

# **Minor Project Report**

**on**

**DocEase**

**In partial fulfillment for the award of the degree**

**Of**

**BACHELOR OF COMPUTER APPLICATION**

**[B.C.A]**

**Year 2023-2024**

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**BCA-5<sup>th</sup> SEMESTER**

**Submitted to:**



**SHRI SHAMBHUBHAI V. PATEL COLLEGE OF  
COMPUTER SCIENCE & BUSINESS MANAGEMENT**

**Affiliated to**

**Veer Narmad South Gujarat University**

**SHRI SHAMBHUBHAI V. PATEL COLLEGE OF  
COMPUTER SCIENCE & BUSINESS MANAGEMENT**

Near I. C. Gandhi School, Sumul Dairy Road, Surat. (Gujarat) India.

**CERTIFICATE**

This is to certify that the minor project entitled \_\_\_\_\_

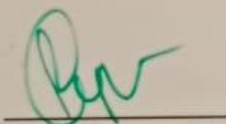
\_\_\_\_\_ Doctor Appointment App \_\_\_\_\_

has been carried out by Mr./Ms. Dudhesh Uday Nileshbhai

\_\_\_\_\_ in Bachelor of Computer Application, Semester V

Exam No. 8714

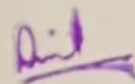
towards partial fulfillment of the course, for the Academic Year 2023-24.



Mentor/Guide

Date: 03/10/2023





I/C. Principal

Date: 03/10/2023

**MINOR PROJECT OF B.C.A.**

Academic Year: 2023-24

Approved by: \_\_\_\_\_

Examiners



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# 1. Introduction

- ❖ Welcome to a smarter, more convenient way to manage your healthcare needs. Our DocEase App is designed to simplify the process of booking and managing your medical appointments, ensuring you receive the care you deserve, when you need it.
- ❖ Say goodbye to the hassle of long waiting times on the phone or tedious paperwork. With our user-friendly app, you can effortlessly book, reschedule, or cancel appointments with just a few taps. Our goal is to put the power of healthcare back in your hands, allowing you to take control of your well-being and connect with the right medical professionals when you need them most.
- ❖ Key Features:
  - ✓ **Effortlessly Schedule Appointments:**

Say goodbye to long hold times and tedious paperwork. Book appointments with your preferred healthcare providers at your fingertips, 24/7.
  - ✓ **Find the Right Specialist:**

Easily search for and connect with specialists who can address your unique healthcare needs.
  - ✓ **Appointment History:**

Keep a comprehensive record of all your past and upcoming appointments, making it easy to track your healthcare journey.
- ❖ Your health is invaluable, and our Doctor Appointment App is committed to making it as accessible and stress-free as possible. Experience the future of healthcare management in the palm of your hand.

## 1.1 Project Description

- ❖ DocEase Application is a system designed primarily for use easy online doctor appointment management application.
- ❖ This system is fully responsive or mobile friendly and have a good-looking user interface.
- ❖ DocEase Application have contained two panels:
  - ✓ Doctor Panel
  - ✓ Patient Panel

### ❖ Doctor Panel:

- ✓ Doctor can register itself with an appropriate field.
- ✓ Doctor can login with valid credentials.
- ✓ Doctor can update his / her profile.
- ✓ Doctor can view his / her appointments with his / her patients.
- ✓ Doctor can confirm the appointments.

### ❖ Patient Panel:

- ✓ Patient can register itself with an appropriate field.
- ✓ Doctor can login with valid credentials.
- ✓ Patient can update his / her profile.
- ✓ Patient can view all doctors which are register at doctor panel.
- ✓ Patient can appoint doctor easily.
- ✓ Patient can view his / her appointments.
- ✓ Patient can delete his / her specific appointment.

## 1.2 Project Profile

DocEase	
Project Title	DocEase
Frontend	XML , Java
Backend	Firebase
Supported OS	Android
IDE	Android Studio
Browsers	Google Chrome, Brave
Documentation tool	MS Word
Internal Guide	Prof. Riddhi Joshi (HOD)
Submitted to	Prof. Riddhi Joshi (HOD)

## 1.3 Target Audience

- ❖ The target audience for a Doctor Appointment app can include a diverse range of individuals and professionals within the healthcare ecosystem.

### ➤ Patients:

- ✓ Individuals seeking medical care for themselves and their family members.
- ✓ Those looking for a convenient way to schedule appointments with healthcare providers.
- ✓ People who want to manage their health records, prescriptions, and appointments digitally.
- ✓ Patients interested in telemedicine options for virtual consultations.

### ➤ Healthcare Providers:

- ✓ Doctors, physicians, specialists, dentists, therapists, and other medical professionals.
- ✓ Healthcare practices, clinics, and hospitals interested in adopting a digital appointment booking system.
- ✓ Professionals looking for tools to manage patient appointments and streamline their practice.

## 2. Objectives

### ✓ **Appointment Scheduling:**

Enable patients to easily schedule, reschedule, or cancel appointments with healthcare providers at their convenience. This reduces the need for phone calls and streamlines the appointment process.

### ✓ **Improved Access:**

Ensure patients have easy access to a variety of healthcare providers, including primary care physicians, specialists, and allied health professionals. This can be especially helpful in areas with limited healthcare resources.

### ✓ **Real-time Availability:**

Display real-time availability of healthcare providers, allowing patients to choose appointments based on their preferred time slots and provider availability.

### ✓ **Reduced Wait Times:**

Minimize the time patients spend waiting in the clinic by providing estimated wait times and allowing them to check in online or virtually.

### ✓ **Patient Information Management:**

Allow patients to securely store and manage their medical records, including past appointments, test results, and medications, within the app for easy access by healthcare providers.

