```
#include <Arduino.h>
#include <Wire.h>
#include <Adafruit_SSD1306.h>

#define LED_PIN 18
#define LED_BTN_PIN 25
#define BUZZER_PIN 14

#define SCREEN_WIDTH 128
#define SCREEN_HEIGHT 64
Adafruits_SSD1306
display (SCREEN_WIDTH,
SCREEN_HIEGHT, &Wrire);

unsigned long buttonPressTime = 0;
bool buttonPress = false;
bool ledState = LOW;
Const unsigned long long PressTime
= 1500; // 1.5 Seconds

void Setup() {
```

```
Pin Mode (LED_PIN, OUTPUT);
Pin Mode (LED_PIN - BUZZER,
    OUTPUT);
Pin Mode (BTN_PIN),
INPUT_PULLUP);

digital Write (LED_PIN, led State);
digital Write (BUZZER_PIN, LOW);

display. begin (SSD1306_SWITCHCA
PVCC, 0x3C);
display. Clear Display ();
display. set Text Size (1)
display. set Text Color (SSD1306_WHITE);

display. set Cursor (0,0);
display. Print In ("Ready ....");
display. display ();
}
    void loop () }
    bool btn State =
    digital Read (BTN_PIN) = = LOW//

if (btn state && button Pressed ) {
// Button just Pressed
```

```
    buttonPressed = true;
    buttonPressedTime = millis()
  }
  if (!btnState && buttonPressed) {
  // Button just released
    Unsigned long PressDuration =
    millis() - buttonPressTime;

  . if (PressDuration >=
    LongPressTime) {
    // Long Press action
digitalWrite (LED_PIN, LOW);

  tone (BUZZER_PIN, LOW);
      PIN, 1000, 200); //
Play 1kHz tone for 200 ms
  display.clearDisplay();
  display.setCursor(0,0);
  display.println("Long Press detected!");
    display.display();
  } else {
  // Short Press action
  ledState = ledState;
  digitalWrite(LED_PIN, ledState);
```

```
digitalWrite(LED_PIN, ledState);

display.clearDisplay();
display.setCursor(0,0);
display.println("Short Press
    detected!");
display.display();
}
    buttonPressed = false; //
  reset for next Press
}
  }
```