

# Assembling

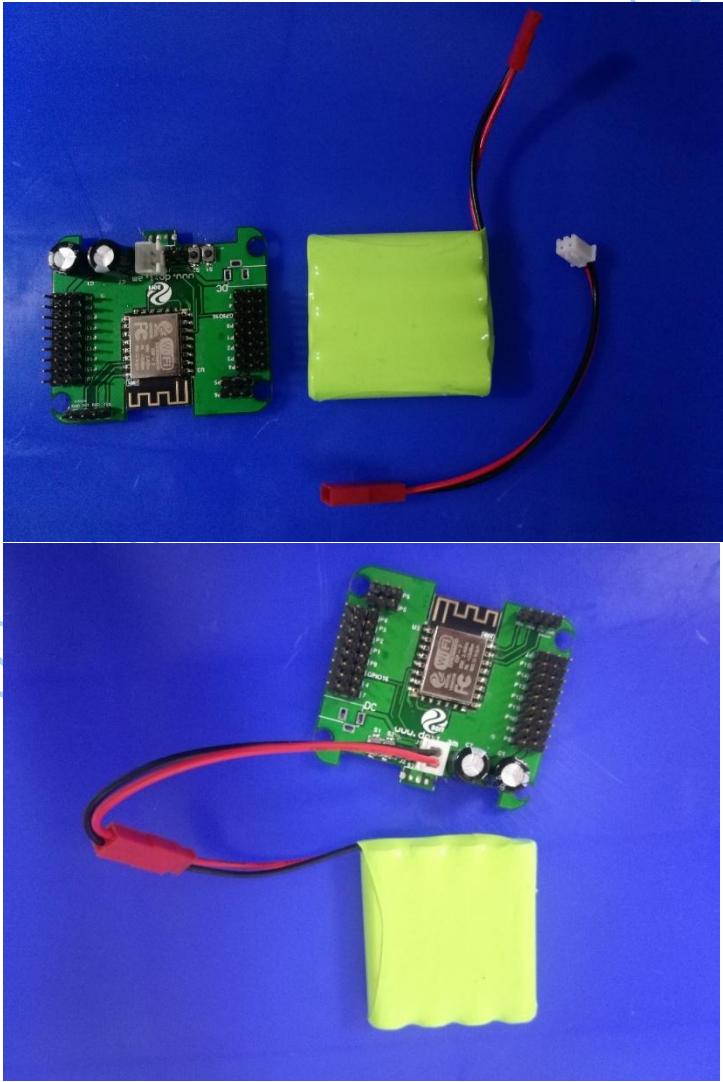
## Connect a Battery

### Parts List

Parts list of the power supply is enumerated below.

Name	Quantity
Battery	1
Cable	1
Control Board	1

### Connecting Process



## Attention:

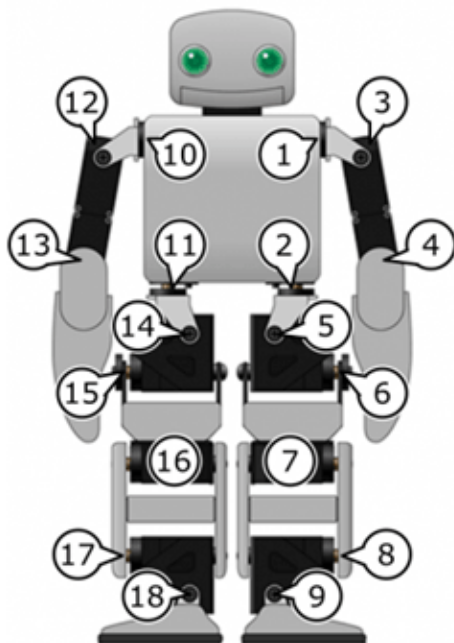
When connecting servos' cables with the control-board.

Please turn on switches and keep the status.

## The overall structure

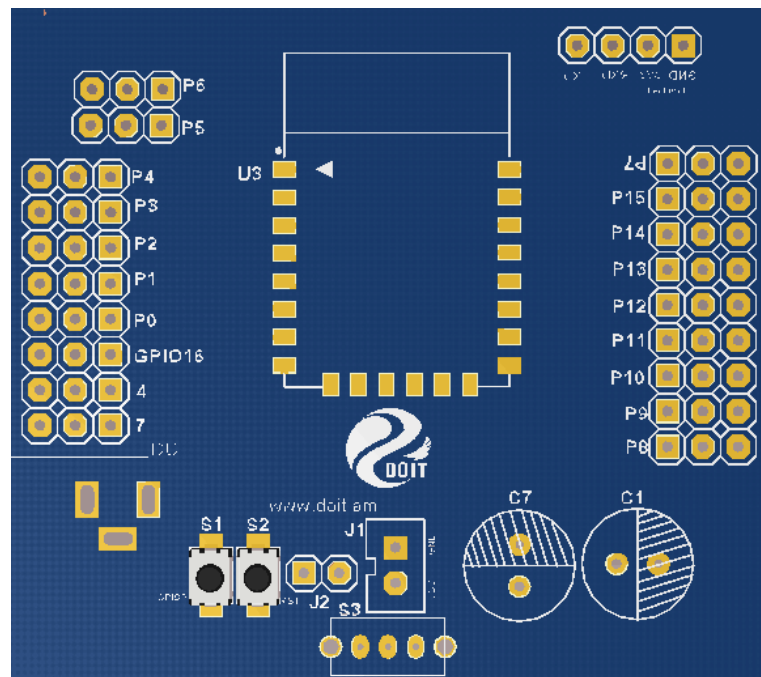
### Attention!

Please connect "servo\_motor" so that white wire is inside.

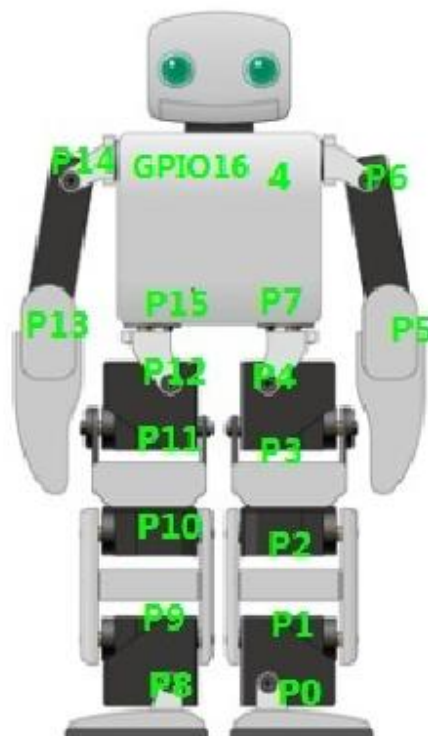


No.	Name	No.	Name
1	Left Shoulder Pitch	10	Right Shoulder Pitch
2	Left Thigh Yaw	11	Right Thigh Yaw
3	Left Shoulder Roll	12	Right Shoulder Roll
4	Left Elbow Roll	13	Right Elbow Roll
5	Left Thigh Roll	14	Right Thigh Roll
6	Left Thigh Pitch	15	Right Thigh Pitch
7	Left Knee Pitch	16	Right Knee Pitch
8	Left Foot Pitch	17	Right Foot Pitch
9	Left Foot Roll	18	Right Foot Roll

## Control board



## Connection between steering gear and control board



## Arm

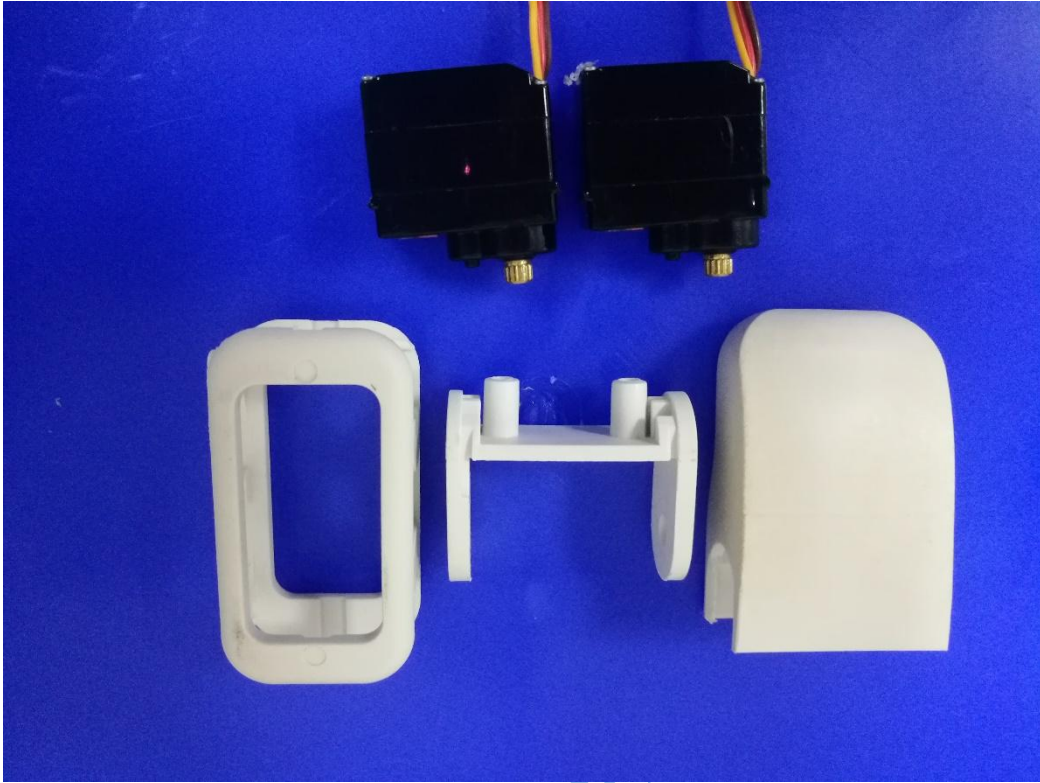
### Parts List

Components of the right arm list as below. (Also you can use the parts to build the left arm.)

