Battery Firmware Upgrade Manual

V2.0
27nd February, 2023

CONTENTS

1. Determine Your Battery Version

E-Box-48100R-A Version

1. Link Port 0 and Link Port 1 in Vertical Line
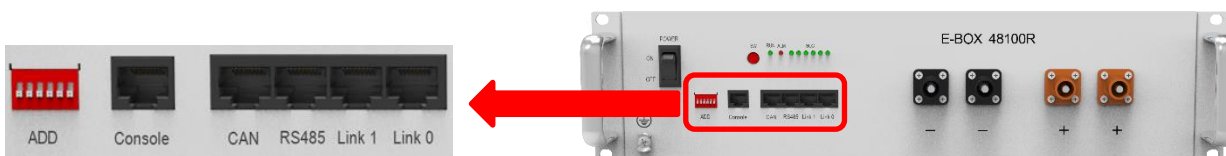2. 4 Position DIP switch (ADD)

E-Box-48100R-B Version

1. Link Port 0 and Link Port 1 in Horizontal Line
2. 4 Position DIP switch (ADD)

E-Box-48100R-C Version

1. Link Port 0 and Link Port 1 in Horizontal Line
2. 6 Position DIP switch (ADD)

2. Prepare for the Upgrade
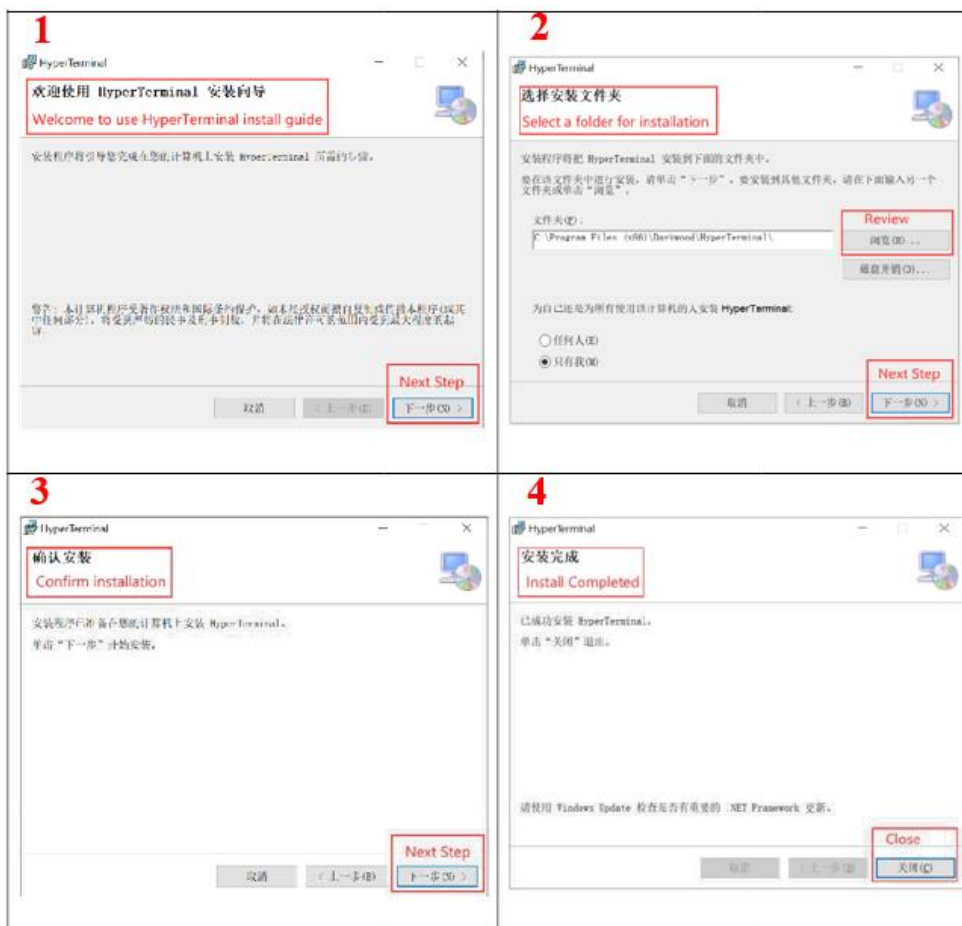
Step 1. Download the upgrade documents

Download these three documents from this link:
https://www.pytesusa.com/upgrade_system/

