



**REVOLUTIONIZING REMOTE HEALTH MONITORING:
AUTONOMOUS DETECTION OF CARDIAC ABNORMALITIES
WITH CUSTOMIZED DIETARY PLANNING**

R24-019

Project Proposal Report

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Table of Contents

1. SCREENSHOTS OF THE PROJECT MANAGEMENT TOOL	4
2. SCREENSHOTS OF GOOGLE DRIVE FOLDERS	5
3. SCREENSHOTS OF THE MEETING MINUTES	6
4. SCREENSHOTS OF THE TEAMS MEETING HISTORY	7
5. SCREENSHOTS OF THE WHATSAPP GROUP	13
6. FIGMA PROTOTYPE DESIGNING	15
7. EVIDENCE FOR DEVELOPMENT	16
8. TRAINED ADAPTERS	17
9. SCREENS COMPLETED	19
10. RESEARCH PAPER SUBMISSION	26
11. ETHNOGRAPHY STUDY	28

Table of Figures

Figure 1: Asana Board Dashboard Screenshot	4
Figure 2: Asana Board Screenshot	4
Figure 3:Google Drive Screenshot.....	5
Figure 4:Google Drive document repo screenshot.....	6
Figure 5:Brainstorm meeting screenshot	7
Figure 6:Group Meeting Chat Screenshot	7
Figure 7:Teams group meeting history	8
Figure 8: Teams Group Meeting History Screenshots	8
Figure 9: Teams Group Meeting History Screenshots.....	9
Figure 10: Teams Group Meeting History Screenshots	9
Figure 11: Teams Group Meeting History Screenshots	10
Figure 12: Teams Group Meeting History Screenshots	10
Figure 13: Teams Group Meeting History Screenshots	11
Figure 14: Teams Group Meeting History Screenshots	11
Figure 15: Teams Group Meeting History Screenshots	12
Figure 16:Whatsapp chat with supervisor and external supervisor screenshot	13
Figure 17:Whatsapp chat with supervisor and external supervisor screenshot	14
Figure 18:Whatsapp chat with supervisor and external supervisor screenshot	14
Figure 19:Whatsapp chat with supervisor and external supervisor screenshot	15
Figure 20:Figma prototype screenshot.....	15
Figure 21:Firebase screenshot up to PP1	16
Figure 22:Firebase progress up to PP2	16
Figure 23:AWS full blood count custom adapter analytics.....	17
Figure 24:AWS full blood count custom adapter analytics.....	17
Figure 25:AWS custom adapter - Urine Full Report	18
Figure 26:AWS custom adapter - Lipid Profile	18
Figure 27:AWS custom adapter - Blood Glucose	19
Figure 28:Diet Analysis Screen.....	19
Figure 29: Report Analysis Screen.....	20
Figure 30:Multiple Report Analysis Screen	20

Figure 31: User Profile Screen	21
Figure 32:User Login Screen.....	21
Figure 33:Medicine Reminder Screen Notification	22
Figure 34: Medicine Alert Screen Home page	22
Figure 35:Medicine Alert Screen Success	23
Figure 36:Medicine Alert Screen Upload	23
Figure 37: Flask Server Code	24
Figure 38:Postman API Testing	25
Figure 39:Git Hub Repo Screenshot	25
Figure 40:GitHub branch Screenshot.....	26
Figure 41: FICC Conference Research Paper Submission	26
Figure 42:ICCSIT 2024 Confirmation screenshot	27
Figure 43:Ethnographic Picture.....	28

1. SCREENSHOTS OF THE PROJECT MANAGEMENT TOOL

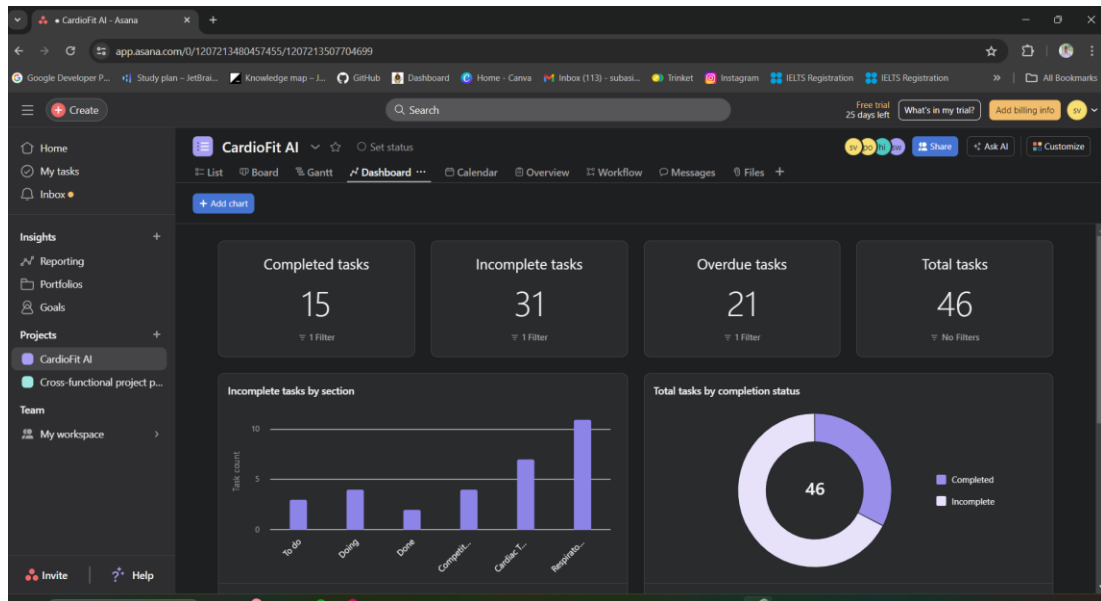


Figure 1: Asana Board Dashboard Screenshot

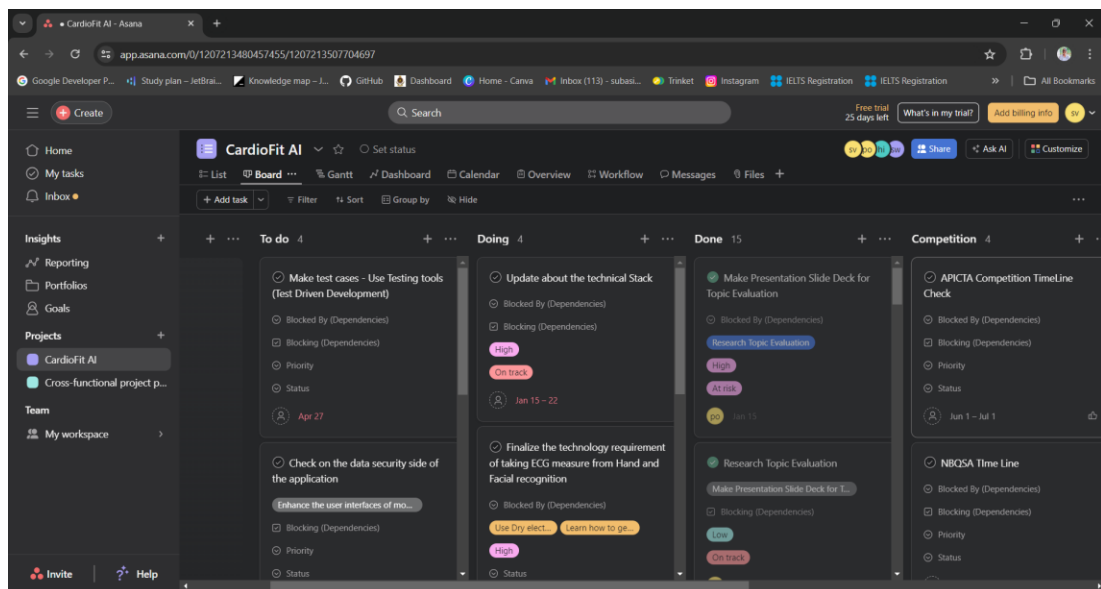


Figure 2: Asana Board Screenshot

2. SCREENSHOTS OF GOOGLE DRIVE FOLDERS

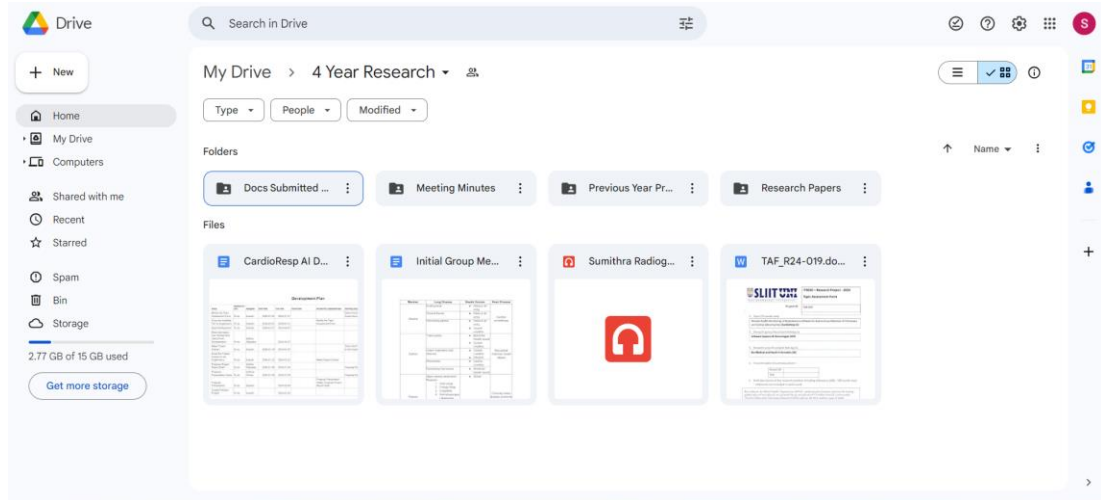


Figure 3:Google Drive Screenshot

3. SCREENSHOTS OF THE MEETING MINUTES

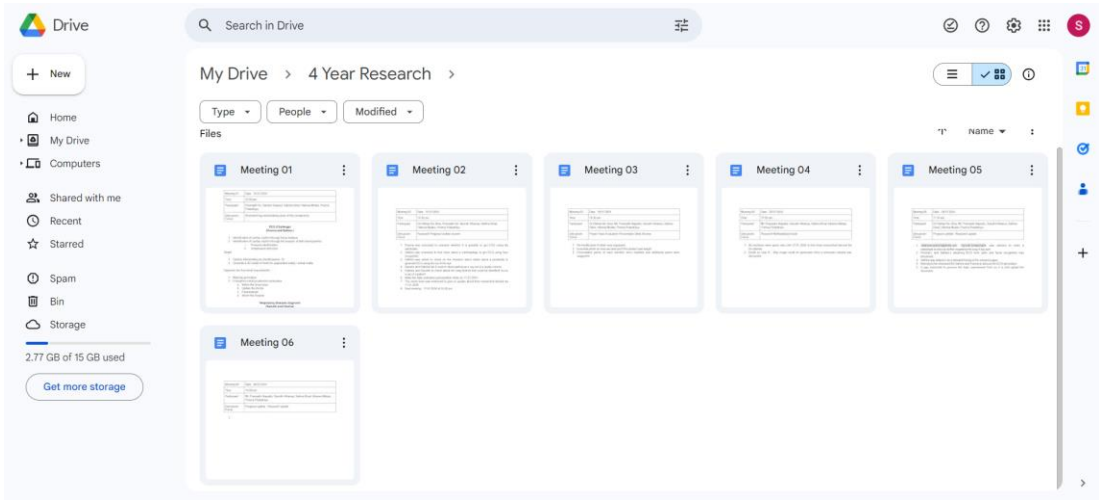


Figure 4:Google Drive document repo screenshot

4. SCREENSHOTS OF THE TEAMS MEETING HISTORY

...

