# Description:

Miss call to get temperature as SMS response from owner mobile number only.

# Source Code:

#include <LiquidCrystal.h> // include the library code:

#include <SimpleDHT.h>

int pinDHT11 = 6; //DTH11 connected on Pin 12 i.e. B4 in IomaTic

SimpleDHT11 dht11;

LiquidCrystal lcd(11, 12, 14, 15, 16, 17); // initialize the library with the numbers of the interface pins

char PhoneNo[]="+91xxxxxxxxxx";

int sendStatus=0;

char Caller\_name[13] = "";

int current\_status;

int DTMF\_Code;

char c;

void setup()

{

pinMode(13,OUTPUT); //SIM808 wakeup connected on pin 13 in IomaTic board

digitalWrite(13, HIGH); //Initialize the SIM808 Module

delay(1000);

digitalWrite(13, LOW); //Sending wake up signal to SIM808 Module

delay(1000);

digitalWrite(13, HIGH); //Keeping SIM808 in active/wakeup state

delay(1000);

lcd.begin(16, 2); //Initialize the LCD in 16x2 mode

delay(1000);

lcd.setCursor(0,0); //Set cursor at first character/coloumn of first line/row

lcd.print(" IomaTic "); //Print the message as metioned cursor location

lcd.setCursor(0,1); //Set cursor at first character/coloumn of first line/row

lcd.print("Dial to Monitor........"); //Print the message as metioned cursor location

Serial.begin(9600); //Initialize a serial communication with baud rate 9600

delay(1000);

}

void loop()

{

byte temperature = 0;

byte humidity = 0;

int err = SimpleDHTErrSuccess;

if ((err = dht11.read(pinDHT11, &temperature, &humidity, NULL)) != SimpleDHTErrSuccess)

{

Serial.print("Read DHT11 failed, err="); Serial.println(err);delay(1000);

return;

}

lcd.setCursor(0,1); //Set cursor at first character/coloumn of first line/row

lcd.print("Val:"); //Print the message as metioned cursor location

lcd.print((int)temperature);

lcd.print(" \*C, "); //Print the message as metioned cursor location

lcd.print((int)humidity);

lcd.print(" H");

Serial.println("AT+CPAS"); //Phone activity status: 0= ready, 2= unknown, 3= ringing, 4= in call

delay(100);

if (Serial.find("+CPAS: ")) //Decode reply

{

char c = Serial.read(); // gives ascii code for status number

current\_status = c - 48; // return integer value of ascii code

if (current\_status == 3)

{

lcd.setCursor(0,1); //Set cursor at first character/coloumn of first line/row

lcd.print("Ringing............"); //Print the message as metioned cursor location

delay(4000);

Serial.println("ATH"); //Automatically answer call after 1 ring

delay(300);

lcd.setCursor(0,1); //Set cursor at first character/coloumn of first line/row

lcd.print("Triggering SMS...."); //Print the message as metioned cursor location

Serial.begin(9600); //Initialize a serial communication with baud rate 9600

delay(1000);

Serial.println("AT+CMGF=1"); //Initialize the GSM modem

delay(2000);

Serial.print("AT+CMGS=\""); //Send dial a phone AT command

Serial.print(PhoneNo); //Send SMS receiver's phone number

Serial.write(0x22); //Hex code equivalent to "

Serial.write(0x0D); //Hex code equivalent to carraige return i.e. \r

Serial.write(0x0A); //Hex code equivalent to new line char i.e. \n

delay(2000);

Serial.print("Current Temperature and Humidity is: "); //Test SMS Message Body to Send

Serial.print((int)temperature);

Serial.print(" \*C ");

Serial.print((int)humidity);

Serial.print(" H");

delay(500);

Serial.println(char(26));

}

}

delay(500);

}

# Libraries:

No additional libraries required.

# Functions:

*AT Commands:*

AT Commands are commands which are used to control the modems where AT stands for Attention.