PDF Battery Firmware Upgrade Manual.pdf

driver for RJ11 to USB cable.exe

driver for RJ45 to USB cable.exe

hyper_terminal_latest.msi

SPBMS16SRP2110V1.1.6.bin for A Version Battery

SPBMS16SRP2111V1.3.18.bin for B Version Battery

SPBMS16SRP2203V1.5.18.C8.bin for C Version Battery

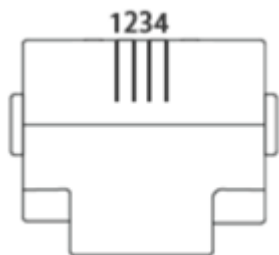## Step 2. Install the hyper terminal

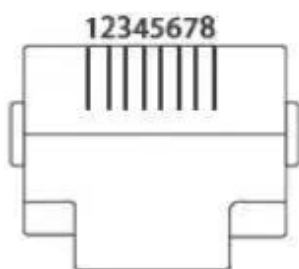Open hyper_terminal latest.msi File to Run the application.:

Step 3. Get the suitable cable

Type I for E-Box-48100R A
Version
(4 pin/RJ11 to USB)

1234

Type II for E-Box-48100R
B&C Version
(8 pin/RJ45 to USB)

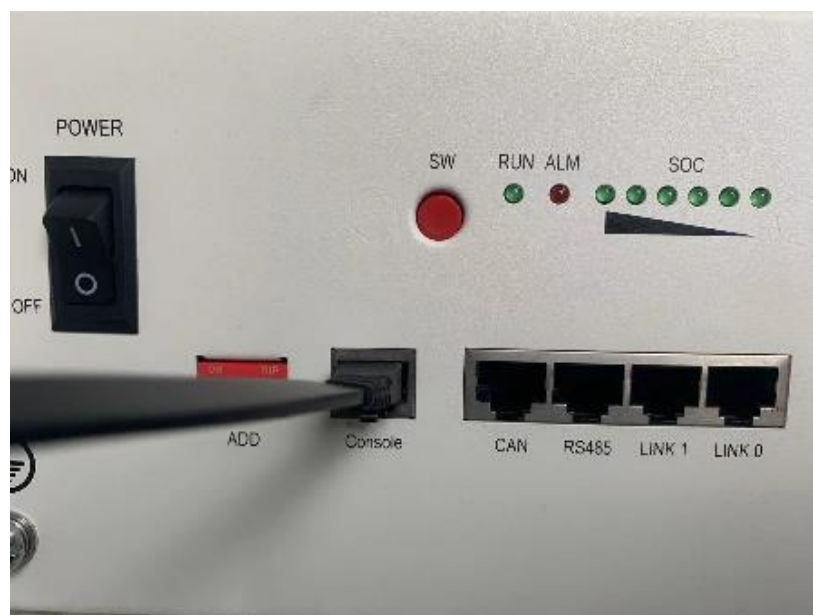12345678

3. Start Upgrading

Step 1. Connect the cable

Connect the battery and PC/laptop with the Cable. The crystal end plugs in battery Console port and USB end plug in your PC/laptop.

*Use the RJ11 to USB cable for E-Box-48100R A Version

  Use the RJ45 to USB cable for E-Box-48100R B&C Version

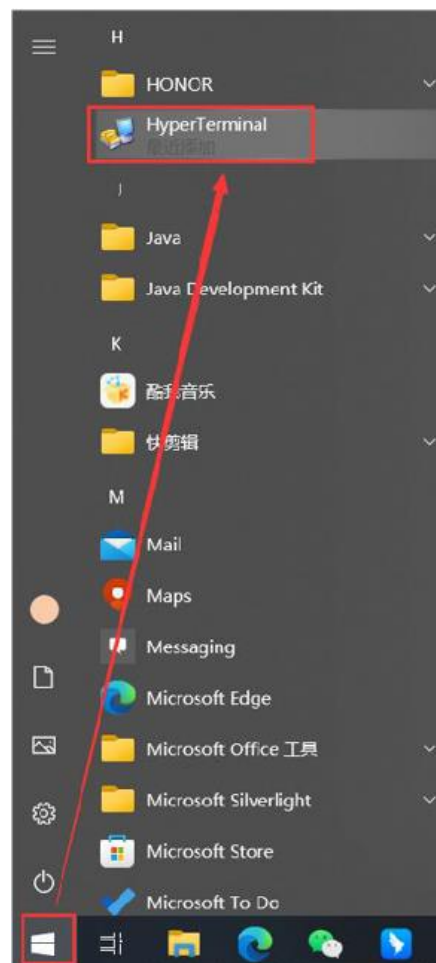| Battery End |
| :---: |
| |
| **Computer End** |
| |

Step 2. Turn on the Battery

After wiring, turn on the battery Power button and press the SW button for one second.

Step 3. Run the Hyper Terminal to Upgrade
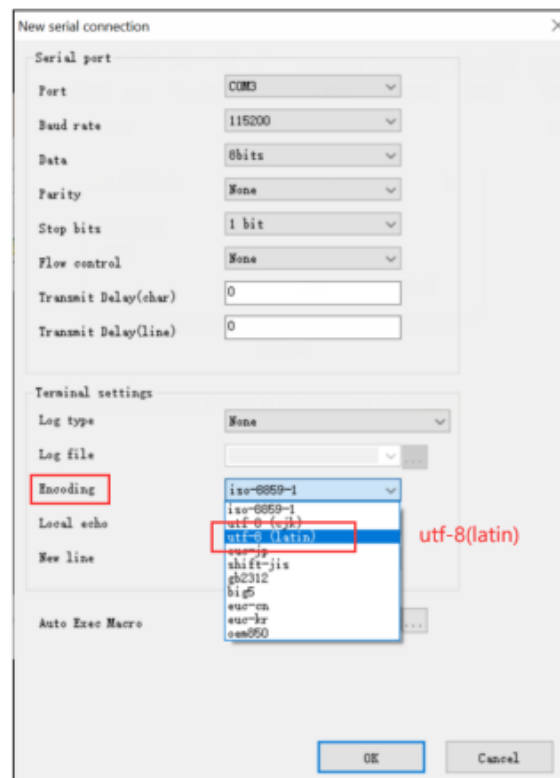
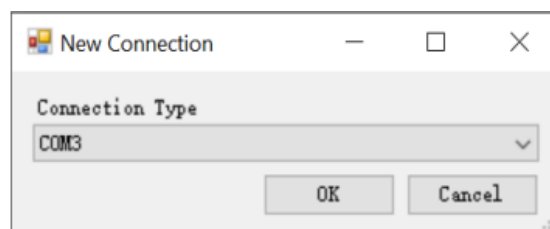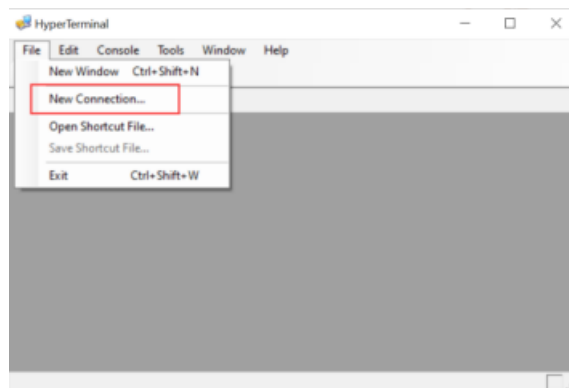|	
Open the Hyper Terminal	

Create a new connection as following steps:

→Click File in Menu bar
→New Connection →COMX*
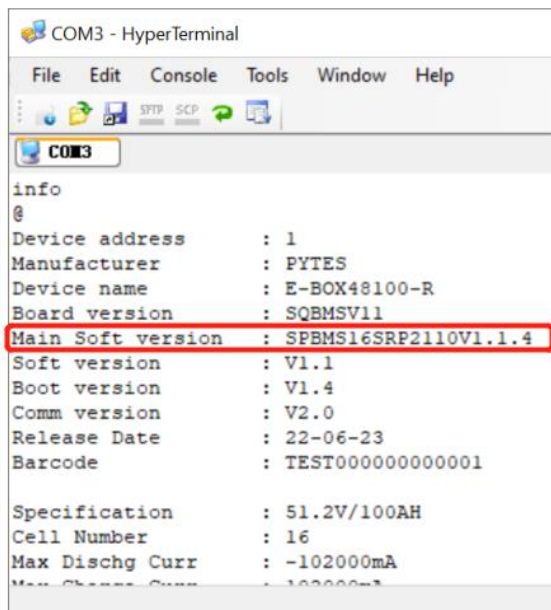→Encoding →utf-8(latin)

*The COM number may vary, it doesn't matter.
If you don't see the COM Option, please close the Hyper Terminal and install the driver for RJ45/RJ11 to USB depend on
your battery version, then Reopen the Hyper Terminal, Repeat the steps above.

 driver for RJ11 to USB cable.exe
 driver for RJ45 to USB cable.exe

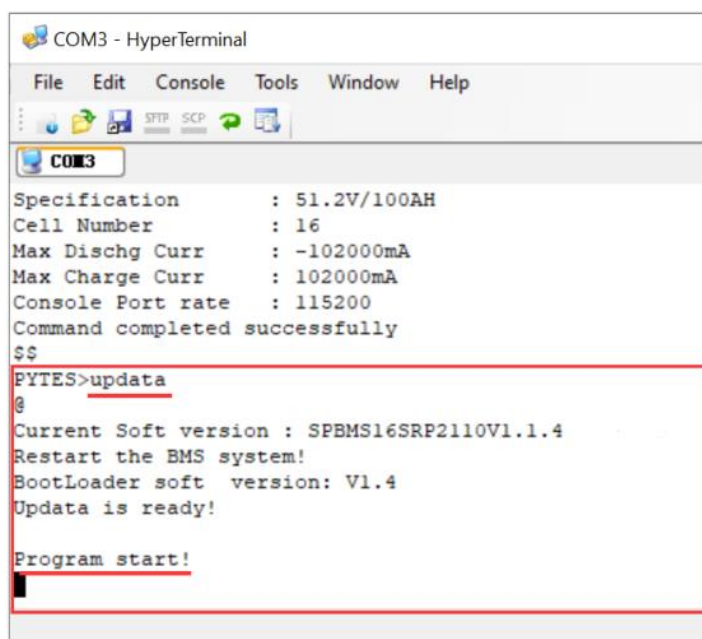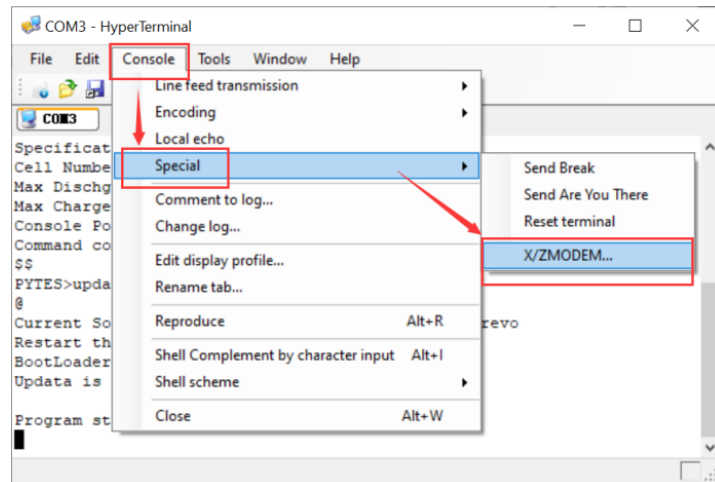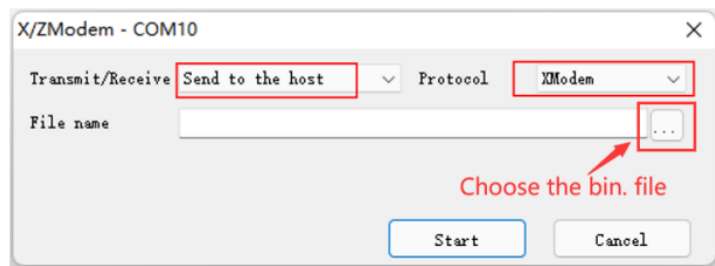|	
Input "info" to check the current battery software version	
Input "updata" to get upgrade program started as following steps: ***Please note that after starting this process, you must complete the upgrade and cannot quit in the middle, otherwise it will cause the battery to die. If the upgrade is interrupted due to various force majeure reasons, please refer to the Battery Recovery Section to recover	

