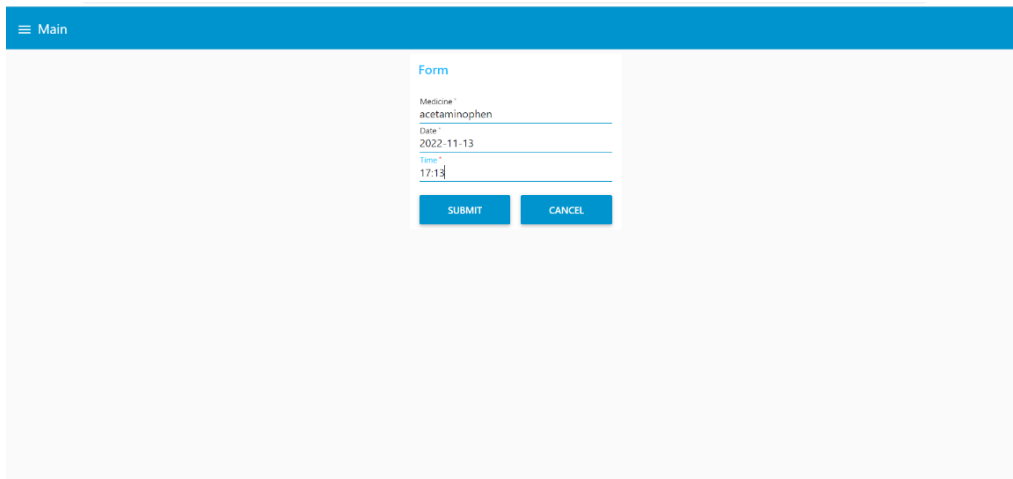


Final Deliverables

Team ID	PNT2022TMID27334
Project Name	Personal Assistance for Seniors Who Are SelfReliant

