

INNOVATIVE SOLUTION FOR BIOMEDICAL WASTE MANAGEMENT



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BIOMEDICAL WASTE: A WORLDWIDE ISSUE FOR PUBLIC HEALTH & ENVIRONMENT

Health care activities protect and save lives. But what about the waste and by-products that they generate? Biomedical waste management process can be expensive and difficult to set up for health care centers. An unsafe management can cause major issues:

Health risks



Biomedical waste contains potentially harmful microorganisms which could infect people

Sharpsrelated



The World Health Organization (WHO) estimates that 40% of hepatitis cases and 12% of HIV cases worldwide are caused by occupational exposure*

Environmental Impact



Treatment and disposal of healthcare waste may release pathogens and toxic pollutants

According to WHO's directives*, infectious waste should be processed as close as possible to its generation place.

*Sources: Health-care waste repport, WHO 2015



Sterilwave® is the alternative on-site solution

to reduce the risk of contamination in comparison with incineration and landfills.

STERILWAVE® EQUIPMENT & OFFER

Compact solutions for on-site waste management:

3 different capacities to convert any biohazardous waste into municipal waste.



*with a waste density of 1L=0.1kg

A comprehensive offer of services:



Support for **installation** and waste management process optimization



Operators and maintenance **training** by certified experts



Maintenance and technical support: spare parts and consumables available / technical tutorials / after sales services

EFFICIENT MICROWAVE TECHNOLOGY



8log10 microbial inactivation



No pressure during the process No irradiation risk



No water consumption No steam generator **No liquid effluent**



Efficient heating rise up to 110°C for 20′ to obtain a **full decontamination**



Adapted to any type of medical waste (sharps, glass, solid, liquid...)

No segregation



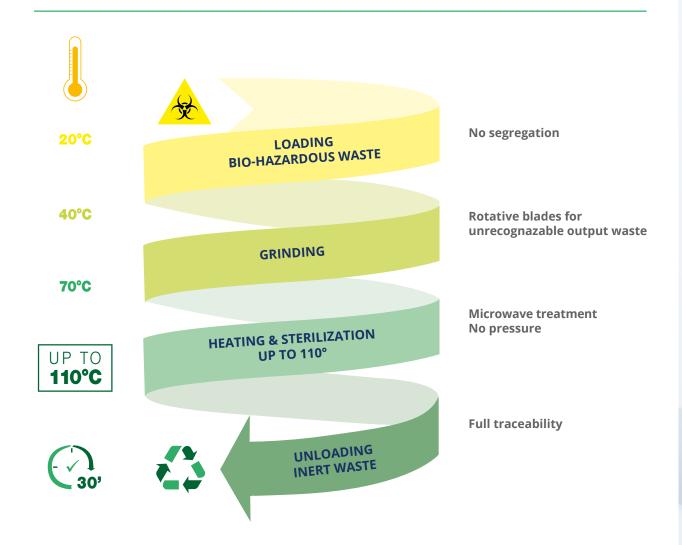
Easy maintenance Equipment based on mechanical technologies

Sterilwave® has been registered and approved by health & environmental ministries in Europe, Asia, Africa, Middle East and America.

The uniqueness of Sterilwave® is linked to its innovative microwave technology and high level of treatment respecting both the environment and security processes.

| Waste management method | Dry | Waste our | tput Sterilized | Weight Reduction | Volume Reduction | Immediate installation (no specific construction required) | Zero effluents (no polluting emissions) |
|-------------------------------|-----|-----------|---------------------------|---------------------|---------------------|--|---|
| STERILWAVE® | ✓ | 1 | ✓ | ✓ | ✓ | ✓ | ✓ |
| Autoclave | | | ✓ | | ✓ | | |
| Incineration | ✓ | ✓ | ✓ | ✓ | ✓ | | |
| Chemical treatment | | | ✓ | | Some models | | |

A 30 MINUTES AUTOMATIC PROCESS IN ONE SINGLE VESSEL



From infectious waste to municipal waste



*Refuse-Derived Fuel

TECHNICAL SPECIFICATIONS







| | 4 | | | | | |
|-----------------------------|---|-------------------------------------|--|--|--|--|
| SPECIFICATIONS | | | | | | |
| Waste capacity | 200L/h Up to 20kg /h * | 500L/h Up to 50kg /h * | 880L/h Up to 70kg /h * | | | |
| Vessel capacity | 100L | 250L | 440L | | | |
| Average cycle time | 30′ | 30′ | 30′ | | | |
| Dimensions (L x W x D) | 1 x 1 x 1 m | 1,6 x 1,1 x 1,5 m | 2 x 1,1 x 2 m | | | |
| Weight | 700 kg | 1200 kg | 1400 kg | | | |
| Recommended working area | 8 sq.m Ceiling height: 2m | 10-12 sq.m Ceiling height: 2.2 m | 15-20 sq.m Ceiling height: 3m (3.85m with automatic loading option) | | | |
| Electricity | 400V/ 3-Phase, 63A | | | | | |
| Technology | Grinding by rotating blades and heating by microwaves | | | | | |
| OPERATING DATA | | | | | | |
| Microbial inactivation | Spore up to 8log10 Virus up to 6log10 STAATT requirements and NFX30-503 compliant | | | | | |
| Volume reduction | Up to 80% | | | | | |
| Weight reduction | Up to 25% | | | | | |
| Final Waste | Unrecognizable, inert, dry, stable | | | | | |
| Loading Process | Manual or Automatic (option) | | | | | |
| Process management | Full traceability | | | | | |

*with a waste density of 1L=0.1kg

STERILWAVE® KEY BENEFITS

Eco-friendly, economic & safe solution

Safe

Microwave technology No pressure in comparison with the autoclave

Efficient

Exceed international regulatory standards Bacterial reduction up to 8log10



Cost effective

No more storage Robust equipment, easy maintenance

Eco-friendly

Zero environmental impact On-site treatment – no transport No liquid effluent to drain

Easy to use

"Plug and play" system No specific technical qualifications required

Solution adapted to:

✓ Every medical waste producers



CLINICS & HOSPITALS



RESEARCH LABORATORIES



COMMERCIAL WASTE SERVICES

√ Any type of medical waste

- · Hospital and laboratory waste,
- · Solid and liquid medical waste,
- · Human and animal pathological waste,
- Sharps and prickly hospital waste with their containers,
- · Cultures and stocks,
- Any other waste listed in state and federal regulations as medical waste.









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