

## **Code for LED**

```
void setup() {//Setting up the Arduino
Serial.begin(9600);
{
  pinMode(2,OUTPUT);//Setting up LED as an output pin
  pinMode(12,OUTPUT);//Setting up LED as an output pin
  pinMode(13,OUTPUT);//Setting up LED as an output pin
}}
void loop() //Code written between “{}” repeats itself for ever
{{
digitalWrite(2,LOW); //This statement sets the LED Low
Serial.println("Led off"); //This statement prints values stored in input val on the serial monitor
delay(1000);//This statement makes the Arduino sleep for 1000ms
digitalWrite(12,LOW);
Serial.println("Led off");//This statement prints values stored in input_val on the serial monitor
delay(1000);
digitalWrite(13,LOW);
Serial.println("Led off");
delay(1000);
}}
```

## **Code for piezo buzzer**

```
Constint buzzer=2;//This statement gives name buzzer to pin3
void setup(){
Serial.begin(9600);
{
pinMode(buzzer,OUTPUT); //This statement sets buzzer pin as an output pin
}}
void loop() {
digitalWrite(buzzer,LOW);// This statement makes buzzer on.
delay(200);  } //some delay
```

## **Define the variables**

```
int sensorPin=A1;
int greenpin=8;
int yellowpin=7;
int redpin=6;
int sensorValue=0; //to store the value coming from the sensor
int buzzpin=A0; //for buzzer
```

## Defining the pin number to specific variable

```
void setup() {  
  Serial.begin(9600);  
  pinMode(greenpin,OUTPUT);  
  pinMode(yellowpin,OUTPUT);  
  pinMode(redpin,OUTPUT);  
  pinMode(buzzpin,OUTPUT);  
}
```

## Actual running code using loops

```
void loop() {  
  sensorValue = analogRead(sensorPin);      // read the value from the sensor  
  // send the message about water level to serial monitor  
  
  if (sensorValue <= 0) {  
    Serial.println("Water level: 0mm - Empty!");  
  }  
  else if (sensorValue > 1 && sensorValue <= 330) {  
    Serial.println("Water lvl: 20mm");  
    digitalWrite(greenpin, HIGH);           // turn the green LED on  
  }  
  else if (sensorValue > 331 && sensorValue <= 360) {  
    Serial.println("Water lvl: 50mm");  
  }  
  else if (sensorValue > 361 && sensorValue <= 385 ) {  
    Serial.println("Water lvl: 65mm");  
    digitalWrite(yellowpin, HIGH);          // turn the yellow LED on  
  }  
  else if (sensorValue > 386 && sensorValue <= 399 ) {  
    Serial.println("Water lvl: 80mm ");  
  }  
  
  else if (sensorValue > 400 && sensorValue <= 449 ) {  
    Serial.println("Water lvl: 91-129mm tank is going to full..");  
  }  
  else if (sensorValue > 450) {  
    digitalWrite(buzzpin, HIGH);             // turn the piezo buzzer on  
    digitalWrite(redpin, HIGH);              // turn the red LED on  
    Serial.println("Water lvl: 100mm Alarm! Alarm!turn off....");  
  }  
}
```

```
}  
delay(1000);           // delay 1 second  
digitalWrite(greenpin, LOW); // turn the green LED off  
digitalWrite(yellowpin, LOW); // turn the blue LED off  
digitalWrite(redpin, LOW); // turn the red LED off  
digitalWrite(buzzpin, LOW); // turn the speakerPin off - reset  
  
}
```