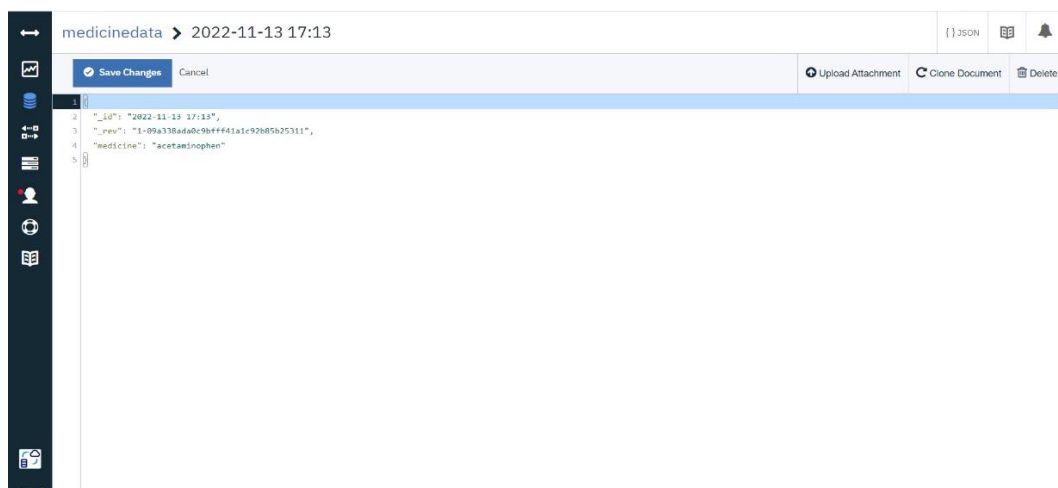
Web Application

1. Get Data From User:

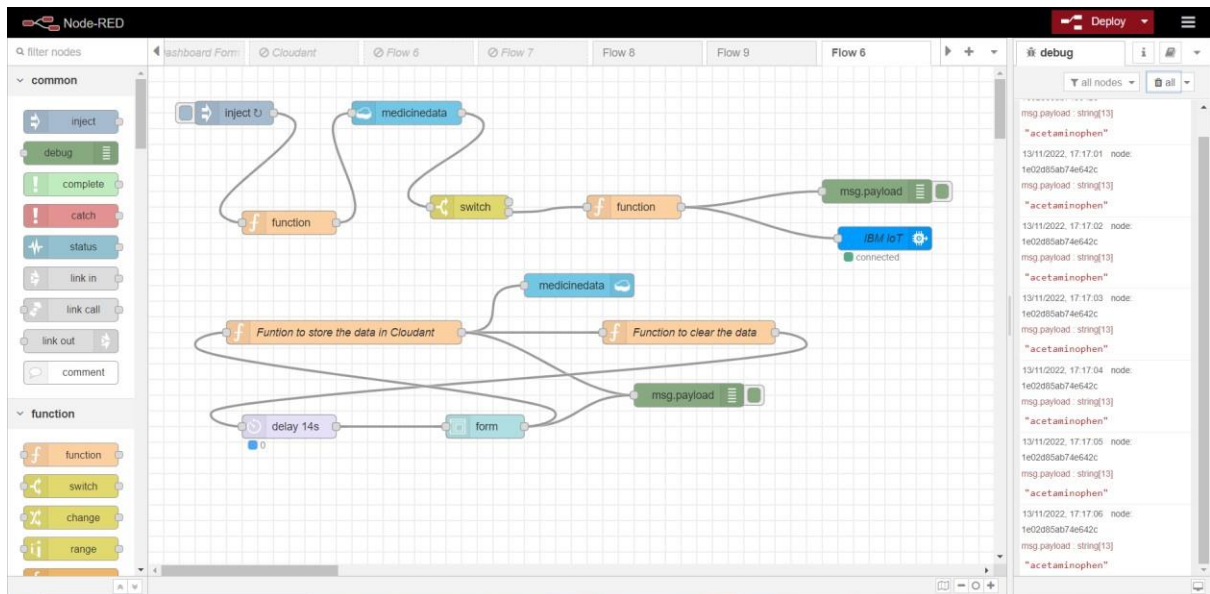


The screenshot shows a web application interface with a blue header bar containing a hamburger menu icon and the text 'Main'. Below the header, there is a light gray background area. In the center, a white form titled 'Form' is displayed. The form contains three input fields: 'Medicine' with the value 'acetaminophen', 'Date' with the value '2022-11-13', and 'Time' with the value '17:13'. Below these fields are two buttons: 'SUBMIT' and 'CANCEL'.

2. Stored in Cloudant



3. Display in Node-red



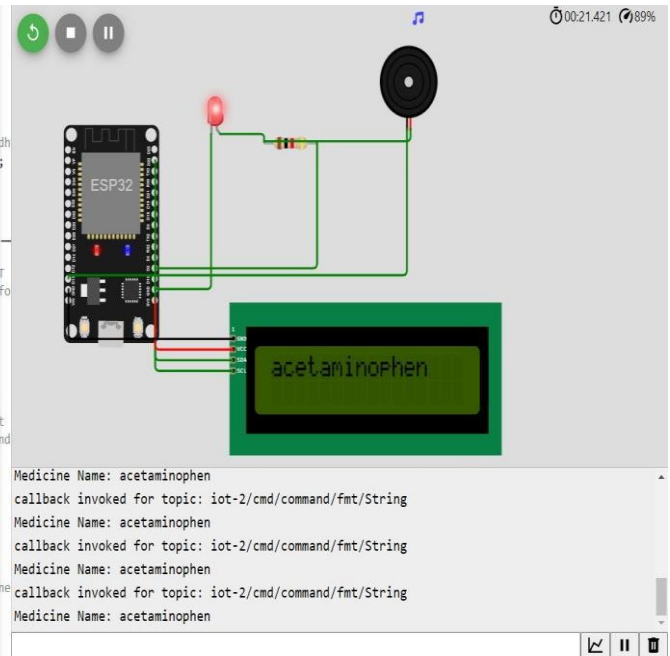
4. Streaming in Watson IoT Platform

The screenshot shows the Watson IoT Platform interface. The top navigation bar includes 'Browse', 'Action', 'Device Types', and 'Interfaces'. The main content area shows a device 'b11m3edeviceld' with status 'Connected'. Below the device information, there is a section for 'Recent Events' which displays a table of events.