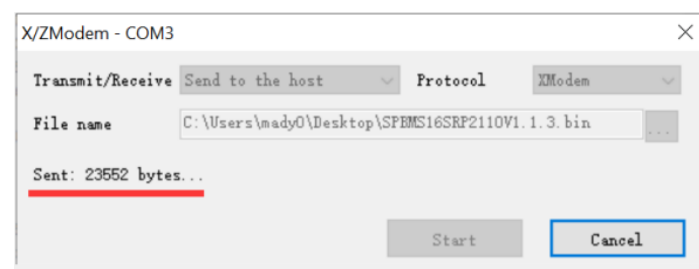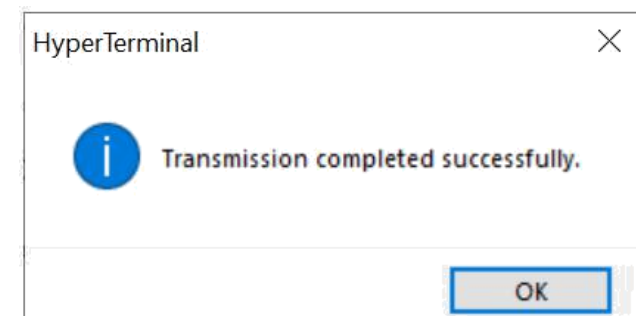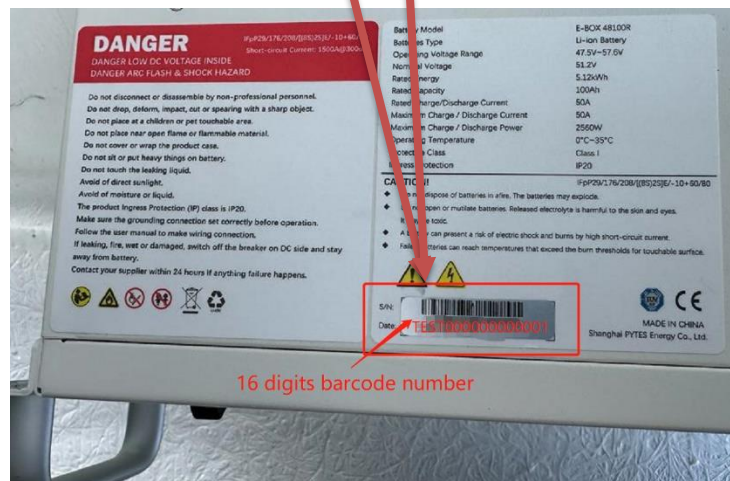|	
Steps 1: → Click Console in Menu bar →Special →X/ZMODEM	
Steps 2: a. Select "Send to the host" for Transmit/Receive b. Select "XModem" for Protocol c. Review the bin. file path * Please prepare the bin. file in advance according to your battery version. Do not confuse the bin. file Otherwise it will cause the battery to die please refer to the Battery Recovery Section to recover	
Transmission processing	
Transmission completed	

Input "info" again to check the battery Main Soft Version. Make sure it has changed to the updated bin. file name. *Also check the Barcode that should remain the same as the S/N in the battery label. If not, please input "tbar" + SN to rewrite the barcode. Note that the S/N code is composed of 16 letters and digits.	
Input "login debug" and Input "config default" to make the new BMS parameters take effect.	

4. Recover the Battery

If any force majeure causes the B Version and C Version Battery to die (The Run light does not flash, you cannot type in hyper terminal), Please refer to following steps to recover the battery.

