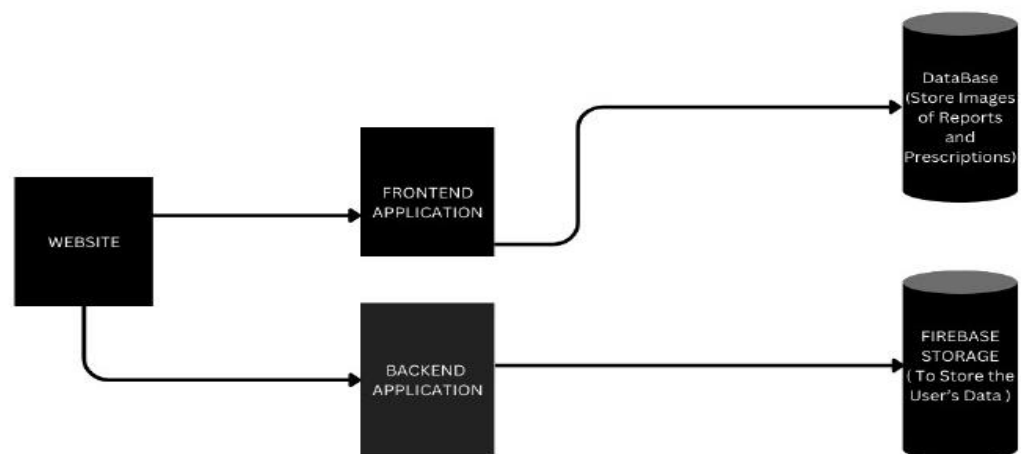
We have checked various websites before developing our project from different stores like Google Play Store, App Store and Microsoft Store where we found that all the application are just giving the users only the facility of booking appointment and arranging the meeting with doctors but they are not keeping the track of the health of the patients.

2.2 Proposed Solution

In the Proposed solution the web application “Health Connect” will provide the user with various features like finding doctors near him, keeping the health records of the patient and providing the user to set goals and to finish them and tracking their health and also prescription tracking. This web app provides users a great experience.

3. THEORITICAL ANALYSIS

- **Block Diagram**



- **Hardware & Software Requirements**

Hardware Requirements:

- Any device with minimum RAM of 4GB.
- Processor: Minimum 1 GHz; Recommended 2GHz or more
- Internet connection with network or WIFI or LAN.

Software Designing Requirements:

- React frontend library.
- Firebase used to build backend.
- Email JS to send emails to users.
- Chart JS used to display charts.

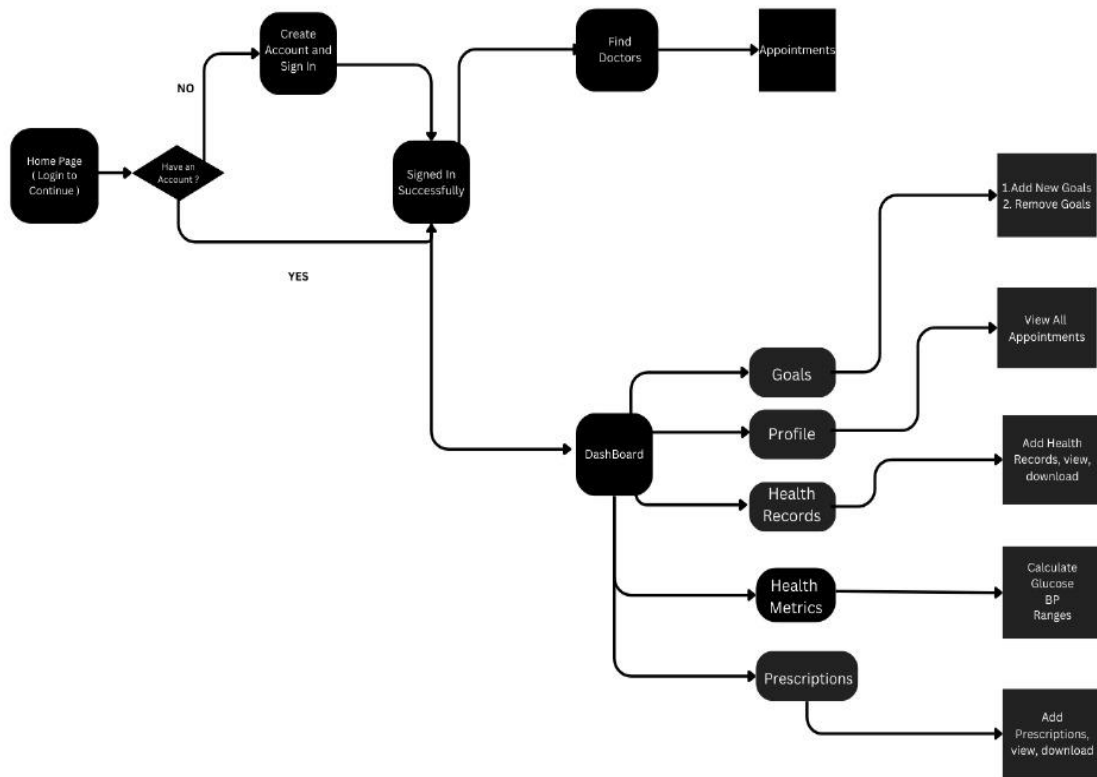
Software Requirements:

