Atlas Vac Machine Model 15:22 Medical Tray Heat Sealer

OVERALL STANDARD FEATURES

- Heat Sealing Area 15 in. deep X 22 in. wide. (380mm x 560mm)
- Manual SINGLE aluminum shuttle, clear anodized, mounted on smooth 1" diameter stainless shafts w/non-lube linear ball bearings
- Two hand Banner Opti-touch safety rated sensors (not single button) per OSHA 1910.212 & 1910.144 requirement, ergonomically correct positioning
- Emergency stop red-yellow. Meet CE, UL, CSA OSHA, ISO13850; includes stationary safety shields,
- Heating Elements 240v or 480v, Heavy flat 1" heat plate w/internal heaters, 6000w
- Seal Platen precision machined flat ½" aluminum, Dupont Teflon Silverstone coating is included
- Electrical Requirements 208, 220/240v; 480v, 1ph or 3ph, others available (*specify* at time of ordering)
- Sealing Pressure adjustable to over 10,000+ pounds, precision stationary support surface for tool shuttle alignment
- Air reservoir included; 4.7 gallon ASME rated; includes required ASME pressure relief safety valve
- Air Dump Safety valve, OSHA approved, tag out/lock out.
- Floor Space 33" wide X 50" deep (84cm X 127cm) approx. Rear cabinet model.
- Machine mounted on non-mar casters w/height adjustment & brakes
- Rigid welded steel tubular framework w/powder coating White standard. NEMA 12 enclosure(s). Rear mount cabinet standard (side mount option available).
- Components vcompliant with IEC 60204-1, CE/CSA/UL as applicable to touch protection.
- Stainless steel physical operator guards and framework cover panels. Guarding meets OSHA 1910 sub-part 0, 1910.145, EN415-1 & -3.
- Quick change lift off tooling supports (removable) to support 1" tool plates for 4" standard tray depth (others on request).
- Inlet air filter (5 micron) included, ¾" NPT ready for non-regulated supply air connection.
- Single exhaust port with 20 micron filter or for connection to discharge line from clean room if desired. Sound levels comply with OSHA 1910.95
- Air Usage 11-13 CFM @ 80 PSI at 4 cycles per minute. Supply @ 100psi with 3/4"+ dia line min.
- Sealer is ready for operation upon connection to air and electric power.
- Weight 860 pounds approx.

STANDARD CONTROLS FEATURES

- Mitsubishi PLC Fx3u
- 10"color touch screen Beijer operator interface terminal (OIT-HMI).
- On-screen programmable Time and Temperature controls w/alarm limits is standard
- Individualized operator (optional), supervisor/engineer or calibration unique sign in ID/PW for assigned access levels
- Odometer and resettable cycle counter
- USB port for offload of data if desired.
- Powered USB ports (2) for barcode scanner (not included) entry of UDI, sign-on, etc. Manual input on screen permitted also.
- Data Logging memory of all sign-on access, changes and UDI process data per each cycle. Memory accessible for manual offloading only. No edits permitted.
- Capability to match recipe with barcoded tooling and barcoded device/paperwork during setup of production.
- Redundant automatic heater over temperature safety cutoff control circuit, Factory Mutual approved controller, 300F cutoff standard.
- Electronic process monitoring with temperature & air pressure sensor fail-safe alarms for parameter recipe settings, PW protected.
- Four (4) dual lead special grade thermocouples for control feedback & accurate individual temperature displays on OIT while providing signals to calibration ports for simultaneous reading.
- Individual thermocouple calibration connector ports. On-screen calibration of each (4) thermocouples. PW protected
- Alarm screen detail history on screen and in memory.
- Low profile Banner multi-color signal light for recipe parameter alarms.
- Pressure regulation w/precision manual adjustment & liquid filled precision gauge as well as on screen digital readout
- Pressure validation port for easy calibration gage connection to pressure circuit. Onscreen calibration of pressure circuit. PW protected.
- Timer calibration connector (1) 24vdc signal output
- Eye level controls including 10" color touch OIT/HMI screen, reset(s) and others.
- English units of measure readouts
- Air Usage 11-13 CFM @ 80 PSI at 4 cycles per minute. Supply @ 100psi with 3/4"+ dia line min.