Name	Quantity
arm	1
wrist	1
hand	1
Servo Motor	2

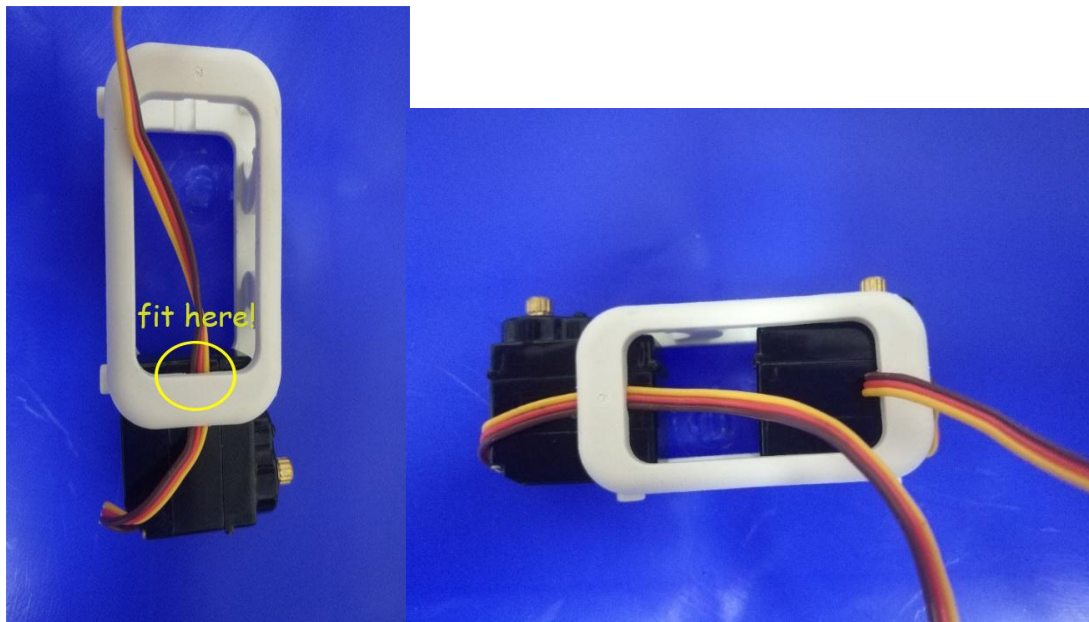
## Assembling Steps

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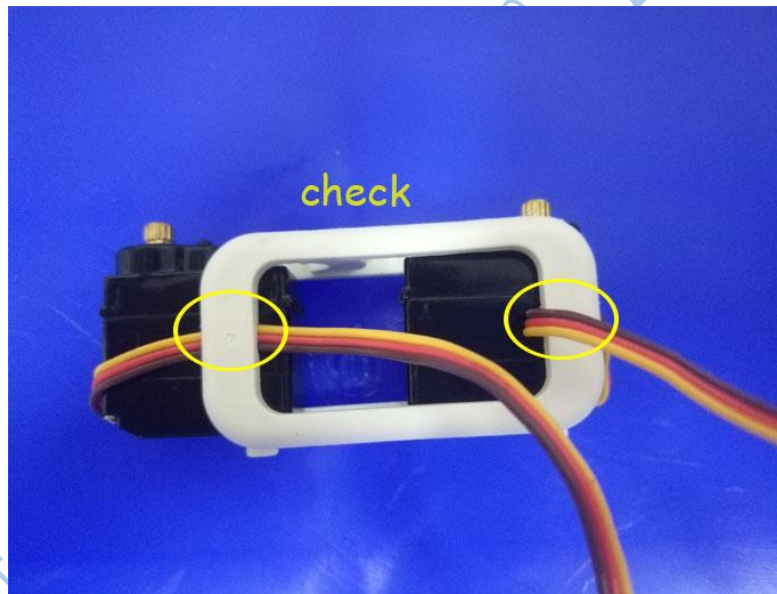


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## Upper Arm

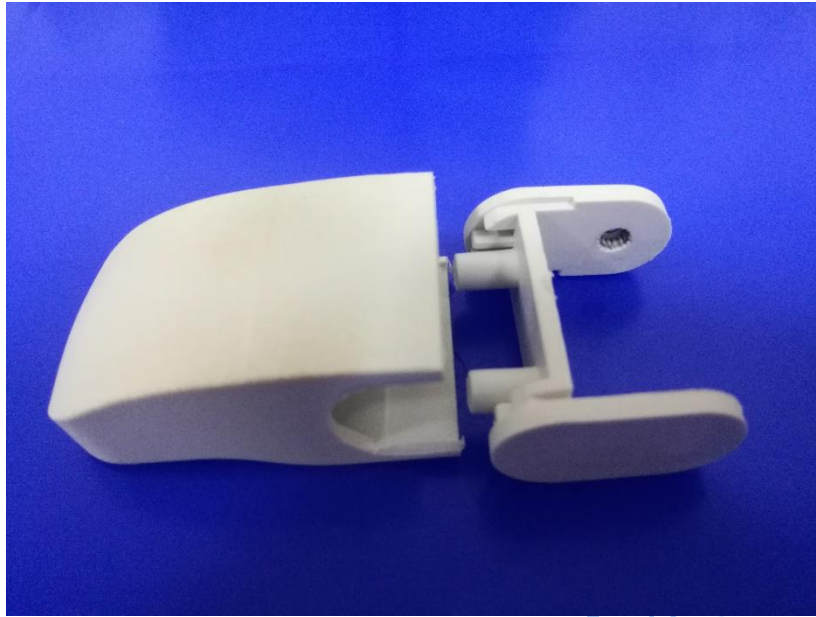


**Attention!:** Please fit the conducting wire through inside a groove on arm.



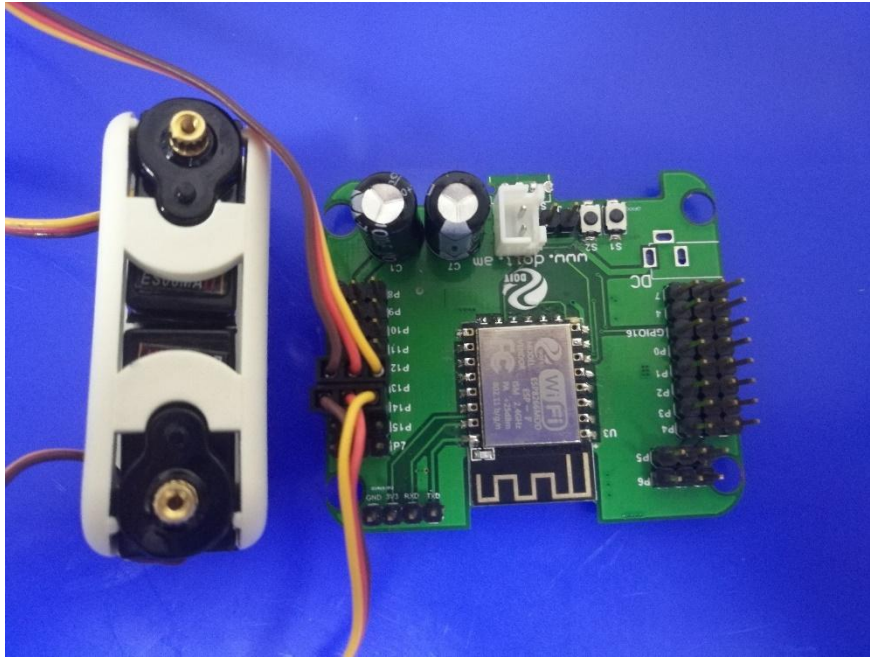


## Hand



## Merge Parts

**Attention!:** Before to merge the parts, you should connect servos' cables with the control-board. When it was completed, please turn on switches and keep the status.



