



Overview

Our Latest microwave digestion system (The Alchemist 4000) is the culmination of over 20 years of continuous refinement.

- Powerful 3000 Watt output
- Advanced Safety Systems
- Easy Access to Vessels
- Top Load Design for Superior safety
- Tool-less Finger Tight Vessel



Features

- The powerful Alchemist 4000 has 3000 watts of fully adjustable power output (0-3000 watts) to tackle the toughest digestions.
- Our advanced Safety features ensure the safest possible working environment for you and your samples. The Alchemist 4000 will automatically adjust power output when heat or pressure parameter limits are achieved.
- The ergonomic top-loader design makes our system easier to use, simply remove one vessel at a time without the hassle of lifting a heavy carousel.
- Our patented finger tight vessels require no tools, and eliminate contamination worries with wireless real-time temperature and pressure monitoring.

Program Method

Steps	Pressure (Bar)	Temperature (°C)	Power (W)	Heat-time (s)	Hold-time (s)	Program No.	
1. General digestion method						1	
2. Pure milk	5	100	1000	300	60	7 8 9	
3. Skimmed milk powder	2	10	150	1000	240	60	4 5 6
4. Herb	3	20	180	1000	240	600	1 2 3
5. Medicine : Capsule	4	0	0	0	0	0	0
6. Meat	5	0	0	0	0	0	0
7. Soil	6	0	0	0	0	0	0
8. Water	7	0	0	0	0	0	0
	8	0	0	0	0	0	0
	9	0	0	0	0	0	0
	10	0	0	0	0	0	0

Buttons: Esc, Save, Apply, Load, 0-9, <, X, Checkmark

Alchemist 4000

Microwave Preparation System

Safety Features

Our patented finger tight vessels are designed to be the safest and easiest to use on the market.

Each vessel is temperature and pressure are continuously monitored to keep sample temperature and pressure within the pre-set ranges input by the user.

The high-tensile steel door features double interlocks which ensure operator safety.

Audible Anomaly Detection System will notify the user with alarm in case of vessel rupture.



Easy Tool-less Vessels

System Details

The on-board computer can store and edit up to 255 user pre-set methods for fast and easy operation.

Each preset method has parameters for time temperature, pressure and microwave power (0-3000 watts).

Our 360 degree carousel ensures even heating and also an extended motor life since there is no continuous stopping and starting.

The 7" (17.78 cm) color touch-screen displays real-time temperature and pressure reading of each vessel, along with working time and tendency curves.

TFM coated 3/16 stainless steel construction ensures years of corrosion resistance.

Model	Alchemist 4000
Vessel Quantity	1-40 vessels
Vessel Volume	50ml
Temperature Monitoring system	Contact-less Infrared Sensor Real time temperature reading & control of each vessel.
Temperature controlling range	50-400° Celcius
Display Accuracy	within 0.1° Celcius
Pressure Monitoring system	Contact-less pressure monitoring Real time pressure reading & control of each vessel.
Pressure control Range	0-10MPa
Pressure monitoring accuracy	0.01MPa
Display Accuracy	0.01MPa
Inner sample cup material	Modified PTFE (TFM)
Outer Vessel material	Fiberglass - Peak composite
Display	7 Inch Color touchscreen
Rotation	360° continuous rotation for longer motor life
Microwave Chassis	316 Stainless Steel with triple TFM coatings
Microwave power output	0-3000 Watts of fully adjustable power
Microwave leakage	<5mw/cm ²
Exhaust system	High powered corrosion resistant blower
Power requirements	220V 60 Hertz
Dimensions	25x25x24 inches
Weight	172 Lbs