IOT Lab - 5th Sem

Name : Rajath MK , USN : 1BM18CS079

Program No : 12 , Week : 6

Program Title : IR based SERVO motor controller

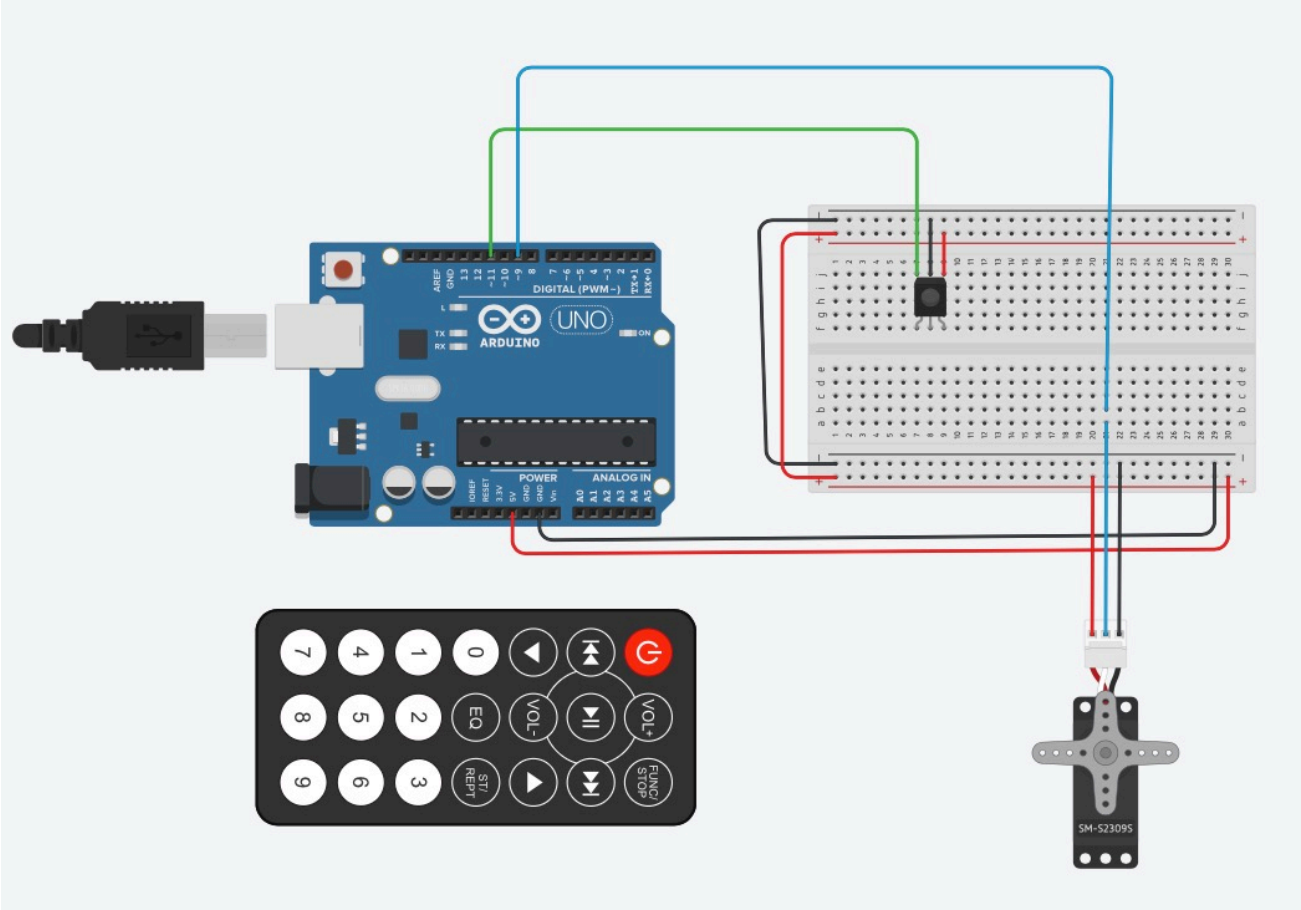
Aim :

Design IR based SERVO Motor controller. (Clockwise and CounterClockwise rotation of shaft).