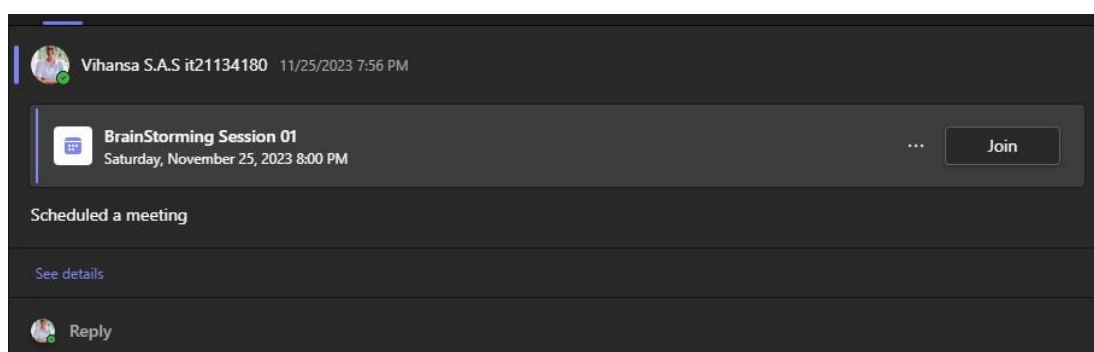


Figure 5:Brainstorm meeting screenshot

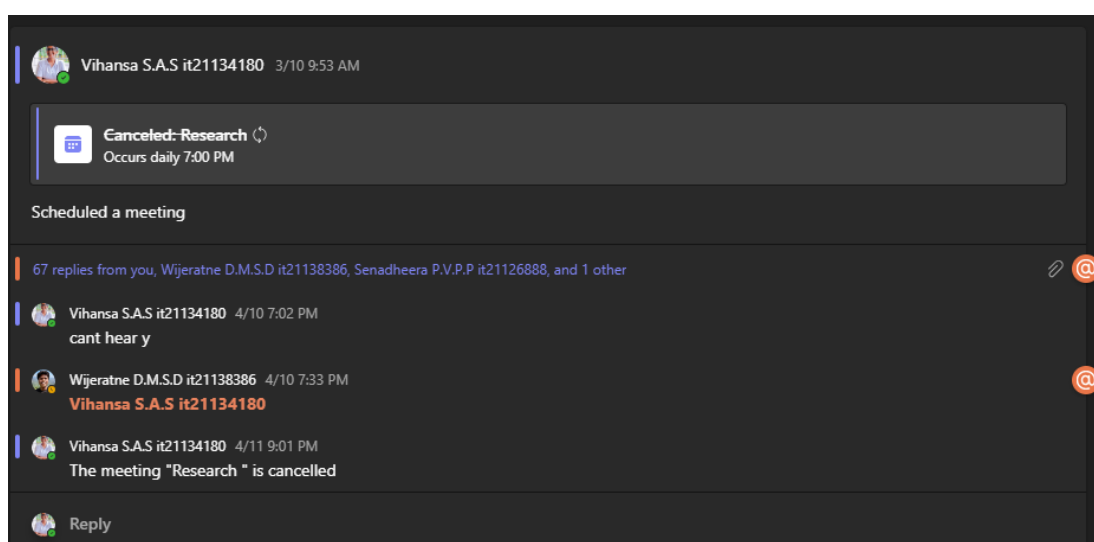


Figure 6:Group Meeting Chat Screenshot

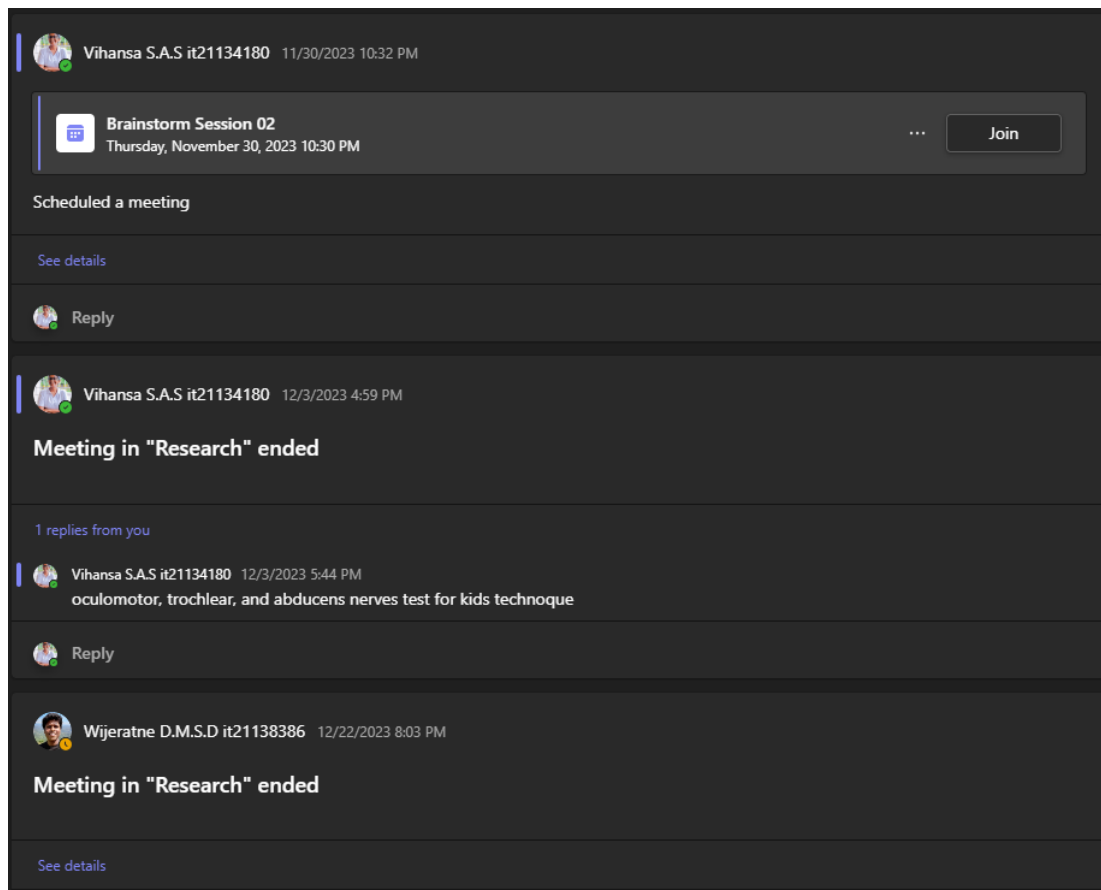


Figure 7: Teams group meeting history

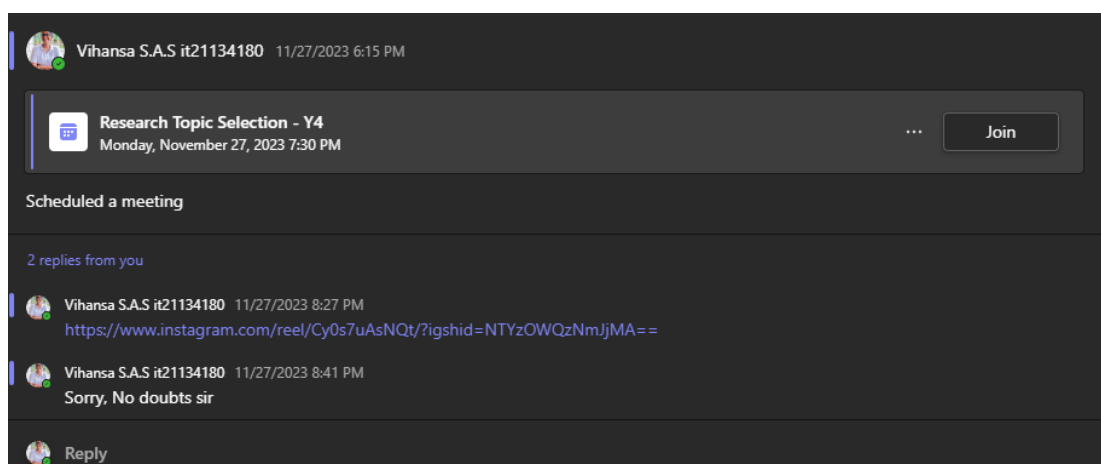


Figure 8: Teams Group Meeting History Screenshots

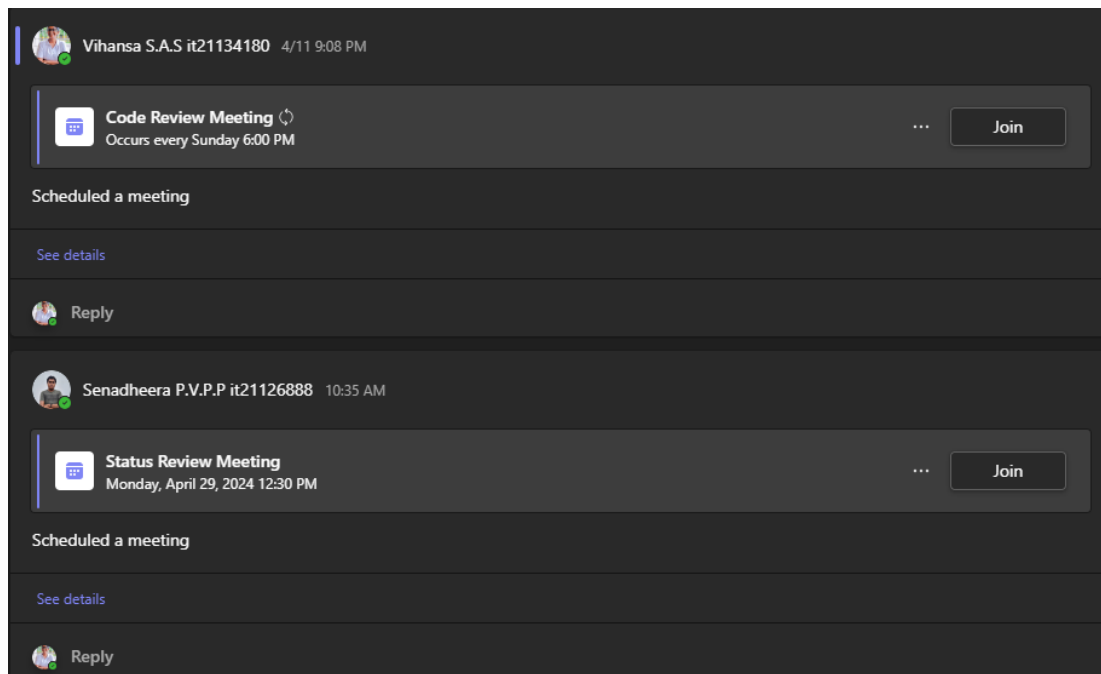


Figure 9: Teams Group Meeting History Screenshots

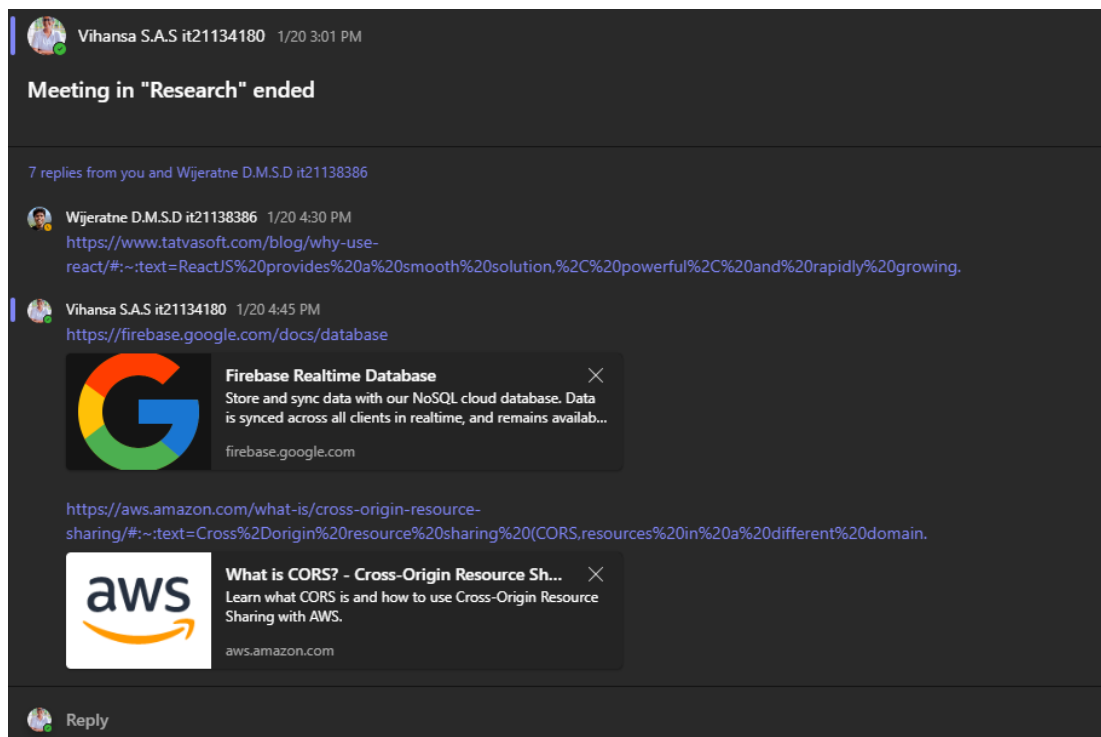


Figure 10: Teams Group Meeting History Screenshots

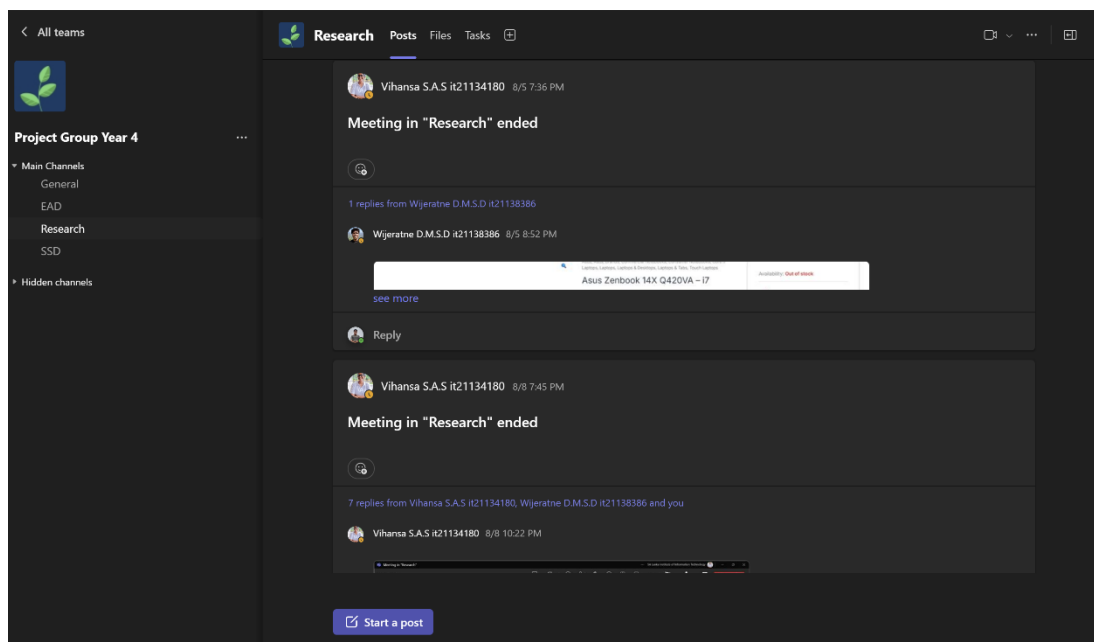