- Any browser recommended Chrome.

4. EXPERIMENTAL INVESTIGATIONS

- After choosing the project we have seen the working of existing solutions. We have noted down the essential requirements and thought of new requirements which will help the user to book appointment and maintaining the health records.
- Investigated how to maintain the health record of patients and how to store their details.
- Did research to find the best API's for finding good doctors near user and to get the correct and genuine information about the doctor.
- Investigated about the best plans to track the health of the user and show theme visually.

5. FLOW CHART




6. RESULT

- User can find doctor's near them.
- User can book appointment.
- User can set goals.
- User can keep track of his health.



Fig – 1: Home Page


Find Doctors
Hello hi@gmail.com
DASHBOARD
SIGN OUT

Find Doctor's near you

Specialization

example: dentist

select a city

Search

Name : Dr. G.Chakradhar Reddy
Specialisation: psychiatrist
Location : kurnool
book a appointment

Name : Dr. B.Sai Vamshi
Specialisation: dermatologist
Location : banglore
book a appointment

Name : Dr. C.Srikala
Specialisation: gynecologist
Location : banglore
book a appointment

Name : Dr. A.MeeraJ
Specialisation: cardiaogy
Location : kurnool
book a appointment


Name : Dr.M.Mounsih
Specialisation: dentist
Location : kurnool
book a appointment


Name : Dr. C.Jagan
Specialisation: general-physician
Location : hyderabad
book a appointment

Name : Dr. K.Kalyan
Specialisation: ophthamologist
Location : banglore
book a appointment

Name : Dr.E.Uma
Specialisation: ophthamologist
Location : banglore
book a appointment

Fig – 2: Finding Doctors


Find Doctors
Hello hi@gmail.com
DASHBOARD
SIGN OUT



Name:Dr. G.Chakradhar Reddy
Qualification : MBBS
Specialization : psychiatrist
Experience : 5 years
Rating : 4 ★
Medical Registration Verified ✓

ABOUT :

Dr. G.Chakradhar Reddy is a Healthcare Practitioner who practices the field of psychiatry in various prestigious institutions. He has 14 years of experience with clinical specialization in General Adult Psychiatry, Marital Problems, Anxiety Disorders & Depression. He is a Medical Graduate & Post Graduate both from the prestigious Maulana Azad Medical College, New Delhi.