## Finished Arm





## Leg

### Parts List

Components of the right leg list as below. If you would like to assemble the left leg, please use mirror parts

Name	Q'ty
Serve_horn	6
Servo_assem_type1	2
servo_assem_type2	1
servo_bracket_knee	1
servo_bracket_shin	1
foot_mirrorl	1
Servo Motor	5

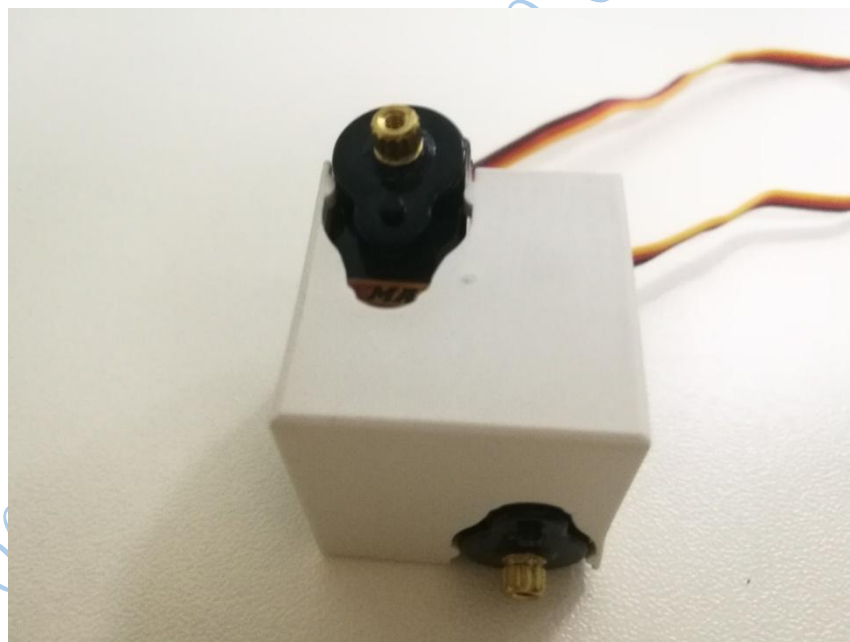
### Assembling Process

#### Parts List



## Thigh

**Attention!:** When assembling the right thigh, you should use **servo\_assem\_type1**. While assembling the other thigh, you should use the mirror part of it.

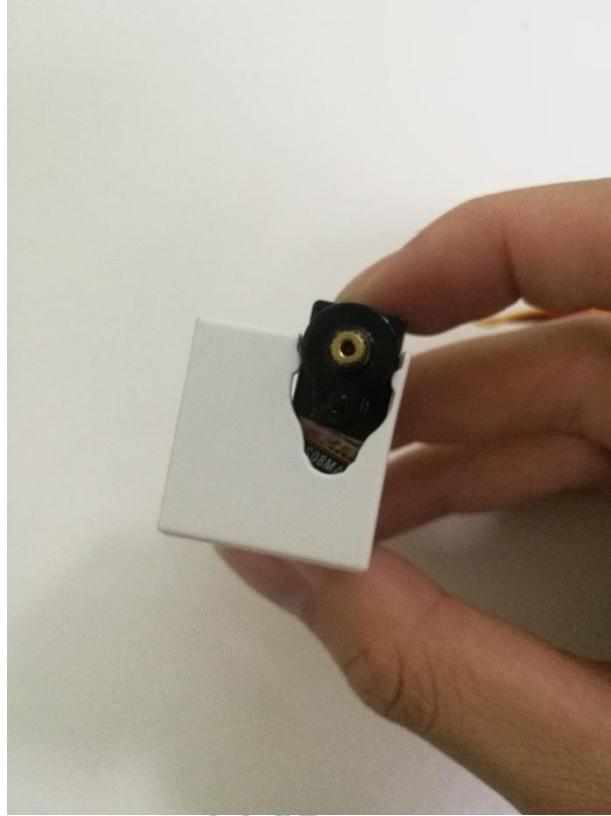


## Knee



## Upper Foot

**Attention!:** When assembling the right upper foot, you should use **servo\_assem\_type2**. While assembling the other upper foot, you should use the mirror part of it.

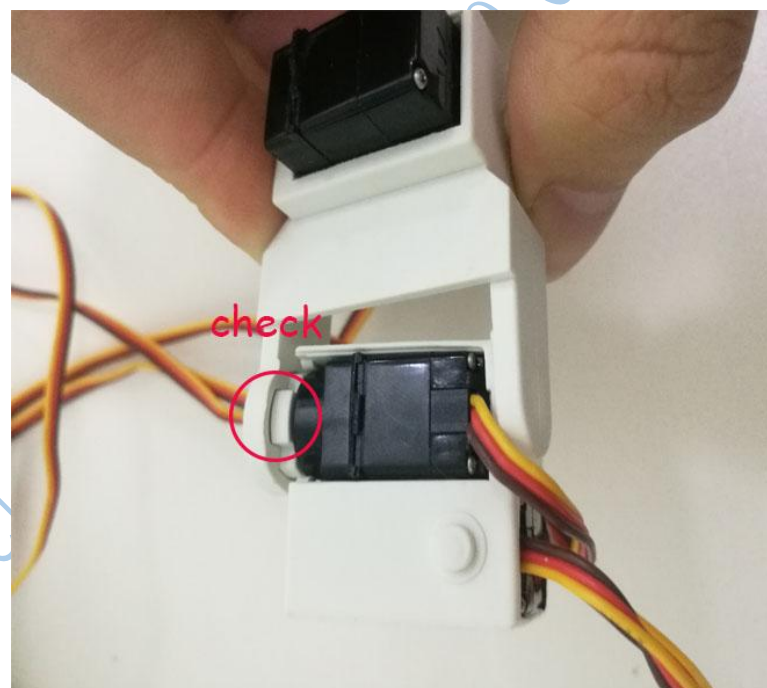
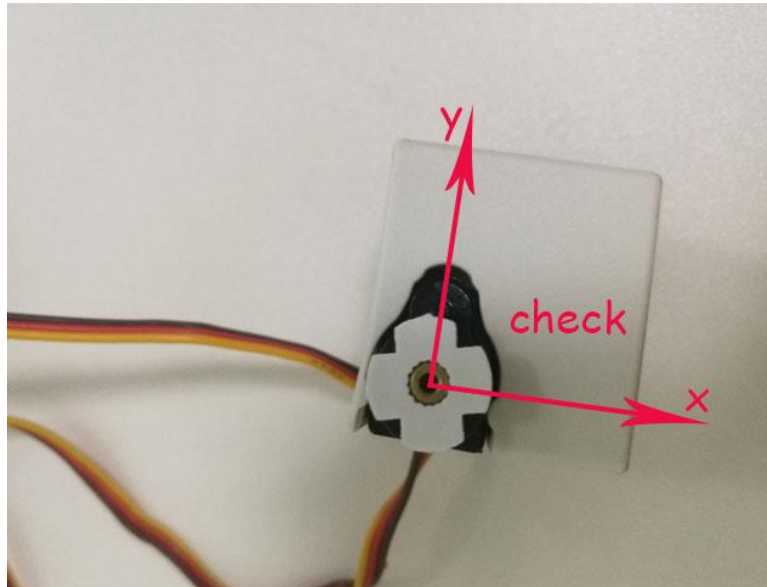


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## Merge Parts

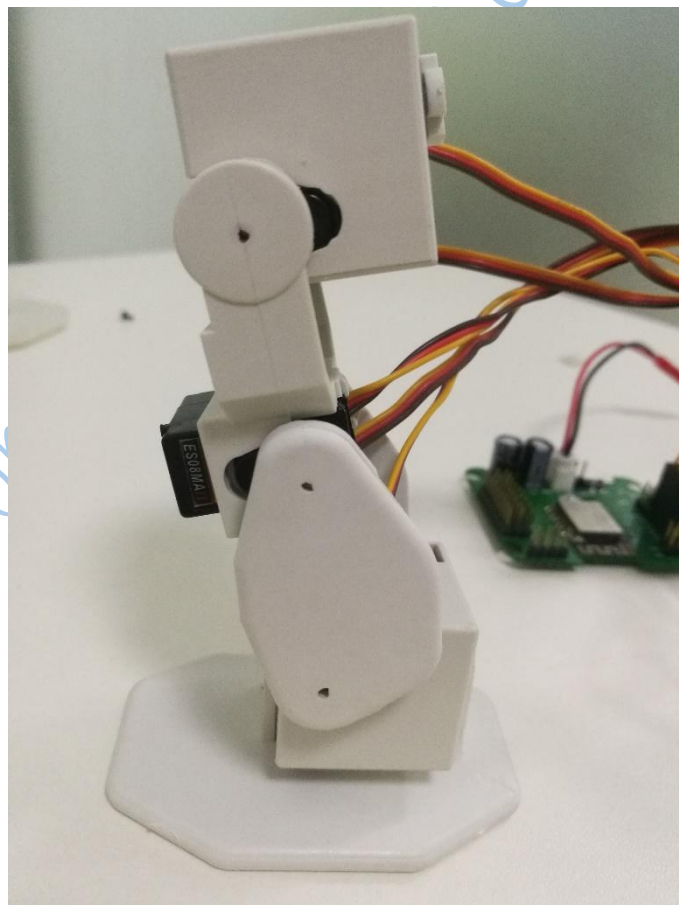
**Attention!:** When you attach a servo-horn to the right thigh, make sure it is placed approximately parallel to edge of the servo.





**Attention!:** When merging the right shin and the left upper foot, servos' cables are passed through inside the right shin.

**Finished Leg**



# Head

Parts List

Name	Q'ty
head	1
chin	1
eyes	1
neck	1
Servo	1

Assembling Steps

Parts List



## Attach Neck Servo



## Attach eyes



**Attention!:** Please fit eyes (LEDs) grooves on the chin. When it was completed.

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## Finished Head



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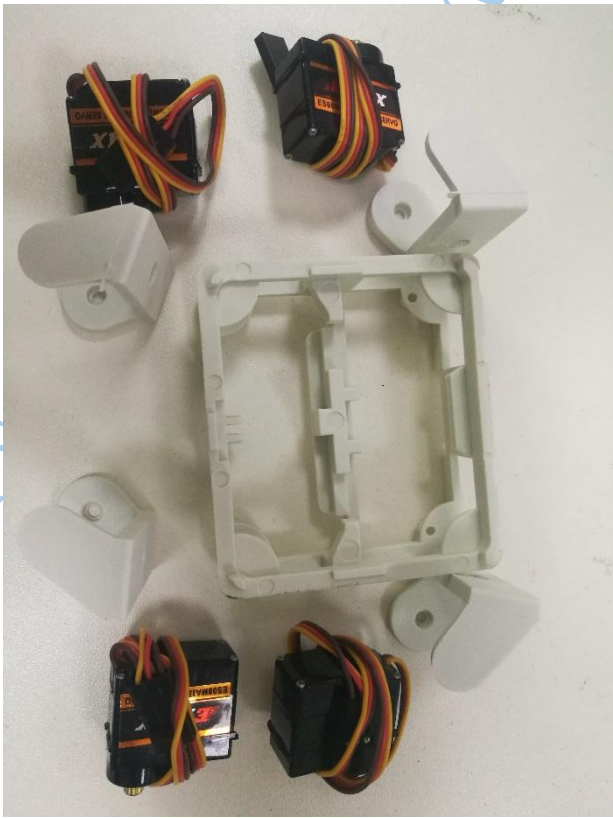
# Body

Parts List

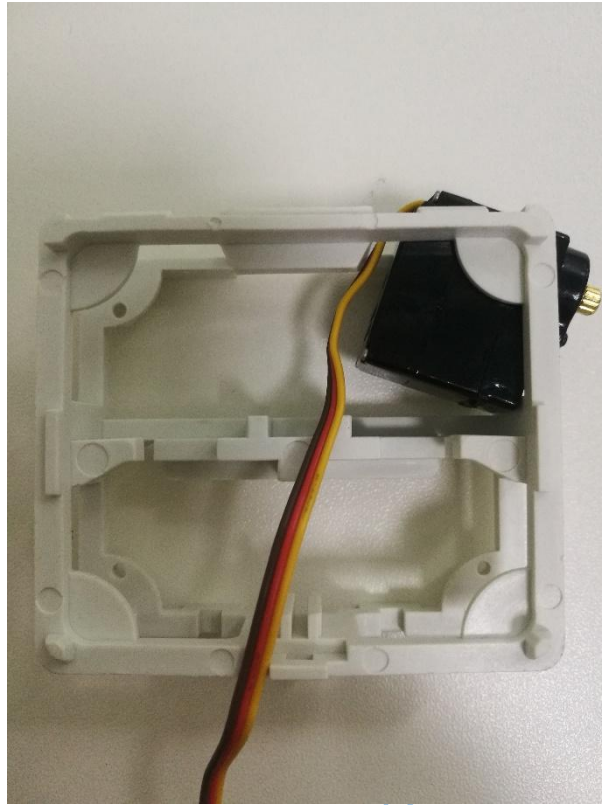
Name	Q'ty
body_middle	1
servo_bracket	2
servo_bracket_mirror	2
Servo Motor	4
Finished Head	1
Control Board with Power Supply	1

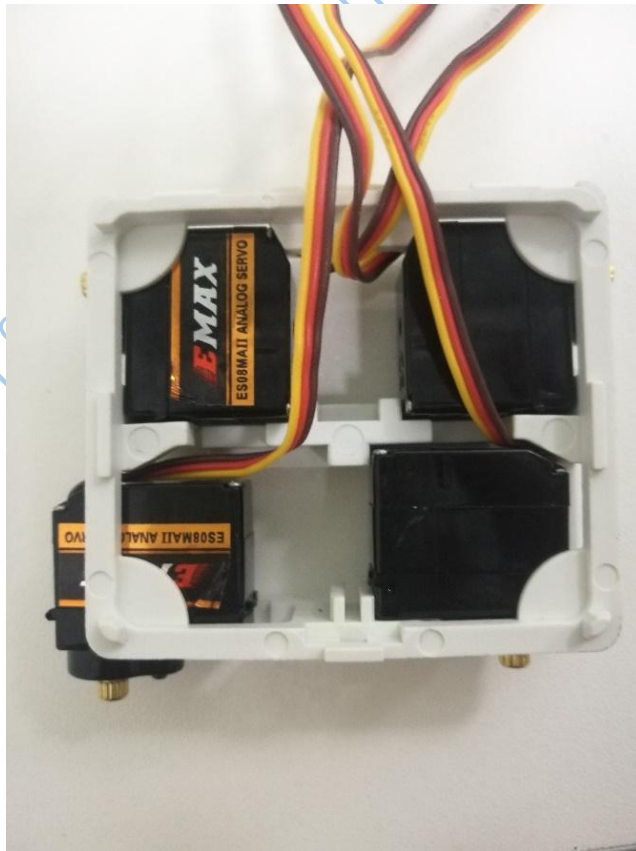
Assembling Steps

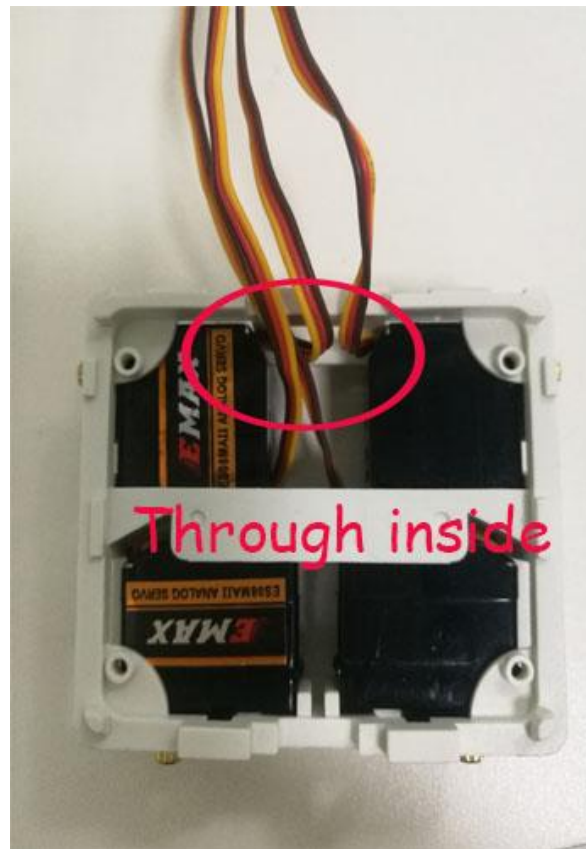
Parts List



Attach Servos



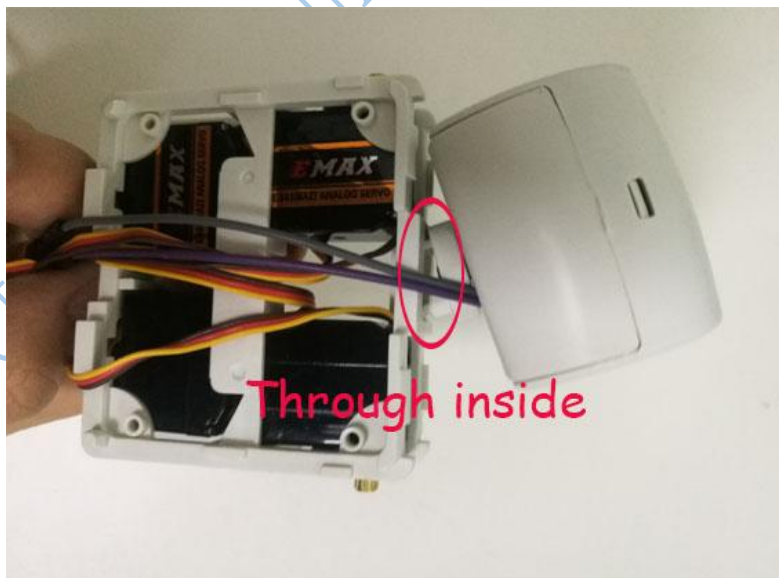




**Attention!:** Servos' cables are passed through inside the body's gap.

**Attach the Finished Head**

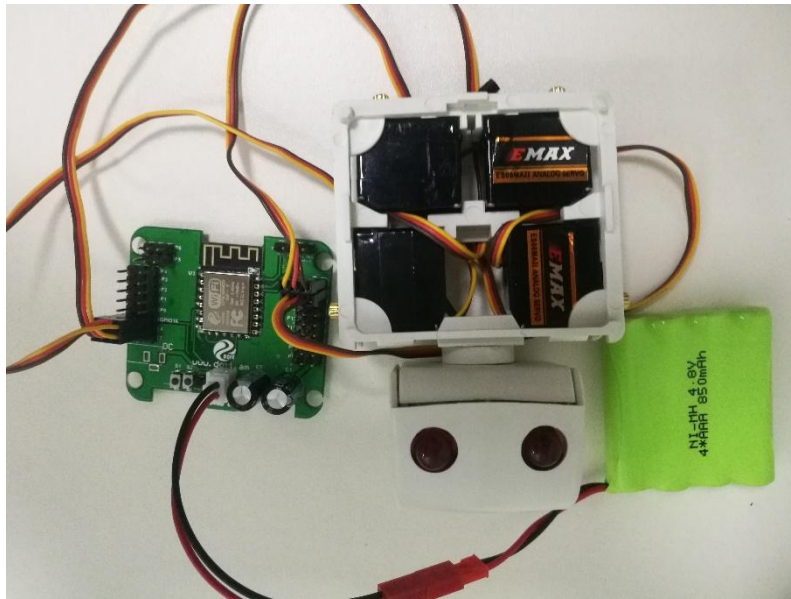
**Attention!:** Head-board's cable is passed through inside the body's gap.



