Project：433MHz RF Remote Control

Remote control motor on/off and LED on/off with a pair of 433MHz Tx/Rx modules

433MHz Transmitter side:
- BM53A367A BMduino UNO
- BMC21M041 433MHz OOK Tx
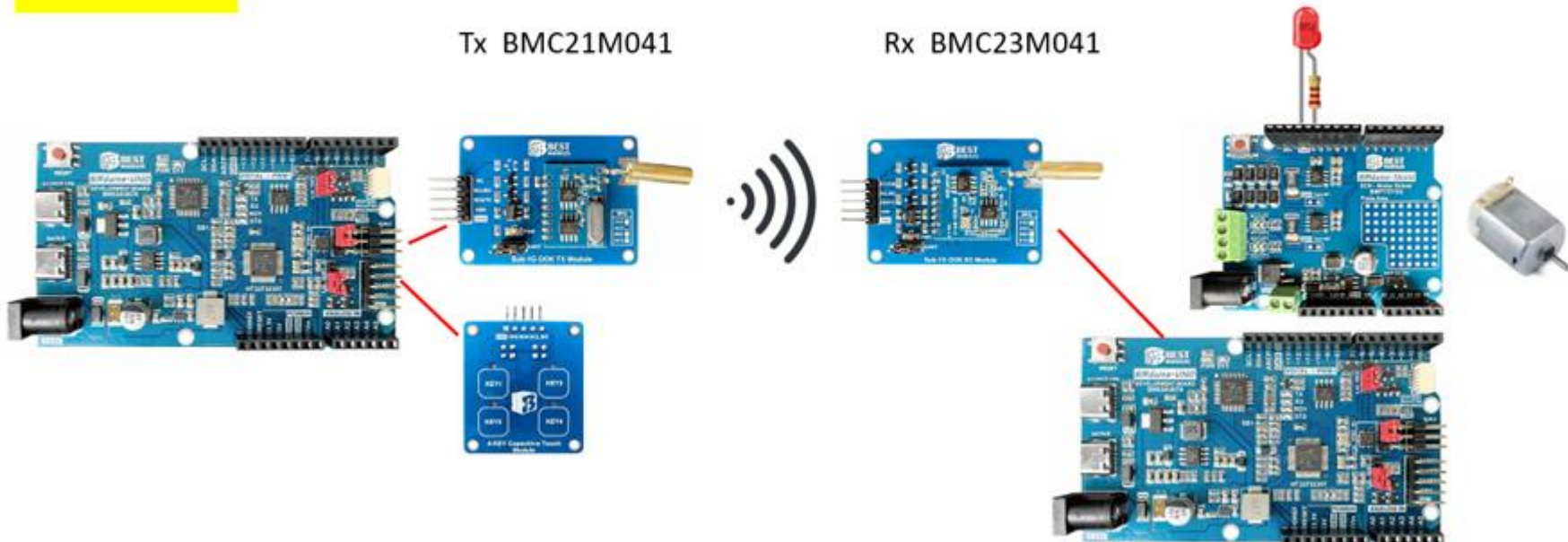- BMK52M134 4-key capacitive touch module

433MHz Receiver side:
- BM53A367A BMduino UNO
- BMC23M041 433MHz OOK Rx
- BMP73T102 motor driver shield
- DC motor
- LED