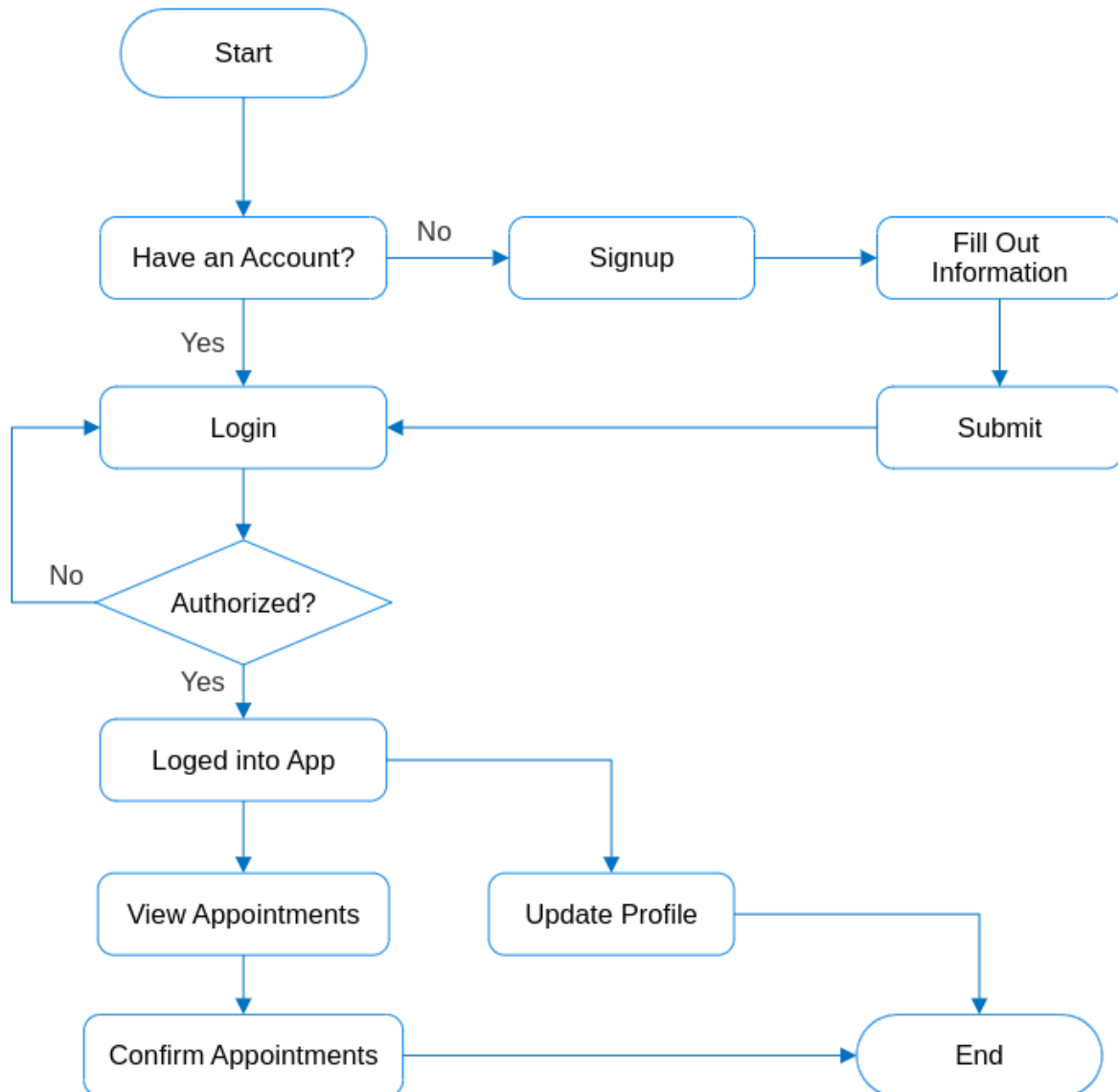


## **Start to End Process:**

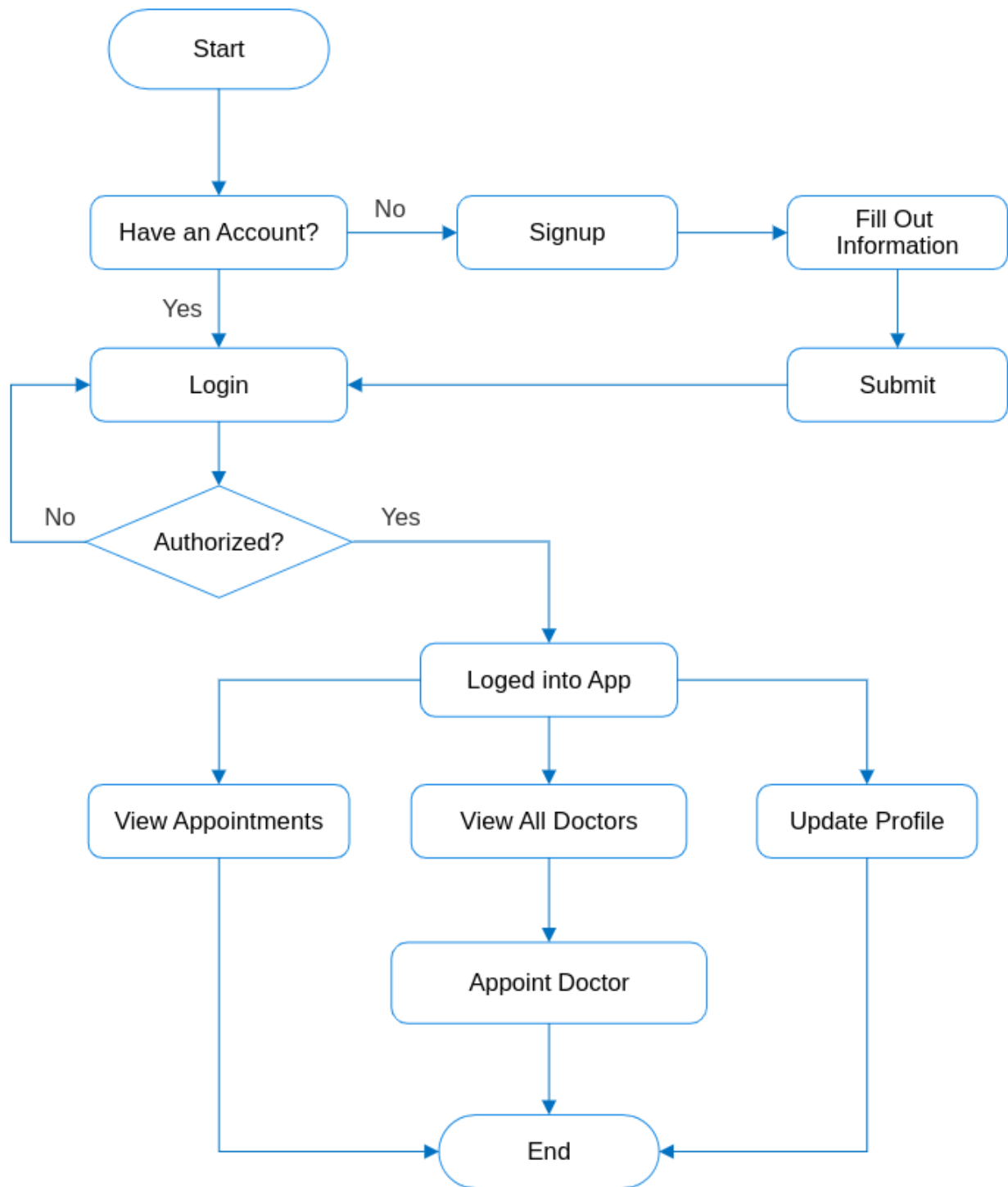
1. Collecting information for system (Requirement Gathering and Analysis).
2. Preparing the design of the system through information.
3. Creating table definition and implementation.
4. Integration of Front-end and Back-end.
5. Custom Functions & Validations.
6. Making responsive design.
7. Testing.
8. Debugging and code optimization.