**Attach the Control Board**

**Attention!:** Control-board's cable is passed through inside the body's gap.

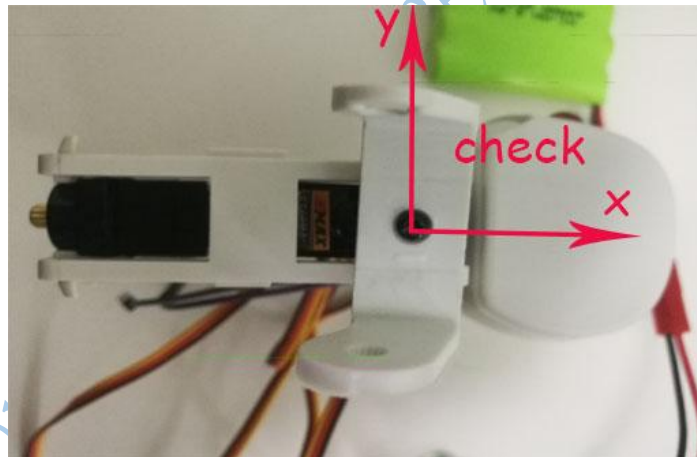




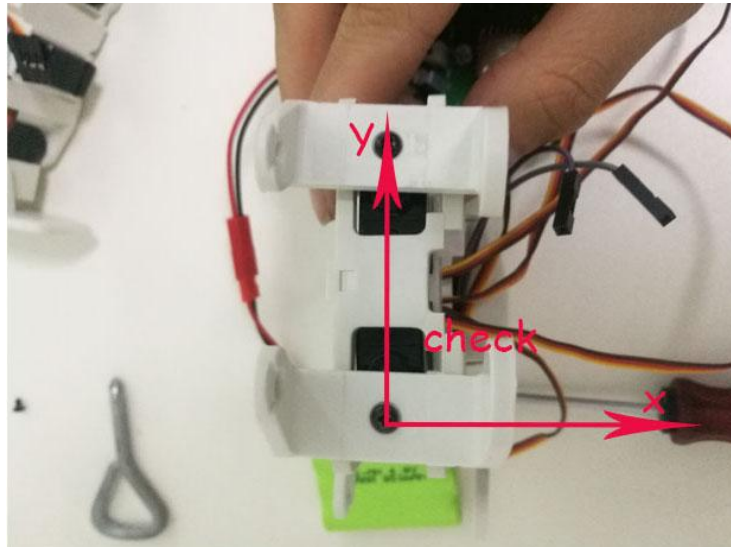
## Attach the Brackets

**Attention!:** Before to attach the brackets, you should connect servos' cables with the control-board. When it was done, please turn on switches and keep the status.

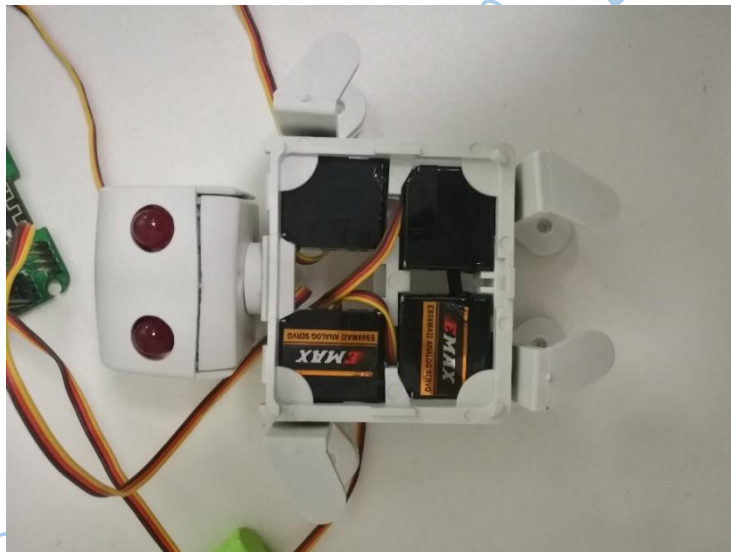
**Attention!:** Attach a servo-bracket to the body. In this step, please make sure the servo-bracket is placed approximately parallel to edge of the body.



**Attention!:** Attach a servo-bracket (mirror) to the body. In this step, please make sure it is placed approximately parallel to edge of the body.



**Finished Body**

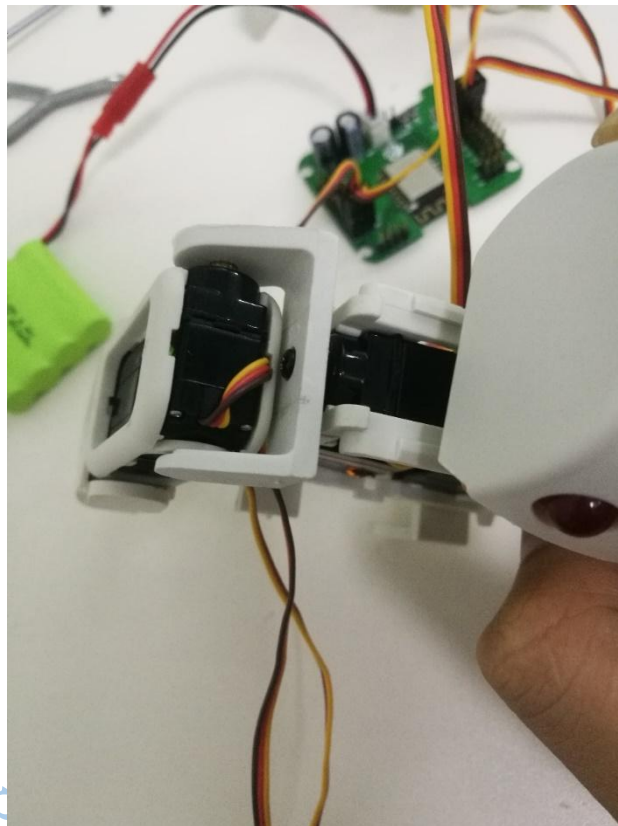


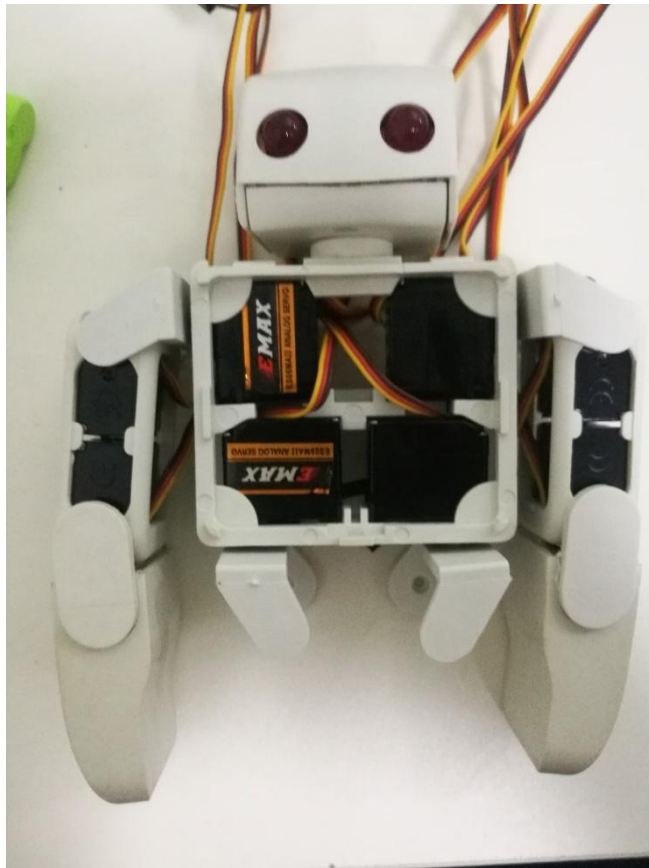
# Merge the Parts

## Assembling Steps

### Attach a Fineshed Arm

**Attention!:** Before merging the parts, you should connect servos' cables with the control-board. When it was done, please turn on switches and keep the status.