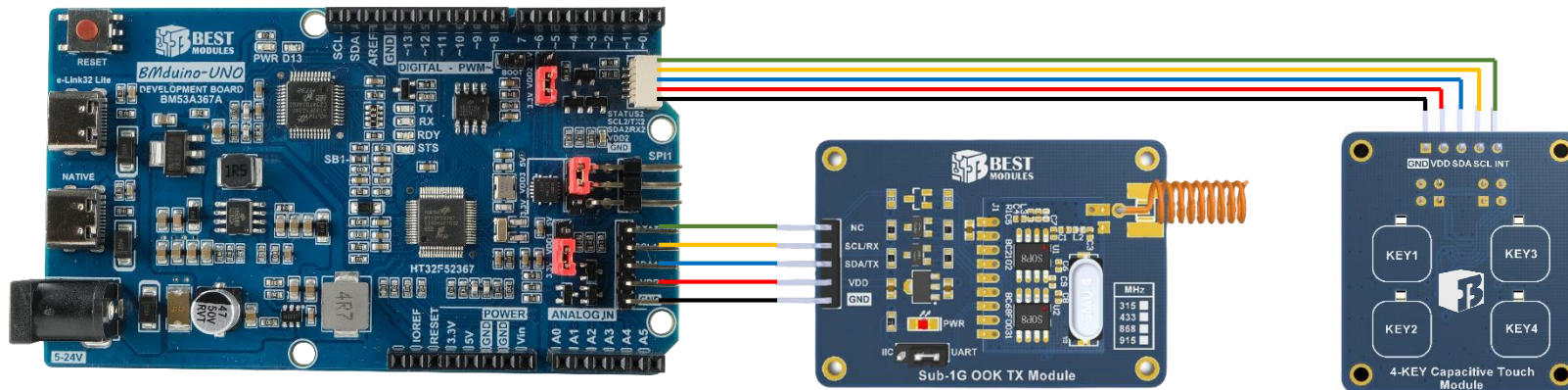Sub-1GHz OOK

Tx BMC21M041

Rx BMC23M041

Wire Connection – Tx side

Connection
- Connect BMC21M041 to BMCOM1 of the BMduino UNO board
- Connect BMK52M134 to BMCOM2 of the BMduino UNO board

Program code
- BMC21M041_TX.ino

Connection
- Connect BMC23M041 to BMCOM1 of the BMduino UNO board
- Connect BMP73T102 (motor driver shield) to the BMduino UNO board
- Connect DC motor to BMP73T102
- Connect an LED (with resistor for current limit) to D13 pin of BMP73T102
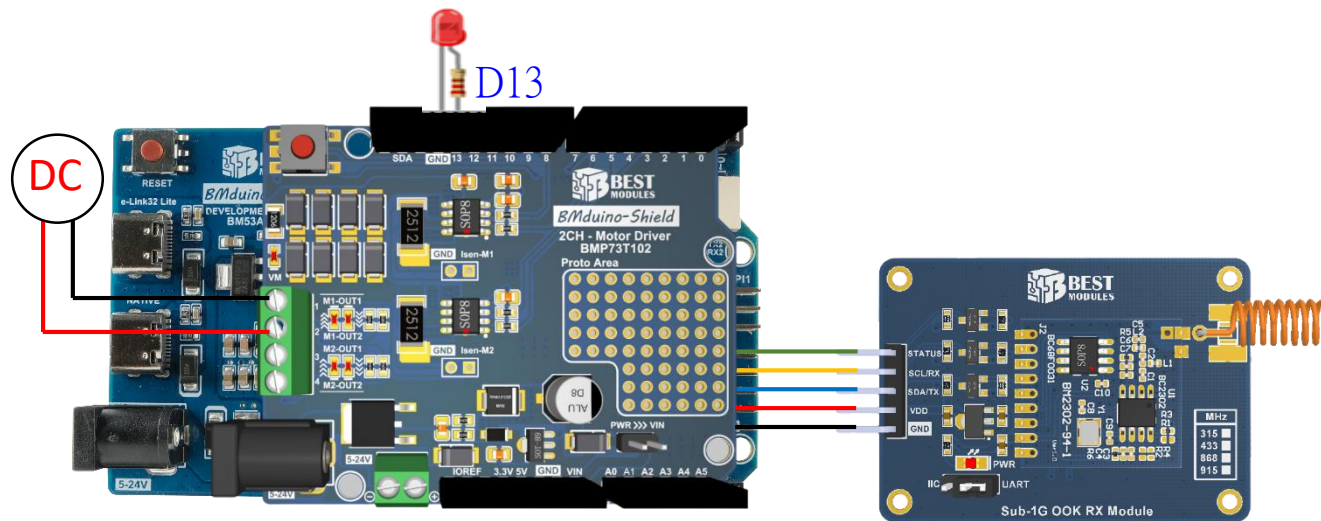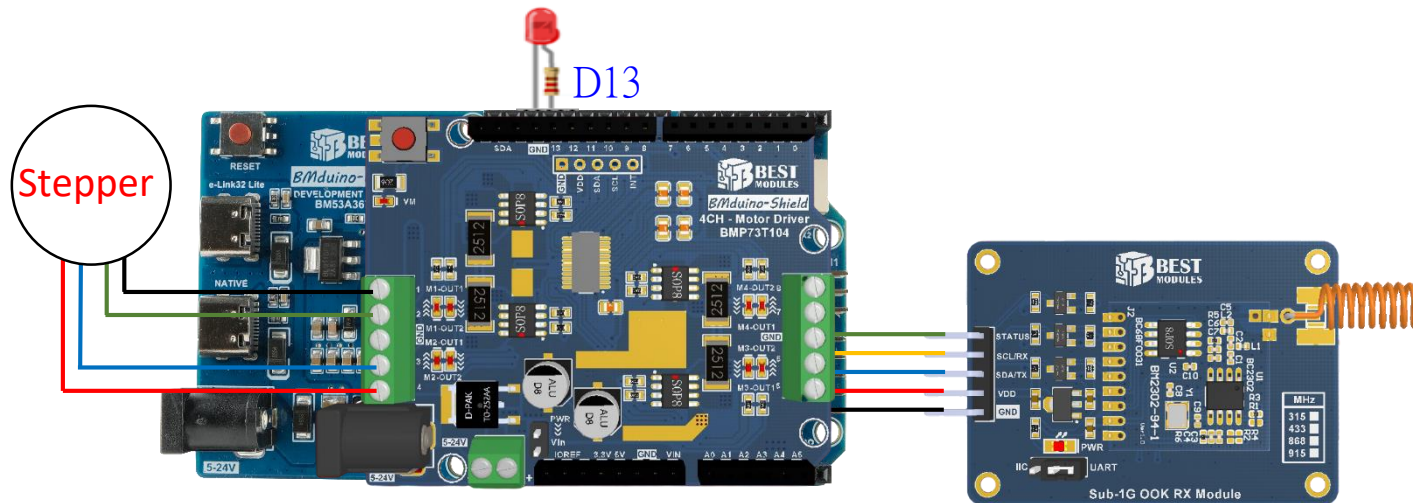
Program code
- BMC23M041_RX_2CH_DcMotor.ino