*If you cause the A Version Battery die or the following steps don't work please contact ess_support@pytesgroup.com to recover the battery. So make sure that the bin. file corresponds to your battery version.
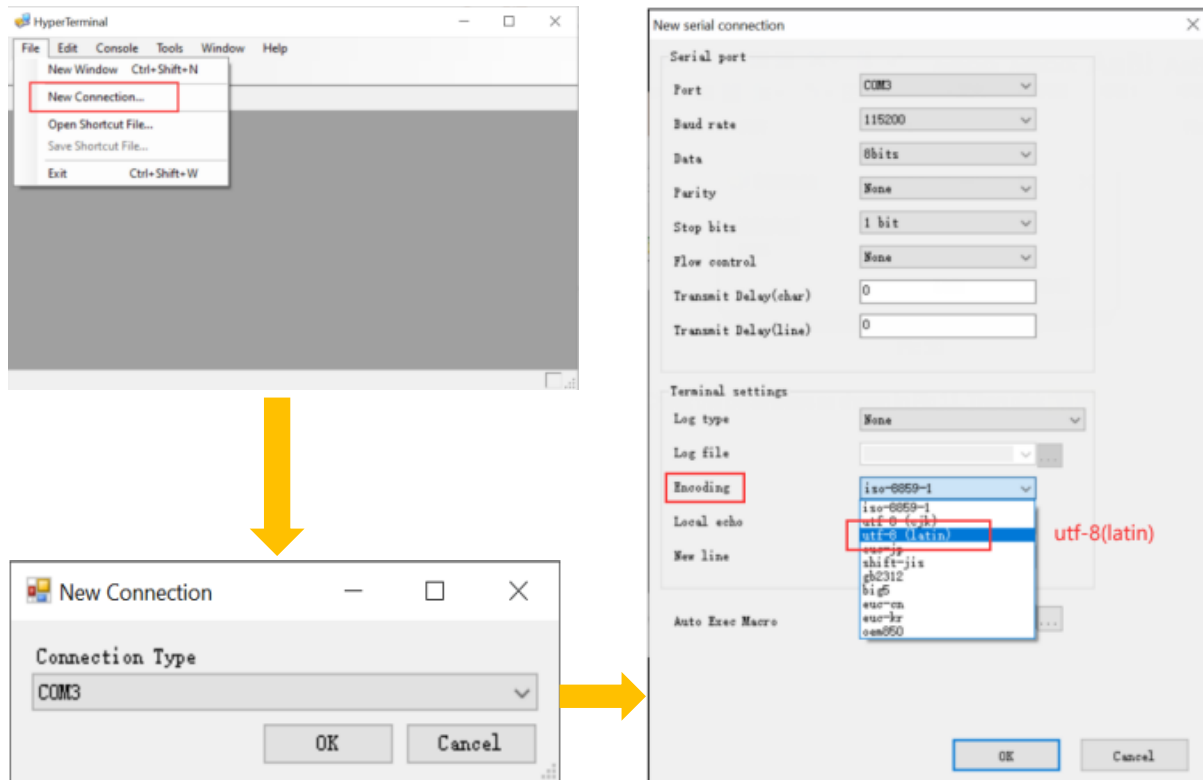
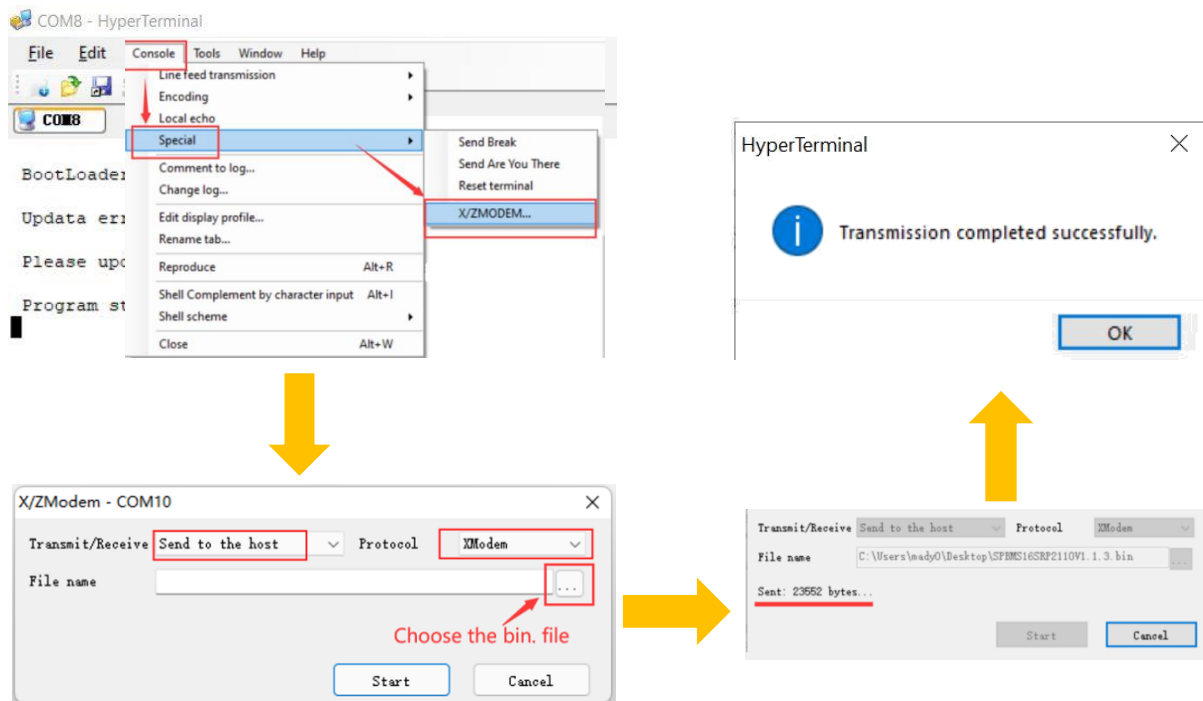## Step 1. Close and Rerun hyper terminal