### 3. System Flow Diagram

#### ❖ Doctor Process Flow Diagram:

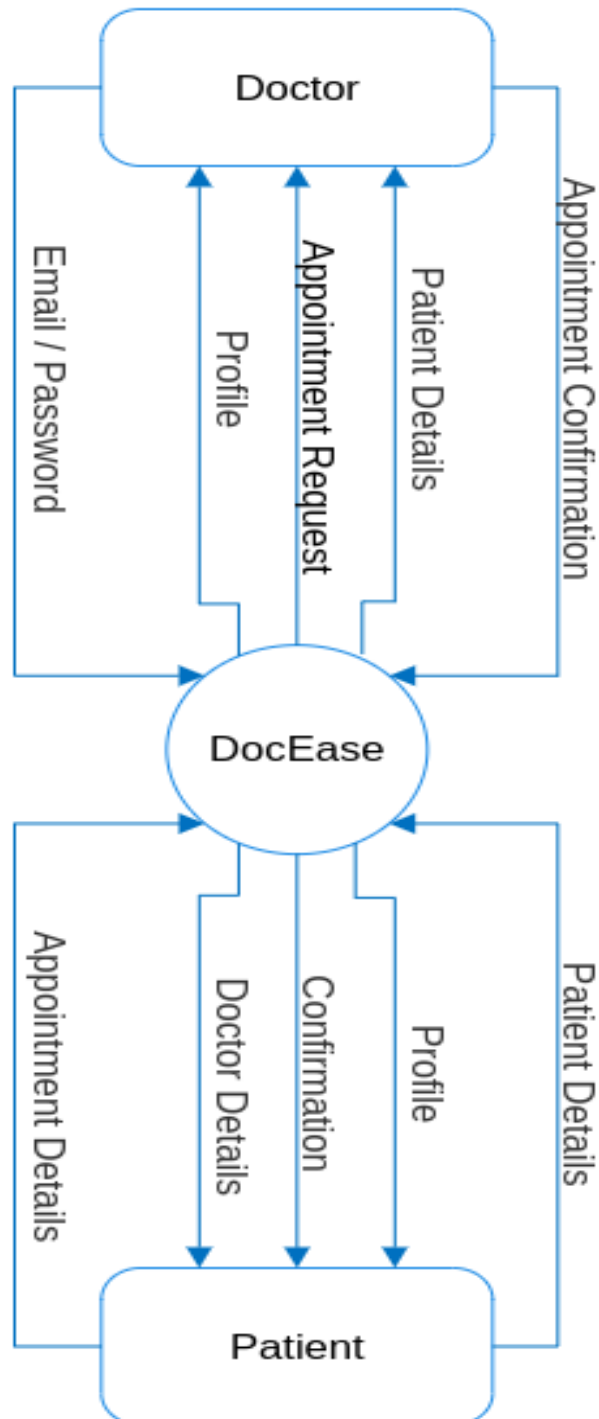


## ❖ Patient Process Flow Diagram:

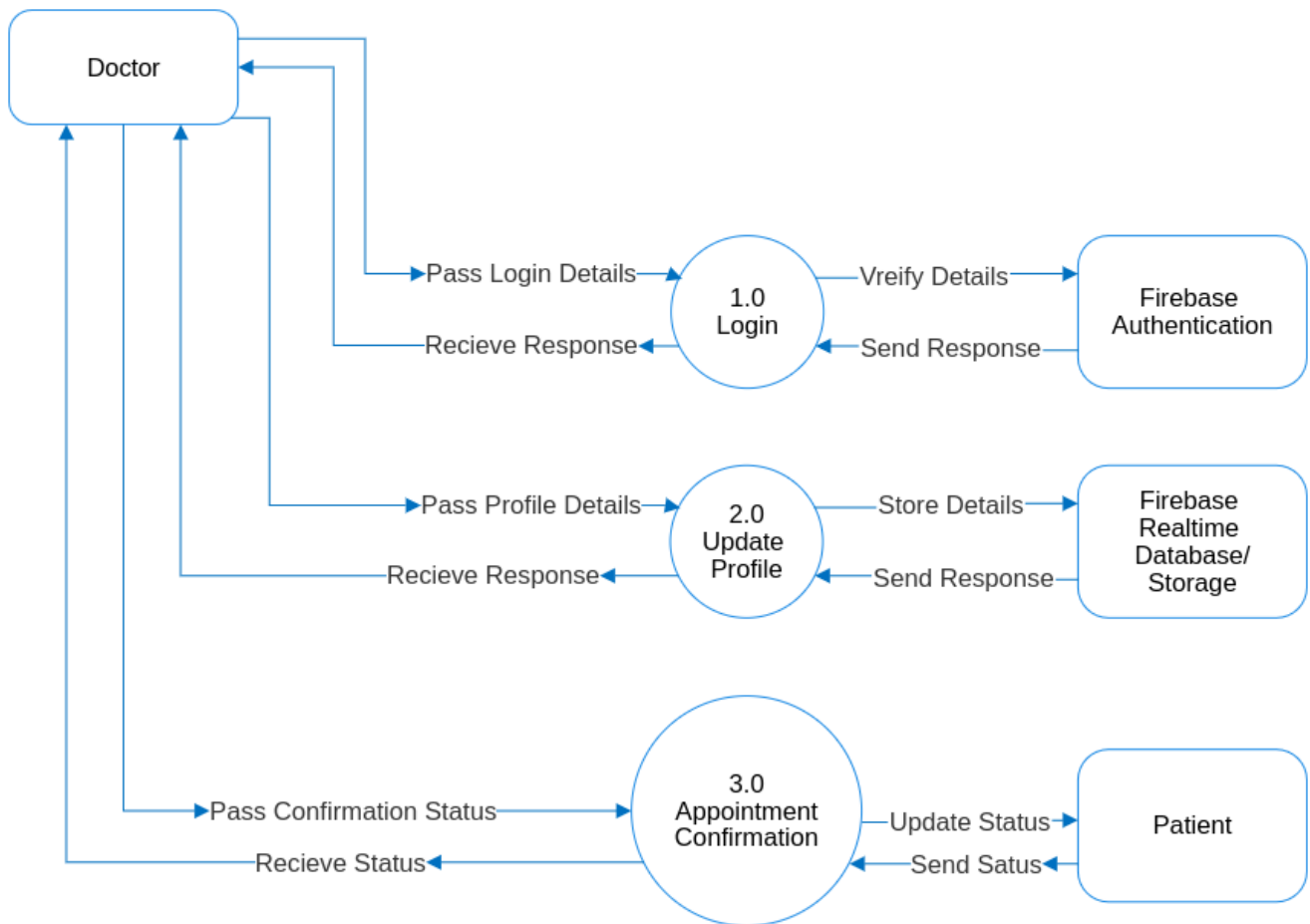


## 4. DFD / UML Diagram

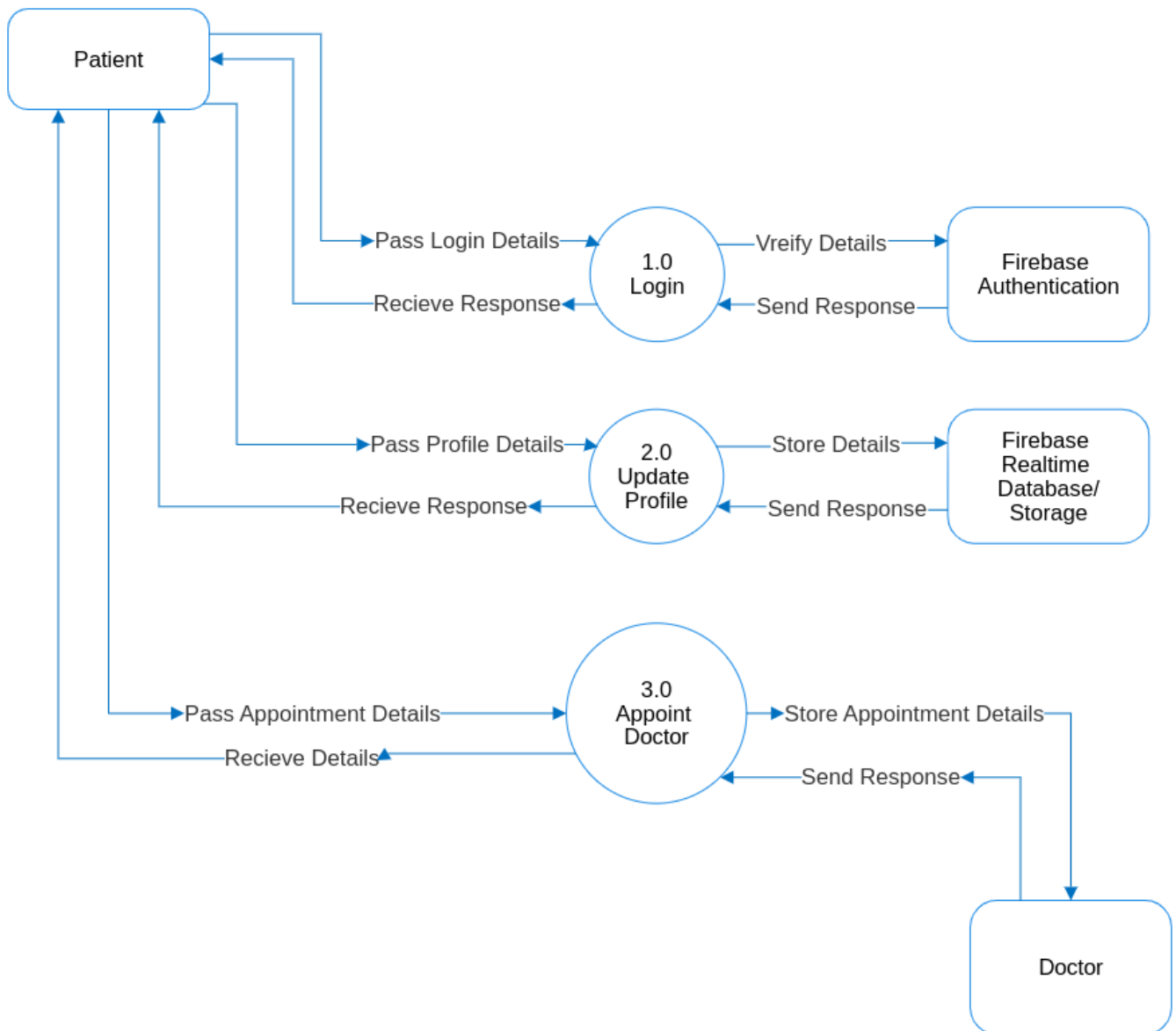
### ❖ 0 Level Diagram (Context Diagram):



