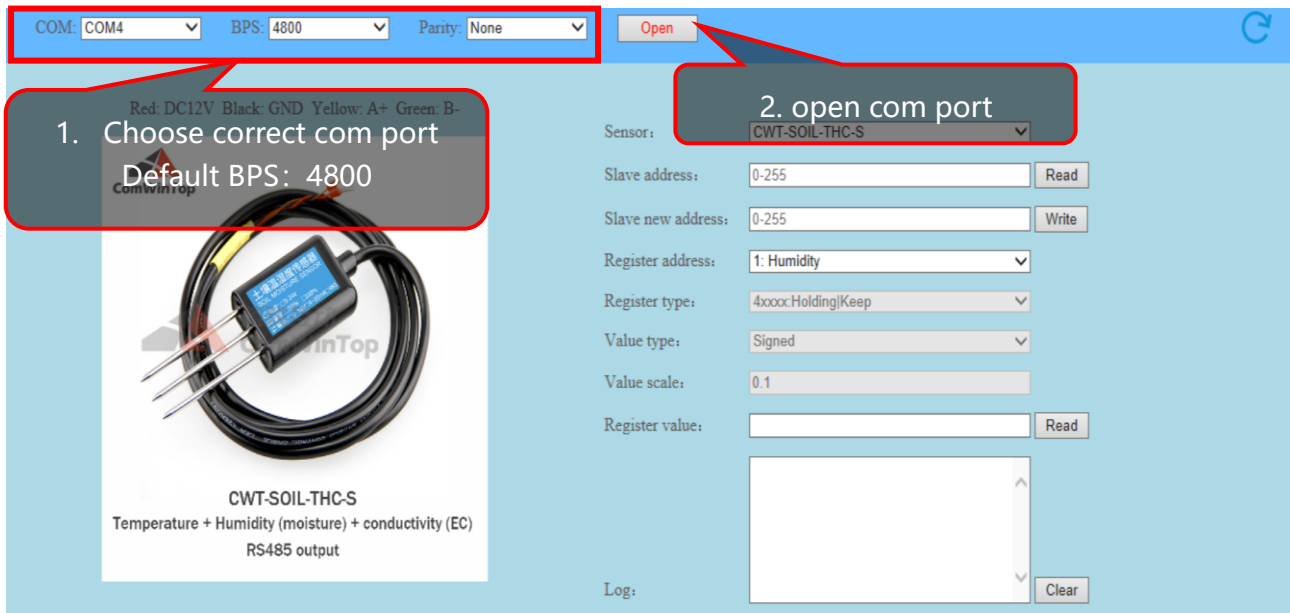


# CWT-SOIL(RS485 type) config tool instruction

## 1 Connect sensor

Connect sensor to PC by a RS485 to USB converter



COM: COM4 BPS: 4800 Parity: None **Open**

1. Choose correct com port  
Default BPS: 4800

2. open com port

Sensor: CWT-SOIL-THC-S

Slave address: 0-255 Read

Slave new address: 0-255 Write

Register address: 1: Humidity

Register type: 4xxxx: Holding/Keep

Value type: Signed

Value scale: 0.1

Register value: Read

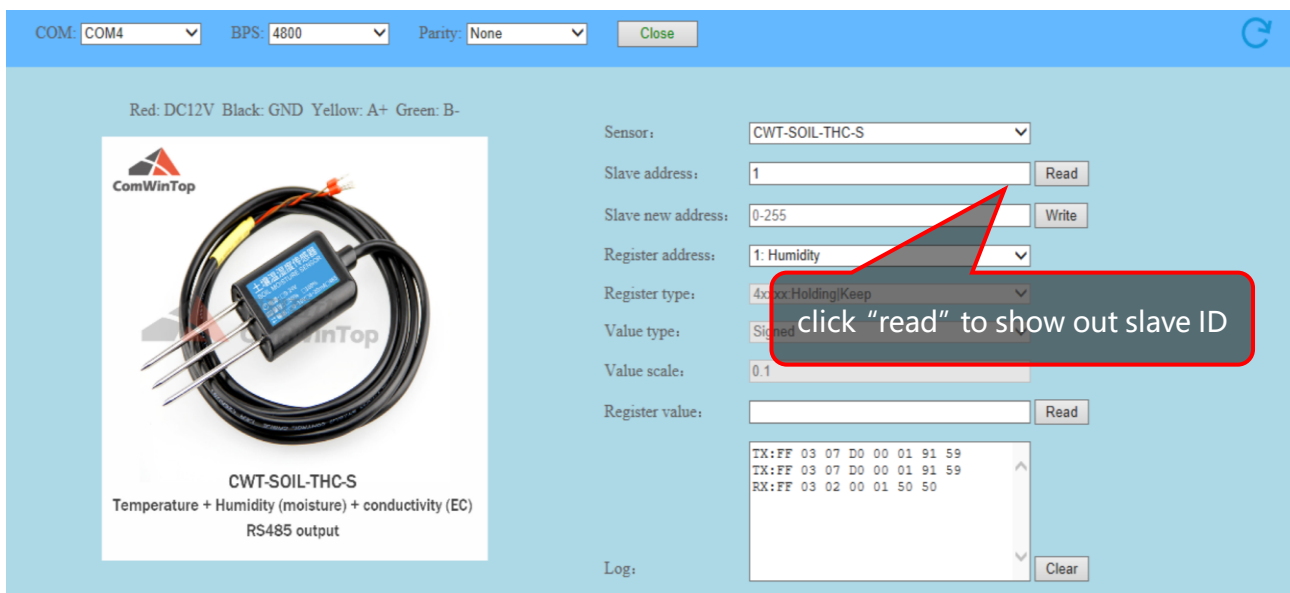
Log: Clear

Red: DC12V Black: GND Yellow: A+ Green: B-

**CWT-SOIL-THC-S**  
Temperature + Humidity (moisture) + conductivity (EC)  
RS485 output

## 2 Read value

### 2.1 read ID



COM: COM4 BPS: 4800 Parity: None **Close**

Red: DC12V Black: GND Yellow: A+ Green: B-

**CWT-SOIL-THC-S**  
Temperature + Humidity (moisture) + conductivity (EC)  
RS485 output

Sensor: CWT-SOIL-THC-S

Slave address: 1 Read

Slave new address: 0-255 Write

Register address: 1: Humidity

Register type: 4xxxx: Holding/Keep

Value type: Signed

Value scale: 0.1

Register value: Read

Log: Clear

TX: FF 03 07 D0 00 01 91 59  
TX: FF 03 07 D0 00 01 91 59  
RX: FF 03 02 00 01 50 50

click "read" to show out slave ID

## 2.2 read temperature or humidity

COM: COM4 BPS: 4800 Parity: None Close

Red: DC12V Black: GND Yellow: A+ Green: B-

**1. Choose temp or humidity**

**2. read**

**Show value**

CWT-SOIL-THC-S  
Temperature + Humidity (moisture) + conductivity (EC)  
RS485 output

Sensor: CWT-SOIL-THC-S

Slave address: 1 Read

Slave new address: 0-255 Write

Register address: 2: Temperature

Register type: 4xxxx: Holding|Keep

Value type: Signed

Value scale: 0.1

Register value: 27.20 Read

Log:

```
TX:FF 03 07 D0 00 01 91 59
TX:FF 03 07 D0 00 01 91 59
RX:FF 03 02 00 01 50 50
TX:01 03 00 01 00 01 d5 ca
RX:01 03 02 01 10 B8 18
```