Event	Value	Format	Last Received
IoT Device	["medicine";"acetaminophen"]	json	a few seconds ago
IoT Device	["medicine";"acetaminophen"]	json	a few seconds ago
IoT Device	["medicine";"acetaminophen"]	json	a few seconds ago
IoT Device	["medicine";"acetaminophen"]	json	a few seconds ago
IoT Device	["medicine";"acetaminophen"]	json	a few seconds ago

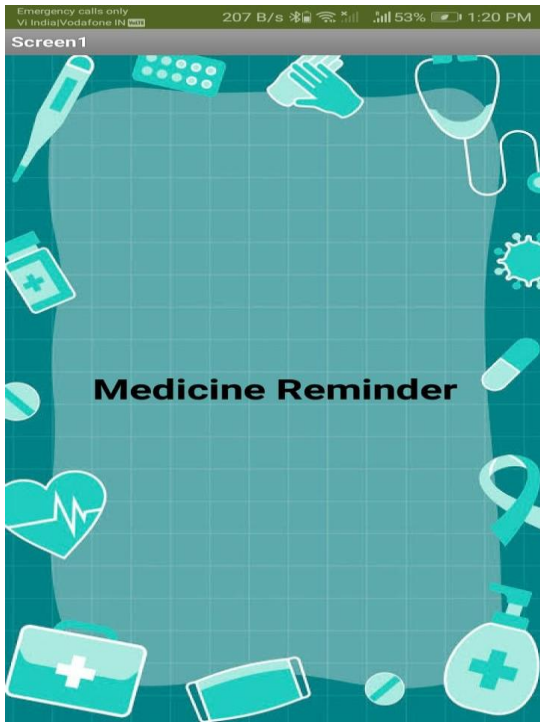
5. Simulation

```
1  #include <WiFi.h> //library for wifi
2  #include <PubSubClient.h> //library for MQTT
3  #include <LiquidCrystal_I2C.h>
4  #include "DHT.h" // Library for dht11
5  #define DHTPIN 15 // what pin we're connected to
6  #define DHTTYPE DHT11 // define type of sensor DHT 11
7  #define LED 2
8  DHT dht (DHTPIN, DHTTYPE); // creating the instance by passing pin and type of dht
9  void callback(char* subscribetopic, byte* payload, unsigned int payloadLength);
10
11
12 //-----Credentials of IBM Accounts-----
13
14 #define ORG "64yf7x" //IBM ORGANIZATION ID
15 #define DEVICE_TYPE "b1m3edevicetype" //Device type mentioned in ibm watson IOT
16 #define DEVICE_ID "b1m3edeviceid" //Device ID mentioned in ibm watson IOT Platform
17 #define TOKEN "-&EMtr7l-v-Gz2G)e" //Token
18 String data3="";
19 int buzz= 13;
20
21 //----- Customise the above values -----
22 char server[] = ORG ".messaging.internetofthings.ibmcloud.com"; // Server Name
23 char publishTopic[] = "iot-2/evt/data/fmt/json"; // topic name and type of event
24 char subscribetopic[] = "iot-2/cmd/command/fmt/String"; // cmd REPRESENT command
25 char authMethod[] = "use-token-auth"; // authentication method
26 char token[] = TOKEN;
27 char clientId[] = "d:" ORG ":" DEVICE_TYPE ":" DEVICE_ID; //client id
28 LiquidCrystal_I2C lcd(0x27,16,2);
29
30 //-----
31 WiFiClient wifiClient; // creating the instance for wifiClient
32 PubSubClient client(server, 1883, callback, wifiClient); //calling the predefined
33
34 void setup() // configuring the ESP32
35 {
```



Mobile Application

1. Splash Screen



2. Get Data From User

Screen1

Enter the medicine name

acetomenophin

Enter the time

10.3

SUBMIT

10th. 10. 19e...@kcg...com

1 2 3 4 5 6 7 8 9 0

% ^ ~ | [] < > { }

q w e r t y u i o p

@ # & * - + = ()

