Vacuum, gas tracer and pressurization units & Leak detectors

iAmiata

Vacuum, tracer gas (H2 or He) mixtures and pressurization unit

iAMIATA is a bench station for mixing Helium and Nitrogen gases and creation of test leaks with rising vacuum, pressure decay and point to point micro leaks detections.

iAMIATA has been designed specifically to perform pressure tests and leak tests of refrigerating units with the use of inert gas or tracer gases such as helium or nitrogen/hydrogen, according to the ISO 10156 Standard; before the charging of the test gas it is possible to perform a vacuum cycle so to get a first cleaning of the unit and to make a preliminary sealing test.

iAMIATA is ideal for the tracing of leaks from components and refrigerating units, on production lines for any kind of appliance, wherever a pressure test or/and a trace gas leak test is required.

iAMIATA can be easily interfaced with the Inficon and Pfeiffer Leak detectors, with complete control of the main functionalities, configuration and report of the leak test over the relevant copper circuits.

iAmiata for pressure stress test

iAmiata connected to leak detector

iAmiata Uno

Touch screen machine Controller

Connections

Functional Characteristics:

- Hight versatility and portability thanks to compact design
- Maximum test pressure 55 bar
- Digital gauges for pressure and vacuum measurement
- Integrated pneumatic vacuum pump (5,2 m^3/h capacity)
- Setting of working cycle parameters, monitoring and printing test reports by connecting to an external PC
- Bar code reader (optional)
- Microprocessor controlled
- Up to 1000 programmable working cycles
- Reporting of the sub cycle in progress
- Built in agreement to the European Machinery Directive, Safety standards CE marked

iAmiata Technical Characteristics	iAmiata - Uno	iAmiata- DUE
Tracer gas/mixtures	1	2
Injectors	2	2 + 2
Pressurization System	1 Aluminium block	2 Aluminium block
Injector Length	3,5 m, Different length is available on request	
Maximum Test pressure	55 bar	
Pressure Sensor resolution	1 kPa	
Connection to the unit to be tested	¼" Hansen F (ISO 7241B), ¼" SAE at request	
Vacuum pump capacity	Integrated pneumatic depressor 5,2 m^3/h; DN16KF flange for connection to ext. vacuum pump	
Programmable work cycles	Up to 1000	
Safety valve security setting	63 bar, configurable at request	
Control unit	TS690	
Working temperature	from 5 °C to 45° C	
PC Connection	LAN	
Compressed air supply	6 ÷ 7 bar not lubricated	
Power Supply	400 V @ 50 Hz – 3ph + GND	
Power Consumption	0,7 kW	
Dimensions (L x W x H)	850 x 560 x 1400mm	
Weight	~150 kg	

* The provided unit could not exactly match the one described here

Optional features and devices
DCA (Data Collector Application over TCP/IP protocol)
Available up to 4 Mixture pressurization Systems and 2 Vacuum Pumps
Automatic working cycle selection performed by bar code reader
On-Board printer
Obstructed vacuum group test and/or capillary test
iAmiata UNO -1 Special configuration without Vacuum Pump

* FT software department develops customized software on request