SMART LOCKER

CODE:

```
#include <Wire.h>

#include <LiquidCrystal_I2C.h>

#include <SoftwareSerial.h>

#include<Servo.h>

LiquidCrystal_I2C lcd(0x27, 16, 2);

SoftwareSerial mySerial(9, 10);

int pB[4]={2,3,4,5};

int pass[4];

int q[4]={0,0,0,0};

int outPin[4]={11,8,7,6};

char gsmPass[4];

int epass[4];

const int buzzer = 13;

int servoPin=12;

Servo servo1;

int t;

float d;

int a,ch;

int co=0;

char c;

int a2=7;

int a3=6;

int ma;
```

```
int lo=0;
float aw=256;
//LiquidCrystal lcd(12,13,11,10,9,8);
void setup()
{
 int i=0;
 lcd.begin();
 lcd.backlight();
 lcd.clear();
 lcd.print("to open press ");
 lcd.setCursor(0,1);
 lcd.print(4);
 for (i=0;i<4;i++)
 {
  pinMode(pB[i],INPUT);
  pinMode(outPin[i],OUTPUT);
 }
 pinMode(buzzer,OUTPUT);
 servo1.attach(servoPin);
 //pinMode(led, OUTPUT);
 mySerial.begin(9600);
 Serial.begin(9600);

}
```

```
void loop()
{
  int i=0;
  a=0;
  while(lo==0)
  {
    while(q[i]<4)
    {
      q[i]++;
      if (q[i]==4)
        q[i]=0;
      i++;
      if (i==4)
      i=0;
      if(digitalRead(pB[3]))
      {
        a++;
        Serial.println("...");
         break;
      }
      delay(50);
      Serial.print(i);
      Serial.println(q[i]);
    }
    if(a)
```

```
  {
    lo++;
    break;
  }
}
Serial.print("pass is : ");
for(t=0;t<4;t++)
{
  pass[t]=q[t];
  if (q[t]==0)
  {
    pass[t]=4;
  }
  gsmPass[t]=pass[t]+'0';
  Serial.print(pass[t]);
}
Serial.println(gsmPass);
mySerial.println("AT+CMGF=1");    //Sets the GSM Module in Text Mode
delay(1000);  // Delay of 1 second
 mySerial.println("AT+CMGS=\"+917659898992\"\r"); // Replace x with mobile number
   delay(1000);
   mySerial.println(gsmPass);// The SMS text you want to send
   delay(100);
   mySerial.println((char)26);// ASCII code of CTRL+Z for saying the end of sms to  the module
    delay(1000);
```

```
mySerial.println(gsmPass);// The SMS text you want to send
mySerial.println("is your passcode");
delay(100);
mySerial.println((char)26);// ASCII code of CTRL+Z for saying the end of sms to  the module
delay(1000);
Serial.println(".");
int j=0;
ma=0;
a=0;
t=check();
delay(1000);
lcd.setCursor(0,0);
lcd.print("enter passcode");
while (co==0)
{
 for (i=0;i<4;i++)
 {
   t=check();
   epass[i]=t;
   Serial.print(epass[i]);
   Serial.print("==");
   Serial.println(pass[i]);
   delay(450);
   c=t;
```

```
  lcd.setCursor(i,1);
  lcd.print(t);
  delay(200);
  lcd.setCursor(i,1);
  lcd.print("*");

}
for (i=0;i<4;i++)
{
  if (epass[i]==pass[i])
  {
    j++;
    Serial.println(j);
  }
 }
 if (j==4)
     {
       Serial.println("correct password");
       lcd.clear();
       lcd.setCursor(0,0);
      lcd.print("Correct Password");
     co=co+1;
     digitalWrite(outPin[0],HIGH);
     digitalWrite(outPin[1],LOW);
     digitalWrite(outPin[2],LOW);
```

```
    digitalWrite(outPin[3],LOW);
    servo1.write(90);
    break;

 }
else
{
 Serial.println("incorrect password");
 lcd.clear();
 lcd.setCursor(0,0);
 lcd.print("incorrect Password");
 ma++;
 if (ma<3)
 {
  lcd.setCursor(0,1);
  lcd.print(3-ma);
  lcd.print(" attempts remaining");
  delay(1000);
  lcd.clear();
  lcd.setCursor(0,0);
  lcd.print("enter password:");
 }
 else if (ma==3)
 {
  lcd.setCursor(0,1);
```

```
  lcd.print("max limit exceeded");
  tone(buzzer,1000);
  delay(1000);
  noTone(buzzer);
  co=2;
}
/*if (ma==1)
{
  digitalWrite(a3,LOW);
}
else if (ma==2)
{
  digitalWrite(a2,LOW);
  digitalWrite(a3,HIGH);
}
else if (ma==3)
{
  digitalWrite(a2,HIGH);
  digitalWrite(a3,LOW);
  break;
}*/
for(i=1;i<=ma;i++)
{
  digitalWrite(outPin[i],HIGH);
  delay(50);
```

```
    }
    j=0;
   }
  }
}

int check()
{
  int o=0;
  int i,j;
  while (o==0)
  {
    for (i=0;i<4;i++)
    {
      j=digitalRead(pB[i]);
      if (j==HIGH)
      {
        o=i+1;
        return o;
        break;
      }
    }
  }
}
```

Screenshots: