## mini T100 tank car chassis

## Installation Manual



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## 1. Material

Material list:



Note: There are 1pcs driving wheel, 1pcs bearing, 1pcs motor, 1pcs beam, 1 part of stents, 1pcs caterpillar, a set of wrench tools and the corresponding screw copper pillars on the graph. But in fact, the material quantities of mini T100 is adding up the total number of individual \* Numbers in the graph. For example: The total number of motor is 1 \* 2 = 2pcs.

## 2. Installation steps:

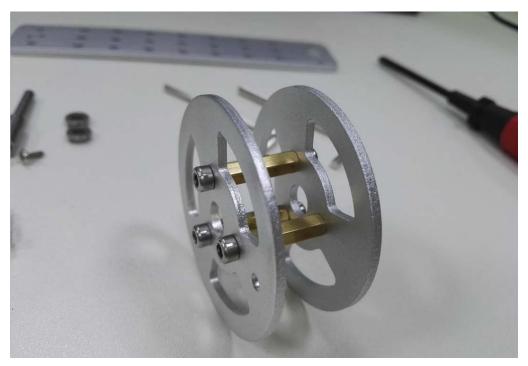
1 install bearing wheel



Install the bearing wheel in the round hole of the yellow circle



use the M3 \* 8 inner hexagonal screw to lock the load-bearing copper column on two side



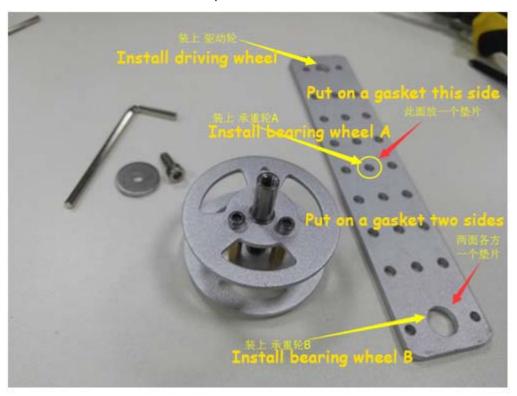
fixed bearing wheel copper column on two sides



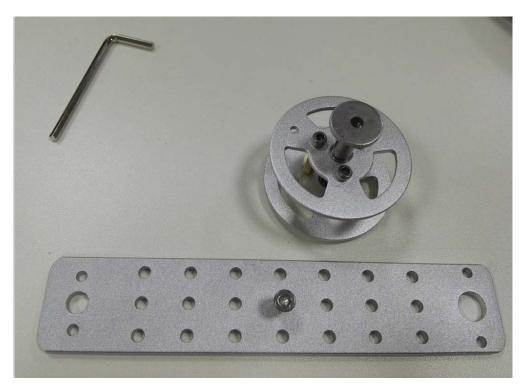
Place the bearing on both sides of the central round hole of bearing wheel



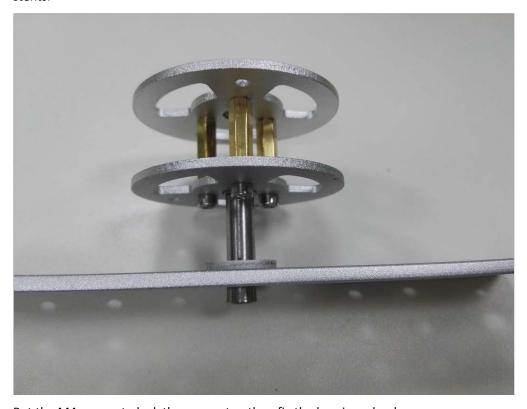
Use the M2 screw to lock the connector through both sides of the bearing, Pay attention to the connector from the bottom to the top.



Install the bearing wheel A into the circle mark on the stents.



Place the gasket on the connector, short M4 hexagonal screws pass through the other side of the stents.



Put the M4 screws to lock the connector, then fix the bearing wheel.

1 install driving wheel



Note that the two central holes of each wheel are different.



