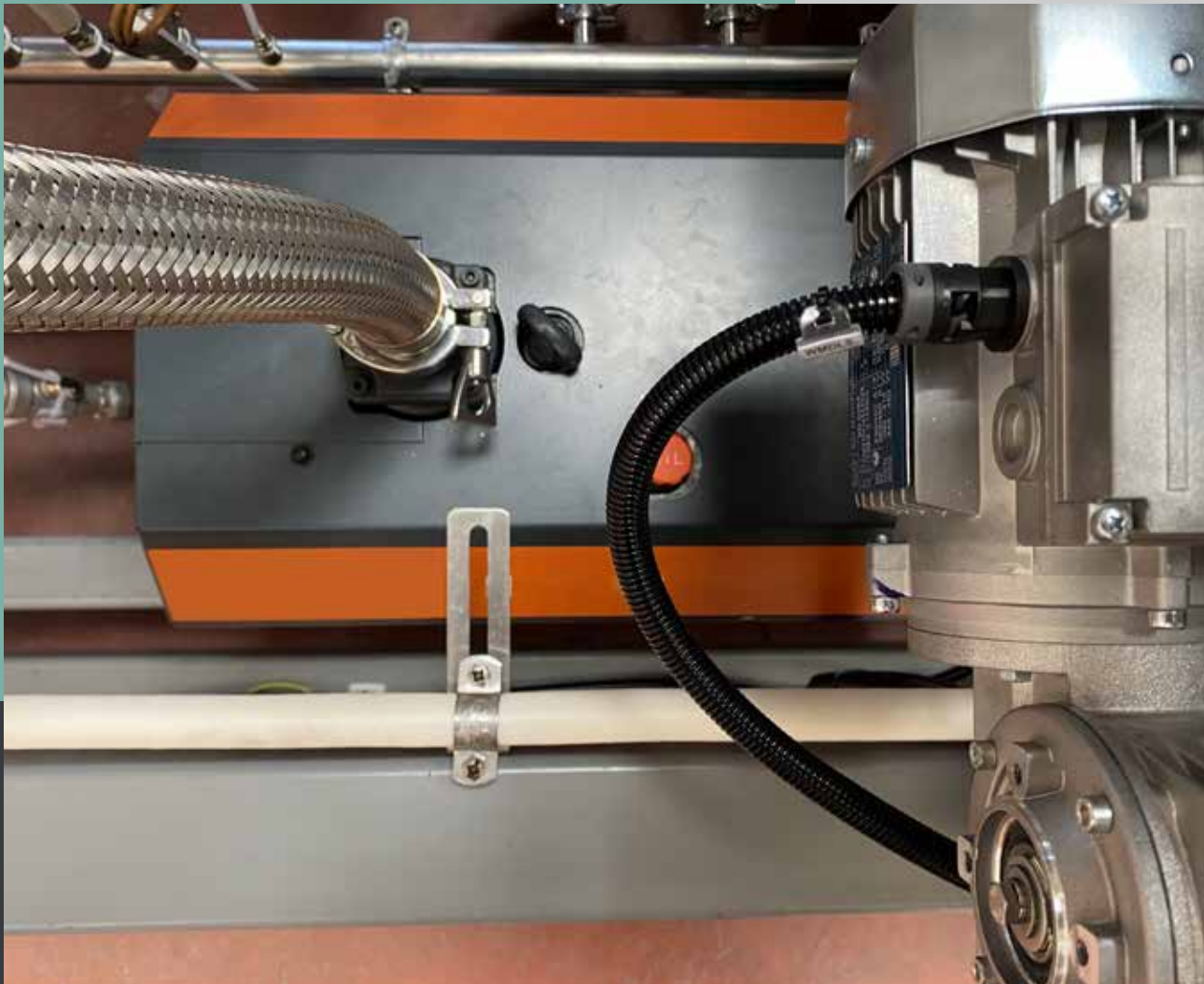


# AQUAZERO®

The patented technology  
for vacuum generation  
without water



Healthcare 

Waste 

Life Science 

# Cisa Group



**Cisa Group is a global supplier of infection control systems with production plants in Italy and Brazil.**

Founded in 1947, Cisa Group, together with Cisa America and Cisa Brasile, forms an international group that is one of the world's leading manufacturers of washing, disinfection and sterilization technology for infection control for the healthcare and life sciences industries.



HEALTHCARE  
INDUSTRY



LIFE SCIENCES  
INDUSTRY

Creating safer environments in hospitals, healthcare facilities and laboratory applications is a fundamental priority for the well-being of humans worldwide.

This is the commitment that drives Cisa to its claim:

## We care about life

Cisa Group is part of Faper Group, leading Italian supplier of world-class, innovative engineering solutions.

