



<https://www.tinkercad.com/things/bkdHNBgl8ls-frantic-uusam-wolt/editel>

```
// C++ code

//

#include <Servo.h>

int set = 0;

int set_to = 0;

int dist = 0;

int read_digital = 0;

int read_digital_pin2 = 0;

long readUltrasonicDistance(int triggerPin, int echoPin)
{
    pinMode(triggerPin, OUTPUT); // Clear the trigger
    digitalWrite(triggerPin, LOW);
    delayMicroseconds(2);
    // Sets the trigger pin to HIGH state for 10 microseconds
    digitalWrite(triggerPin, HIGH);
    delayMicroseconds(10);
    digitalWrite(triggerPin, LOW);
    pinMode(echoPin, INPUT);

    // Reads the echo pin, and returns the sound wave travel time in microseconds
```

```
    return pulseIn(echoPin, HIGH);  
}
```

```
Servo servo_8;
```

```
void setup()
```

```
{  
    servo_8.attach(8, 500, 2500);  
    pinMode(2, INPUT);  
    pinMode(12, OUTPUT);  
    pinMode(A0, INPUT);  
    pinMode(9, OUTPUT);  
}
```

```
void loop()
```

```
{  
    dist = 0.01723 * readUltrasonicDistance(7, 7);  
    if (dist <= 100) {  
        servo_8.write(90);  
        delay(1000); // Wait for 1000 millisecond(s)  
    } else {  
        servo_8.write(0);  
        delay(1000); // Wait for 1000 millisecond(s)  
    }  
    if (digitalRead(2) < 1) {
```

```
digitalWrite(12, HIGH);  
delay(1000); // Wait for 1000 millisecond(s)  
} else {  
    digitalWrite(12, LOW);  
    delay(1000); // Wait for 1000 millisecond(s)  
}  
if (analogRead(A0) > 200) {  
    digitalWrite(9, HIGH);  
    delay(1000); // Wait for 1000 millisecond(s)  
} else {  
    digitalWrite(9, LOW);  
    delay(1000); // Wait for 1000 millisecond(s)  
}  
}
```