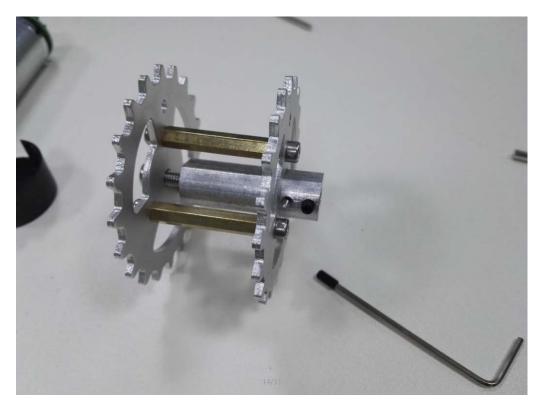
Same as bearing wheel, Start with the M3  $^{*}$  8 inner hexagon screw on each drive wheel and lock the drive wheel copper column



use the M3 hexagonal screw to lock the copper column on both sides, notice the two positioning holes should correspond, otherwise the gears on both sides will be deranged.



Pass the coupling from one side of the big central hole of the driving wheel, and the other is inserted into the long M4 hexagonal screw, lock



Use a small wrench to temporarily fix the top wire to a small round hole in the coupling, Notice that this is just a little bit of spinning

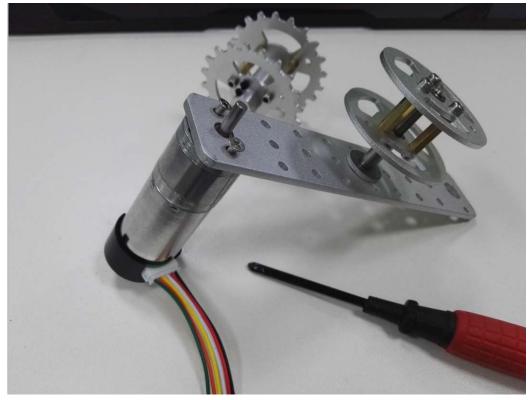
2 Load the drive wheel into the motor



Material graft



The motor cap is mounted on the motor, and plugged in motor line.



Pass the rotor of the motor through one end of the stent (smaller)

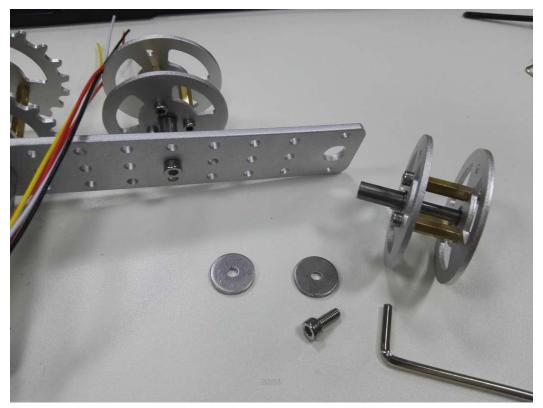


Lock the motor with 2 M3 flat head screws

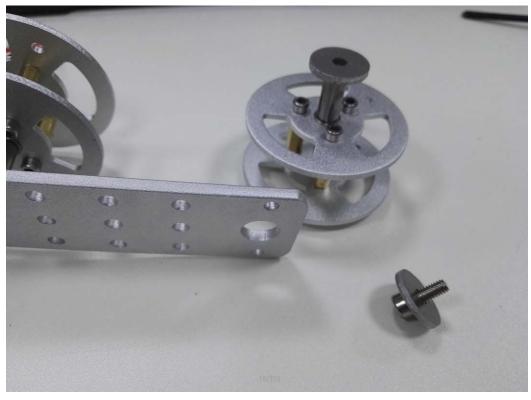


Install the coupling of the driving wheel to the motor shaft, adjust the position of the jackscrew hole to the flat of the shaft, tighten the jackscrew.