Figure 11: Teams Group Meeting History Screenshots

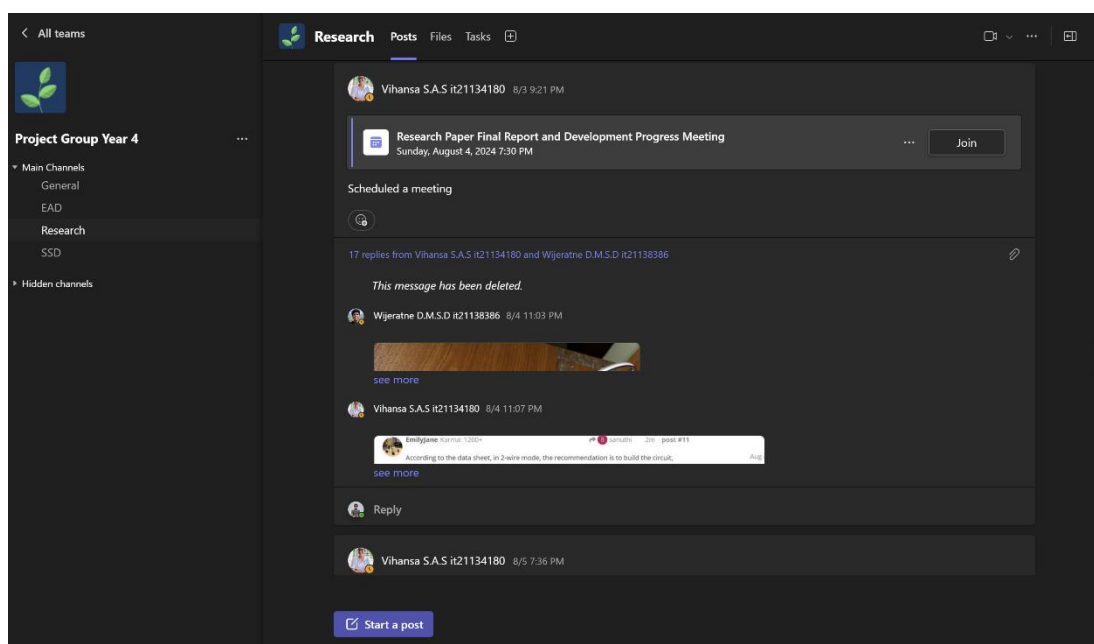


Figure 12: Teams Group Meeting History Screenshots

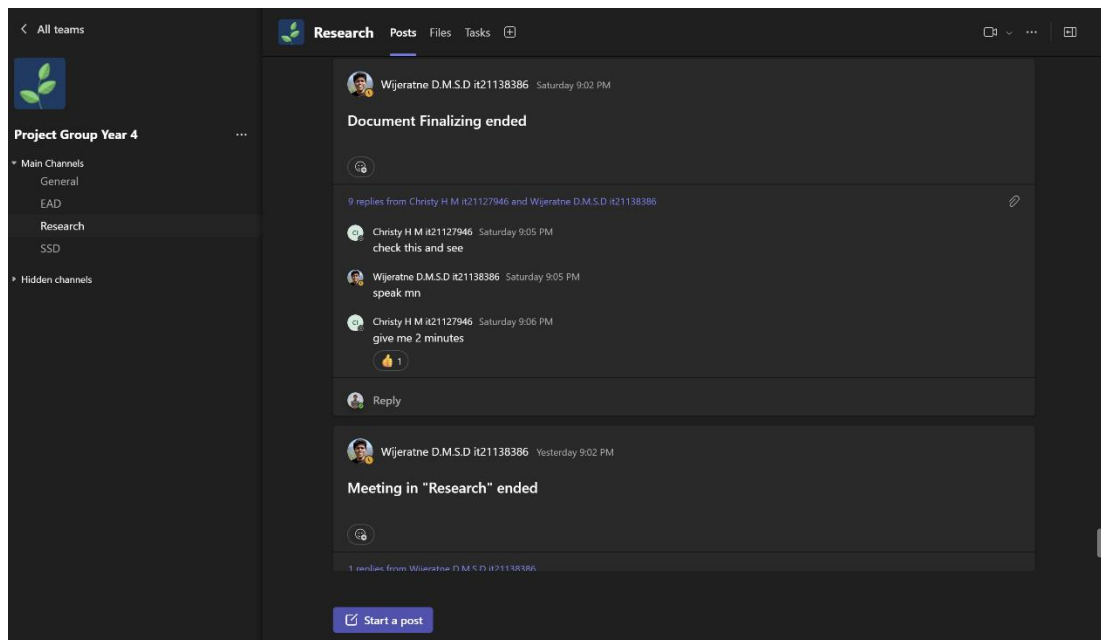


Figure 13: Teams Group Meeting History Screenshots

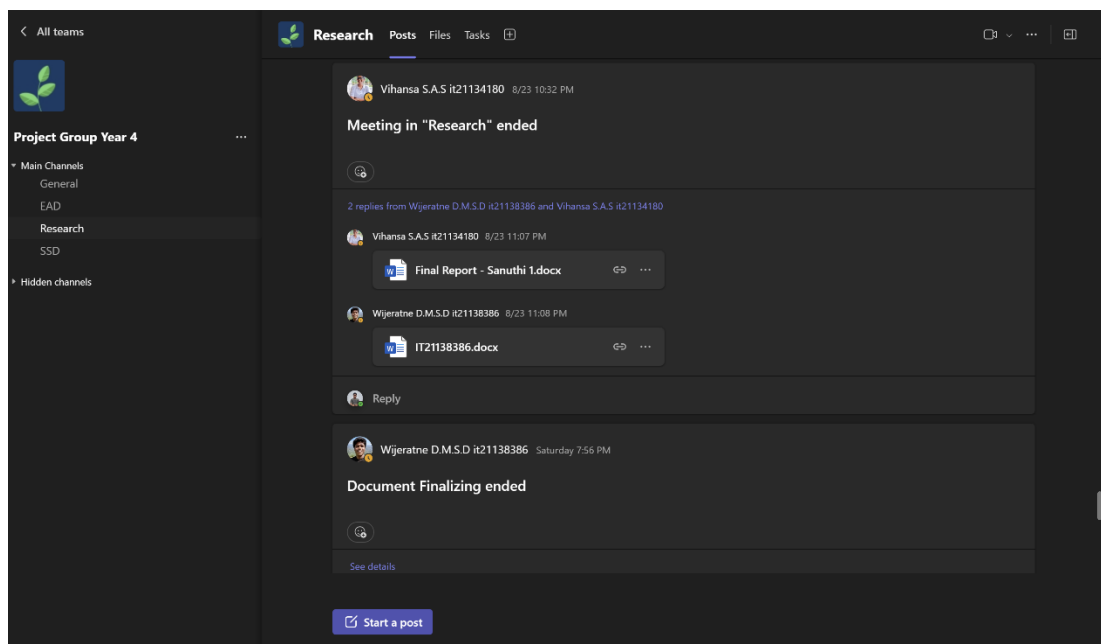


Figure 14: Teams Group Meeting History Screenshots

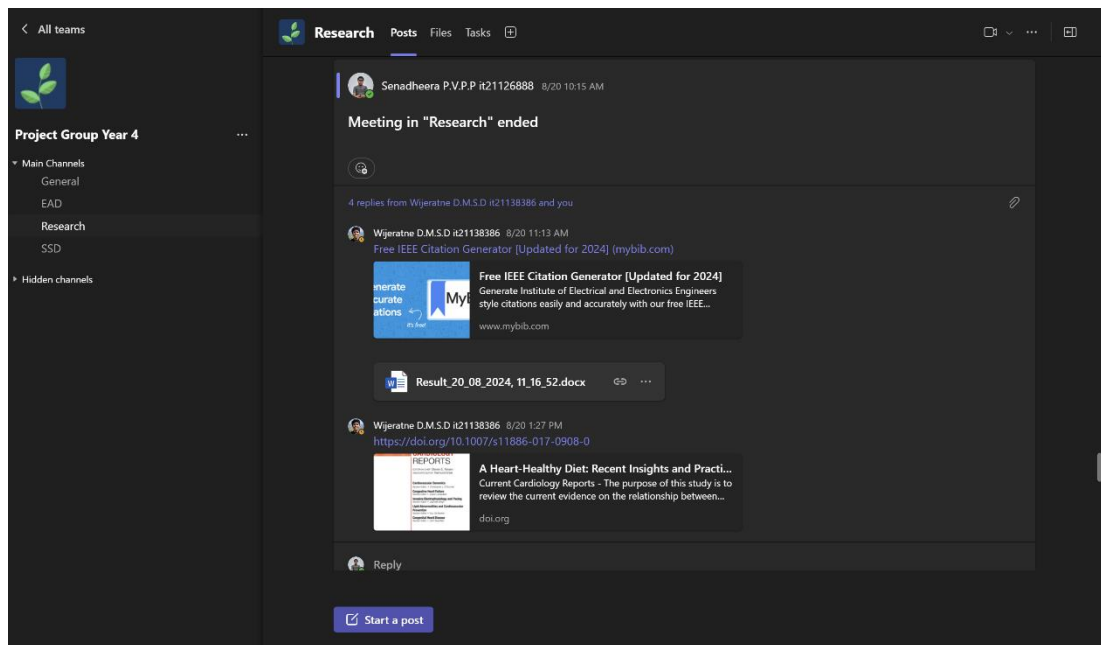


Figure 15: Teams Group Meeting History Screenshots

5. SCREENSHOTS OF THE WHATSAPP GROUP

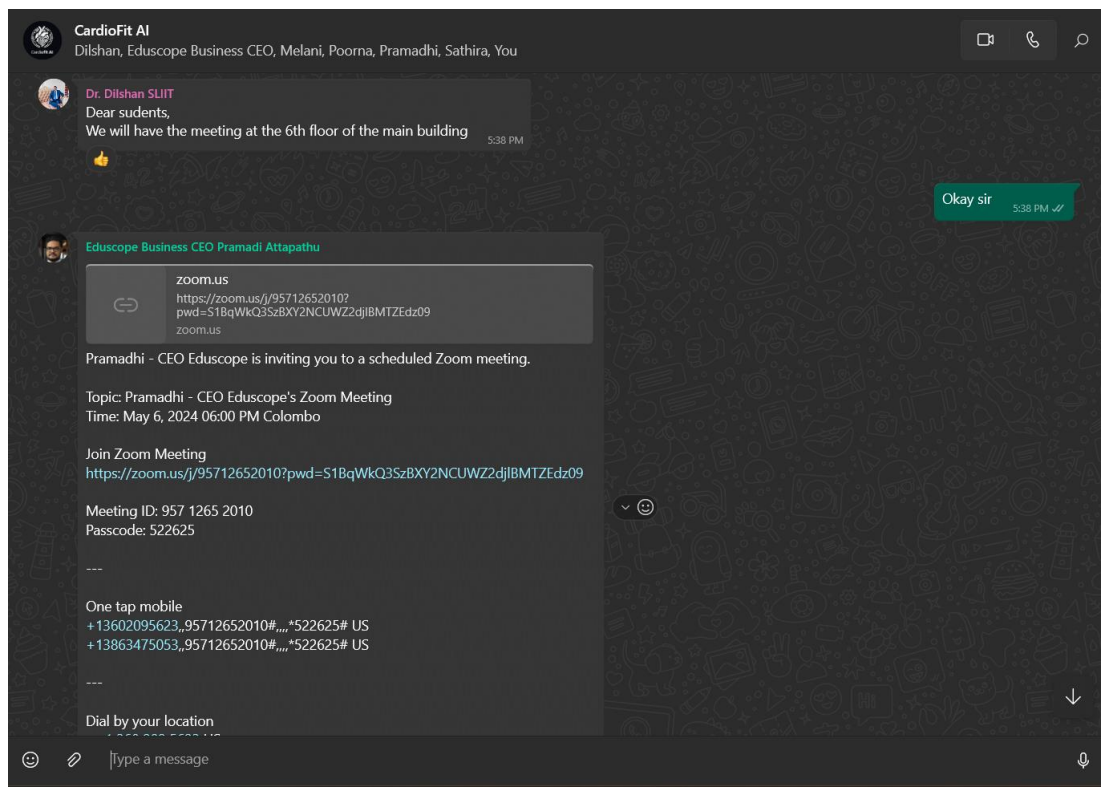


Figure 16:Whatsapp chat with supervisor and external supervisor screenshot