Address	Work Timings	Fee
Apollo hospitals.gandhi nagar	9:00 - 17:00	₹500

Book Your Slot for :

Tue Sep 05 2023

9 - 10

10 - 11

11 - 12

12 - 13

13 - 14

14 - 15

15 - 16

16 - 17

Write a review

Write Your Review

▶

Fig - 3: Booking Appointments

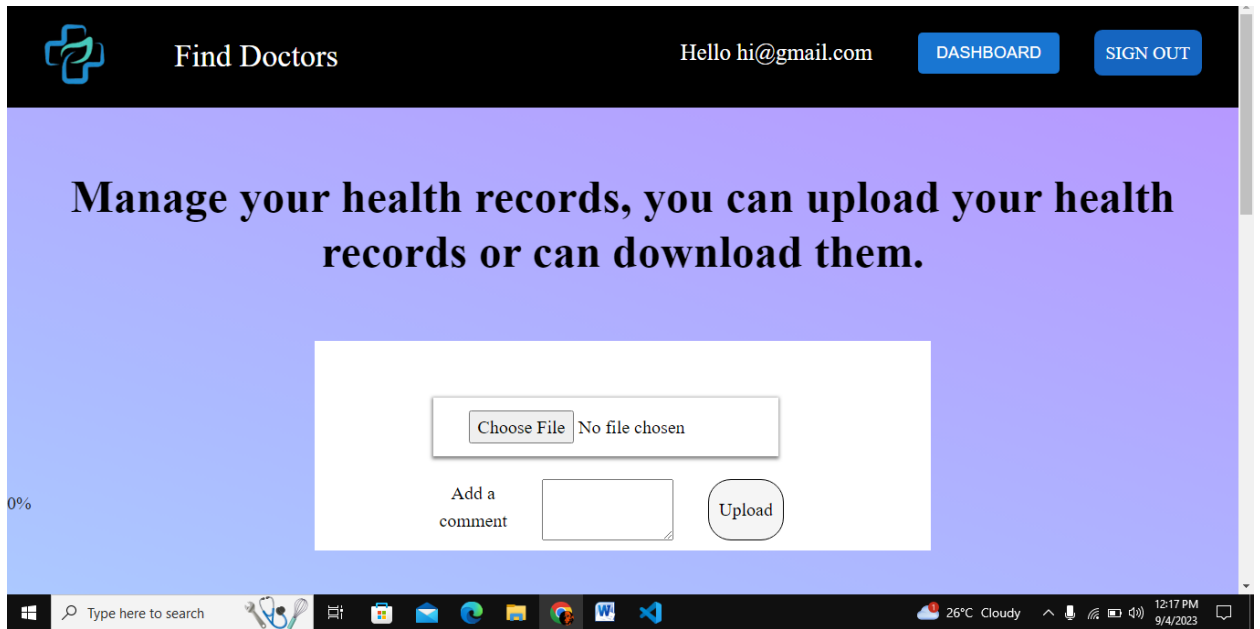


Fig – 4: Health Records

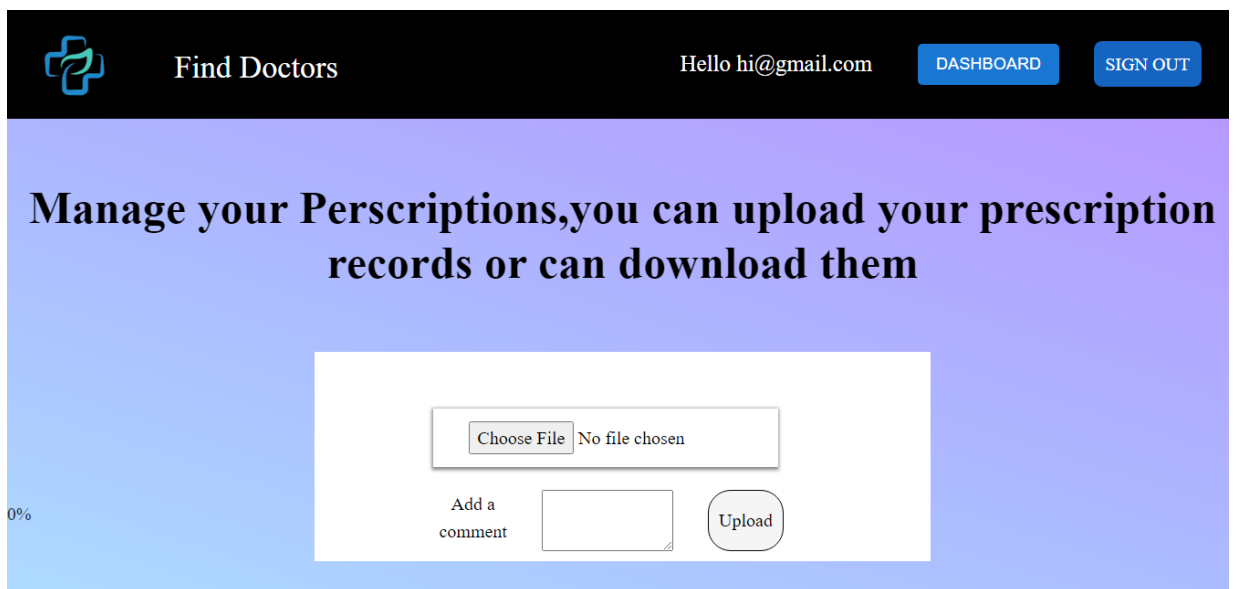


Fig – 5: Perscription



Fig – 6: Blood Pressure

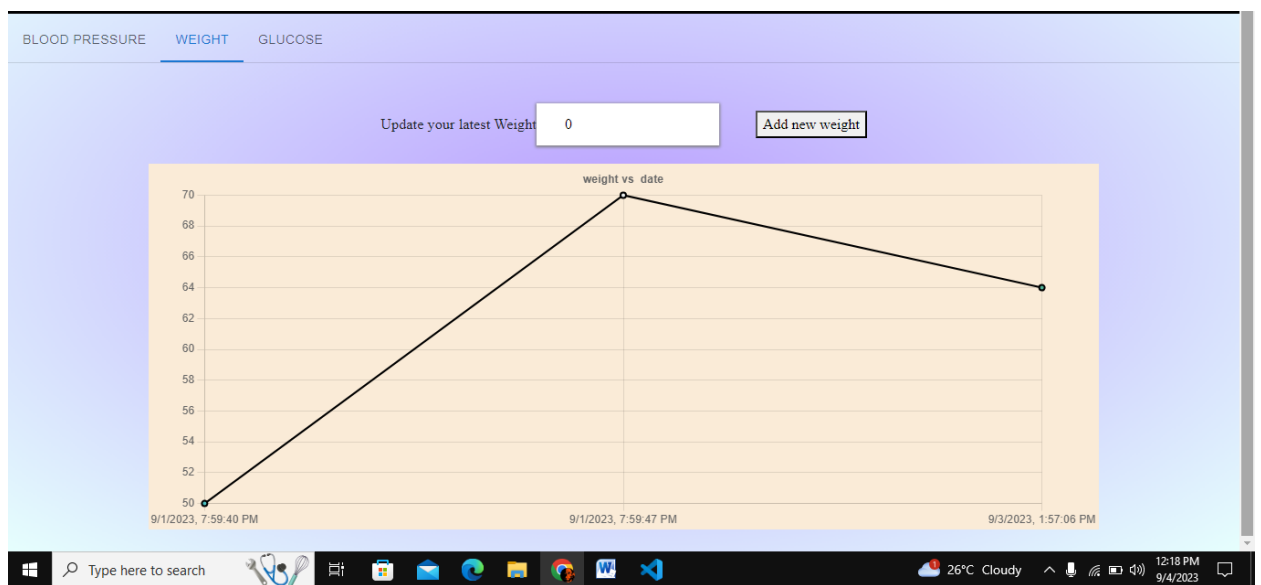


Fig – 7: Weight Tracker

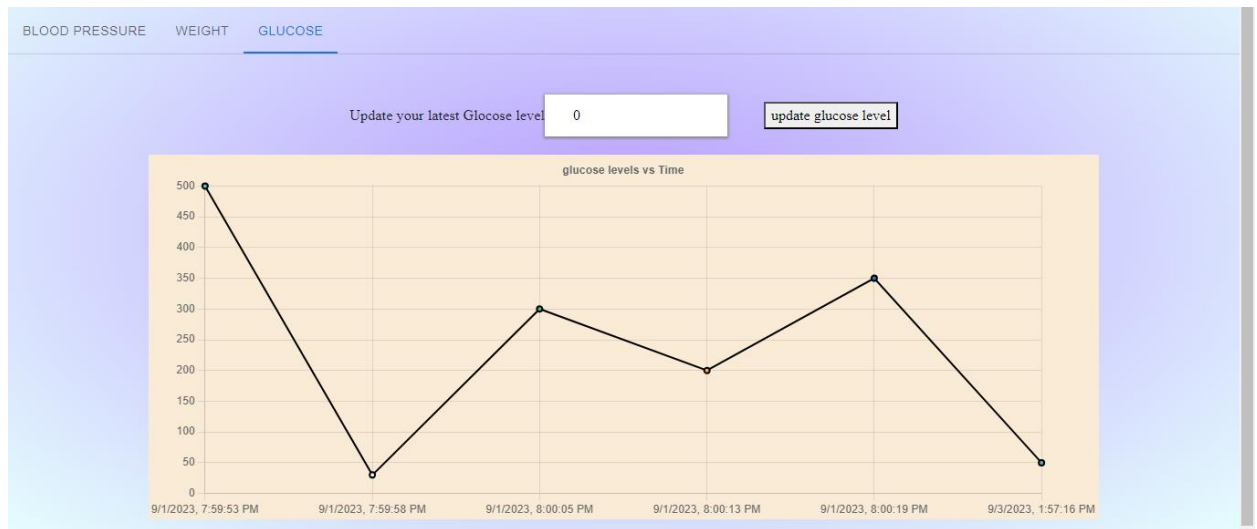





Fig – 8 : Glucose Tracker

 Find Doctors Hello hi@gmail.com DASHBOARD SIGN OUT

Set new goals



hello frends
created on:31/8/2023, 2:10:28 pm 


h i vbeosf
created on:31/8/2023, 2:11:17 pm 

Fig – 9: Setting Goals



Fig – 10: Login Page

7. ADVANTAGES

- It keeps track of health of the user.
- It helps user to keep their medical records safe and securely.
- It helps user to book appointment, we can book appointment easily.
- It helps in finding the nearby doctors.
