



Provaset T3LPF

INSTRUMENT FOR FLOW TEST WITH MASS FLOW SENSOR AND FOR LEAK TEST WITH ABSOLUTE PRESSURE DECAY MEASUREMENT



- Flow measurement with mass sensor:
 - ranges up 300 l/min
 - resolution up to 0.01 cm³/min
- Leak test with measure of pressure decay:
 - full scale range up to 6 bar
 - resolution up to 0.1 Pa
- 300 test programs
- 300 test sequences
- Digital I/O interfaces
- USB, RS232/RS485 serial lines for PC and Ethernet



DESCRIPTION

Provaset T3LPF is an electro-pneumatic instrument, designed for air flow tests at a programmed pressure, controlled by an electronic pressure regulator.

In addition to flow tests the instrument is able to perform also leak tests with absolute pressure decay measurement.

The touch interface, with colour display and real-time view of testing, make programming and use simple and immediate.

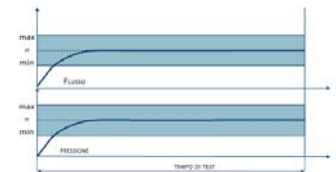
Provaset T3LPF is suitable for use in all industrial segments, on testing benches, production lines or fully automatic systems.

The control of external automations, the interface with barcode, Qrcode readers and printers and the possibility to record the tests on USB memories or via Ethernet make it a complete and suitable instrument for the most modern production methods.

DIRECT FLOW MEASUREMENT

The instrument directly controls and measures the pressure and flow rate of the product being tested (filters, valves, cooktops, exhaust manifolds ...).

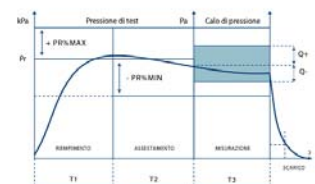
The test can be performed at constant flow.



LEAK TEST WITH ABSOLUTE PRESSURE DECAY

The test cycle is based on the measuring of the pressure decay inside the component being tested, which must be below the set limit to pass the test.

With the electronic pressure regulator is possible to set up customized filling ramps.



CALIBRATION SERVICE

Each equipment is accompanied by a calibration report released by Tecna srl.

According to the requirements of ISO9001 standard, calibration must be verified at specified intervals against national or international test masters.

Tecna srl, through its specialized personnel and certified instruments, offers a complete scheduled calibration service.

TEST

Provaset T3LPF

Rev.04/22

SPECIFICATIONS

Power supply	External 24 Vdc; alternatively 85÷264 Vac, 35W
Compressed air line	Dry, non-condensing, 5-micron filtered, and oil-free air, compliant with ISO8573-1.
A/D converters	24 bits
Calibration	Calibration certificates for pressure and flow sensors Software-guided procedure with sample instruments.
Pressure regulator	Electronic, with dedicated pressure transducer to visualize the regulated pressure on the display
Keyboard	Resistive touch screen
Display	7" colour TFT LCD display with touchscreen
Indicators	4 LED lights (testing phases, pass/reject outcome)
Test counter	Pass and Reject totals, resettable to zero Statistic option: mean value, minimum, maximum, standard deviation, normal distribution, CP, CPK, hour production totals
Audible alarm	Built-in beeper with programmable duration
Clock	Date and time, with supercap, max autonomy 7 days
Programmable parameters	300 testing tables with sequential mode, general parameters, volume calculation to indicate the leak rate in cm ³ /min or cm ³ /h
PLC connections	8 photocoupled inputs and 8 photocoupled outputs Each I/O is fully programmable Control of external automation (coupling, security cage...) without PLC
Data interfaces	Configurable RS232/RS485 USB device interface and Ethernet Protocols: Modbus RTU, CSV ASCII output, barcode, Qrcode, printer
Staubli® Connector	Standard, for Leak Masters
Housing	Unpainted anodized aluminium, ABS

OPTIONS

- 2 programmable pneumatic outputs for external commands (plug/marker)
- Setup for vacuum test
- I/O expansion: adds digital PLC inputs/outputs (8+8) and a RS232/RS485 serial line
- Additional USB, Ethernet, Profibus or CANbus interfaces for remote control and data collection
- Real time SPC statistical analysis
- Software for managing label printer, barcode and Qrcode readers

ACCESSORIES

- Air filters
- Certificated Leak Master to be inserted in the Staubli® connector
- Barcode, Qrcode readers and printer
- Remote control keypad
- 3-colours indicator light with loud sound alert



CUSTOMIZED PROGRAMS FOR PC/HMI TERMINAL

- Software to collect and manage the data of the tests
- Parameter programming and SPC analysis of test data
- Virtual Instrument for National Instruments LabVIEW™ available at request