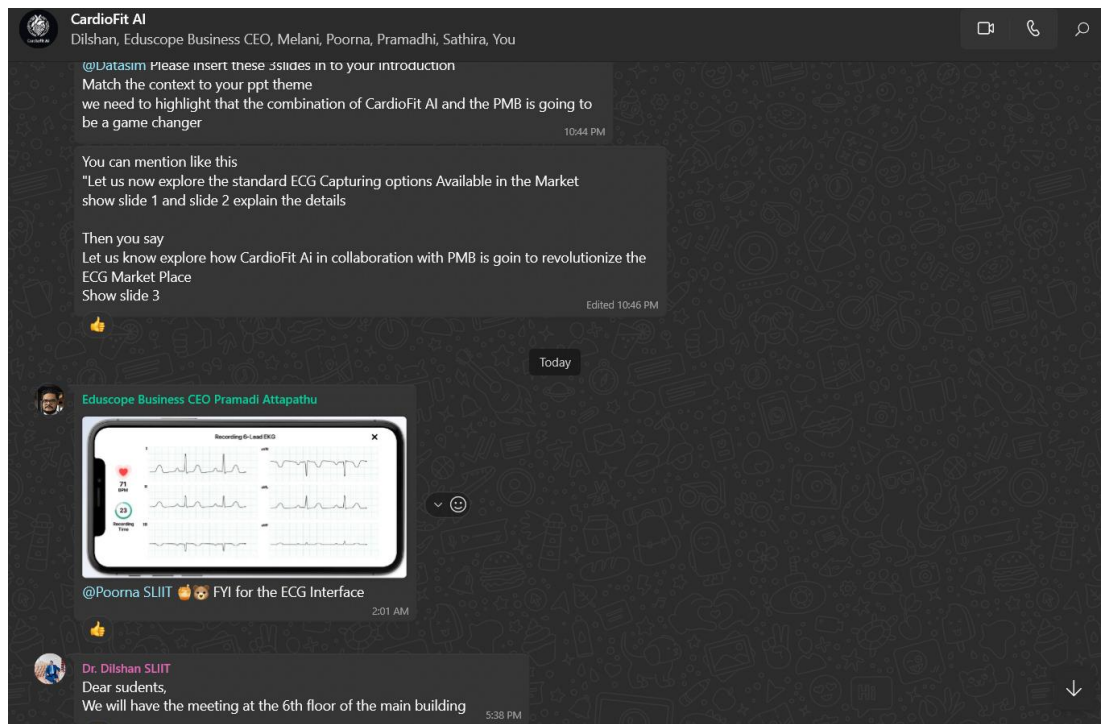


Figure 17:Whatsapp chat with supervisor and external supervisor screenshot

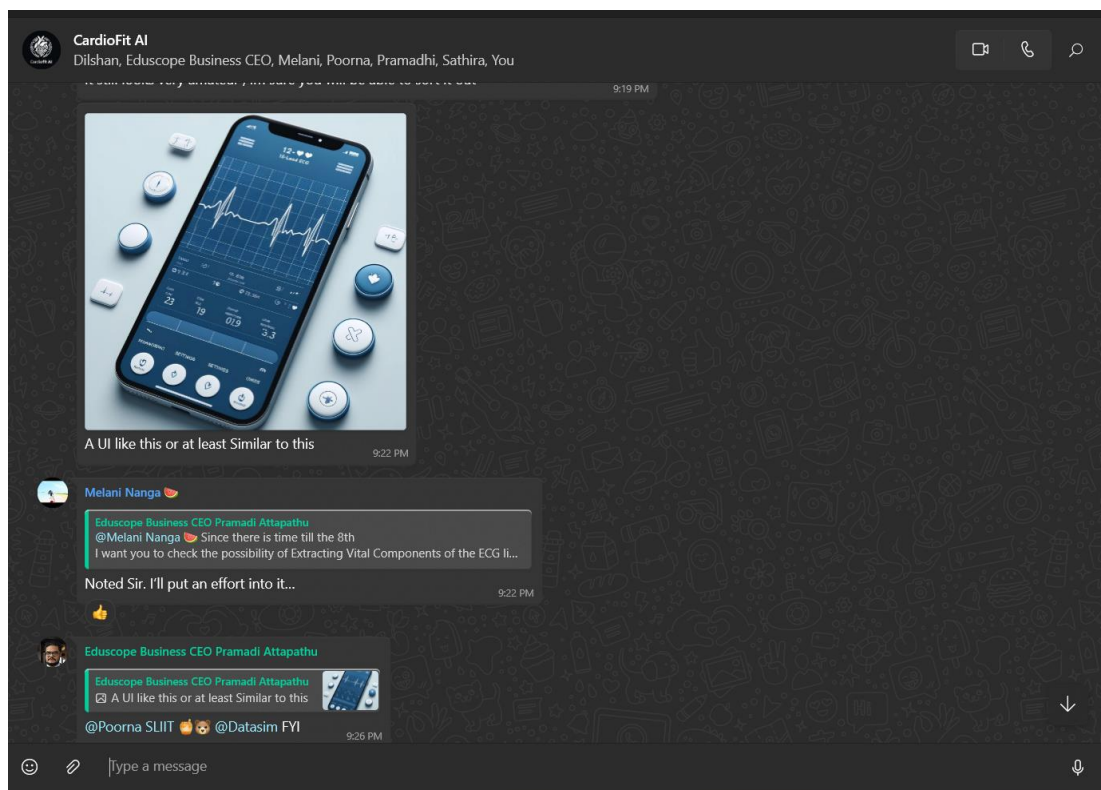


Figure 18:Whatsapp chat with supervisor and external supervisor screenshot

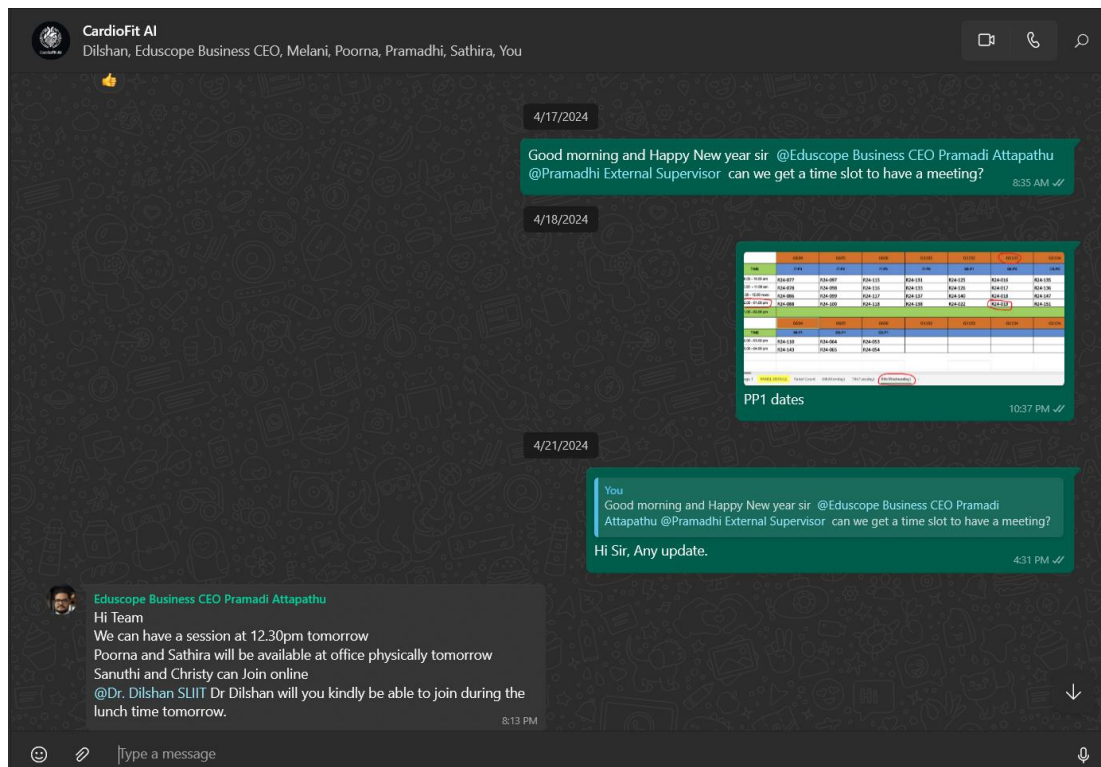


Figure 19:Whatsapp chat with supervisor and external supervisor screenshot

6. FIGMA PROTOTYPE DESIGNING



Figure 20:Figma prototype screenshot

7. EVIDENCE FOR DEVELOPMENT

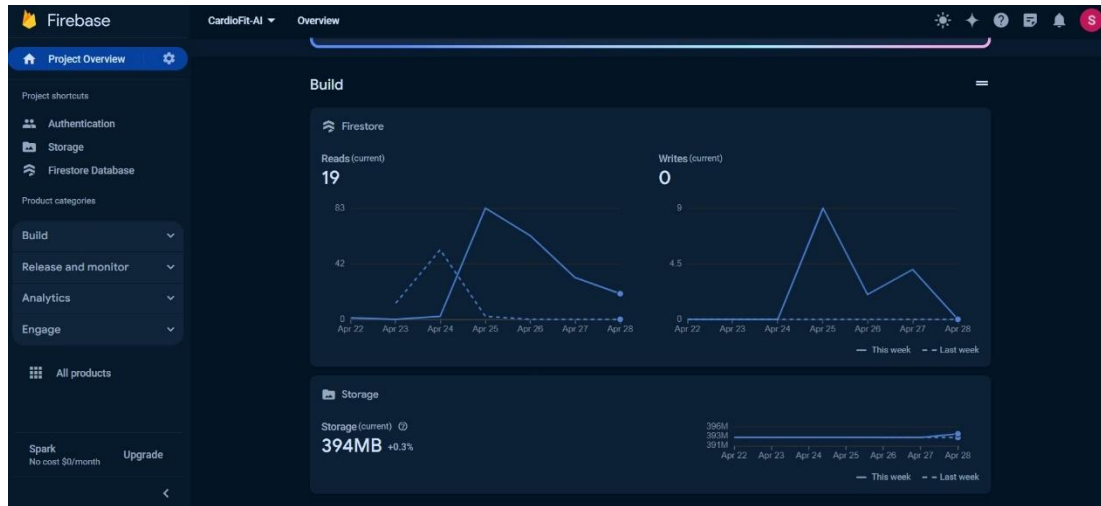


Figure 21:Firebase screenshot up to PP1