Wire Connection – Rx side (2)

Connection
- Connect BMC23M041 to BMCOM1 of the BMduino UNO board
- Connect BMP73T102 (motor driver shield) to the BMduino UNO board
- Connect stepper motor to BMP73T102
- Connect an LED (with resistor for current limit) to D13 pin of BMP73T102

Program code
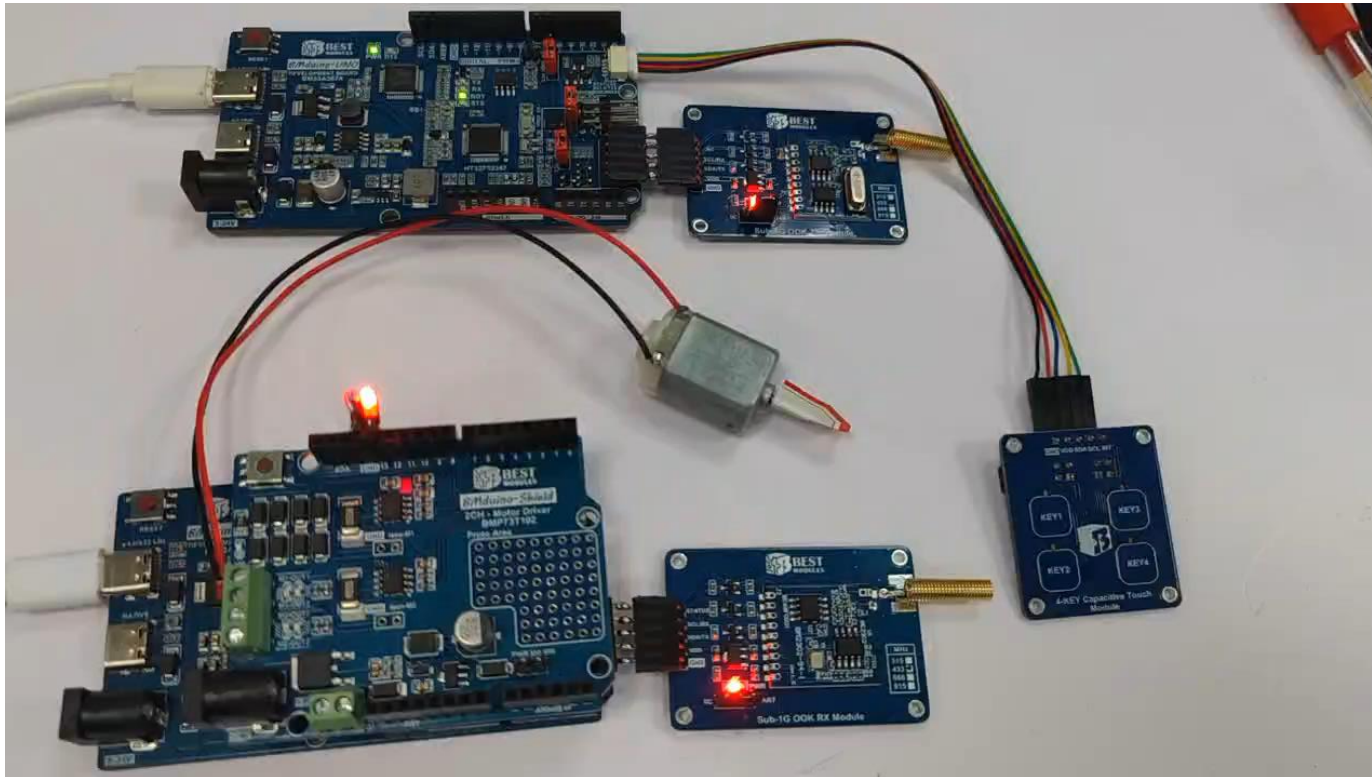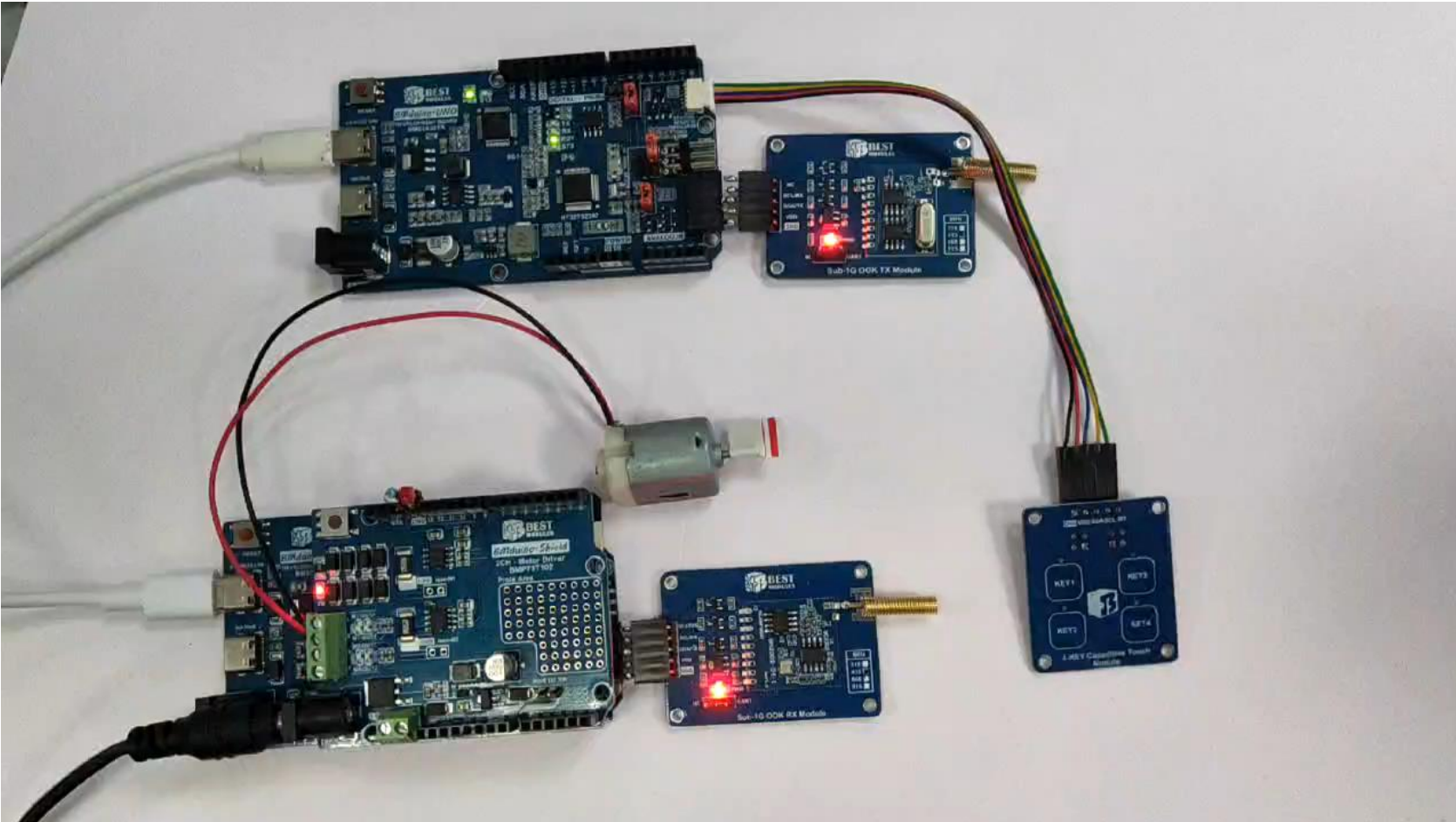- BMC23M041_RX_4CH_StepperMotor.ino

Pairing：

After the RX side is powered on, it will enter pairing mode, and the LED will flash.
Press any Key (except Key3) on the TX side to complete pairing.