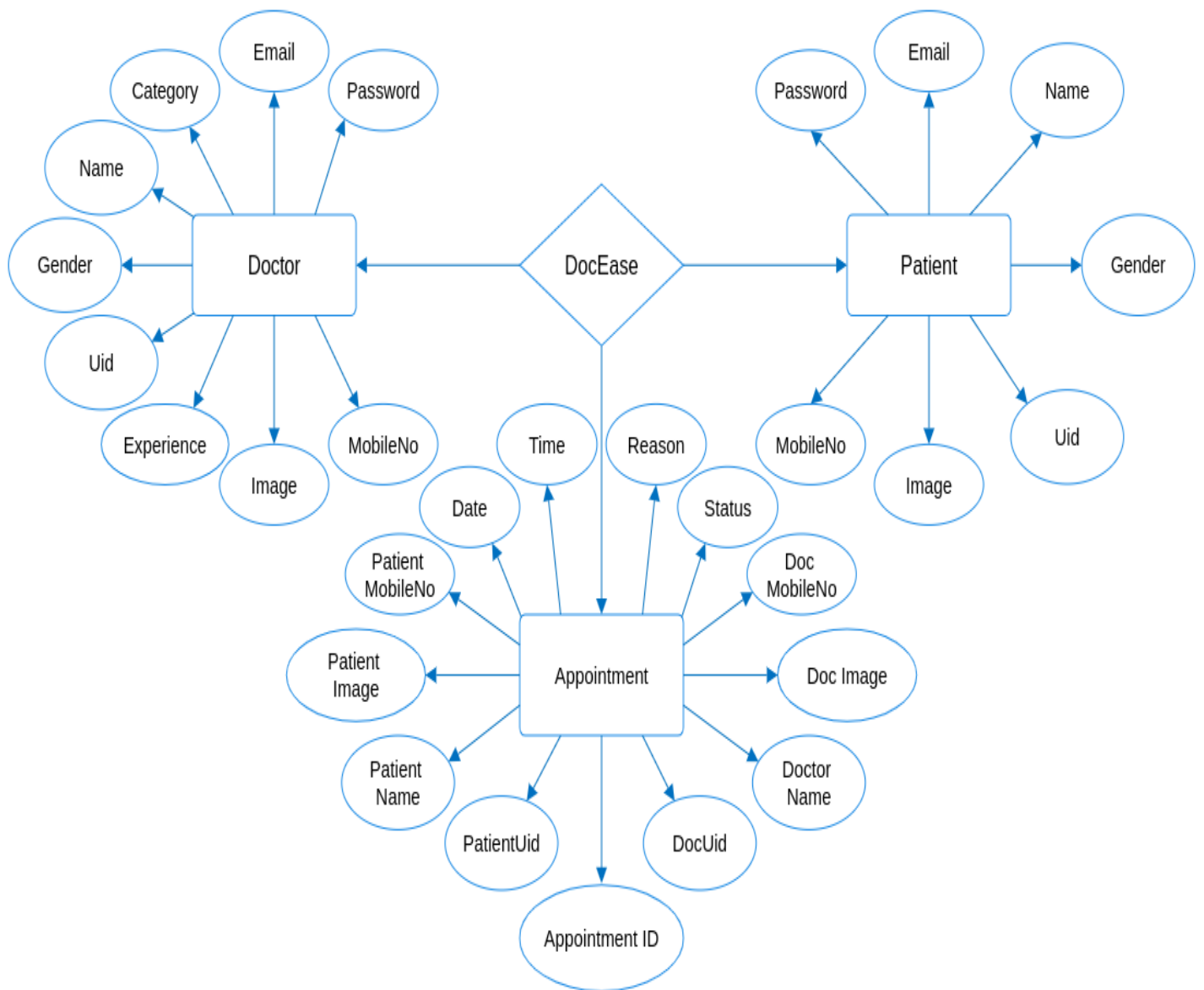
## ❖ 1<sup>st</sup> Level Doctor Diagram:



## ❖ 1<sup>st</sup> Level Patient Diagram:



## 5. ER Diagram

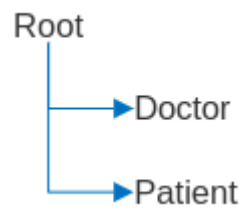


## 6. Database Design

### ❖ Firebase Authentication:

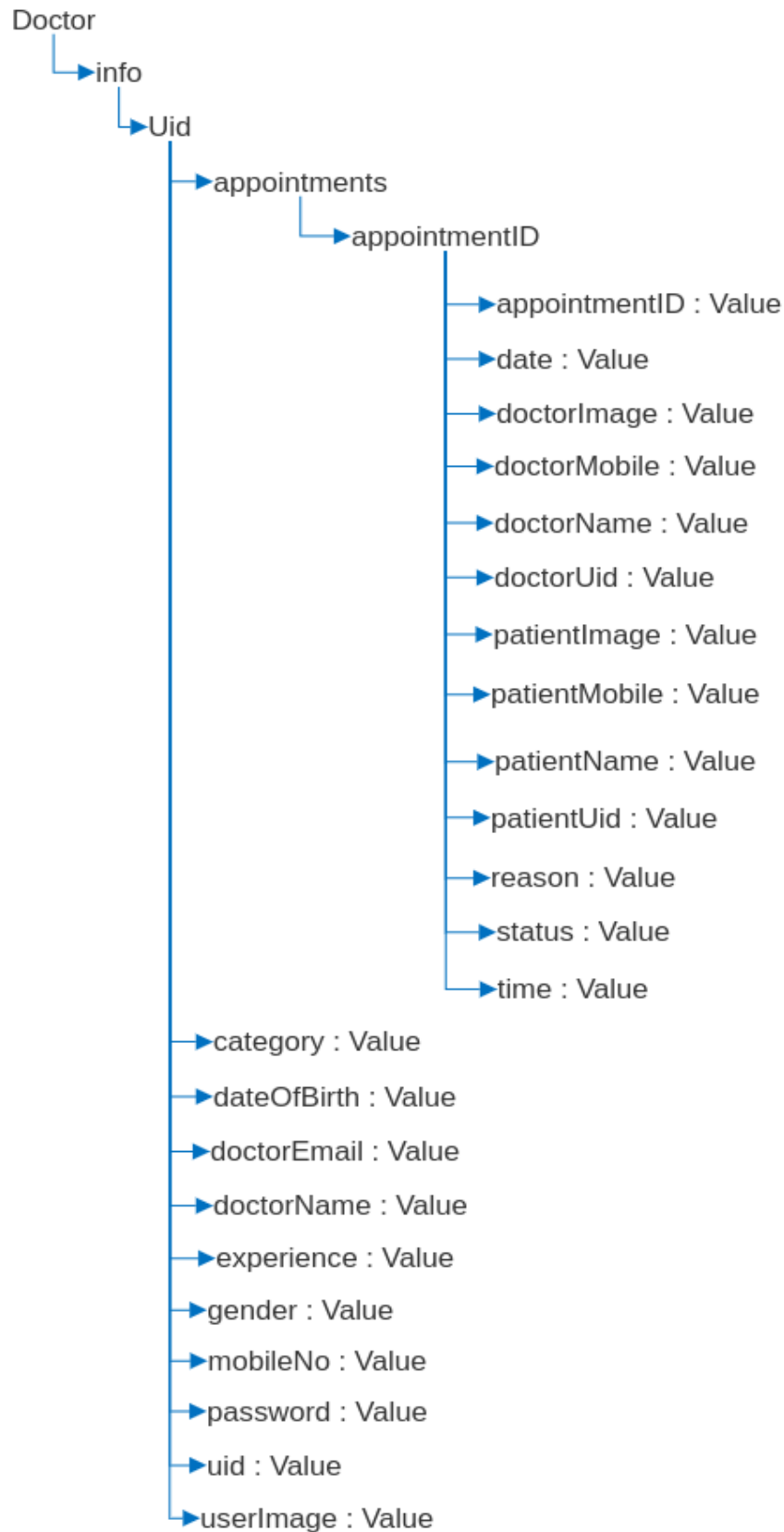
- ✓ Email ID
- ✓ Password
- ✓ Uid

### ❖ Firebase Realtime Database:

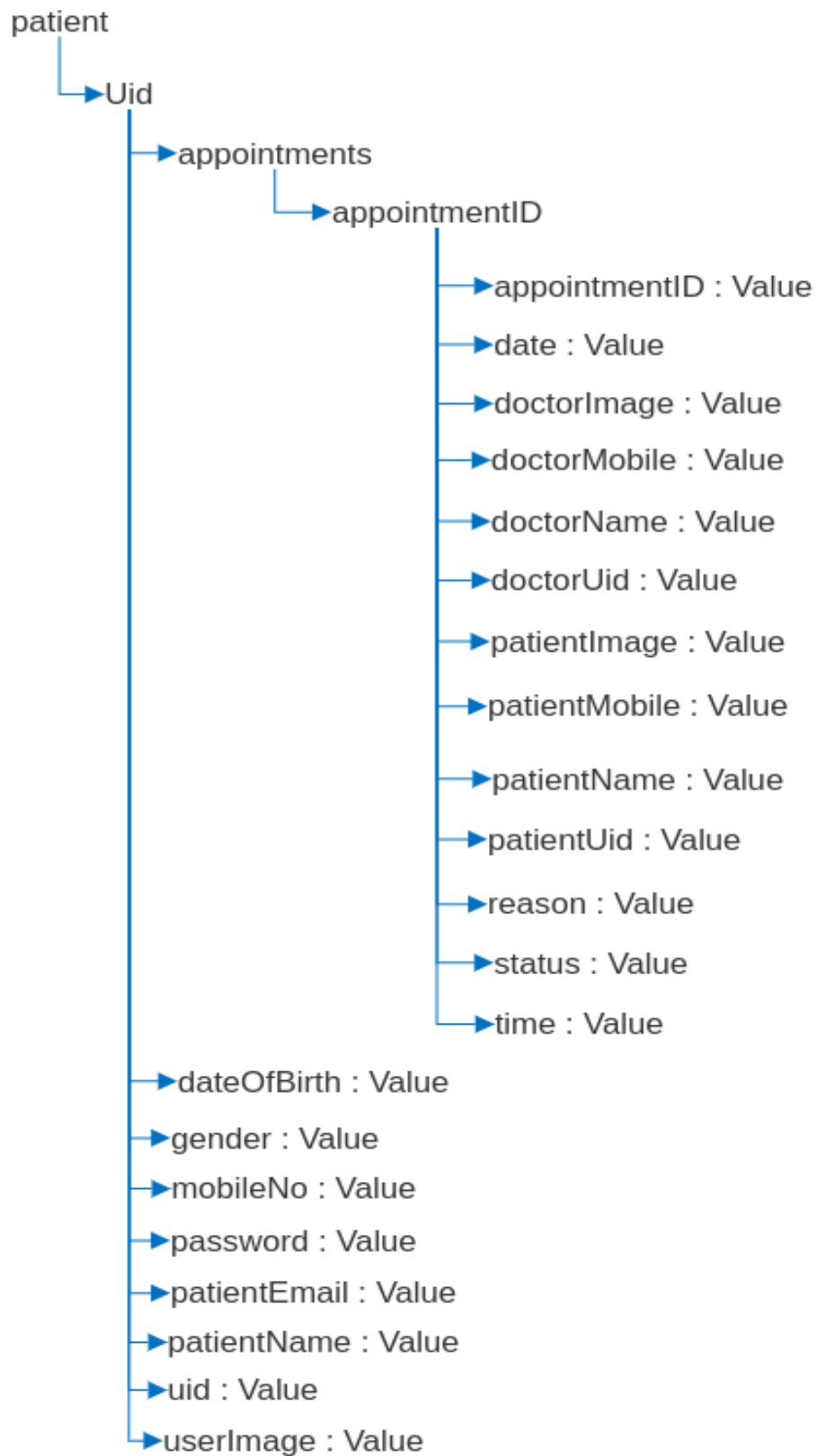




❖ **Doctor Side database:**



❖ Patient Side database:



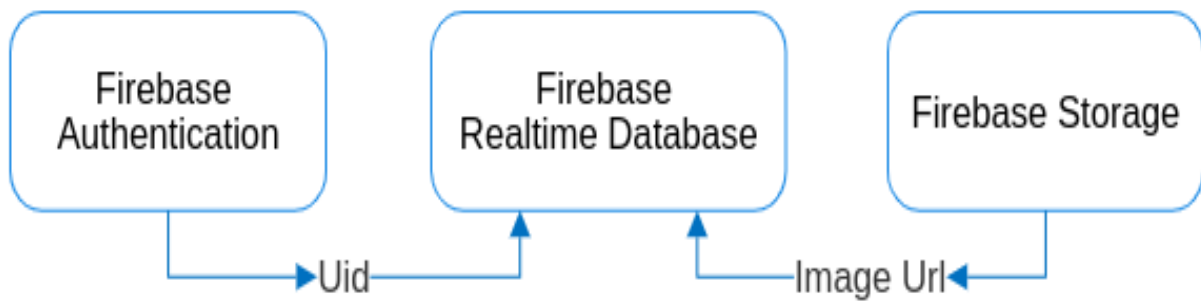
### ❖ **Firestore Storage:**

- ✓ Doctor/
- ✓ Patient/

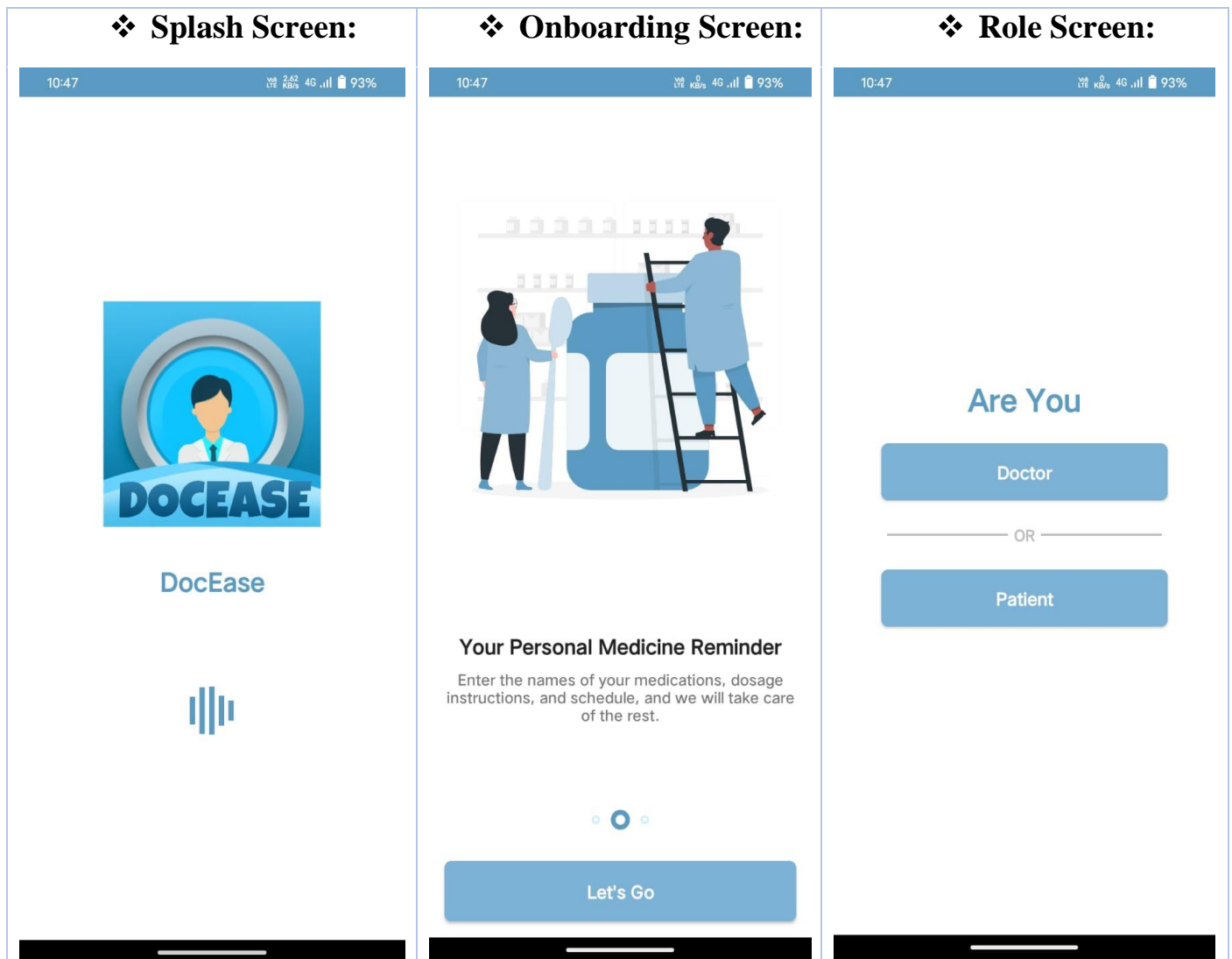
→ Doctor Folder contains profile photos of doctors.

→ Patient Folder contains profile photos of patients.

### ❖ **Connection Between Authentication, Database and Storage:**



## 7. System Design




## ❖ Patient Side App:

### ❖ Login Screen:

10:48

3.93 KB/s 4G 93%



Login

@ Email ID

🔒 Password

☐ Show Password

Login


New Member? [Register](#)

