

MXDTR-2410A

DC digital tension regulator

直流数显张力调节器



产品概述

Product Overview

该产品主要用来代替传统的张力板，通过0-10V电压信号转化0-24V强电压驱动负载，由于该产品是通过电源芯片控制MOS管的导通角，来调节24V电压高低，从而实现可调压作用，故产品的寿命和稳定性大大高于传统的张力板。

广泛应用于绕线机，磁粉离合器张力控制、纺织机械、印刷机械、化工机械、食品包装机械、喷绘机械、绞线机、冲版机及需要对直流电机/直流风机进行无极调速的场合。

The product is mainly used to replace the traditional tension board, through 0-10V voltage signal to convert 0-24V strong voltage drive load, because the product is through the power chip to control the MOS tube turn-on Angle, to adjust the 24V voltage level, so as to achieve adjustable voltage effect, so the product life and stability is much higher than the traditional tension board.

Widely used in winding machine, magnetic powder clutch tension control, textile machinery, printing machinery, chemical machinery, food packaging machinery, inkjet machinery, wire stranding machine, plate punching machine and the need for DC motor/fan stepless speed regulation occasions.



工作条件

Working condition

- 电源输入：24V直流电源供电，电源功率需大于磁粉离合器最大功率；
- 调节方式：手动控制：借助3-10K电位器；自动控制：由张力传感器将张力信号转换为电压信号0-10V，再由张力调节模块转换为大功率0-24V信号驱动磁粉离合器。
- 输出信号：0-24V电压输出，无散热器情况下最大电流4A，加散热器最大电流可达10A；
- 使用环境：工作温度：-10℃~60℃，存储温度：-40℃~85℃，相对湿度：-5℃~95℃不结露。
- Power input: 24V DC power supply, power supply should be greater than the maximum power of magnetic powder clutch;
- Adjustment mode: Manual control: with 3-10K potentiometer; Automatic control: the tension signal is converted to voltage signal 0-10V by tension sensor, and then converted to high-power 0-24V signal by tension regulation module to drive magnetic powder clutch.
- Output signal: 0-24V voltage output, the maximum current 4A without radiator, with radiator maximum current up to 10A;
- Operating environment: Working temperature: -10℃~60℃, storage temperature: -40℃~85℃, relative temperature: -5℃~95℃ no condensation.

产品特点

Product Characteristics

- 数显表显示输出电压；
- 无负载时可调节输出电压；
- 控制信号不接时无输出；
- 控制信号与输出电压成比例输出，线性对称好。
- Digital display display output voltage;
- Adjustable output voltage without load;
- No output when the control signal is not connected;
- The control signal is proportional to the output voltage, and the linear symmetry is good.

注意事项

Matters needing attention

- 本模块底板和散热器接触面应均涂抹一层导热硅脂。
- 5A以上要求加散热器，电流大于10A时，请采用风冷或水冷。
- Apply a layer of thermal grease to the contact surface of the module bottom plate and the heat sink.
- 5A and above require radiator, current greater than 10A, please use air cooling or water cooling.

外形及安装尺寸 / 接线图

Outline and mounting dimensions/wiring diagram (mm)