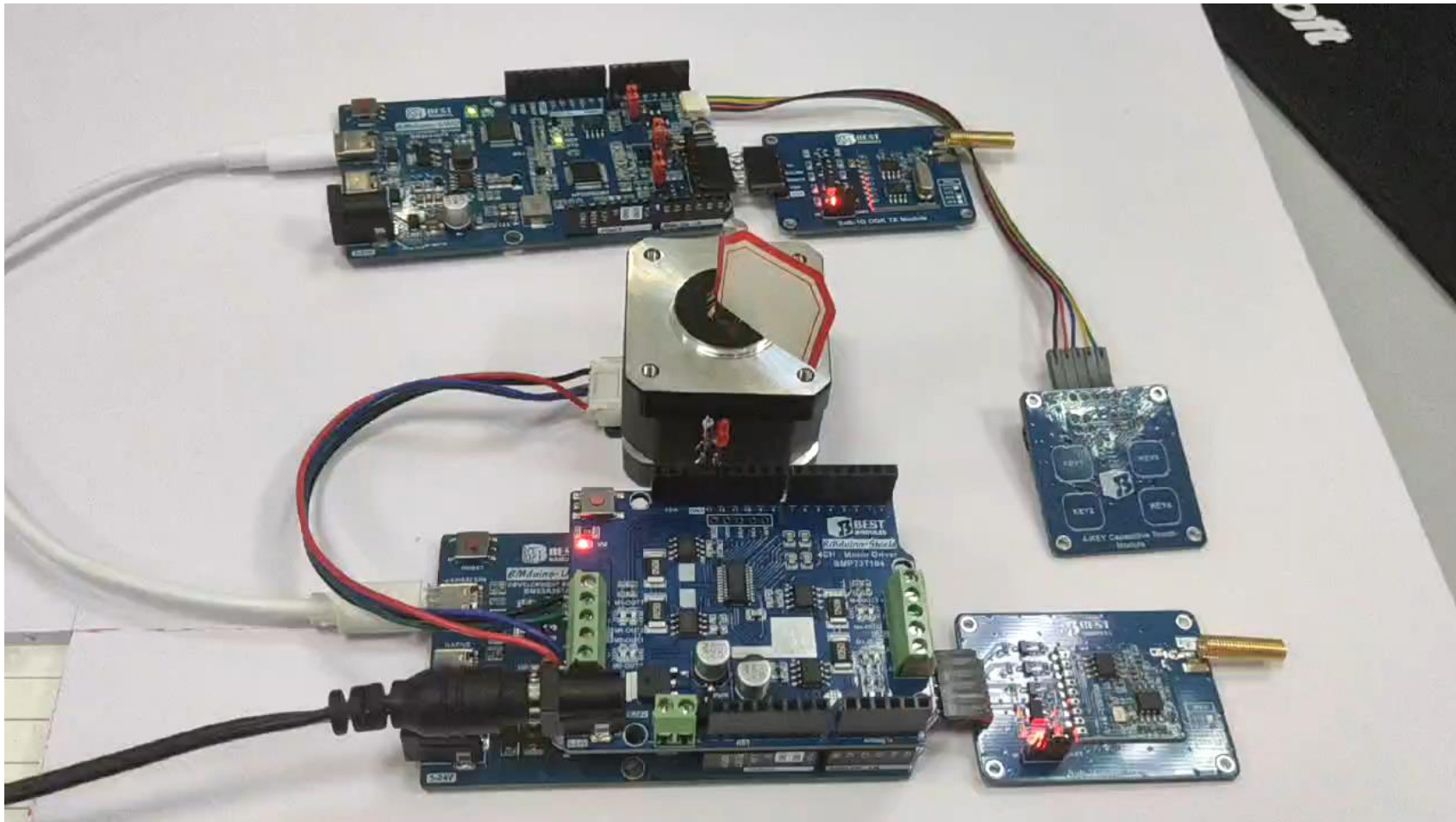→ pairing success：LED turns off

→ pairing failure：LED turns on

Video – DC motor

Key1: motor runs   Key3: LED flash
Key2: motor stops   Key4: LED off

Video – Stepper motor

Key1: motor runs
Key2: motor stops

Key3: LED flash
Key4: LED off

END