### ❖ Registration Screen:

10:51

0 KB/s 4G 93%

Register



Upload Profile Pic

👤 Name


@ Email ID


🔒 Password

🔒 Confirm Password

☎ Mobile Number

📅 Date of Birth

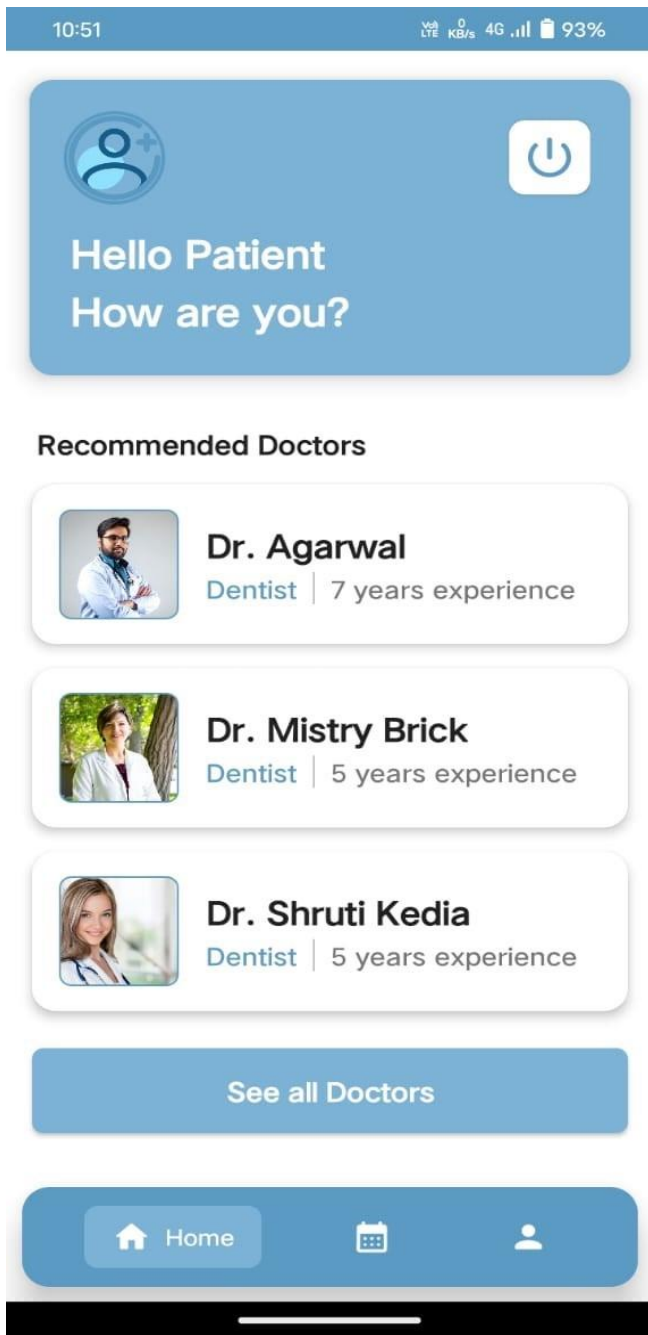
  
Male

  
Female

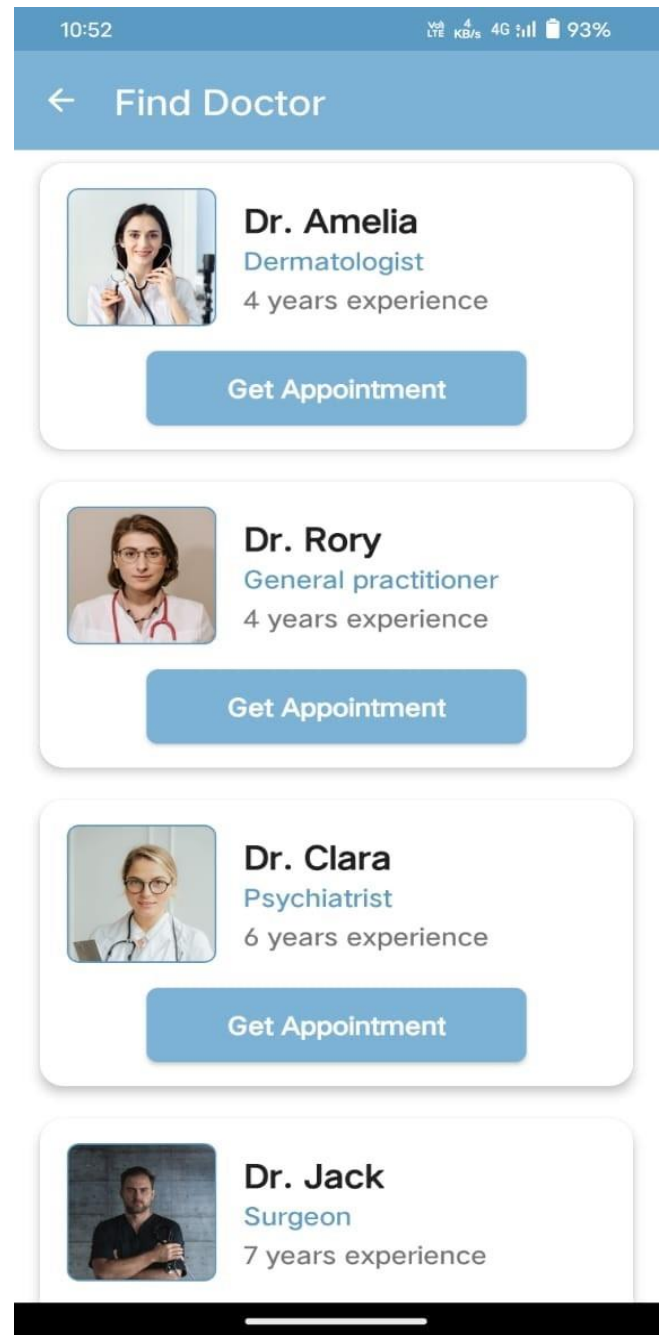
Register

Joined us before? [Login](#)

## ❖ Home Screen:




## ❖ All Doctor Screen:



### ❖ Book Appointment Screen:

10:52
LTE 0 KB/s 4G 93%

← Doctor Information



Name	Dr. Amelia
Specialist	Dermatologist
Experience	4 years
Contact Number	6879452130
Email ID	amelia@gmail.com

Reason (like: Fever)


Select Date For Appointment


Select Time For Appointment

Book Appointment


### ❖ All Appointments Screen:


10:31
LTE 0 KB/s 31%







**Dr. Jane**  
fever  
10-10-2023 18:20  
Pending







**Dr. Clara**  
stress  
27-11-2023 15:15  
Pending








**Dr. Steven**  
heavy depression  
21-09-2023 17:15  
Confirmed



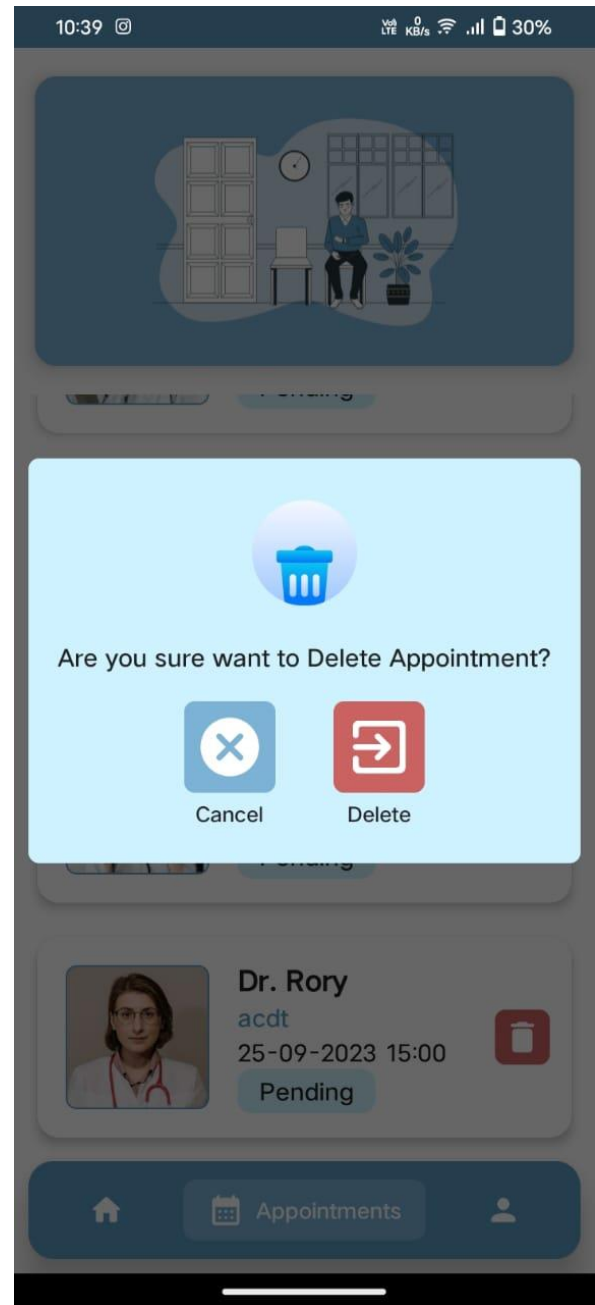
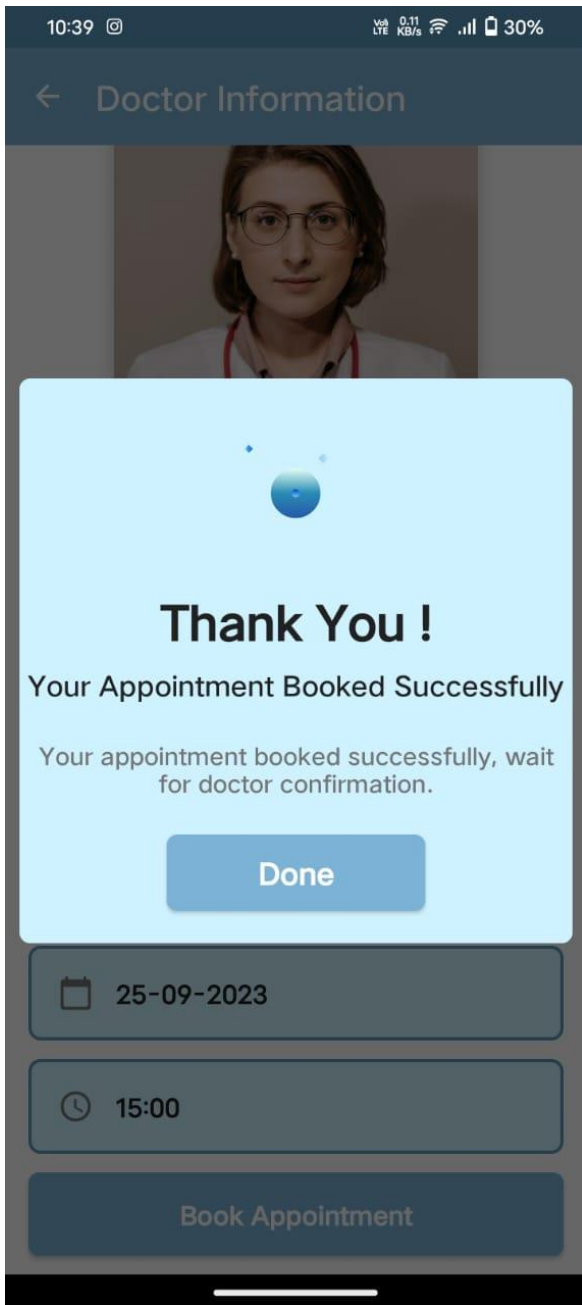