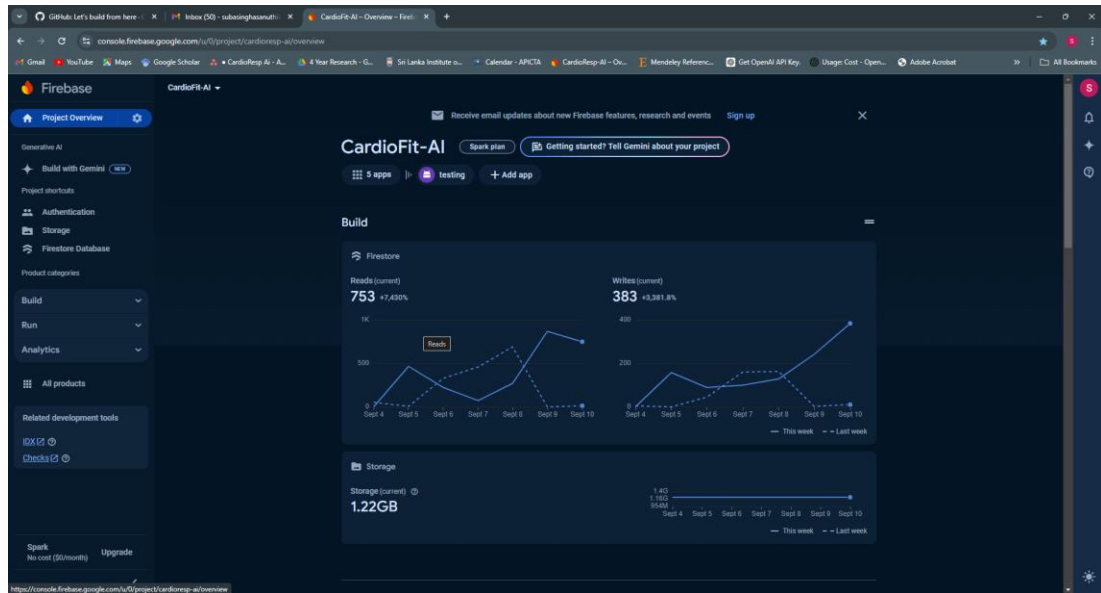


Figure 22:Firebase progress up to PP2

8. TRAINED ADAPTERS

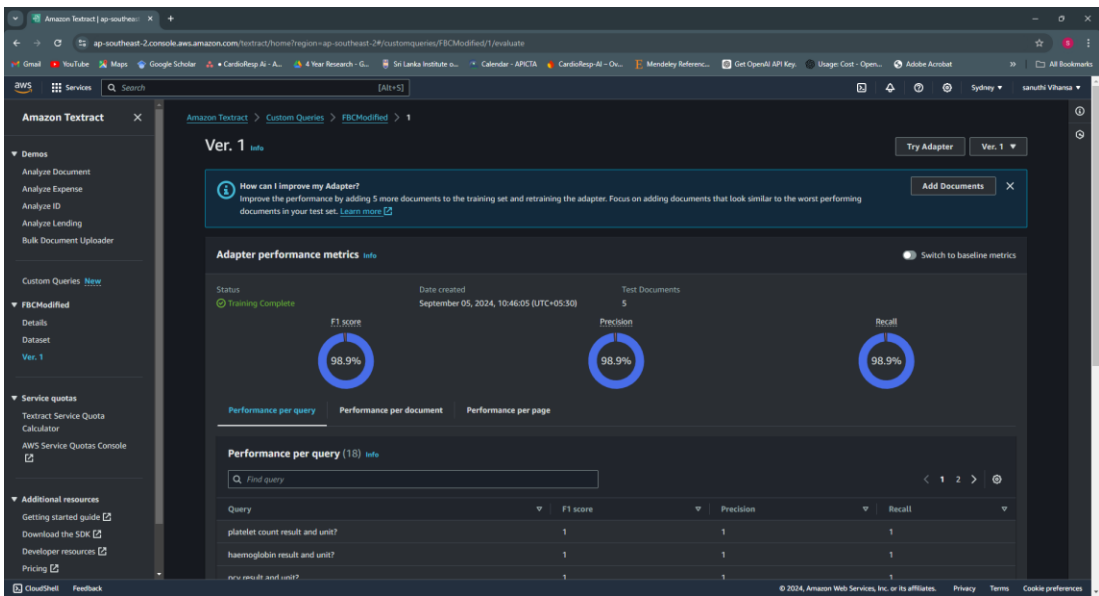


Figure 23: AWS full blood count custom adapter analytics

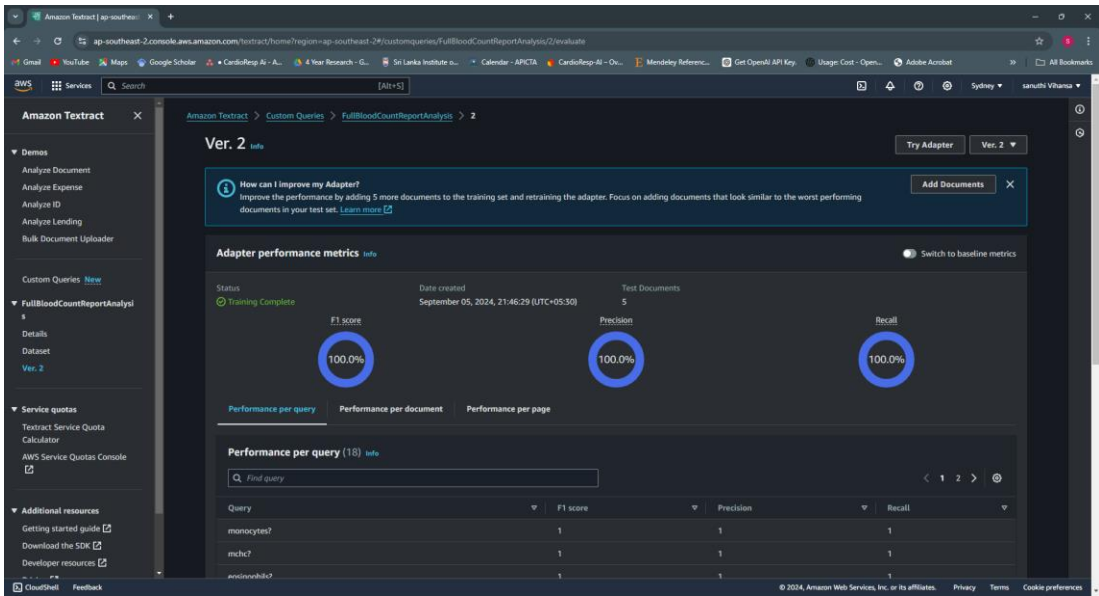


Figure 24: AWS full blood count custom adapter analytics

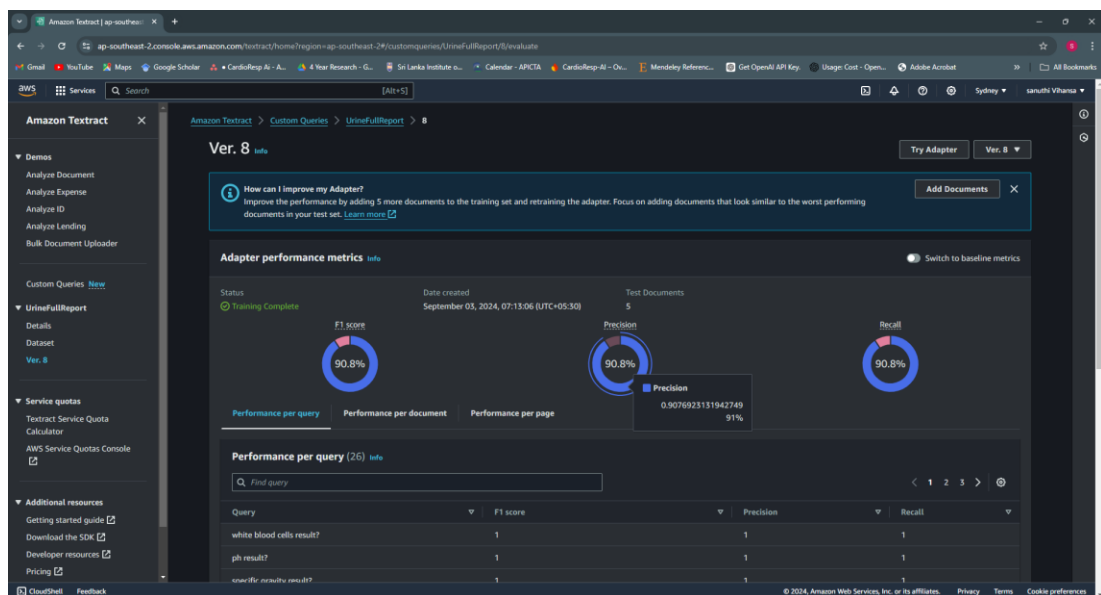


Figure 25:AWS custom adapter - Urine Full Report

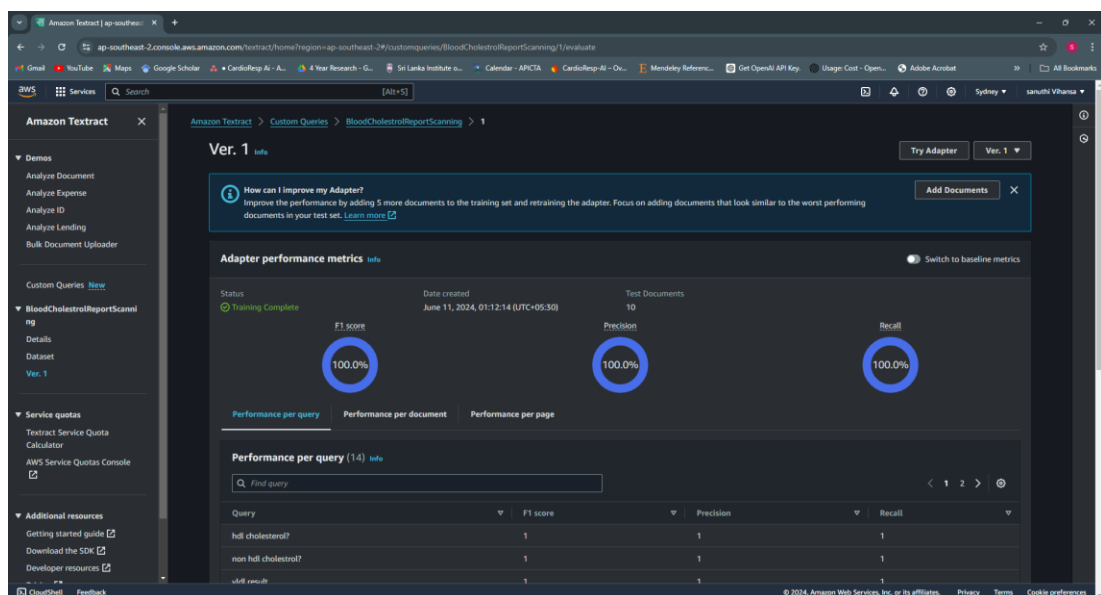


Figure 26:AWS custom adapter - Lipid Profile

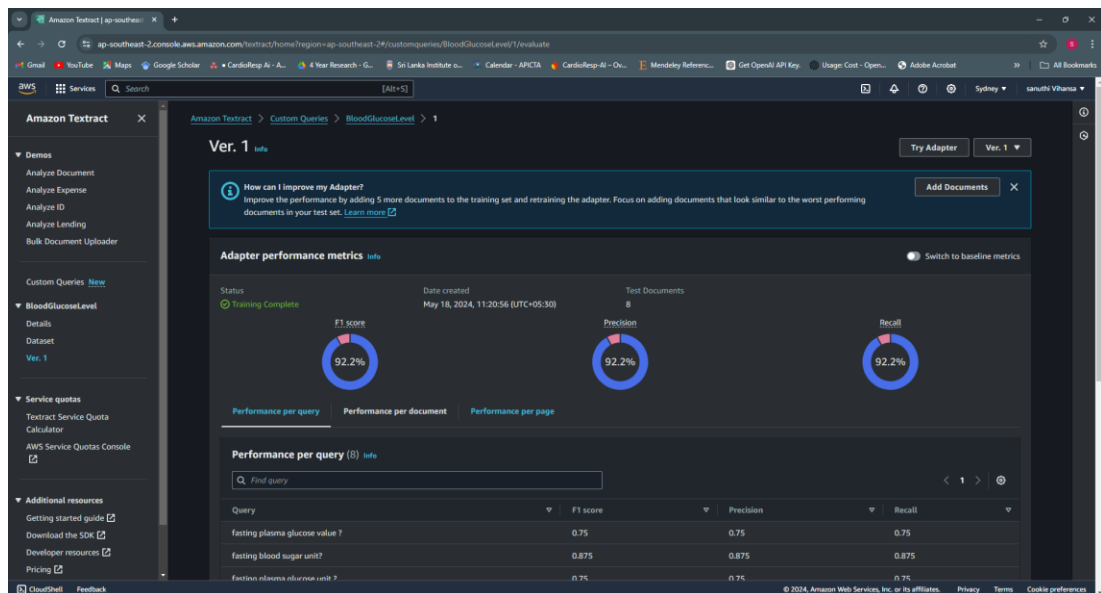


Figure 27:AWS custom adapter - Blood Glucose

9. SCREENS COMPLETED

