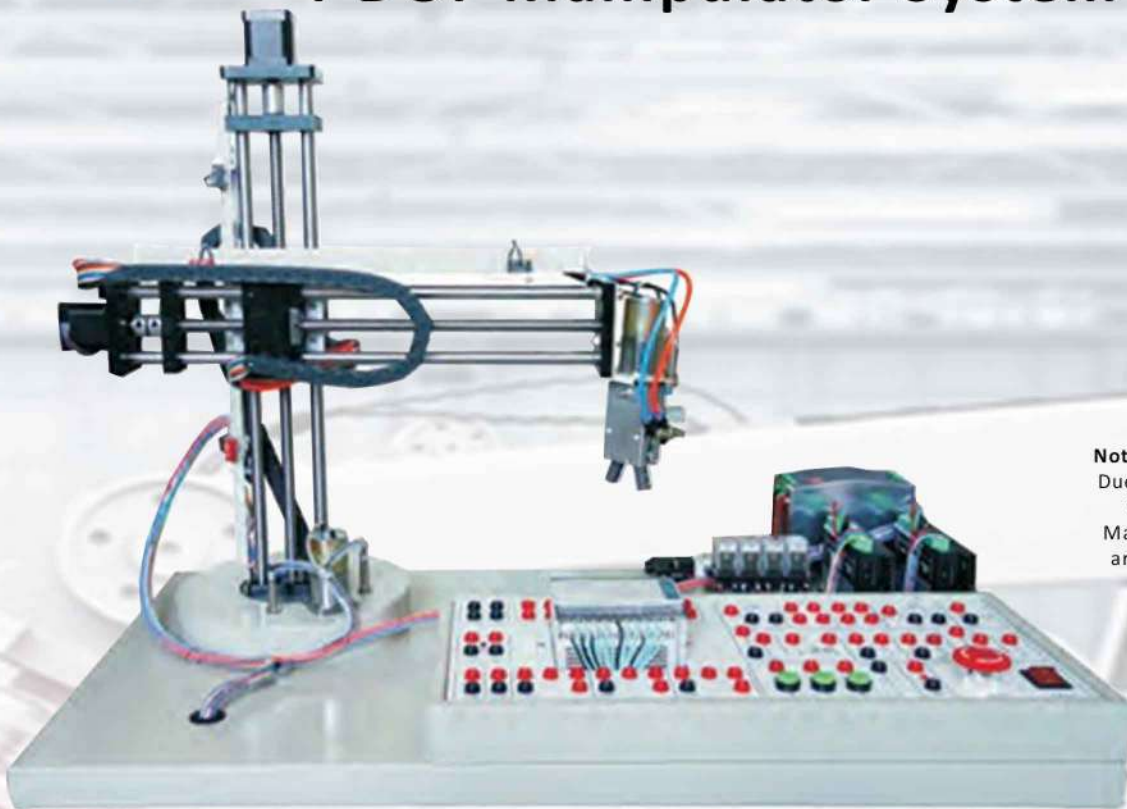




4-DOF Manipulator System Trainer



Note :
Due to keeping innovation,
the specification and
Machine pictures or color
are subject to alteration
without notice!

Equipment Overview

- This trainer is mainly composed of powder coating metal frame, PLC module, mechanical structure, control panel board and so on. The manipulator adopted is coordinate type, with four degrees of freedom, that is, horizontal movement, vertical movement, manipulator rotation and paw rotation.
- The PLC adopted is transistor type, it is used for the complex position control of complete manipulator with high strength plastic casing, aluminum- plastic panel and silk printed graphic pattern and letter symbols.
- It covers technologies such as stepper motor driving, mechanical transmission, pneumatic, programmable logic controller and sensor technology, which provides a wide and comprehensive training environment for students.
- High precision ball screw is adopted for the mechanical drive of manipulator horizontal axis and vertical axis, stepper motor is adopted as the power source, which can achieve the subdivision of 0.45 degree. The horizontal rotation is driven by DC gear motor, which is equipped with photoelectric sensor and coded disc. The manipulator paw is equipped with electromagnetism position switch and 3/2 way solenoid valve, which is high in precision.
- The manipulator rack is made of aluminum steel, the axles are made of oxidation treated aluminum profile and the base and side part is made of 1mm stoving varnish treated steel plate.
- All interfaces for PLC, motors and electrical components are connected with safety socket.
- Safety protections: grounded, lead protection, safety in accordance with related standards. Insulated safety sockets, sheathed cables and wires.

Training Content

- Sensor technology application
- Pneumatic technology application
- Programmable logic controller technology training
- System maintenance and fault detection training
- Automatic control technology training
- Mechanical system installation and debugging
- Electrical control circuit training

Technical Parameters

1. Power supply: AC 220 V $\pm$ 10%, 50Hz
2. Temperature: -10~50°C, Below RH90%
3. Overall power consumption: $\leq$ 1.0 kVA
4. Dimensions: 500mm $\times$ 820mm $\times$ 600mm (approx.)