**Dr. Amelia**

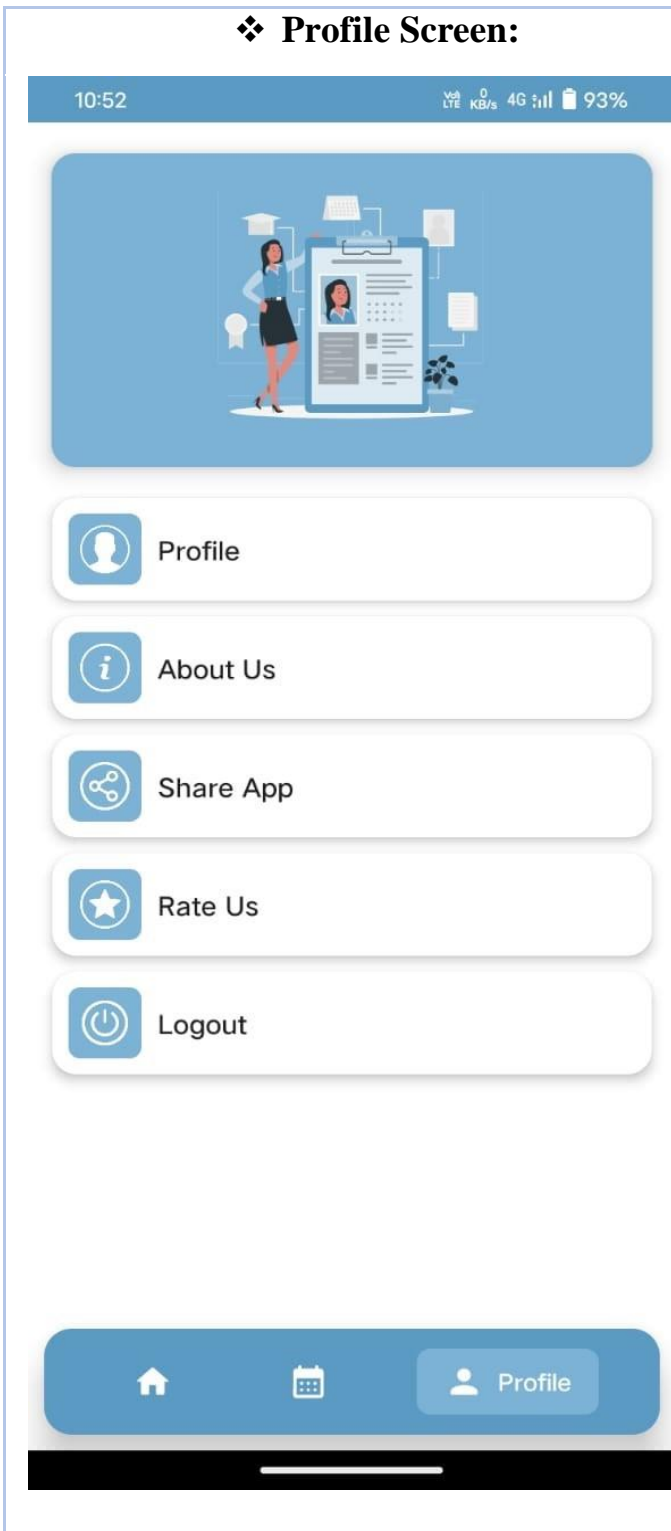
### ❖ Book Appointment Dialog:

### ❖ Delete Appointment Dialog:

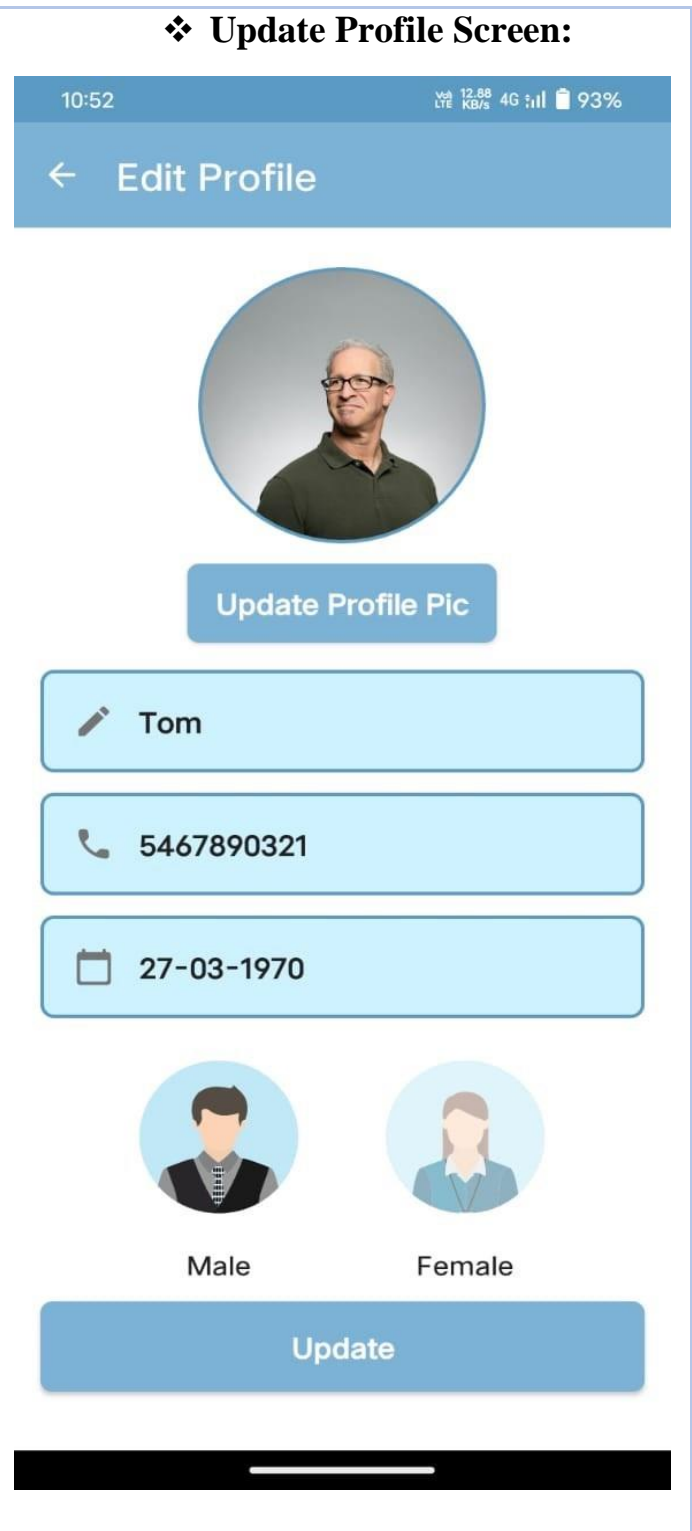




### ❖ Profile Screen:



### ❖ Update Profile Screen:




## ❖ Doctor Side App:

### ❖ Login Screen:

11:31

8.16 KB/s 4G 91%



### Doctor Login

@ Email ID

🔒 Password

☐ Show Password

Login


New Member? [Register](#)