7:31 Customised Dietary Advice

Confirm your data and click generate

Age: 20 Gender: Female

BMI (kg/m²): 27.83

Blood Cholesterol Level: 201 Blood Sugar Level: 94

User have cardiac arrhythmia?: Yes

[Generate](#)

Dietary Advice given for a patient with following conditions is,

BMI: 27.83 Cardiac Condition: No
Blood Sugar Level: Normal Blood Cholesterol Level: Normal

[Be aware of salt and fat intake](#)

Figure 28:Diet Analysis Screen



Figure 29: Report Analysis Screen

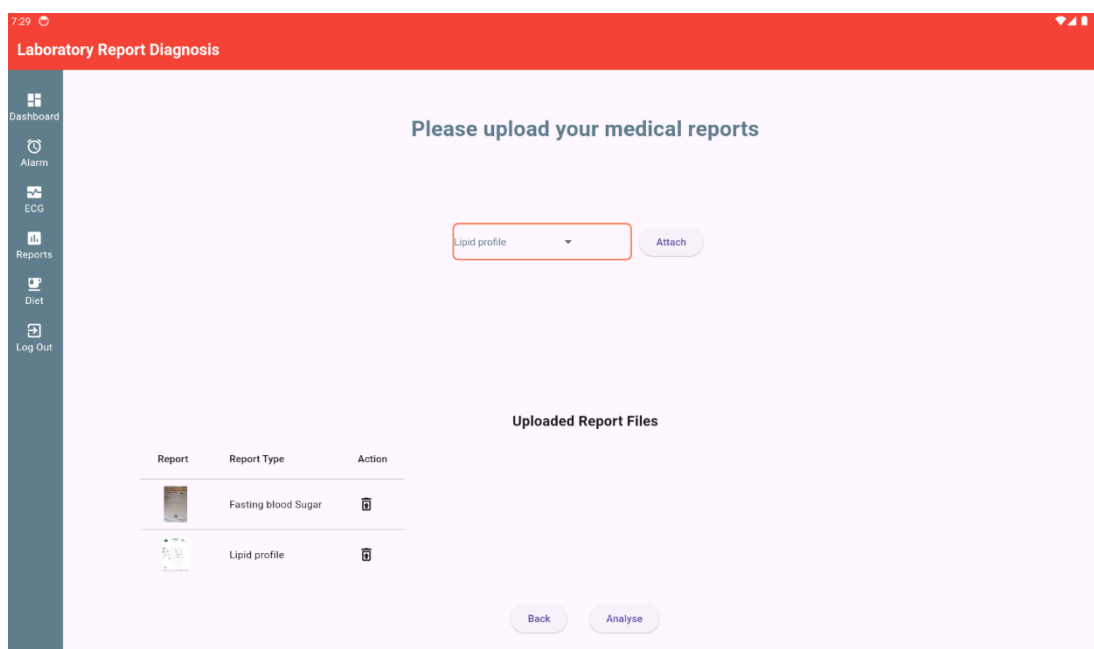
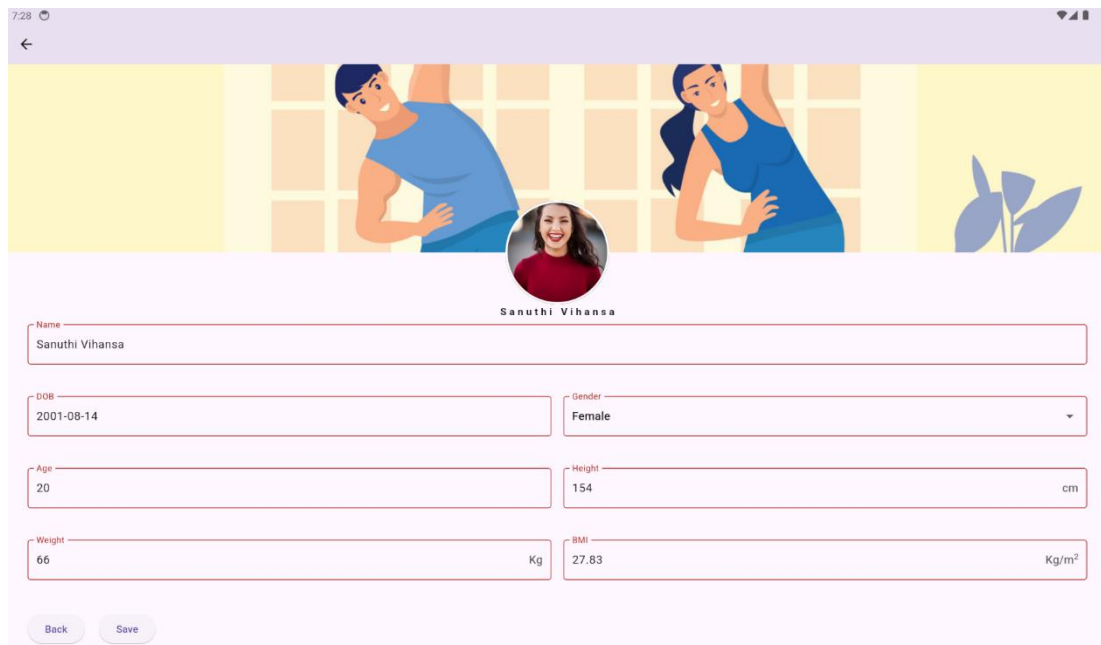


