int load = 8;

// CE pin 15

int clockEnablePin = 9;

// Q7 pin 7

int dataIn = 11;

// CP pin 2

int clockIn = 12;

const int latchPin=6;

const int dataPin=5;

const int clockPin= 7;

void setup()

{

// Setup Serial Monitor

Serial.begin(9600);

// Setup 74HC165 connections

pinMode(load, OUTPUT);

pinMode(clockEnablePin, OUTPUT);

pinMode(clockIn, OUTPUT);

pinMode(dataIn, INPUT);

pinMode(latchPin, OUTPUT);

pinMode(clockPin, OUTPUT);

pinMode(dataPin, OUTPUT);

}

void loop()

{

// Write pulse to load pin

digitalWrite(load, LOW);

delayMicroseconds(5);

digitalWrite(load, HIGH);

delayMicroseconds(5);

// Get data from 74HC165

digitalWrite(clockIn, HIGH);

digitalWrite(clockEnablePin, LOW);

byte incoming = shiftIn(dataIn, clockIn, LSBFIRST);

digitalWrite(clockEnablePin, HIGH);

// Print to serial monitor

Serial.print("Pin States:\r\n");

Serial.println(incoming, DEC);

digitalWrite(latchPin, LOW);

shiftOut(dataPin, clockPin, LSBFIRST, incoming);

digitalWrite(latchPin, HIGH);

delay(200);

}