### ❖ Registration Screen:

11:31

0.1 KB/s 4G 91%

### Doctor Register



Upload Profile Pic

👤 Name

@ Email ID

🔒 Password


🔒 Confirm Password


📞 Mobile Number

📅 Date of Birth

👤 Experience (in Years)

- Select Category -

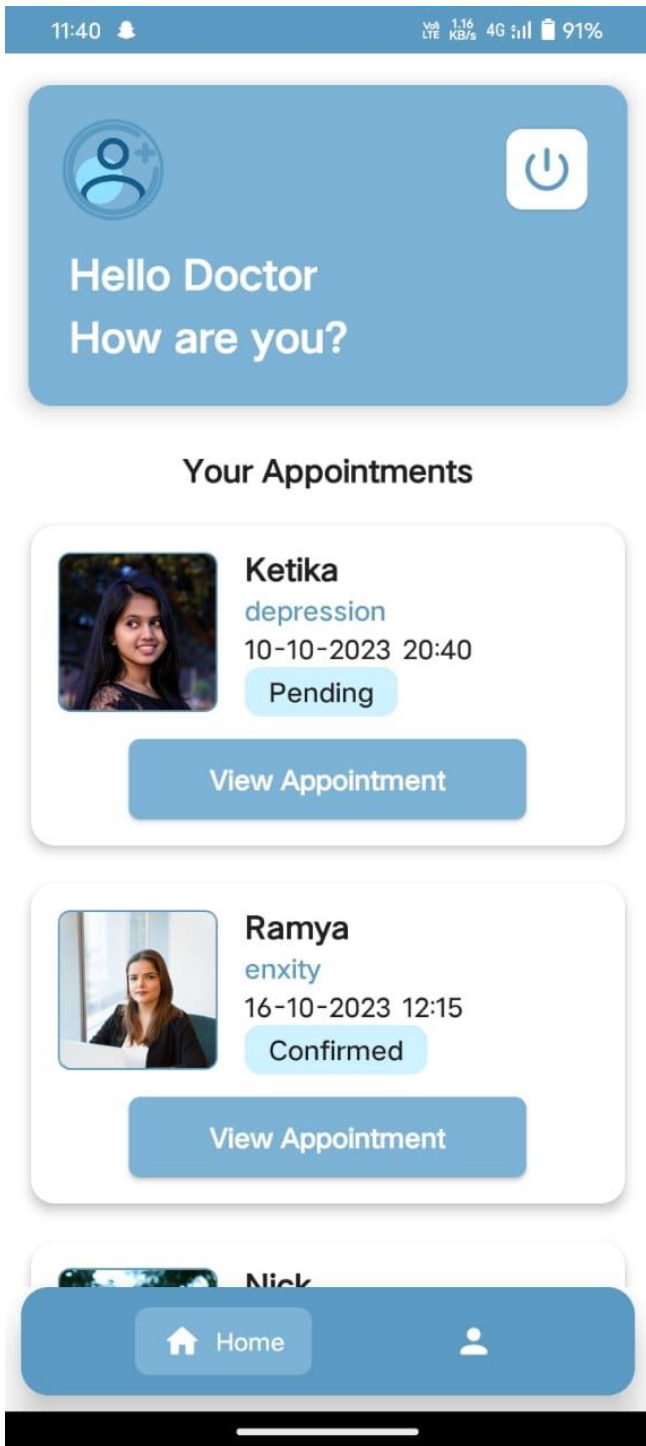
  
Male

  
Female

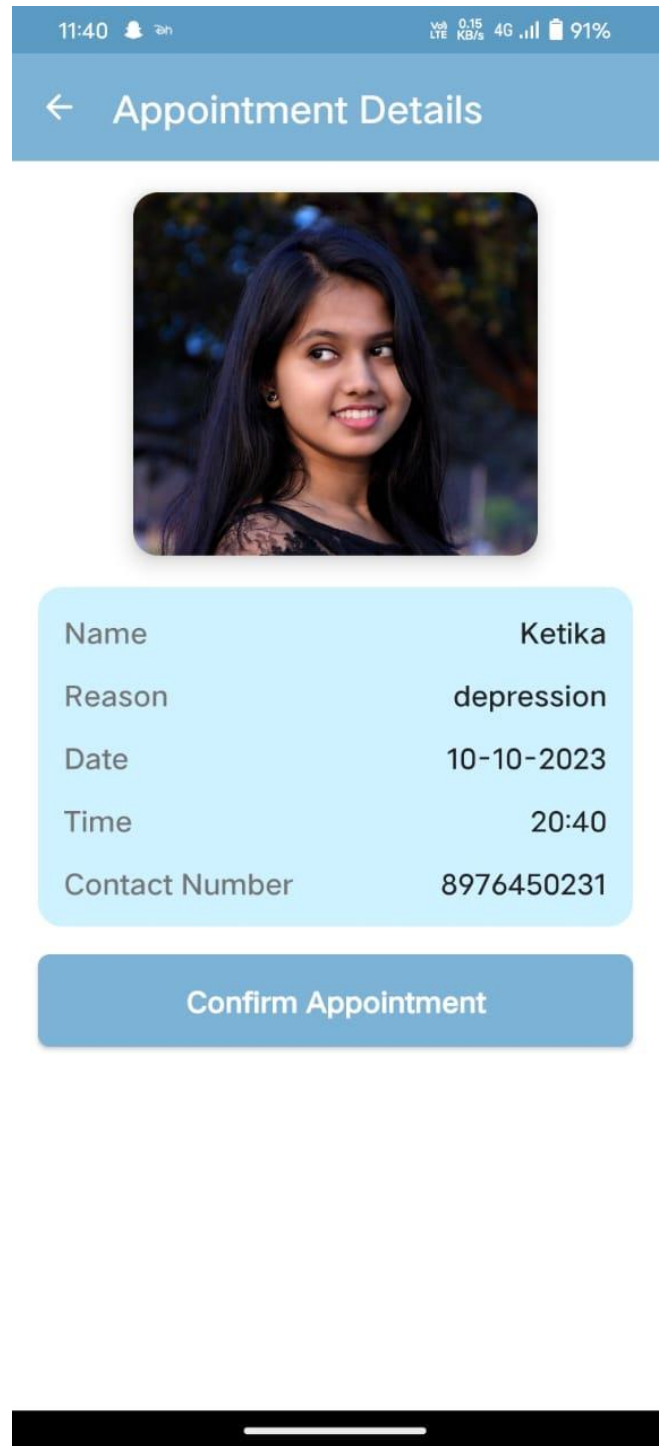
Register

Joined us before? [Login](#)

## ❖ Home Screen:






## ❖ Pending Appointment Screen:



## ❖ Confirmed Appointment Screen:




11:40


  

Vol 0

KB/s


4G

 91%

←

Appointment Details



Name

Ramya

Reason

enxity

Date

16-10-2023

Time

12:15




Contact Number

9658302174

Appointment Confirmed

## ❖ Profile Screen:




11:40


  


Vol 12.91


KB/s


4G


  


 91%





 Profile


 About Us

 Share App

 Rate Us

 Logout



 Profile

## ❖ Update Profile Screen:

11:40


Vol 0  
LTE KB/s

4G


91%

←


Edit Profile




Update Profile Pic




Dr. Steven




9806745321



17-11-1976



Male



Female

Update

## ❖ About Us Screen:

11:42

Vol 1.39  
LTE KB/s

4G

91%

←

About Us

Application Name

DocEase

Build Version

Version 1.0.0

Rate Us

Please support us with your positive review

Share App

Share our app with your family and friends

## 8. References

- ✓ <https://firebase.google.com/docs>
- ✓ <https://developer.android.com/docs>
- ✓ <https://github.com/>
- ✓ <https://stackoverflow.com/>
- ✓ <https://www.behance.net/>

## 9. Closing Remarks

### ❖ Thank You:

I extend my heartfelt gratitude to you for choosing my DocEase app as your trusted healthcare companion. Your health and well-being are of paramount importance to me, and I am honoured to be a part of your healthcare journey. Thank you for placing your trust in us.

### ❖ Closing Remarks

As we conclude this documentation, we want to reaffirm our commitment to revolutionizing healthcare management. Our vision is to empower you with the tools and resources needed to take control of your health effortlessly. Together, we are reshaping the future of healthcare access and convenience. We look forward to serving you, improving your healthcare experience, and contributing to your overall well-being.

Your health is our top priority, and we are here to support you every step of the way. Welcome to a new era of healthcare management, welcome to the DocEase app.

With warm regards,

Utsav N. Dudhat