Owner's manual (1 copy) with operation instructions, maintenance information, recommended spares list, schematics, Atlas Vac calibration document and Atlas Vac PLC

programs on CD ROM. Sealer is ready for operation upon connection to air and electric power; air filter included. Any additional FAT, or other documents and procedures, may require additional charge based on scope and hours needed to complete.

Tooling nests not included, quoted separately.

15:22 OPTIONS AND ACCESSORIES

- 1. <u>Auto Shuttle System</u>; electrically operated for extremely smooth cycle, single speed with gentle acceleration and deceleration of shuttle. Interlocked with Banner hand sensors for safe platen operation. Reduces operator repetitive motion fatigue and harsh displacement of tray contents.
- 2. <u>Direct Force Sensing System</u> (patented) provides a digital reading of the force (lbs.-force) exerted by the tray sealer press against the tray or blister seal tool area (requires controls option a & b below, auto regulation). Results from adjustments in press air pressure can be directly read on the PLC operator screen. By knowing the lbs-f exerted across the tray sealing tool face, packaging engineers can more closely monitor design variables. Defining the desired lbs-f in a tray sealing protocol can accommodate variations in air pressure, brands or models of tray sealers, and even tooling designs. Speeds validation experiment settings with new package designs. For reference only, not a closed loop system.
- 3. <u>Seal Tool Recognition System</u>; RFID electronic sensing feature for accurate program changeovers, requires Process Control System option for pre-programmed menu selections matching the tool ID, no tooling mix-ups ever again. RFID chip on the tooling verifies the use of the correct PLC recipe on every cycle.
- 4. <u>Stainless steel framework</u>, welded 3/16" rectangular tubing far superior to angle iron and sheet metal, includes stainless steel controls cabinet (special option). In lieu of Atlas Vac standard white powdercoated framework, painted controls cabinet with SS guarding & operator panel. Adds two (2) weeks to lead time.
- 5. <u>Light Curtain, Category 3, OSHA Compliant</u>. Provides angled light curtains across protected tool loading area with stationary side guards of SS and Lexan. Class 3 OSHA, ISO13849, ISO13857 compliant with separate safety circuitry and safety controller. Keyence light curtain system positioned at <u>correct distances</u> to meet ISO13849 integrated to a) safety rated <u>dual channel</u> Ross air supply valve to moving seal press and, b) safety contactor for electric shuttle motion circuit for operator safety. <u>Eliminates the standard Banner Optitouch hand sensors and is replaced by single green push button to initiate the entire cycle</u>. Any light curtain violation will

require the cycle to re-home and start over. Includes Short Cycle alarm and acknowledgement screen for interrupted press cycle. Auto Pressure regulation is still provided by standard Festo system per above.

15:22 PROCESS CONTROL & DOCUMENTATION OPTIONS

- a) Upgrade from standard manual pressure regulator. Auto Pressure Regulator Process Control System including additional programming to Mitsubishi PLC & Beijer operator interface, pressure transducer using I/P transmitter for automatic programmed fine air pressure closed loop control with PLC controlled auto regulator though OIT screen setting. Always includes AV standard digital pressure and temperature monitors with alarm system on OIT. Provides Auto Air Pressure Control settings on the screen in lieu of standard manually set regulator. Stores multiple recipe programs and can utilize optional tooling ID sensor system to prevent mix-ups and operator delay or errors on changeovers (see Tool ID System).
- b) Calibration Services.
- c) IQ, OQ template documents.
- d) Translations of PLC Screens and Manuals
- e) CE rating certification
- f) UL listing on controls cabinet

TOOLING AVAILABLE, PRECISION CNC MACHINED

- Simple lift off tooling, CNC machined aluminum rigid design that locks into place quickly
- Design and retrofit services for non-Atlas Vac Machine units including Alloyd and others.
- Aluminum tool nest assembly w/molded FDA silicone seal gaskets, easy change of gaskets
- Aluminum nest assembly with optional die cut silicone seal gaskets for some configurations.
- Aluminum nest assembly hard anodized standard.
- Relieved hot plate option to reduce heat transfer to product
- Seal Tool Recognition System electronic ID sensing feature used with Process Control System providing special sensing feature to match tool with selected program in stored memory