## Attach a Finished Leg

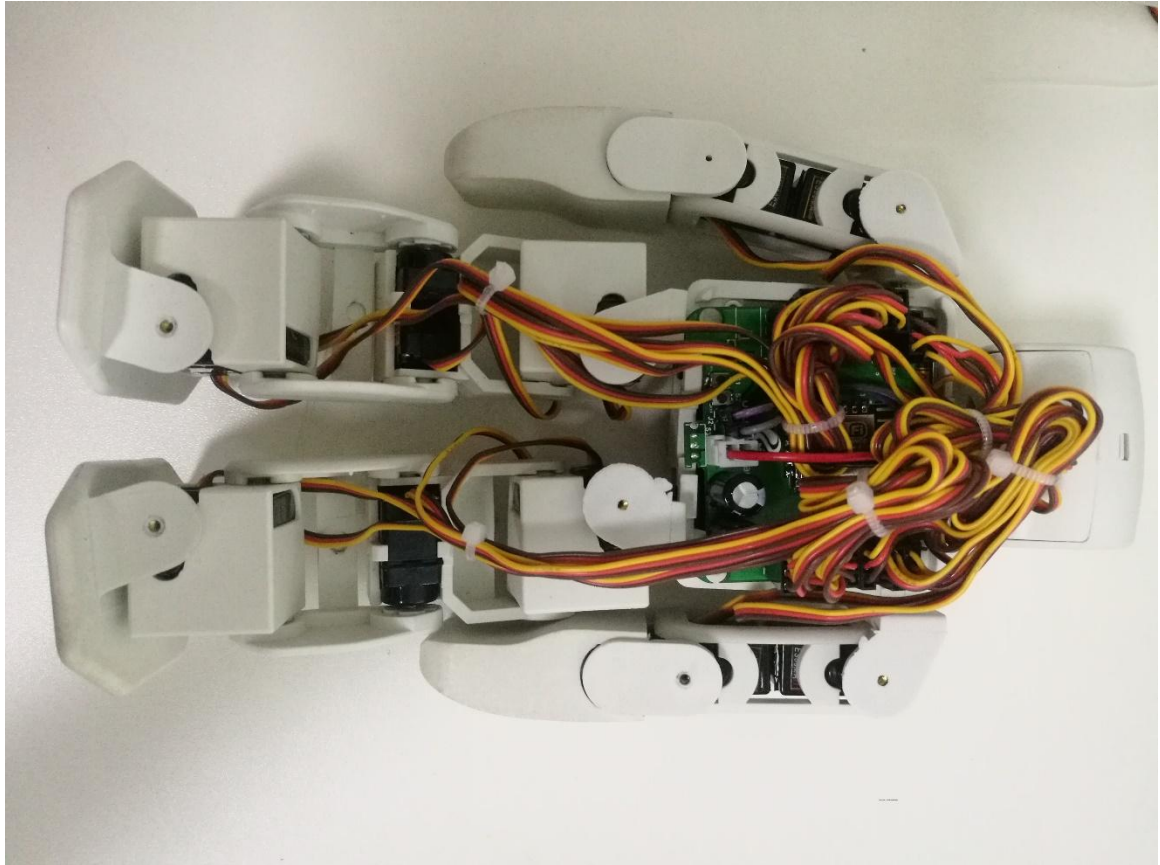
**Attention!:** Before merging the parts, you should connect servos' cables with the control-board. When it was done, please turn on switches and keep the status. Attach a servo-horn to the thigh. In this step, please make sure it is placed approximately parallel to edge of the servo.



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## Finished To Merge



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## Attach Covers

### Parts List

Name	Q'ty
body_front	1
body_rear	1
Finished To Merge ViVi Robot	1

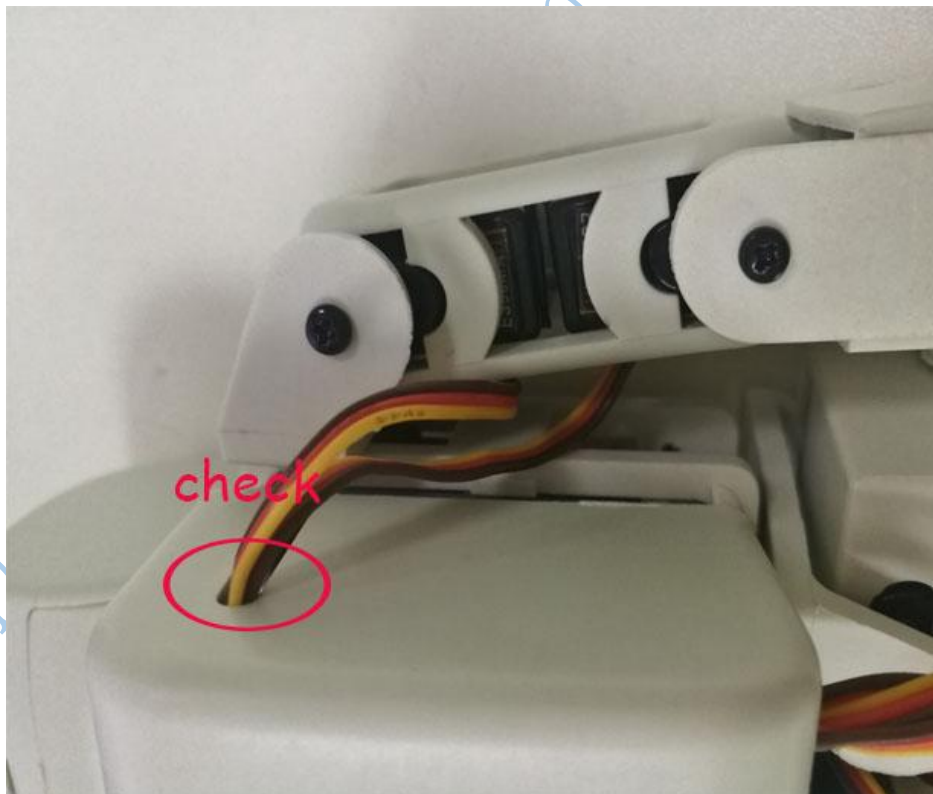
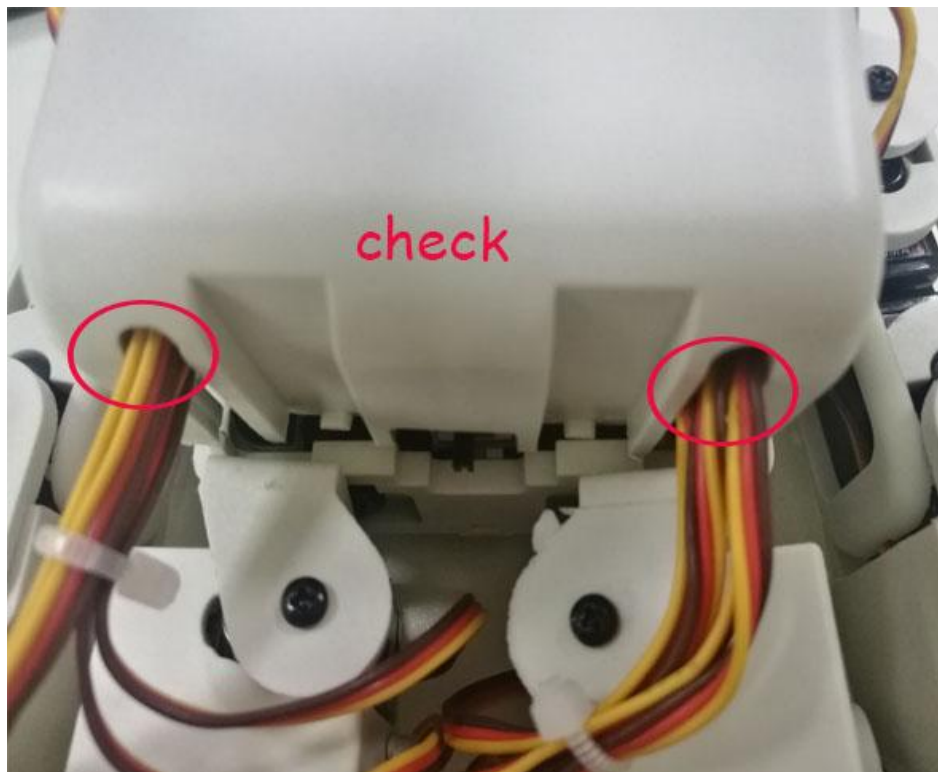
### Assembling Steps