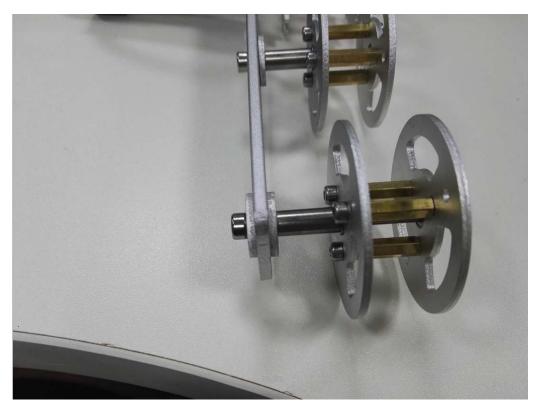
③ Install another bearing wheel



The bearing wheel B needs two gaskets

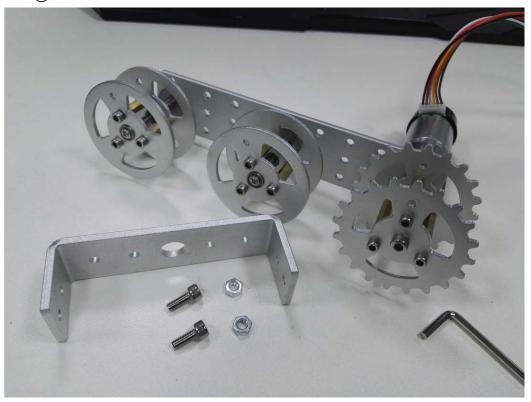


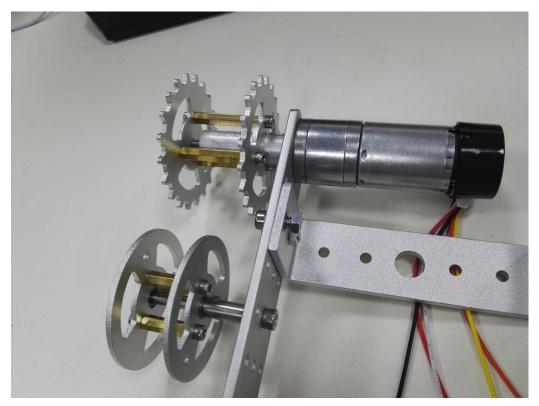
Put 1pcs gasket on th connector, pass the short M4 hexagon screw through another gasket



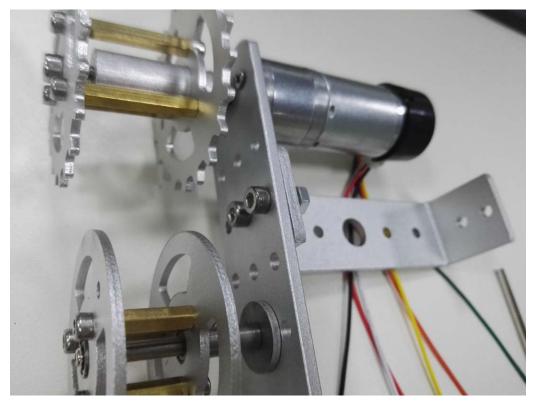
The short M4 screw passes through the center of the round hole at one end of the stents (the larger one), lock connector

4 Install the beam



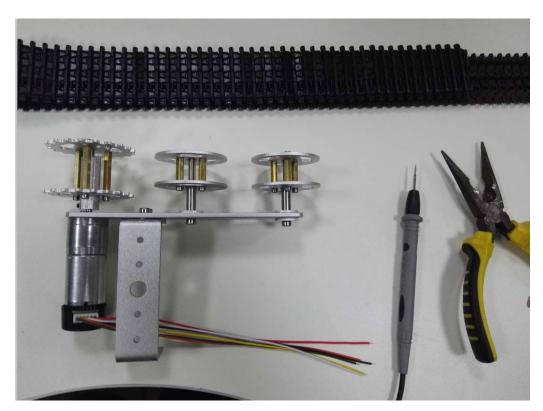


Two short M4 hexagonal screws are used to pass through the round hole of the stents and the round hole of the beam. Then lock it with the M4 nut