Clear

## 3 Set parameters

### 3.1 Set ID

COM: COM4 BPS: 4800 Parity: None Close

Red: DC12V Black: GND Yellow: A+ Green: B-

**1. Enter new ID**

**2. write**

CWT-SOIL-THC-S  
Temperature + Humidity (moisture) + conductivity (EC)  
RS485 output

Sensor: CWT-SOIL-THC-S

Slave address: 2 Read

Slave new address: 2 Write

Register address: 2: Temperature

Register type: 4xxxx: Holding|Keep

Value type: Signed

Value scale: 0.1

Register value: 27.20 Read

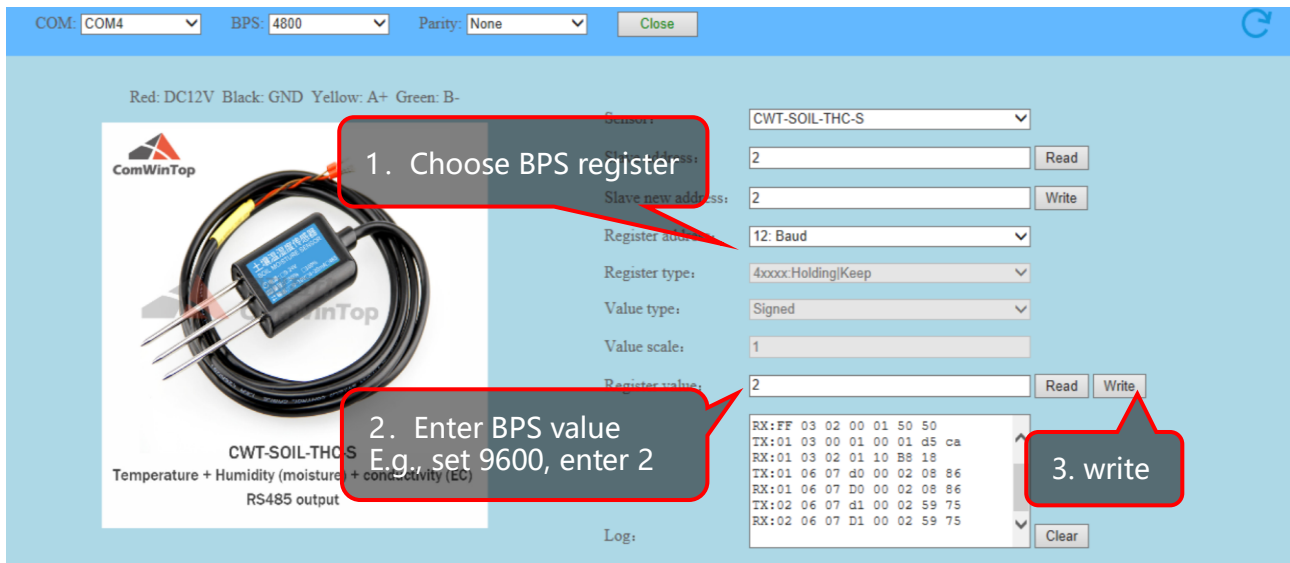
Log:

```
TX:FF 03 07 D0 00 01 91 59
TX:FF 03 07 D0 00 01 91 59
RX:FF 03 02 00 01 50 50
TX:01 03 00 01 00 01 d5 ca
RX:01 03 02 01 10 B8 18
TX:01 06 07 d0 00 02 08 86
RX:01 06 07 D0 00 02 08 86
```

Clear

### 3.2 Set BPS

0=2400, 1=4800, 2=9600



COM: COM4 BPS: 4800 Parity: None Close

Red: DC12V Black: GND Yellow: A+ Green: B-

Sensor: CWT-SOIL-THC-S

Slave address: 2 Read Write

Slave new address: 2 Write

Register address: 12: Baud

Register type: 4xxxx: Holding|Keep

Value type: Signed

Value scale: 1

Register value: 2 Read Write

RX: FF 03 02 00 01 50 50  
 TX: 01 03 00 01 00 01 d5 ca  
 RX: 01 03 02 01 10 B8 19  
 TX: 01 06 07 d0 00 02 08 86  
 RX: 01 06 07 D0 00 02 08 86  
 TX: 02 06 07 d1 00 02 59 75  
 RX: 02 06 07 D1 00 02 59 75