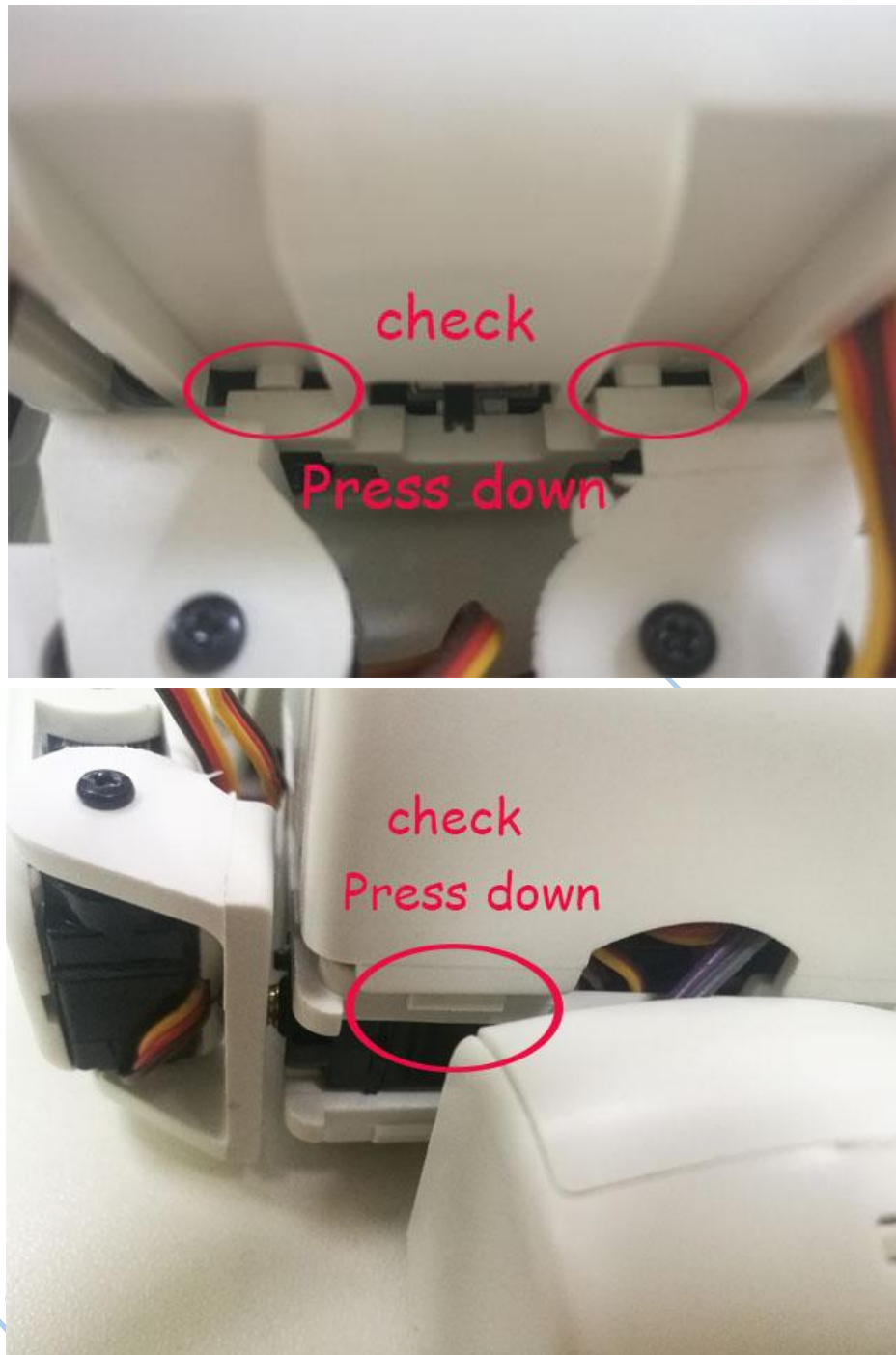
#### Parts List



#### Attach Back Cover

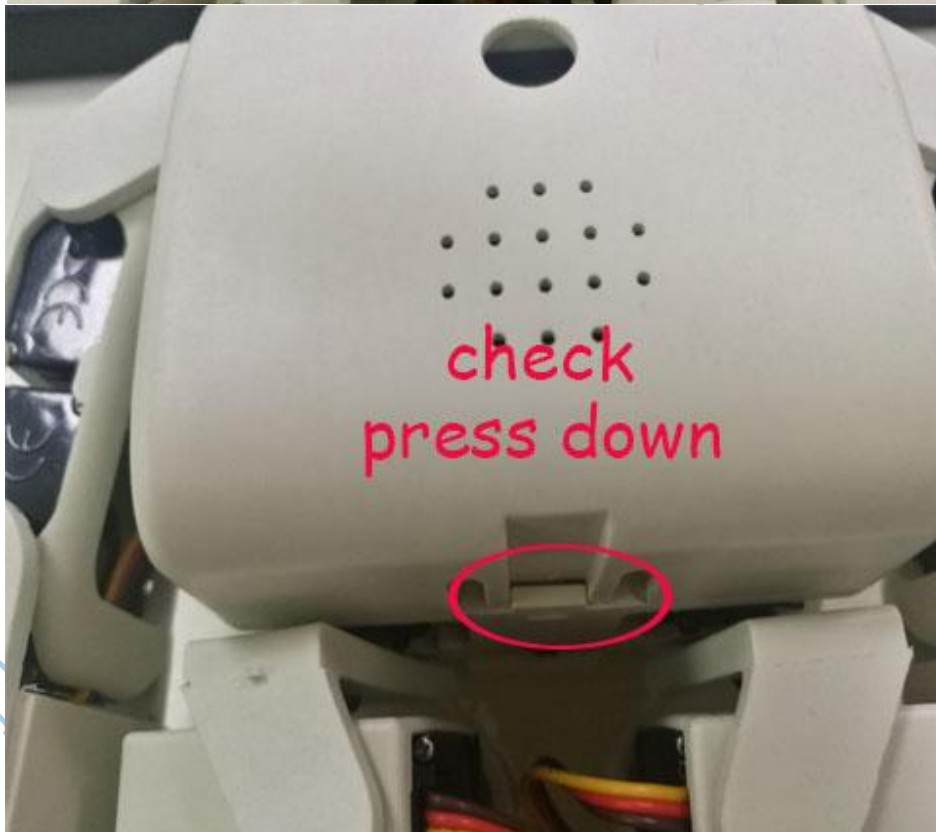
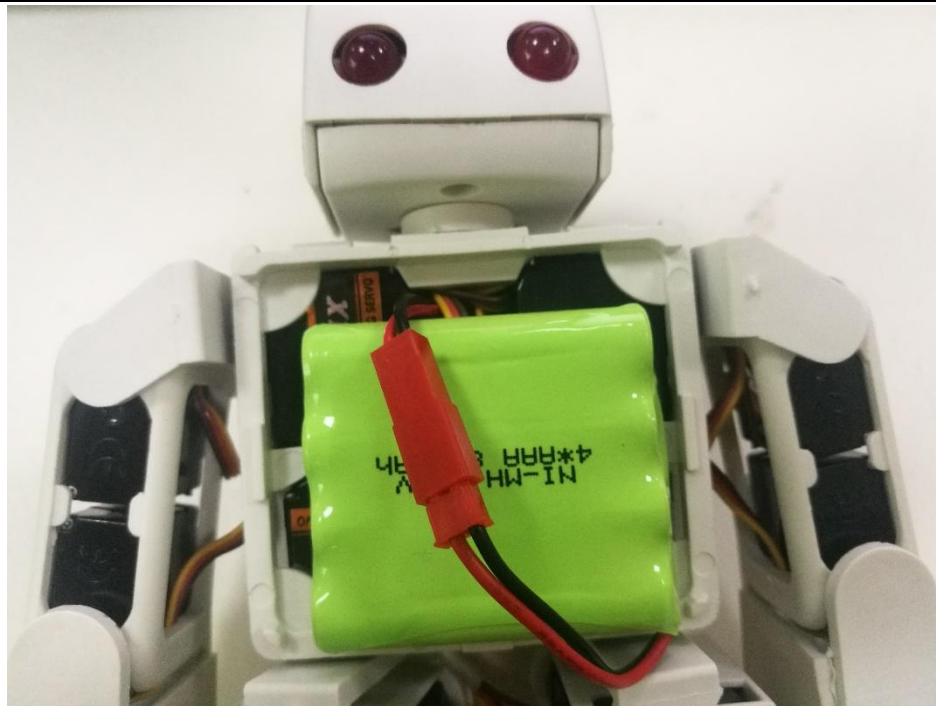
**Attention!:** Please bundle servos' cables and fit the gap on the back.



