

## 16 kN SERVO-PNEUMATIC DYNAMIC TESTING SYSTEM

### B220-01-KIT DTS-16 with manual crosshead

### B220-02-KIT DTS-16 with motorized crosshead

The DTS-16 Dynamic Testing System is a servo-pneumatically controlled testing machine utilizing digital control of a pneumatic servo valve to provide accurate loading wave shapes up to 70 Hz. The DTS-16 can be operated in tension, compression dynamic loading and is suited to testing a diverse range of materials such as asphalt, soil, unbound granular materials, fibres and plastics.

The DTS-16 is underpinned by Pavetest's leading edge CDAS digital controller, TestLab software and a full complement of accessories, hardware and software in perfect unison.

The machine comprises:

- B220-03** 20 kN Load frame with manual crosshead  
or
- B220-04** 20 kN Load frame with motorized crosshead  
(for B220-02-KIT version)
- B220-07** 16 kN Servo-pneumatic actuator (30 mm stroke)
- B206** 16 Channel Control and Data Acquisition System  
(CDAS) & TestLab software (see page 104)
- B270-12** Air reservoir assembly
- B220-01** Load cell ( $\pm 20$  kN)

#### MAIN FEATURES:

- Compact, robust 2-Column load frame
- Precision engineered
- Optional Motorized crosshead positioning
- Fully configurable to suit a large range of testing applications
- Digital Servo-Pneumatic control
- 4 axis control and 16 Channel Control and Data Acquisition System

#### TECHNICAL SPECIFICATIONS:

- **Load frame** Between Columns 345 mm  
Vertical Space 650 mm
- **Servo actuator** Capacity  $\pm 16$  kN  
Frequency up to 70 Hz  
Stroke  $\pm 30$  mm  
Air supply clean dry air  
Pressure 800-900 kPa  
Minimum rate 5 litres/sec

Power Supply: 110/230 V, 50/60 Hz, 2.5 kW, 1 ph

Dimensions: 1020(h) x 450(d) x 500(w) mm load frame  
2100(h) x 900(d) x 750(w) mm with temperature controlled cabinet

Weight: 100 kg without temperature controlled cabinet

#### ACCESSORY:

- B221** Temperature controlled cabinet:  
-20°C to +80°C to suit DTS-16

#### TEST CONFIGURATIONS

#### and RELATED JIGS:

see pages 110 and 111



**B220-02-KIT** 16 kN Servo-Pneumatic dynamic testing system (motorized crosshead) with **B221** Temperature controlled cabinet



**B220-02 KIT**  
DTS-16 detail



**B220-04**  
20 kN Load frame with motorized crosshead