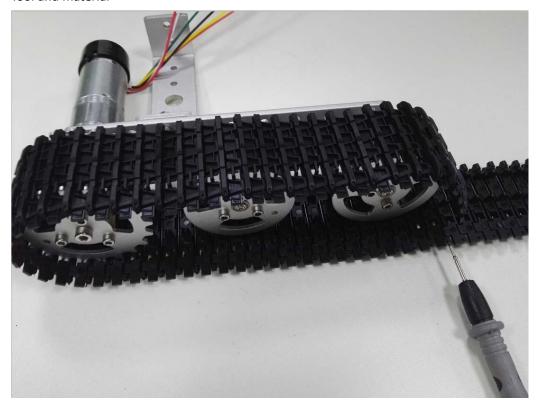


The effect of locking the corresponding hole

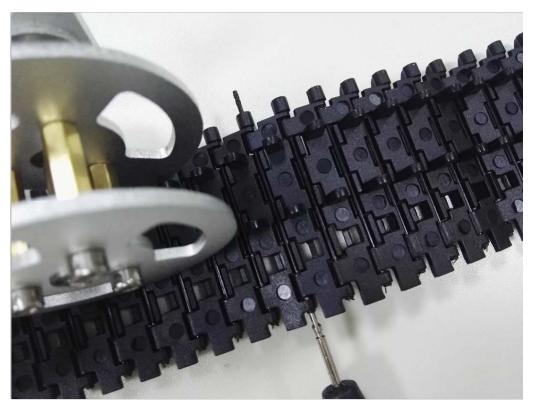
(5) Install the caterpillar



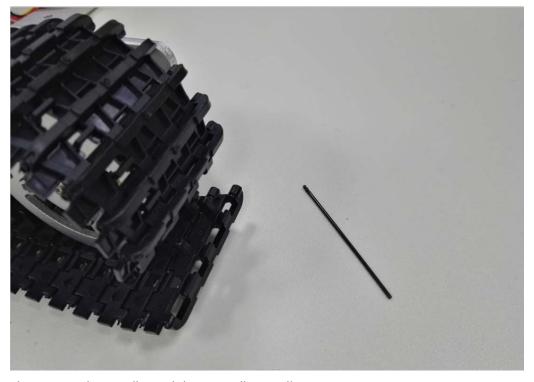
Tool and material



Put the broken track on one side of the wheel to know the length, use a meters pens to intercept the position.



Use the meters pens to put the Caterpillar needle from the concave end, intercept the caterpillar



The truncated caterpillar and the caterpillar needle



Put on the caterpillar, The caterpillar needle is inserted into the caterpillar through the raised end. Pay attention to the rough end of the caterpillar needle left outside.

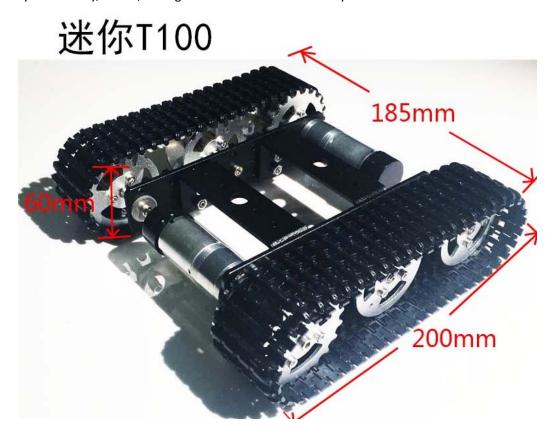


After the caterpillar holes alignment, insert the caterpillar needle from one end to the whole, tighten.



(6) Install the another part of tank chassis

The other half of the installation is the same as above, Notice that the two parts are centered symmetrically, that is, the right and left motor are skew symmetric.



## 3. Motor connection



This motor has Hall sensor, which can measure the velocity, and give out a feedback. If let the interface (or plug) face to our face, from left to right, the interface meanings are VM (power for motor), GM (grand for motor), V (power for Hall sensor), G (grand for Hall sensor), S1 (the output signal for the 1<sup>st</sup> Hall sensor), S2 (the output signal for the 2<sup>nd</sup> Hall sensor)



where, VM and GM are connected to motor, V and G is the power for sensor, S1 and S2 are the output signal.

# 4. Reminder

Video of installation:

http://v.youku.com/v show/id XMjg0MDkyMzkxNg==.html?spm=a2hzp.825386 9.0.0