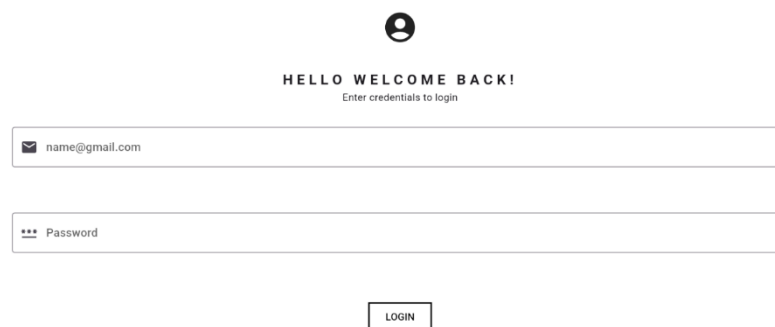
Figure 30: Multiple Report Analysis Screen



The User Profile Screen features a header banner with an illustration of a man and a woman in blue tank tops, a central circular profile picture of a woman, and the name "Sanuthi Vihansa" below it. The main content area contains several form fields for personal information: a full-name field, a date-of-birth field, a gender dropdown menu, an age field, a height field with a unit selector, a weight field with a unit selector, and a BMI field with a unit selector. At the bottom, there are "Back" and "Save" buttons.

Field	Value	Unit
Name	Sanuthi Vihansa	
DOB	2001-08-14	
Gender	Female	
Age	20	
Height	154	cm
Weight	66	Kg
BMI	27.83	Kg/m ²

Figure 31: User Profile Screen



The User Login Screen displays a user icon, a welcome message "HELLO WELCOME BACK!", and a subtext "Enter credentials to login". It includes two input fields: one for an email address (pre-filled with "name@gmail.com") and one for a password (indicated by three dots). A "LOGIN" button is positioned at the bottom.

HELLO WELCOME BACK!
Enter credentials to login

name@gmail.com

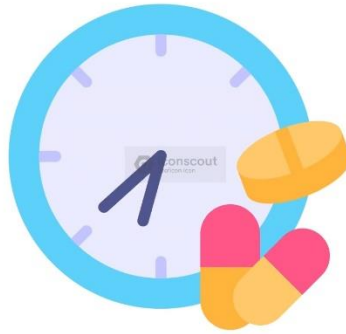
*** Password

LOGIN

Figure 32:User Login Screen



Reminder to take your Medicine !!



Medicine Name : Panadol
Take 2 pill(s) of Panadol. 500 mg.