Step 2. Restart the Battery

Turn on again the Power Button, and press the SW switch.
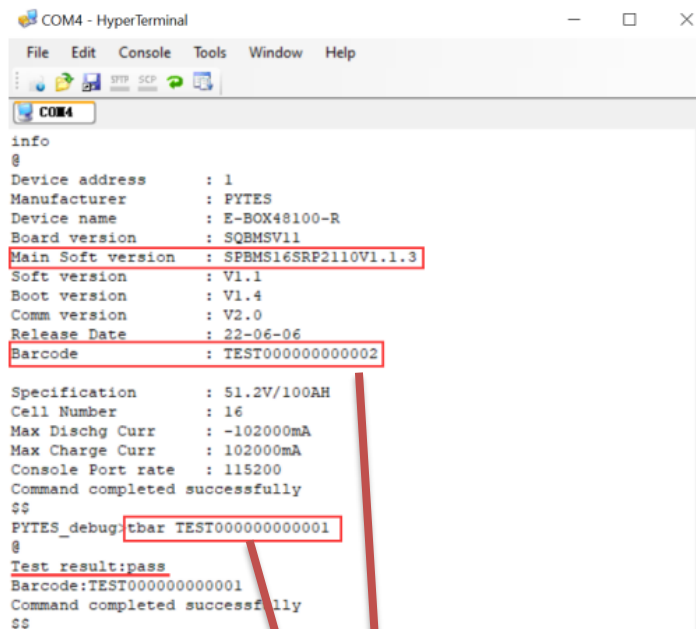

Step 3. Create a new connection as before

Step 4. Re-completing the upgrade

Choose the bin. file

Step 5. Check

Input "info" again to check the battery Main Soft Version. Make sure it has changed to the updated bin. file name.

*Also check the Barcode that should remain the same as the S/N in the battery label. If not, please input "tbar" + SN to rewrite the barcode. Note that the SN is 4 digits capital letters and 12 number digits.
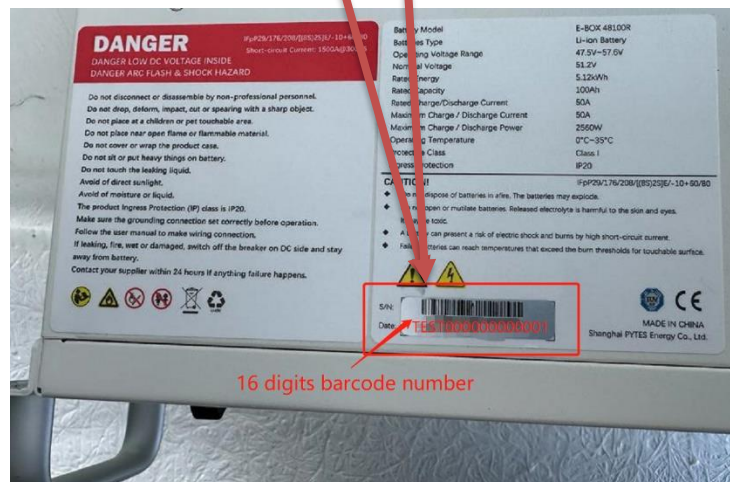

Input "login debug" and Input "config default" to make the new BMS parameters take effect.