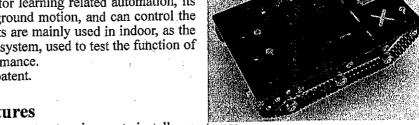
TIANC

Caterpillar chassis

DD1-1 Caterpillar vehicles operating instructions

Introduction

The chassis is the controlled object for learning related automation, its main function is to realize the indoor ground motion, and can control the direction and movement speed. Products are mainly used in indoor, as the controlled object of automation control system, used to test the function of the automatic control system and performance. This product has obtained the national patent.



Range of application Features

- controlled object
- teaching AIDS
- electronic manufacture
- product second development
- other applications

- compact structure is easy to install, easy to use
- modularization, easy to tear open outfit, outfit, and modified
- parts standardization
- standard 2.54 spacing pin type port
- scope of supply voltage: DC 5 V ~ 9 V

Warning: this product can be only used below the elevation 1500 meters indoor or the general outdoor 5 $^{\circ}\mathrm{C} \sim 35$ °C, cannot be used in the wild. Products without the application of industrial grade and above level test, only in the field of civil general indoor and outdoor environment as well as the corresponding places, products do not have the function of waterproof and wading, when using do not touch water.

Product can not be used in heavy industry, strong electromagnetic environment, radioactive, toxic environments, high temperature and low temperature environment or more harsh environment and place, and high reliability (chemical, biological, medical, disaster prevention and mitigation, etc.) of the application is not applicable.

Pin description

- GND: Power supply reference to (cathode)
- VCC: Positive (DC5V 9 v voltage range, power supply current is 1.5 A or higher)
- IB: Motor steering control B side (side A and side B level do not can control motor and reversing, at the same time level phase motor stalling) at the same time
- IA: Motor to control A side (A, B two terminals can input logic level of 3.3 V to 5 V)
- SPEED: Motor output light code disc (speed, track driving wheel turn every week 480 pulse output)
- 6. GND: Power supply reference to
- 7. M.P-: Motor negative input terminals
- M.P+: Motor positive input terminals
- VCC: Power positive
- * Factory M.P short to GND, M.P + sub VCC, motor from 1, 2 feet take electricity

Aterpillar chassis use

After opening the package should be in accordance with the "caterpillar vehicles assembly instructions, check related matters, and are assembled according to the requirement. After the completion of the assembly can be in accordance with the above instructions and connected to the control system of the user.

Product of form a complete set of roof is the user control system installation, power supply, sensor devices such as platform. Roof using acrylic (PMMA) material of environmental protection, before use, please tear protective film on the surface of the division.

Appearance parameter(unit: mm mm)

Chassis chassis length: 200 mm + / - 5 mm width: 125 mm + 8 mm chassis height: 20 mm + / - 5 mm Chassis weight: 420 g (g) chassis weight: 2.0 Kg (Kg) (4.4 ounces) or about 4.4 pounds,

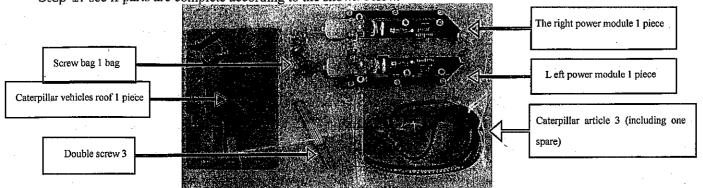
Special instructions

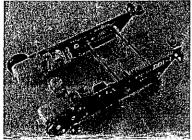
This manual or due to production technology and product improvements, the influence of the upgrade to do with the product function, performance, match exactly .If users are found in the process of using the product specification and product function, performance, there are big difference effect, please contact your supplier or retailer, also can contact with us. We will solve the problem of corresponding technical and after-sales for you. The data above everything carefully check, if you have any printing errors or misunderstandings on the content, the company reserves the final interpretation; Products such as technological improvement, manual update, etc., without prior notice. Product appearance, color, material change, please in kind prevail.

Caterpillar chassis

DD1-1 Caterpillar vehicles assembly instructions

Step 1: see if parts are complete according to the shown below.





Step 2: Referring to the following figure around the power module with double screw and nut. Note: before you tighten nut tighten nut after two power module level. In case of caterpillar contact with the ground bad result in skid.



Referring to the following figure will be tracked in a driving wheel and bearing wheel. Don't pulling on track, if the track installation time is tight to motor at two fixed screw loosening, again a little bit move the motor to the plate. Crawler assembly After driving wheel to turn the red see if run smoothly, if the driving wheel twisted, please check whether the motor at the back of the grating card on the black sensor, if stuck to the motor to twist the opposite direction Under Finally will pick up pieces of the four metal angles of suction cups.

Step 4:
The roof mounted on the frame with screws and nuts. In prior to installation of roof protection on the surface of the upper and lower two torn off. Protective film is to prevent the roof was scratched in the process of transportation, assembly after they shall be torn off, in order to avoid bad shadow after sticky to the users.

Step 5:

Electric testing mechanical and electronic drive and measurement Speed capability. Please check the "GND" before electricity "M.P +" and "VCC" both "M.P +"If there is a jumper cap on the terminal. If there is no Please use wires to the corresponding two groups meet in a terminal Up. Use wires to connect DC5V - 9 v power supply On the "GND" and "VCC. The VCC Positive, "GND" connect power negative. Power supply current is greater than 1.5 A. In the "IA" "IB" two loading different terminals Level when the motor should be positive and negative. If the load is the same level of the motor will stop. Measured with universal measuring terminal "SPEED", observe the multi-meter displays and then turn the grating plate at the end of the motor, when rotating grating disc multi-meter voltage will change. The faster the speed change is not obvious, such as the need to look at the motor run at full speed of the signal, please use the oscilloscope.