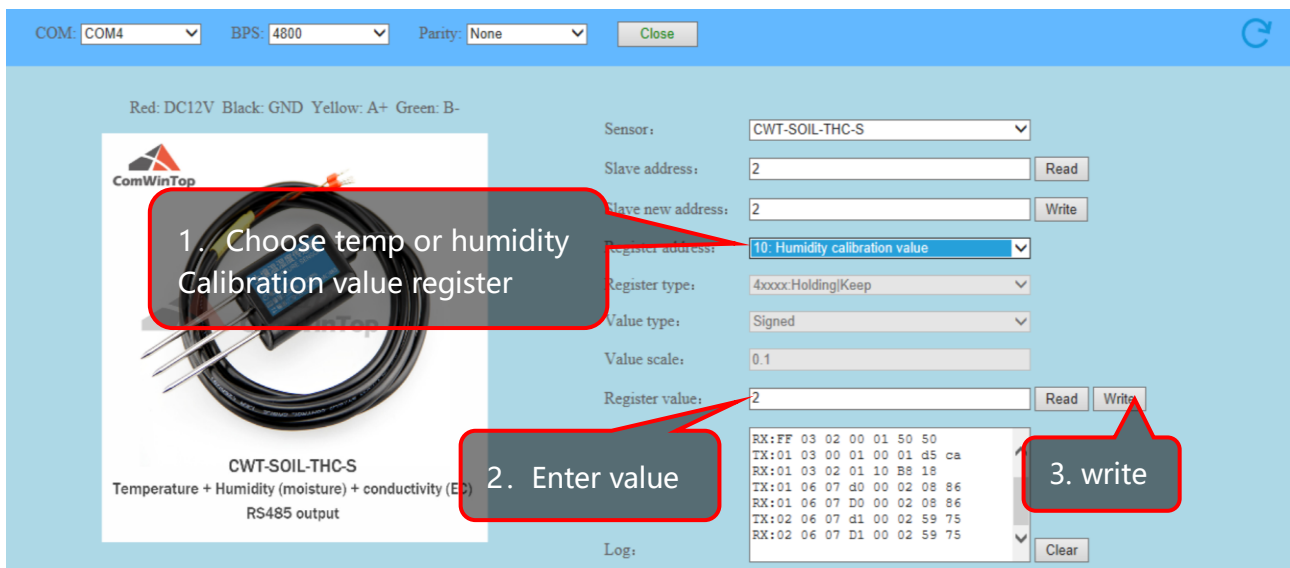
Log: Clear

1. Choose BPS register

2. Enter BPS value  
E.g., set 9600, enter 2

3. write

### 3.3 Set temperature or humidity calibration value



COM: COM4 BPS: 4800 Parity: None Close

Red: DC12V Black: GND Yellow: A+ Green: B-

Sensor: CWT-SOIL-THC-S

Slave address: 2 Read Write

Slave new address: 2 Write

Register address: 10: Humidity calibration value

Register type: 4xxxx: Holding|Keep

Value type: Signed

Value scale: 0.1

Register value: 2 Read Write

RX: FF 03 02 00 01 50 50  
 TX: 01 03 00 01 00 01 d5 ca  
 RX: 01 03 02 01 10 B8 19  
 TX: 01 06 07 d0 00 02 08 86  
 RX: 01 06 07 D0 00 02 08 86  
 TX: 02 06 07 d1 00 02 59 75  
 RX: 02 06 07 D1 00 02 59 75

Log: Clear

1. Choose temp or humidity  
Calibration value register

2. Enter value

3. write

Output value=actual value + calibration value