a s d f g h j k l

↑ _ z x c v b n m ↵

123 ☺ 🗣 < en/ta/tam ↵

3. Store in Cloudant DB

medicinedata > 2022-11-13 17:13

Save Changes Cancel

Upload Attachment Clone Document Delete

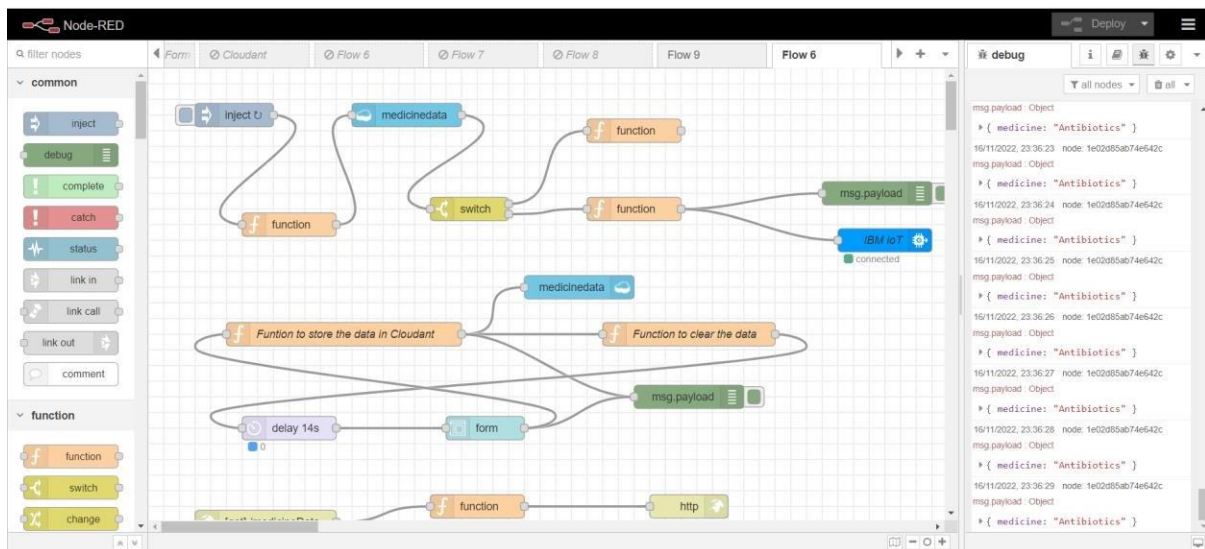
```
{
  "_id": "2022-11-13 17:13",
  "_rev": "1-00a338ada0c9b4ff61x1c92b85a25311",
  "medicine": "acetaminophen"
}
```

4. Display Reminder with audio



TIME TO TAKE ACETOMENOPHIN

5. Display in node-red



6. Remainder in Simulation

```
1  #include <WiFi.h> //library for wifi
2  #include <PubSubClient.h> //library for MQTT
3  #include <LiquidCrystal_I2C.h>
4  #include "DHT.h" // Library for dht11
5  #define DHTPIN 15 // what pin we're connected to
6  #define DHTTYPE DHT11 // define type of sensor DHT 11
7  #define LED 2
8  DHT dht (DHTPIN, DHTTYPE); // creating the instance by passing pin and type of dht
9  void callback(char* subscribetopic, byte* payload, unsigned int payloadLength);
10
11
12 //-----credentials of IBM Accounts-----
13
14 #define ORG "64yf7x" //IBM ORGANIZATION ID
15 #define DEVICE_TYPE "b1m3edevicetype" //Device type mentioned in ibm watson IOT
16 #define DEVICE_ID "b1m3edeviceid" //Device ID mentioned in ibm watson IOT Platform
17 #define TOKEN "-&Etr7L-v-Gz2G))e" //Token
18 String data3="";
19 int buzz= 13;
20
21 //----- Customise the above values -----
22 char server[] = ORG ".messaging.internetofthings.ibmcloud.com"; // Server Name
23 char publishTopic[] = "iot-2/evt/Data/fmt/json"; // topic name and type of event
24 char subscribetopic[] = "iot-2/cmd/command/fmt/String"; // cmd REPRESENT command
25 char authMethod[] = "use-token-auth"; // authentication method
26 char token[] = TOKEN;
27 char clientId[] = "d:" ORG ":" DEVICE_TYPE ":" DEVICE_ID; //client id
28 LiquidCrystal_I2C lcd(0x27,16,2);
29
30 //-----
31 WiFiClient wificlient; // creating the instance for wificlient
32 PubSubClient client(server, 1883, callback, wificlient); //calling the predefined
33
34 void setup() // configuring the ESP32
35 {
```