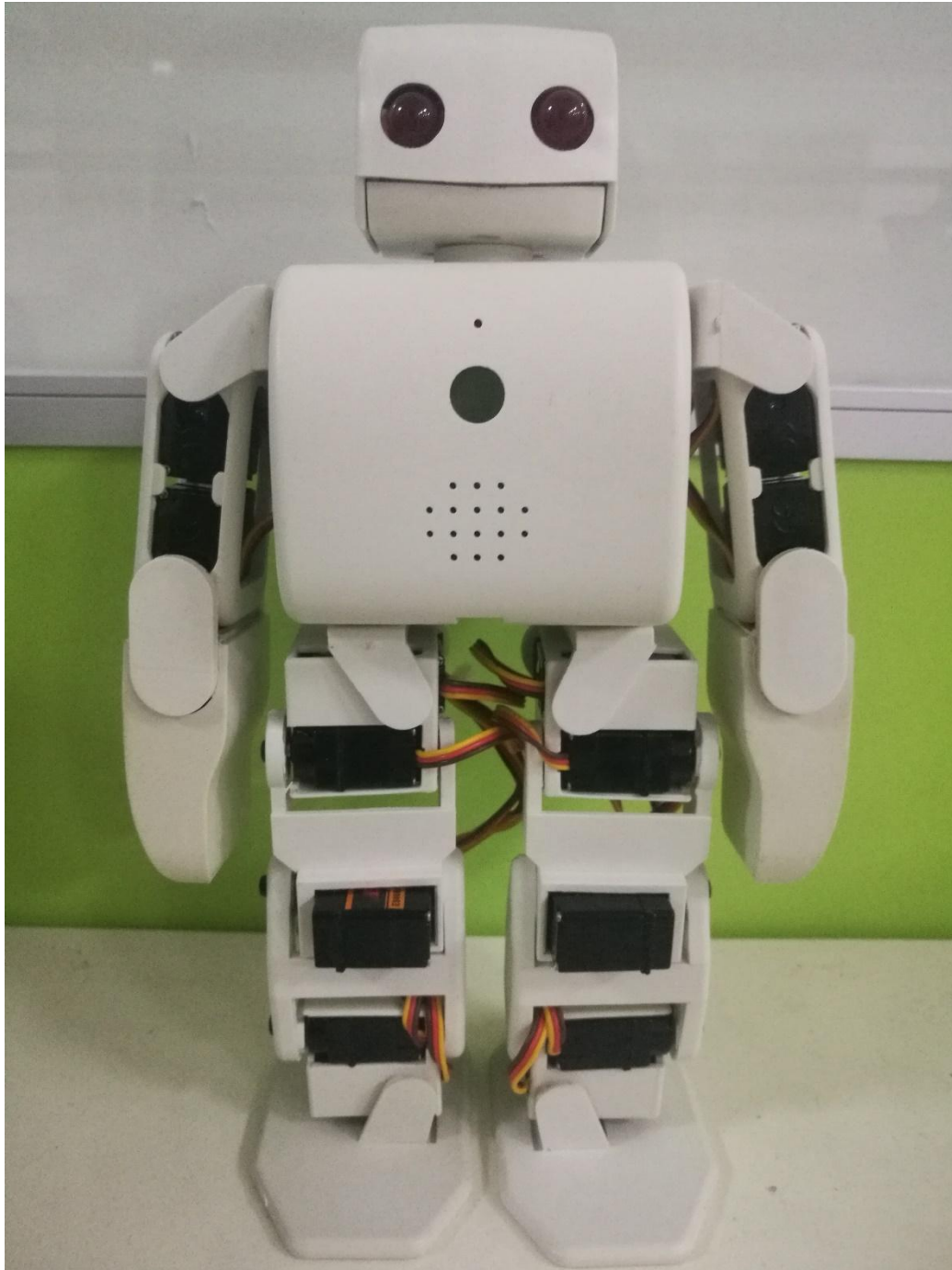


**Attach Chest Cover**

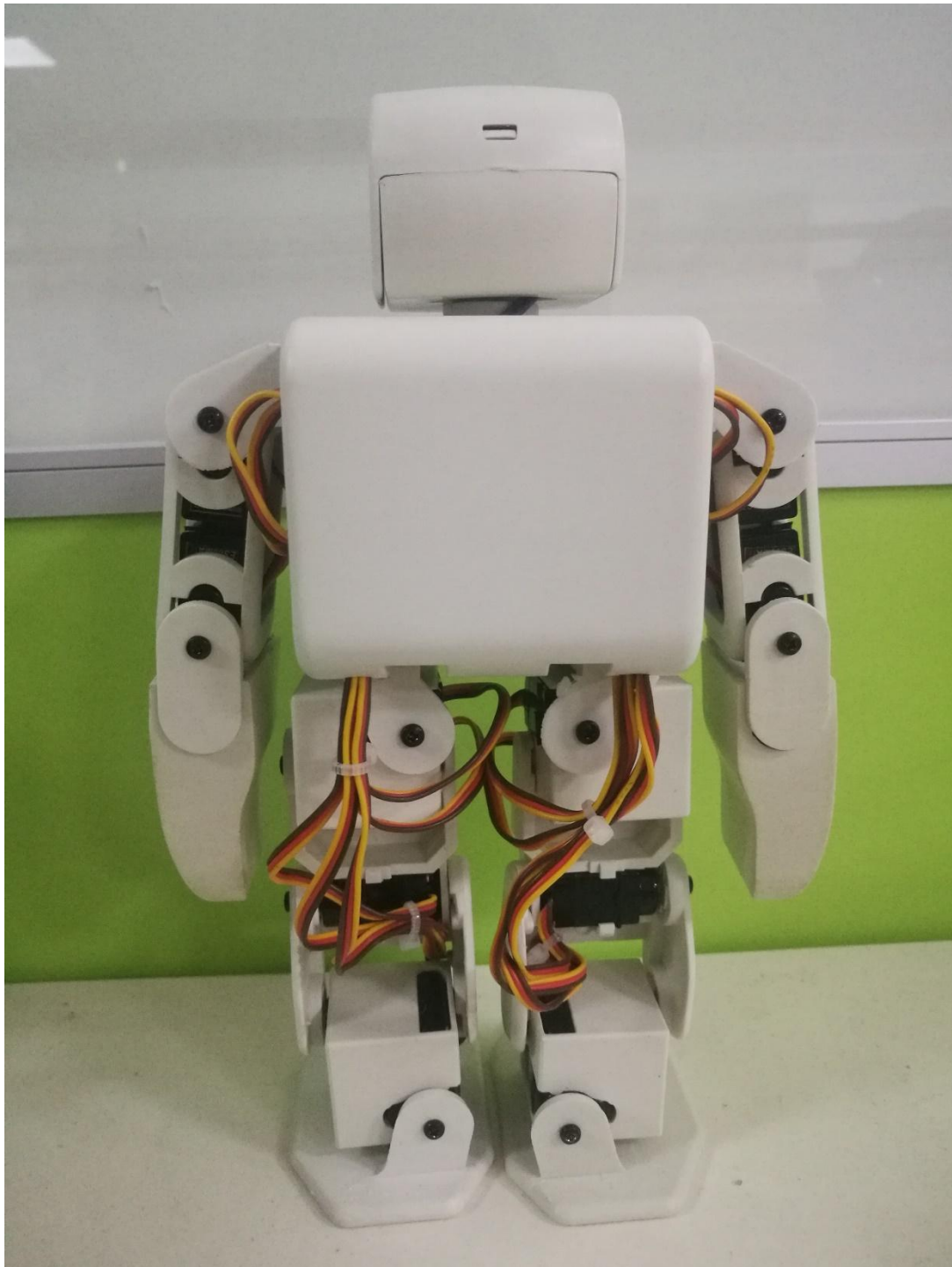
**Attention!:** Please fit the battery's cables gap inside the chest.











# Tuning Up Home Positions

## Preliminary Arrangements

To configure ViVi-Robot's home positions, you have to download firmware for robot MCU first.

## Tuning Up Process

1. Download latest version "[viviRobot firmware](#)" or download The latest bin files.

Download and install robot App for Android or IOS device.

Android App download links:

- <https://play.google.com/store/apps/details?id=jp.doit.scenography&hl=zh-CN>
- <https://www.pgyer.com/qIYq>

IOS App download link:

- <https://itunes.apple.com/us/app/vivi-robot/id1255421040?l=zh&ls=1&mt=8>

Learn more:

- <http://plen.jp/playground/wiki/tutorials/index.html>

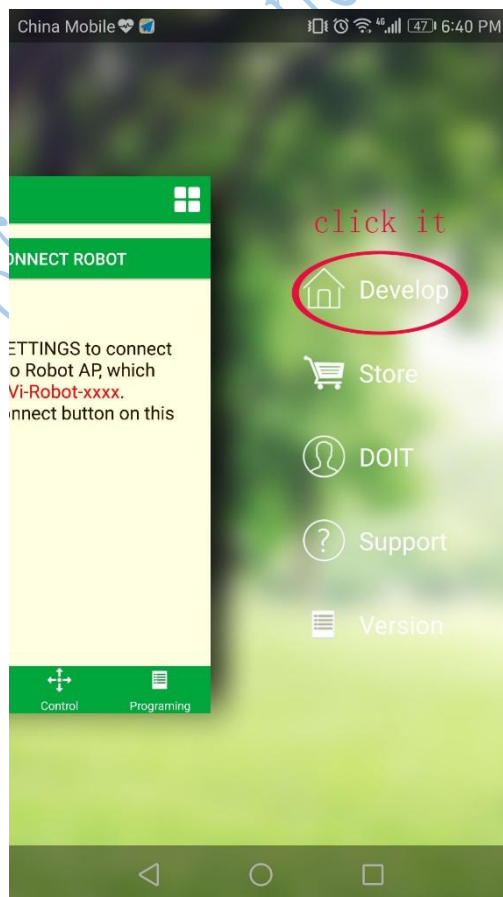
2. Connect to robot

The Robot works as AP. When ViVi Robot power up, wait for about 5 seconds, you can connect to the Robot AP with your phone by changing WiFi SSID to the Robot AP, whose SSID shown as "ViVi-xxxx"; default password: **123456798xyz**

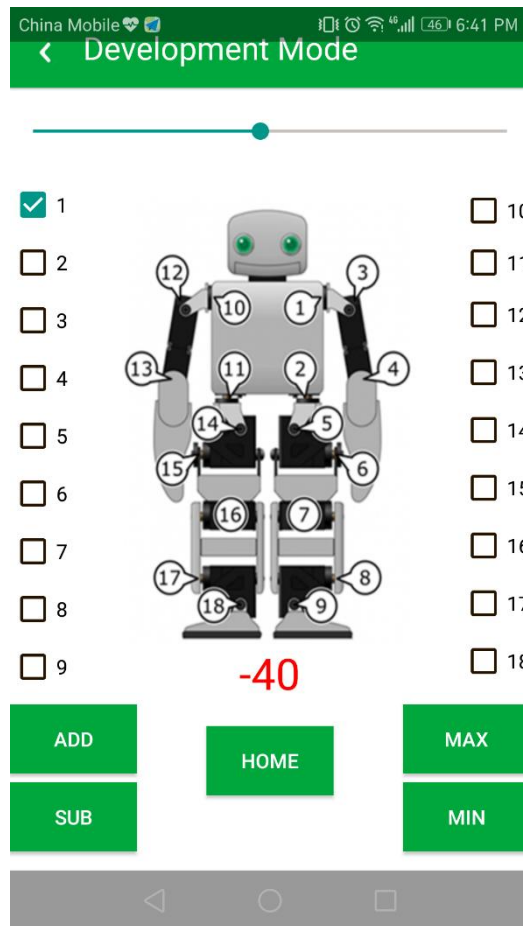
3. Robot Control

When your phone connect to the Robot AP successfully, run the App to connect with the robot by clicking the "connect robot" button on App. After the robot is connected with the App, you can go to the controlling/programming page on App to interact with the robot.









- Please move each servo's sliders until ViVi Robot will be standing straightly.
- If you click "**HOME**" button, a home position is saved. (You may not configure min and max position basically.)