

Generation 2

Atmospheric Enclosure

Atmospheric Enclosure for
Hermetic Sealing Systems.

Rated #1 in the industry.

Intelligent, configurable design and powerful software deliver absolute environmental and process control that spans a wide range of hermetic sealing applications. Comprehensive capabilities address every system requirement — cost-effectively and efficiently.



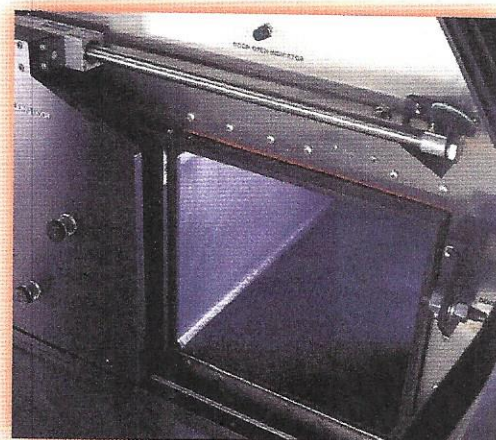
- **Fully-computerized operation eliminates the risk of operator error and insures maximum yield.** The system constantly monitors the glove box environment to guarantee that the desired environment is reached and maintained within the enclosure.
- **Exclusive computer-controlled door locks for all internal and external door with on-screen status display** keep the enclosed atmosphere and parts safe from mistakes. Doors cannot be opened until the proper sequence of vacuum and back-fill has been completed.
- **Independent vacuum pumping systems on all ovens and interchanges** provide maximum package protection. Each pumping system is dedicated to completely and automatically evacuate its designated chamber.
- **A wide variety of vacuum oven configurations** are available to meet diverse production flow and bakeout requirements. Choose from ovens with temperature ranges of ambient to 300°C. Exclusive closed-loop computer control and monitoring of each oven surface, including heated shelves, ensures their temperature stability.
- **Automatic push button inner and outer doors on all ovens and antechambers** make the Generation 2 doors easy to operate.
- **Fully-integrated automatic electronic gas pressure control system**, with user-selectable set points, includes oil-less check valve.
- **Integrated moisture and oxygen monitoring** are available for real-time environmental control. Set points for moisture and oxygen can be selected to prohibit the weld process. This insures that no parts are sealed unless the specified environmental conditions have been reached.
- **ISO 9000/Military specification traceability** through Unitek Benchmark's total environmental control, monitoring and reporting.
- **Enclosure construction** is of Type 304 internally polished stainless steel and external epoxy finish for clean operation and easy maintenance. Ergonomically-designed oversized safety glass window for easy viewing. Glove ports with built-in arm rests.
- **System software provides tight control** of all process parameters. Multi-level password control is provided for operator, process engineer, and service engineers.
- **LAN interface port** available for remote monitoring.
- **Calibrated to NIST standards.**
- **CE certification available.**



Generation 2

*The flexibility to meet your process needs.
The capability to achieve your productivity goals.*

Versatility is synonymous with the Generation 2 – a modular and fully configurable system. It can be built with one or many ovens in varying shapes and capabilities, additional environmental chambers, a closed-loop internal water re-circulator, automated load/unload handling systems, a range of environmental monitoring and control systems...and that's only the beginning!



Pictured: Automatic internal sliding door

Additional Features and Options

- Triple redundant oven temperature protection to guard against over-temperature conditions.
- A range of vacuum pumping systems – oil-less, cryogenic, turbo-molecular – to meet any budget or process requirement.
- A physically integrated single or dual-column gas dryer/oxygen removal system to deliver ultra-low moisture and oxygen environments.
- Chromatographic gas analyzing systems.

Ovens

Configuration:

A variety of configurations to meet process and material handling requirements including, end-loading, front loading, rear loading, heated shelves.

Temperature Ramping:

User-selectable computer-controlled PID loop with graphical interface.

Temperature:

To 200°C standard with optional higher temperature ranges available.

Programmability:

Fully programmable with virtually unlimited scheduling capability.

Analysis and Monitoring Capabilities

Oxygen Detection Range: 0-1000 ppm

Moisture Detection Range: -26°C. to -80°C. dew point

Standard Configurations

Enclosure Length:	33" (84 cm)	48" (122 cm)	60" (152 cm)	81" (207 cm)
Total Length:	86" (218 cm)	101" (257 cm)	113" (287 cm)	134" (340 cm)
Depth:	39" (99 cm)	39" (99 cm)	39" (99 cm)	39" (99 cm)
Height:	59" (150 cm)	59" (150 cm)	59" (150 cm)	59" (150 cm)
Glove Ports:	2	4	4	5

Utilities

Electrical:

5-wire Wye, 208-240, 3-phase, 30 amps, 50/60 Hz

Step-down power transformers available for all input power requirements.

Inputs:

Nitrogen 65psi (448kPa)

Compressed air 80psi (550kPa)

Water:

Not required with available internal water re-circulator.

Specifications are subject to change without notice.

Pentium™ is a registered trademark of Intel Corporation.

Unitek Benchmark Inc.

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