Snooze

Stop

Figure 33:Medicine Reminder Screen Notification

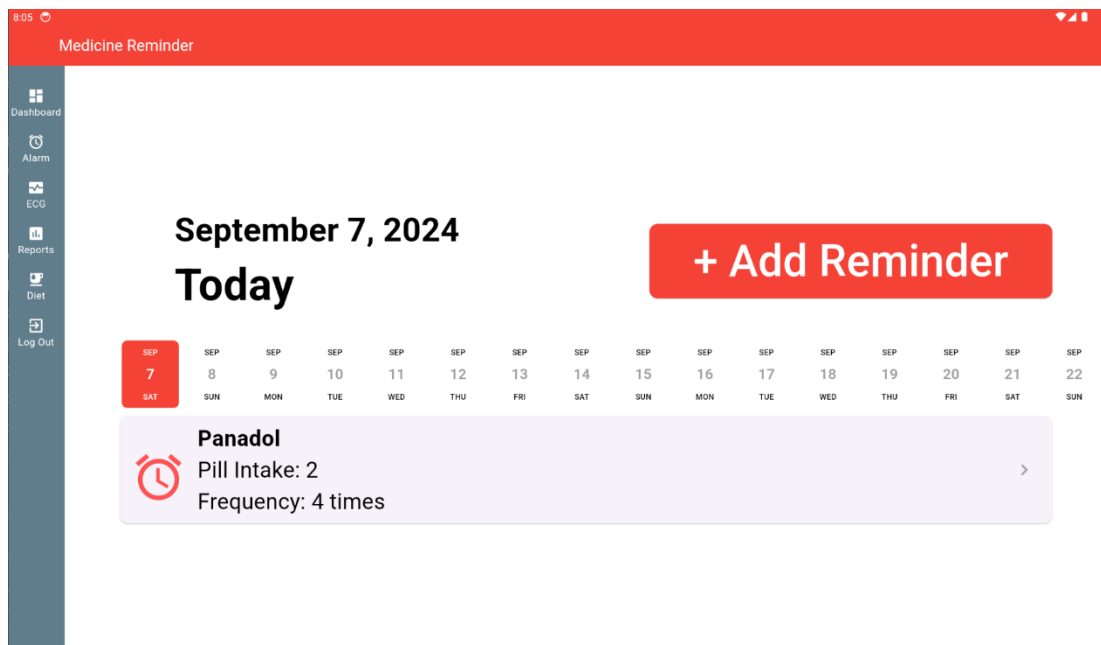


Figure 34: Medicine Alert Screen Home page

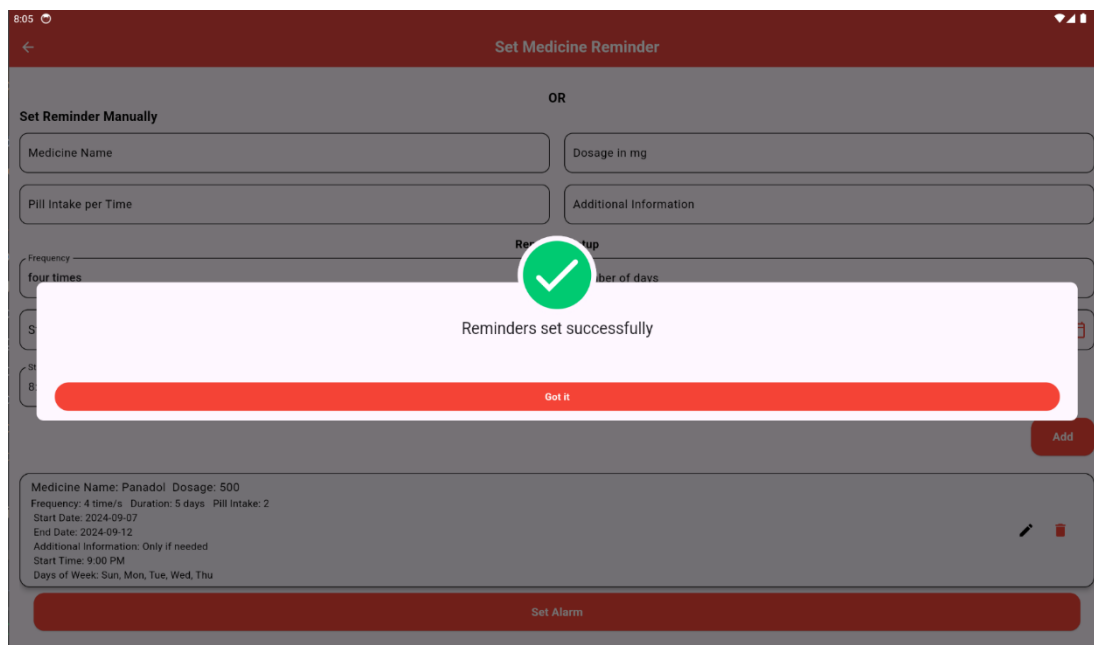


Figure 35:Medicine Alert Screen Success

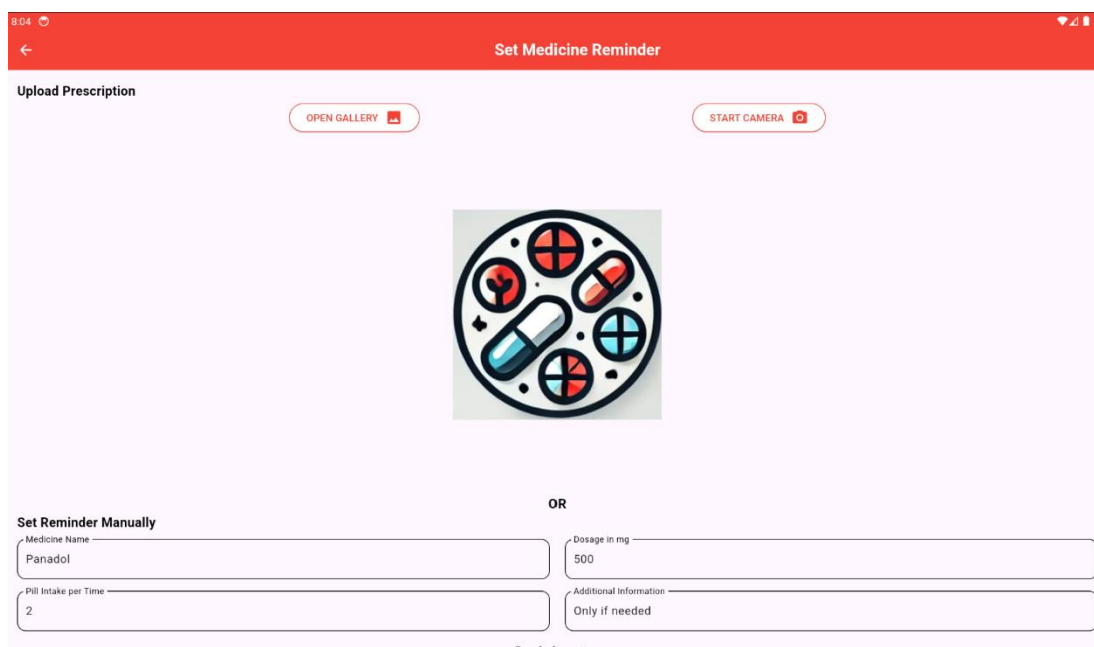


Figure 36:Medicine Alert Screen Upload

10.FLASK SERVER HOSTED QURIES

```
1 # A very simple Flask Hello World app for you to get started with...
2
3 from flask import Flask, request, jsonify
4 import json
5
6
7 app = Flask(__name__)
8
9 def analyze_document_with_custom_adapters_lipid(document_bytes):
10     try:
11         extracted_data = {}
12         current_query = None
13
14         textract = boto3.client('textract', region_name=
15                                     , aws_access_key_id=
16                                     , aws_secret_access_key=
17
18         response = textract.analyze_document(
19             Document={'Bytes': document_bytes},
20             FeatureTypes=['QANES'],
21             QueryConfig={
22                 'Queries': [
23                     {'Text': 'Total Cholesterol', 'Alias': 'B'},
24                     {'Text': 'Total Cholesterol Result', 'Alias': 'a'},
25                     {'Text': 'Triglycerides', 'Alias': 'd'},
26                     {'Text': 'Triglycerides Result', 'Alias': 'c'},
27                     {'Text': 'HDL Cholesterol', 'Alias': 'g'},
28                     {'Text': 'HDL Cholesterol Result', 'Alias': 'f'},
29                     {'Text': 'LDL Cholesterol', 'Alias': 'h'},
30                     {'Text': 'LDL Cholesterol Result', 'Alias': 'n'},
31                     {'Text': 'HDL', 'Alias': 'i'},
32                     {'Text': 'VLDL Result', 'Alias': 'j'},
33                     {'Text': 'CHOLHDL', 'Alias': 'k'},
34                     {'Text': 'CHOLHDL Result', 'Alias': 'l'},
35                     {'Text': 'Non HDL Cholesterol', 'Alias': 'm'},
36                     {'Text': 'Non HDL Cholesterol unit', 'Alias': 'n'}],
37             })
38
39         AdaptersConfig={
40             'Adapters': [
41                 {
42                     'AdapterId': 'S48079fambel',
43                     'Version': '1'
44                 }
45             ]
46         }
47
48         for block in response['Blocks']:
49             if block['BlockType'] == 'QUERY':
50                 current_query = block['Query']['Text']
51                 extracted_data[current_query] = None
52
53             elif block['BlockType'] == 'QUERY_RESULT' and current_query:
54                 result = block['Text']
55                 extracted_data[current_query] = result
56                 current_query = None
57
58         return extracted_data
59
60 except Exception as e:
61     print(f"Error processing document: {str(e)}")
62
63
64
65
66
67
68
69
70
71
72
73
74
75
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77
78
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```

Figure 37: Flask Server Code

11.API TESTED USING POSTMAN

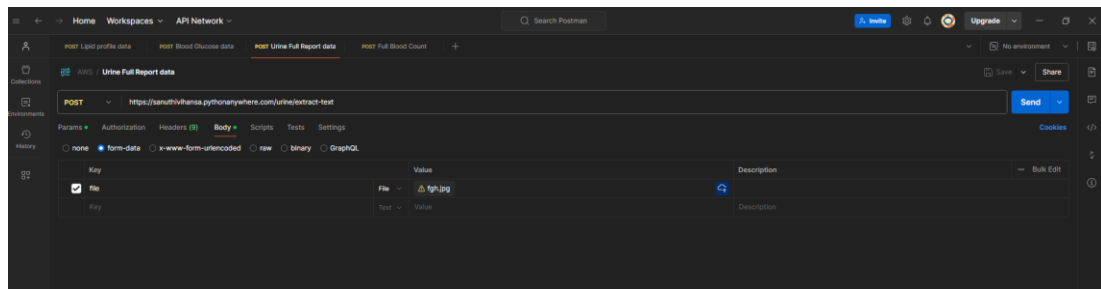


Figure 38:Postman API Testing

12.GIT HUB REPOSITORY SCREENSHOT

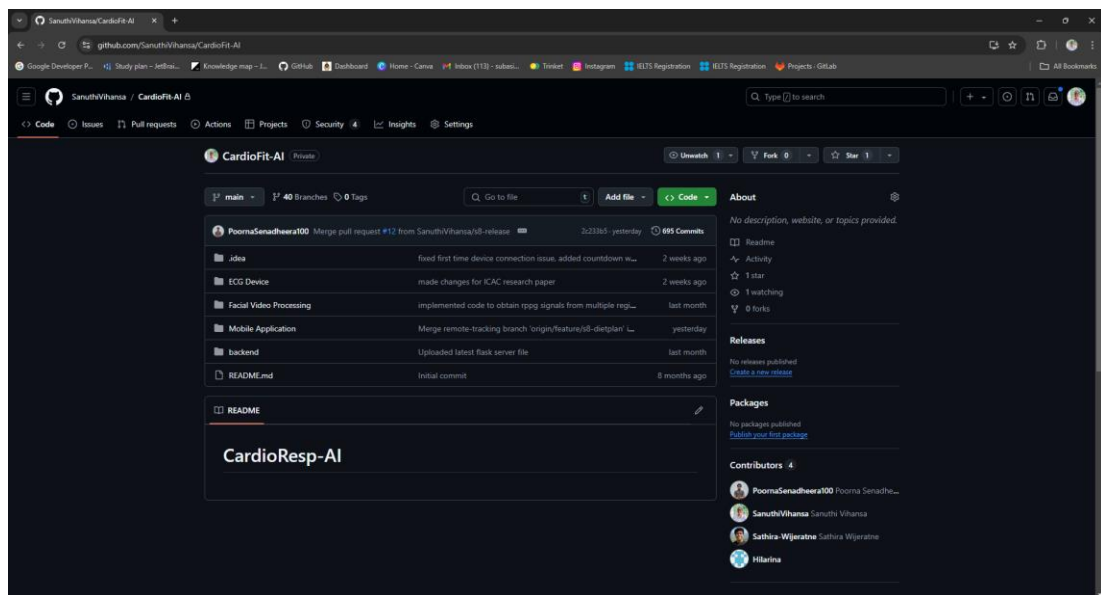


Figure 39:Git Hub Repo Screenshot

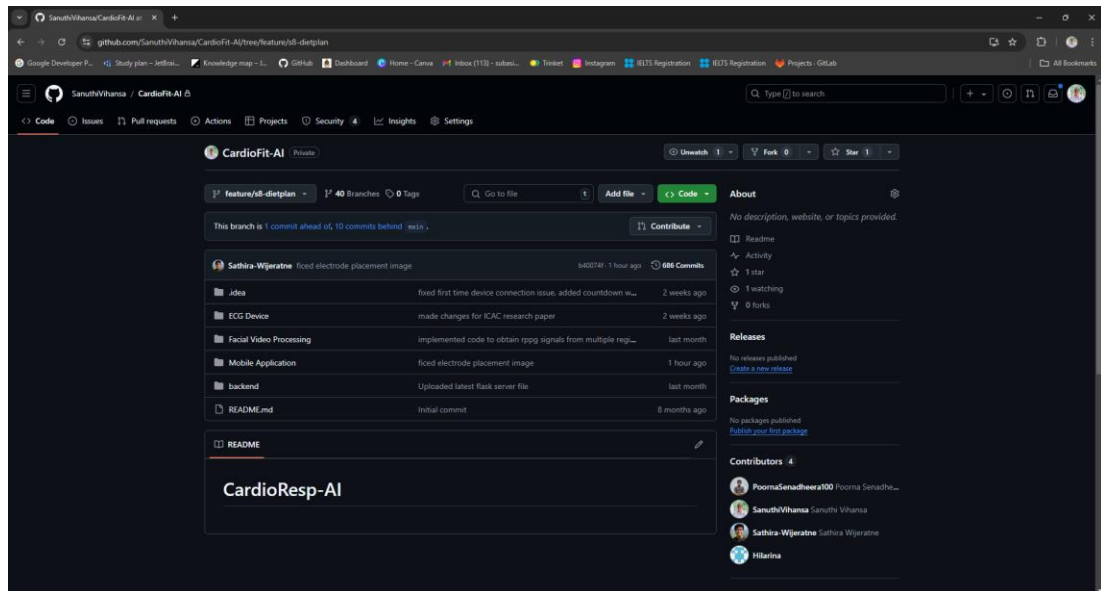
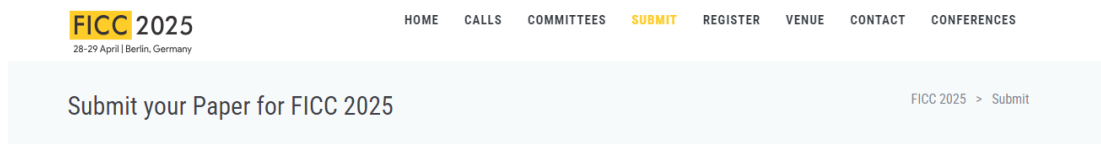
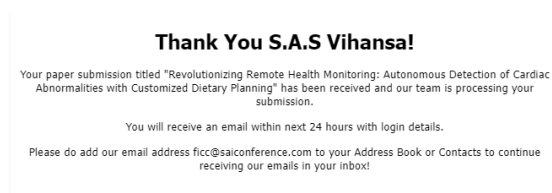


Figure 40:GitHub branch Screenshot

13.RESEARCH PAPER SUBMISSION



Online Submission System



Submission By E-Mail

Submission of Manuscripts can also be done by email to FICC@SAIConference.com

Please Note the following when submitting by Email:

- The Subject Line Should be : FICC 2025 Paper Submission : "Paper Title"
- Cover letter should be included along with submission which should include the domain of research to fasten the review process of the manuscript.
- Manuscript should be sent in .docx or .pdf format.

Figure 41: FICC Conference Research Paper Submission

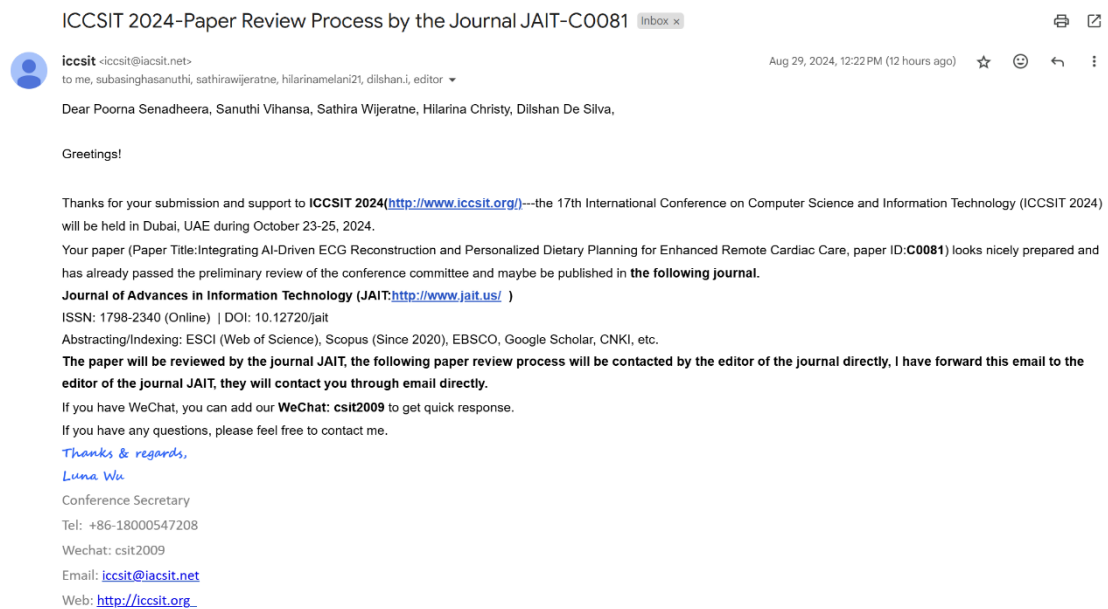


Figure 42:ICCSIT 2024 Confirmation screenshot

14.ETHNOGRAPHY STUDY



Figure 43:Ethnographic Picture