The Group is inspired by its founder, Fabio Perini, and has based its success on the ability to combine invention and simplicity.

Faper Group was established in 2001 as a holding company dedicated to innovation in the fields of tissue paper converting, healthcare and real estate management.

### COMPLIANCE

CEE 93/42  
CE 2007/47/EC  
PED 2014/68/UE  
EN 13445  
2006/42/EC  
2014/30/UE  
014/35/UE

### PRODUCT STANDARDS

CEI EN 61010  
CEI EN 60204-1:2016  
EN 61326-1:2013  
UNI EN 285:2016  
UNI EN ISO 15883

### QUALITY SYSTEM

UNI EN ISO 9001:2015  
UNI CEI ENISO 13485:2016



**MORE INFO  
ON THE  
FAPER GROUP  
WEBSITE**



# Technology

## Healthcare



Cisa Group develops advanced infection control technologies for the safeguard of healthcare workers and the health of patients.

Complete central sterilizing service departments for hospitals (CSSD)

Sterilization for healthcare applications and clinics of all sizes

Disinfection and washing technologies for different operational requirements

Cisa Group is the technology partner for scientists, researchers and engineers who develop life-enhancing products every day.



## Life Science



Washing and sterilization technologies for laboratories and research centres

Sterilization for pharmaceutical production

## Waste



Cisa Group, with 15 years of experience in the treatment of infectious waste, provides ground breaking solutions safe, economical and carbon friendly. Cisa Group is leading the field with the invention of its Waste Sterilization Department (WSD®).

WSD. Complete waste treatment department

WSM. Plug and Play Sterili-Station

Over the years it has developed unique proprietary IT and energy saving systems.



## Software



Tracecare®. Traceability of the sterilization process for the reconditioning of surgical kits in CSSDs

TraceWaste. Traceability of the sterilization process for the treatment of infectious waste using Cisa WSD Waste sterilization departments

# Aquazero®

## Cisa's technology for steam sterilisation.

### LOW WATER CONSUMPTION, ENERGY SAVING AND COST REDUCTION.

Aquazero® is a patented CISA technology for vacuum generation with a powerful Pre and Post Vacuum during the drying phase with no water consumption.

**No maintenance is required.**

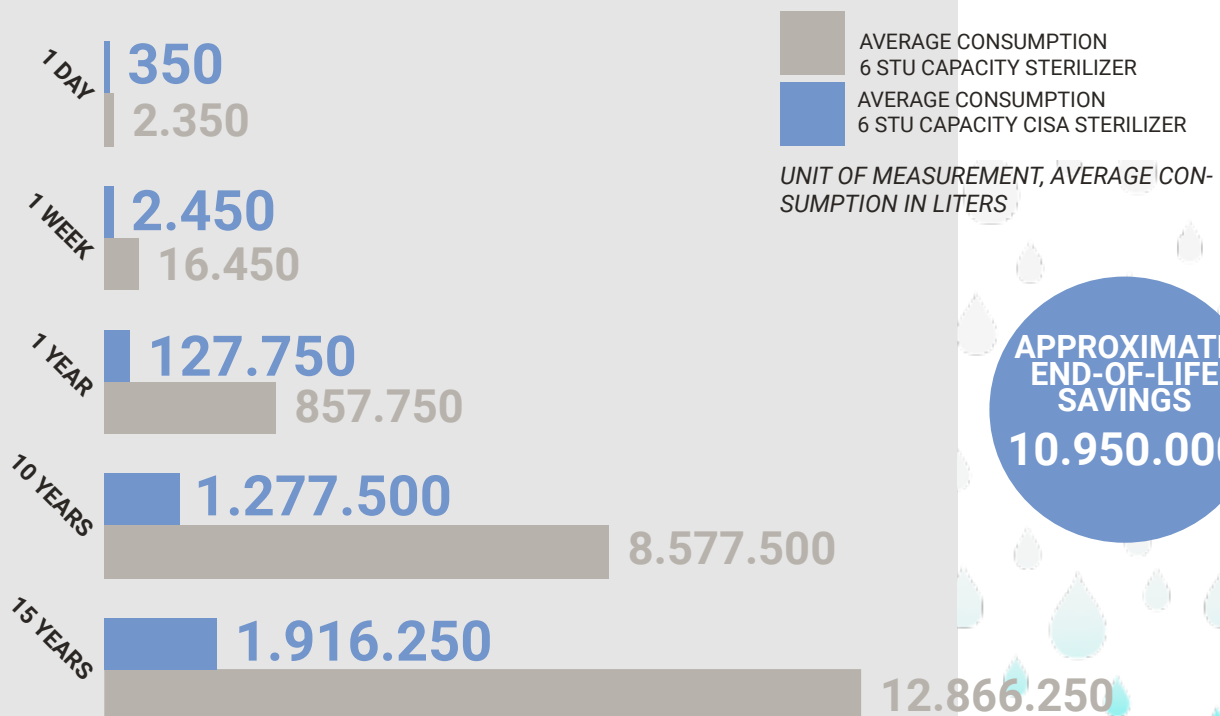
## A COST SAVING MACHINE

Thanks to its features, Aquazero® is able to significantly reduce management costs linked to sterilization, as water savings can reach 85% or more compared to standard steam sterilizers.

