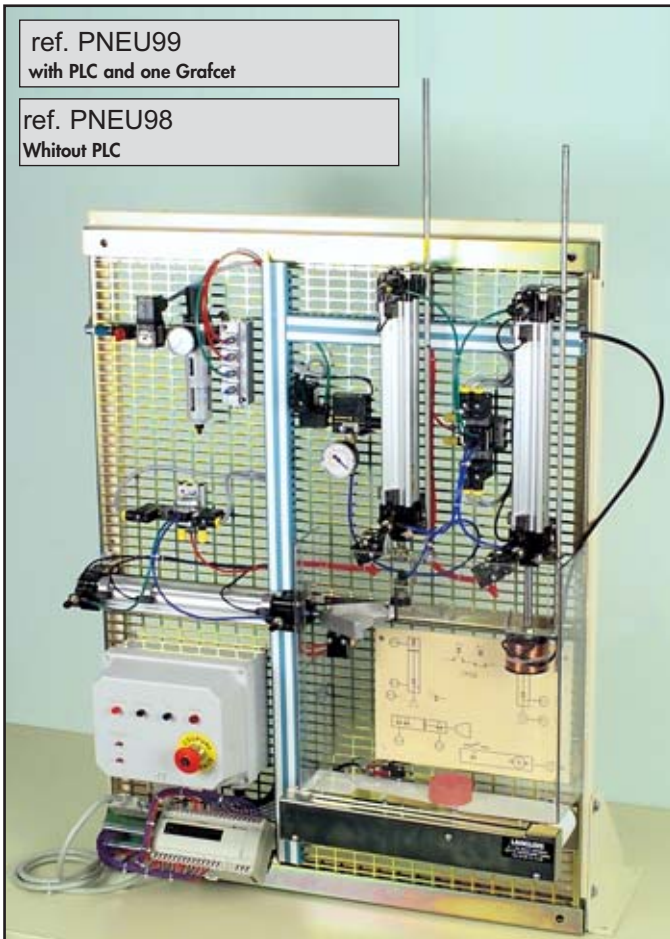


Pneumatic handling line

ref. PNEU99
with PLC and one Grafset

ref. PNEU98
Without PLC

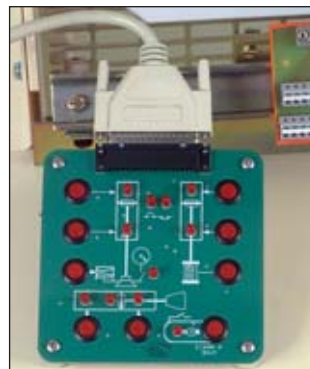


GENERAL CHARACTERISTICS

This line with conveyor belt allows the introduction to pneumatic components to be combined with programming on any automated system (in positive or negative logic). A manual control box delivered with PNEU99 can be connected to the input-output socket in place of the PLC. The manual control box drives the actuators and shows the state of the sensors. It thus facilitates the purely pneumatic study of the components, the problems linked with speed of displacement, cushioning the end of travel, control of rate, needle screw, accuracy of magnetic detectors etc.

A manual gives details of the operation of all the electro-pneumatic components used and their adjustment. Several cycles are described, including one complete with its grafset.

ACCESSORIES SUPPLIED



MANUAL CONTROL BOX

This box contains 9 push buttons corresponding to each actuator and 11 indicator lights which give information about the state of the sensors. It allows very slow observation of pneumatic phenomena and learning about the basic regulation of flow control, actuator speed, and detector positions..

OPERATING CYCLE

The parts placed on the conveyor belt are held by the vacuum suction grip of a first pneumatic jack, then placed on the horizontal jack, grasped by the third jack undergoing a complete handling cycle before being returned to the belt.

PNEUMATIC COMPONENTS

- 3 double effect pneumatic jacks Ø32mm.

Travel 250mm, each equipped with:

- flow reducers allowing fine adjustment of their movement
- magnetic position detectors (2 or 3 per actuator) with LED
- quick-fit joints for Ø4mm tubes

- 2 5/2 electropneumatic distributors
- 1 5/3 electropneumatic distributor

All distributors are fitted with

- 24V DC coils
- LED visual display of the state of the coils
- quick-fit joints for Ø4mm tubes
- fitted on mountings with silencers

- Vacuum generator

One of the actuators is fitted with a suction grip with its vacuum system. An adjustable threshold vacuostat delivers an electrical presence or absence of vacuum signal.

A vacuummeter allows visual checking on the vacuum.

- JACKS PROTECTION

To avoid any risk of destroying a pneumatic jack, an entirely pneumatic logic system (without student access) prevents the simultaneous movement of the horizontal jack with a vertical jack.

ELECTRIC BOX

- Contains a regulated 24V DC 2A source to feed the PLC if necessary if it does not have an internal supply.
- The necessary supplies to the model.
- A Start cycle button, a Stop cycle button,
- an emergency stop. 220V. feed.
- an emergency button stopping the electric and pneumatic supplies.
- The connector with the user connects to the PLC or to the manual control box.

USER'S PROTECTION

A transparent color door is a barrier between the pneumatic jacks and the user's hand. The opening turns off the air pressure

PLC

- 14 inputs / 10 outputs
- 3 languages : Grafset instructions, contacts language, reversible PL7.
- Programming : from a PC using PL7-07 software or from FTX-117 terminal.

OTHER CHARACTERISTICS

The moving mat is either controlled by the automatic system and the end of belt detection switch or by being forced into operation. An electromagnet illustrates picking up by a magnetic field. PNEU99 is delivered on a 1000x750mm chassis with lateral fixing brackets on a table. The model is delivered ready for use (the electric part is completely wired and all the pneumatic connections made). The quick-fit joints allow dismounting/reassembly of pneumatic interconnections with Ø4mm tubes of various colors.

ACCESSORIES NOT INCLUDED

PL7-07 software + PLC/PC connection cable
FTX117 terminal + connection cable + software