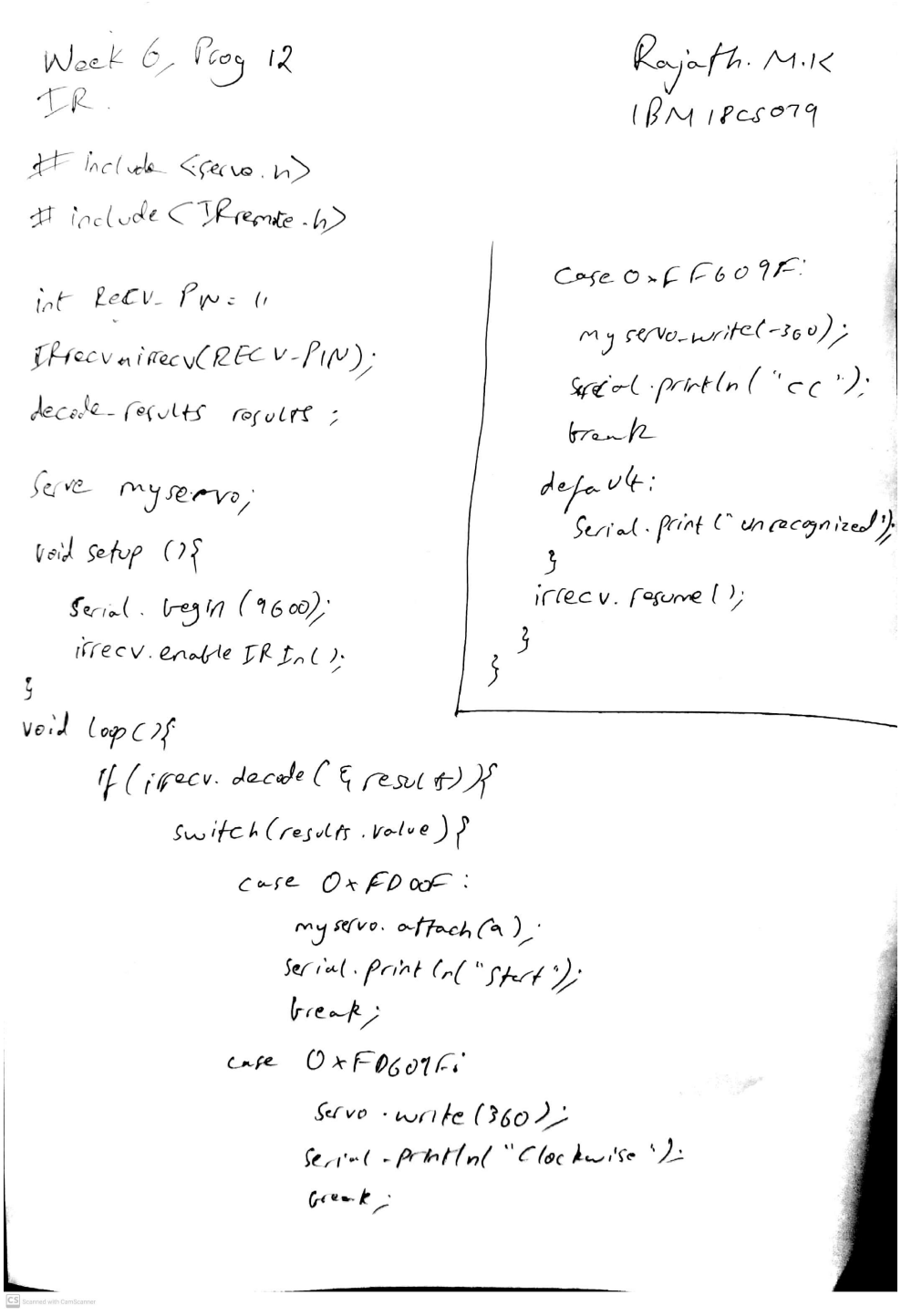
Hardware Required :

- Arduino Uno Board
- Breadboard
- IR Remote
- IR Sensor
- Micro Servo
- Jump wires

Circuit Diagram :



Written Code :



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Week 6, Prog 12                                  Rajath. M.K
IR.                                              1BM18CS079

#include <servo.h>
#include <IRremote.h>

int RECV_PIN = 11;
IRrecv irrecv(RECV_PIN);
decode_results results;

Servo myservo;

void setup (){
   Serial.begin(9600);
   irrecv.enableIRIn();
}
void loop(){
    if(irrecv.decode(&results)){
        switch(results.value){
            case 0xFD00FF:
                myservo.attach(9);
                Serial.println("start");
                break;
            case 0xFD609F:
                servo.write(360);
                Serial.println("Clockwise");
                break;
            case 0xFF609F:
                myservo.write(-360);
                Serial.println("cc");
                break
            default:
                Serial.println("unrecognized");
            }
            irrecv.resume();
        }
    }
```

Observation / Output :

The Servo motor rotated Clockwise/Counter upon detection of IR signal by the sensor provided by the remote.