Sakshi Srivastava

1BM18CS090

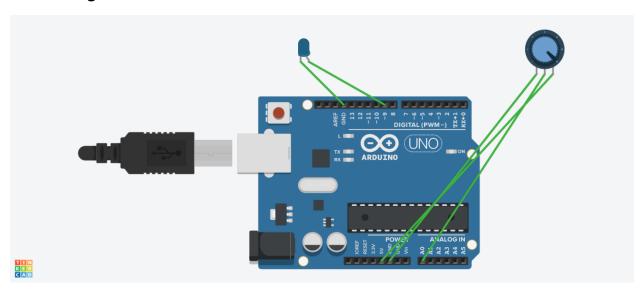
PROGRAM TITLE: LED FADING (USING POTENTIOMETER)

Aim: DEMONSTRATE LED FADING USING POTENTIOMETER

Hardware Required:

- Arduino Board
- LED
- Potentiometer

Circuit Diagram:



Write-Up:

PROGRAM TETLE: LED FADING (USING Potentionates)		ME: Sakshi Srivastava USN: 18 ME CS090 Date 23/9/2
Amin: To demonstrate LED fading using potentioneter Hardware Required: Arduino Board. LED. Potentiometer. CODE: wit LED-PIN = 9: Void setup() Serial begin (9600): paintode (LED-PIN, OUTPUT): void to:p() int brightness: map (analog Read (AO): unit brightness: map (analog Value, 0, 1023, 0, 255): analog write (LED-PIN, brightness: "). Serial punit ("Analog almi): Serial punit ("Brightness: ").	EX	pt. No5Page No7
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CODE:

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int
LED_PIN=9;

    void setup()
    {
        Serial.begin(9600);
        pinMode(LED_PIN,OUTPUT);
    }

    void loop()
    {
        int analogValue = analogRead(A0);
        int brightness = map(analogValue, 0, 1023, 0, 255);
        analogWrite(LED_PIN, brightness);
        Serial.print("Analog: ");
        Serial.print(analogValue);
        Serial.print(", Brightness: ");
        Serial.println(brightness);
        delay(100);
    }
}
```

OUTPUT/OBSERVATION:

LED is fading.