## BUILD A SMART HOME WITH USING AT LEAST 2 SENSORS, LED AND BUZZER IN A CIRCUIT WITH SINGLE CODE

## **SIMULATION**

```
#include <Servo.h>
Servo myservo;
int Value;
int ledPin = 13; // LED
int pirPin = 2; // PIR Out pin
int pirStat = 0;
                     // PIR status
int pos = 0;
void setup() {
 pinMode(6, OUTPUT);
 pinMode(A0, INPUT_PULLUP);
pinMode(ledPin, OUTPUT);
pinMode(pirPin, INPUT);
myservo.attach(9); // attaches the servo on pin 9 to the servo object
Serial.begin(9600);
}
void loop(){
pirStat = digitalRead(pirPin);
if (pirStat == HIGH) {  // if motion detected
 digitalWrite(ledPin, HIGH); // turn LED ON
 Serial.println("Hey I got you!!!");
```

```
for (pos = 0; pos <= 180; pos += 1) \{ // \text{ goes from 0 degrees to 180 degrees} \}
  // in steps of 1 degree
  myservo.write(pos);
  delay(15);
 }
}
else {
  digitalWrite(ledPin, LOW); // turn LED OFF if we have no motion
}
  Value = analogRead(A0);
Serial.println(Value);
delay(1000);
 if(Value > 300)
 {
   analogWrite(6,500);
         delay(1000);
  }
 else
 {
  analogWrite(6,0);
 }
}
```

## **CIRCUIT DIAGRAM**