# Consumption and savings

## ● WATER-RELATED PROBLEMS

Water is the basic requirement that all standard steam sterilizers depend on for vacuum generation. However, for many countries water access is a major issue. In various parts of the globe water shortages are becoming more and more common, or where water is available its quality cannot always be guaranteed, thus generating maintenance problems, or it may simply be too expensive for entities to afford.



## ● WATER-RELATED COSTS

Every single litre of water used with a steam sterilizer is **PAID THREE TIMES** by the hospital and by the customer:

- a first time for the **COST OF WATER**;
- a second time for its **TREATMENT**;
- and a third time for its **DISPOSAL**.



USE  
THE QR CODE  
TO WATCH  
VIDEO

### AVERAGE CONSUMPTION IN LITRES OF A STERILIZER

1 CYCLE	235	1 CYCLE	35
1 DAY	2.350	1 DAY	350
1 WEEK	16.45	1 WEEK	2.450
1 MONTH	71.4780	1 MONTH	10.646
1 YEAR	857.75	1 YEAR	127.750
10 YEARS	8.577.5000	10 YEARS	1.277.500

### SAVINGS IN TERMS OF €

1 CYCLE	€ 0,70
1 DAY	€ 7,04
1 WEEK	€ 49,28
1 MONTH	€ 214,13
1 YEAR	€ 2.570
10 YEARS	€ 25.697

# X5

AUTOCLAVES

€ 3,52
€ 35,20
€ 246,40
€ 1.070
€ 12.850
€ 128.480

CISA STEAM STERILIZER WITH 6 STERILISATION UNITS **WITHOUT AN AQUAZERO® SYSTEM** ASSUMING THE STERILISER IS USED 10 TIMES A DAY FOR 7 DAYS

CISA ELECTRIC STEAM STERILIZER WITH 6 STERILISATION UNITS **EQUIPPED WITH AN AQUAZERO® SYSTEM** ASSUMING THE STERILISER IS USED 10 TIMES A DAY FOR 7 DAYS

USING A CISA STEAM STERILIZER WITH 6 STERILISATION UNITS **EQUIPPED WITH AN AQUAZERO® SYSTEM**, ASSUMING THAT THE COST OF WATER IS 0.00352 PER LITRE

# Medical waste treatment

Aquazero<sup>®</sup> is also used for **MEDICAL WASTE TREATMENT**.

This is a winning solution in critical areas of the world where **THERE ISN'T ALWAYS ENOUGH WATER OR WHERE THE WATER THAT IS AVAILABLE CAN'T EVEN BE USED**.

The correct performance of a traditional liquid ring pump can only be achieved when the water temperature is correct (ideally, around 10 degrees).

**VACUUM OPERATION WITH AQUAZERO<sup>®</sup> TECHNOLOGY IS NOT AFFECTED BY ITS USE IN AN ENVIRONMENT** where the water temperature would be higher than required.

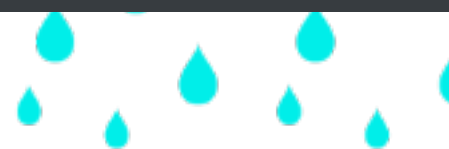


**WSD<sup>®</sup>**  
WASTE  
STERILIZATION  
DEPARTMENT



**WATER  
SCARCITY**

**RISE IN GLOBAL  
TEMPERATURES**



# An environmentally friendly solution

Aquazero® technology meets two important interrelated requirements and at the same time responds to two main environmental issues: **WATER SCARCITY** and the **RISE IN GLOBAL TEMPERATURE**.

If we calculate the total number of steam sterilizers in the world, they are a considerable source of water consumption and heat generation.

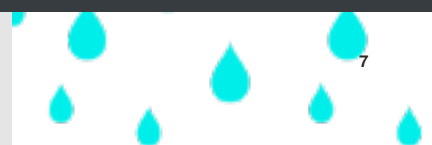
**Aquazero®** is the technology that combines improved sterilisation quality respect for natural resources and environmental needs.

**Cisa Group technologies comply with at least 6 of the 17 Sustainable Development Goals (SDGs) of the United Nations.**



# AQUAZERO

THE PATENTED TECHNOLOGY FOR VACUUM GENERATION WITHOUT WATER





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