

Ultra 6 Inspection

Comprehensive Protection for Your ULT Investment



Why Preventative Maintenance Matters

Ultra-low temperature freezers operate continuously under demanding conditions to protect critical samples, research materials, vaccines, biologics, and temperature-sensitive inventory. Over time, dust buildup, airflow restriction, seal wear, electronic component stress, and mechanical vibration can reduce performance and increase the risk of unexpected downtime. Routine preventative maintenance helps identify and correct minor issues before they become major failures, improving reliability, maintaining temperature stability, reducing emergency service events, and extending the operational life of your equipment. With regular UltraCARE preventative maintenance, customers benefit from:

- Improved system reliability
- Enhanced temperature performance
- Reduced risk of sample loss
- Increased energy efficiency
- Longer equipment lifespan
- Lower long-term service costs
- Greater operational confidence

Preventative maintenance is one of the most effective ways to protect both your ULT investment and the valuable materials stored inside.

- 1. Cabinet & Thermal Integrity**
Inspection of cabinet performance, insulation health, and thermal efficiency to help maintain stable storage conditions.
- 2. Door & Seal Optimization**
Adjustment and inspection of doors, gaskets, hinges, and sealing surfaces for maximum temperature retention.
- 3. Cooling System Cleaning**
Cleaning and inspection of intake/exhaust airflow systems to improve efficiency and reduce strain on components.
- 4. Stirling Engine Health Check**
Comprehensive inspection of engine components, insulation systems, and mechanical mounting integrity.
- 5. Electronics & PCB Inspection**
Preventative inspection and cleaning of critical electronic systems and control boards.
- 6. System Diagnostics & Performance Review**
Review of alarms, operating history, software status, and freezer performance indicators.

Included Benefits

- ✓ Reduce unplanned downtime
- ✓ Extend freezer lifespan
- ✓ Improve energy efficiency
- ✓ Protect valuable samples and inventory
- ✓ Maintain operational reliability
- ✓ 10% OFF parts & labor for non-warranty repairs

6 Core Inspection Areas – 35 Points

Cabinet & Structural Inspection

Cabinet thermal inspection completed with thermal imaging

Wall integrity inspected

Casters inspected

Pass-through ports inspected/cleaned

Vacuum breaker inspected/cleaned

Interior cabinet inspected (if thawed)

Door System Inspection

Door alignment checked/adjusted

Door seals cleaned/inspected

Hinges adjusted

Handle inspected

Strike plate inspected/adjusted

Cooling System Maintenance

Intake louvers cleaned

Filters cleaned (if applicable)

Intake fan cleaned

Exhaust fan cleaned

Exhaust ducts cleaned

Stirling Engine Inspection

Engine compartment cleaned

Warm head fins cleaned

Engine mounts inspected/tightened

Base plate inspected

Cold head insulation inspected

Electronics Inspection

GUI PCB inspected

Inverter PCB inspected

Power PCB inspected

24V PCB inspected

Power filter checked

GUI backup battery checked

System Health Verification

Refrigerant delta checked

Engine efficiency checked

Alarm functionality verified

Maintenance Reminders check and clearing (VAULT100 family)

Review of onboard predictive analytics and issue recommendations (VAULT100 family)

Event logs reviewed

Chart history reviewed

Software/system updates checked/installed if required



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