- It determines the range of risk of disease based on your report values.

8. DISADANTAGES

- It just maintains the prescription photos it does not recommend any medicines by seeing the prescription.
- Some user may face privacy concerns to give their data.
- The accuracy of health data recorded and managed through an HMS can be a concern.
- It may not view properly in mobile screen.

9. APPLICATIONS

- We can use this web application to keep track of the health of the user, book appointment and maintaining their health records.
- Provides assistance to the users on the maintenance of their health.

10. CONCLUSION

In the journey of developing this web application, we got an opportunity to learn the detailed process of developing web applications. In this process we have learned how to build a mobile-first application, we are also able to learn how to develop and use a RESTful API from scratch with the help of firebase. We are also able to learn how to use different JavaScript libraries like charts.js to show the BP, Glucose and weight values. We got to know more about the JSON data formats which are used for exchanging data between client and server as well as to get the data from the medical APIs.

11. FUTURE SCOPE

In the future scope, the application can enhance its functionality by adding Google maps to track the doctor in 2km radius of the user. The Health tracker can also be updated to know the BMI of the user. We can also recommend some basic medications for user in case of some emergency. A notification feature can be added that send the notifications to the user, based on the goals he added. We are having an idea to add a chat bot in our website to help the user with small illness like Fever.

12. BIBLIOGRAPHY

- <https://play.google.com/store/search?q=practo&c=apps&androidId=112888987726988939361&hl=en-IN>
- Source Code: <https://github.com/smartinternz02/SBSPS-Challenge-9992-HealthConnect-Streamlined-Doctors-Appointment-and-Health-Record-Management.git>