PREVENTING THE RISK

of viruses, spores, fungi and bacteria

SANI SYSTEM Polti

Using Steam as a sanitiser

- Ambulances
- Critical care facilities
- Healthcare facilities
- Intensive care units
- Infection prone areas
- Laboratories
- Medical equipments
- Operation theaters
- Waiting areas
- Wards

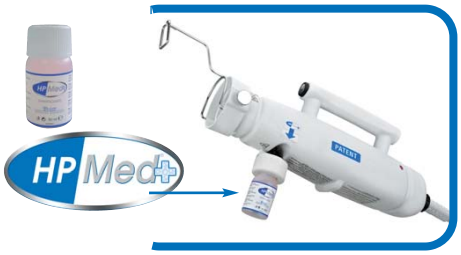
Suitable for all types of surfaces

Wood	Metal	Fabric	Plastic	Medical Equipment

Polti MEDICAL DIVISION

SANITISING
HEALTHCARE ENVIRONMENTS

Presence of high number of people in close proximity to one another encourages the proliferation of micro organisms that are potentially harmful to humans, such as bacteria, viruses, spores and fungi. These organisms spread, multiply and contaminate environments, giving rise to an increased risk of infections. Healthcare environments are most exposed to the risk of cross-infections due to conditions that promote the build-up of pathogenic micro-organisms. Hospitals, nursing homes, Public places, dental clinics present a risk of transmission of infections from person to person.

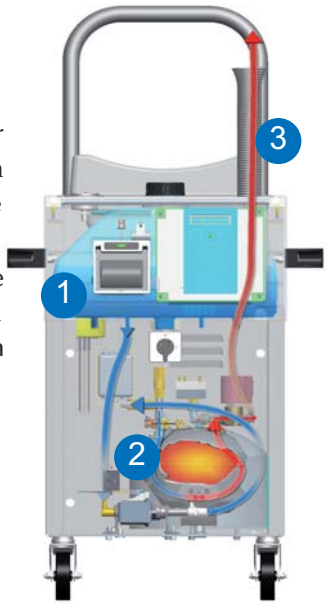


Sani System delivers **super-heated, saturated atomized steam** at high-temperature (180°C) **in combination with HPMed sanitising agent**. Polti Sani System lowers the bacterial, fungal and viral load on surfaces and fabrics in a few seconds. This reduces the risk of cross-infections rapidly. It produces and delivers steam at a high temperature in dry form and at low pressure. The steam quickly evaporates from the treated surfaces without leaving any residual moisture behind. The mixture of steam and HPMed **can be released in the presence of people**. It does not require the operator to come into contact with the surfaces. This eliminates any risk of contamination by the operator.

OPERATING PATTERN

Polti Sani System has an automatic system of transferring water from the tank (1) into the pressurised boiler (2), where it reaches a pressure of 4 to 6 bars. This can be easily monitored by a pressure indicator. Inside the boiler the water is transformed into steam.

The steam then passes through a monotube (3)and reaches the delivery nozzle. The nozzle has a patented system consisting of a control led-expansion heat exchanging device that heats the steam further, bringing it to a maximum temperature of 180°C.



WORLD-WIDE POLTI PATENT

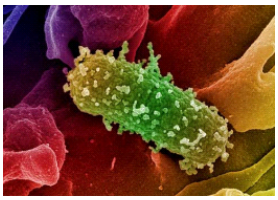
180°C
OVER-HEATED
SATURATED STEAM

The single-dose bottle of HPMed sanitising solution can be connected to the bottom part of the delivery nozzle. Mixed with the steam, HPMed acts as an enhancer to the sanitising action of steam.

The Sani System sanitising method should be used whenever and wherever microbiological contamination has to be kept under control and reduced to the lowest possible levels.

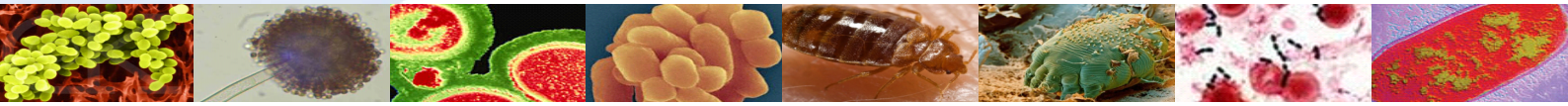
Polti Sani System, **patented world-wide** by Polti S.p.A., was developed on the basis of studies conducted in cooperation with the Faculty of Medicine and Surgery of Pavia University and is an electro-medical device for sanitising surfaces with a risk of biological contamination **(it is a class 2A medical device intended for professional use).**

CLINICAL TESTS



Polti Sani System has been subjected to numerous laboratory tests and clinical studies, both in Italy and abroad. The reduction of bacterial, fungal and viral contamination with the use of Sani System has been certified on the basis of in vitro tests or in standard operating conditions in several types of environment and on many different surfaces.

Following are some of the laboratory tests and clinical studies confirming the safe use and effectiveness of Sani System. Results have shown that compared to the traditional methods **Sani system gives much better results.**



Sanitising in dental surgeries Department of Morphological, Etiological and Clinical Sciences Pavia University, Italy	Eliminated the Staphylococcus and Streptococcus bacterial loads present on the dental units.
Comparison with conventional disinfection methods for sanitising Orthopaedics and Traumatology Unit and Microbiology Unit, San Carlo Borromeo Hospital, Milan, Italy	Destroyed several gram-positive and gram-negative bacteria and various types of fungi. Decontaminated equipment and inert materials such as plastic, metal and glass. Lead to a reduction of the total microbial load by 91.6%, compared to 88.8% using conventional methods
Evaluation of the reduction of the microbial load in a microbiology laboratory Istituto Cantonale di Microbiologia, Bellinzona, Switzerland	Effective in reducing the bacterial load on a work surface previously contaminated with Escherichia coli, coagualase-negative Staphylococcus, Klebsiella pneumoniae and Proteus mirabilis.
Evaluation of activity on MRSA Istituto Cantonale di Microbiologia, Bellinzona, Switzerland	30 seconds exposure was effective in sanitising different materials such as stainless steel and melamine table tops, with a reduction of the bacterial load by upto 4 logarithms of surfaces contaminated with MRSA.
Evaluation of acute inhalation toxicity Chemservice Laboratory, Milan, Italy	In vivo laboratory tests of acute inhalation toxicity on rats have shown HPMed is safe.
Dermatological evaluation study Chelab Laboratory, Treviso, Italy	Patch tests used for examining the skin compatibility in healthy volunteers showed that HPMed, applied in non-occlusive conditions to the healthy skin of 20 volunteers did not cause any irritation.
Effectiveness in reducing microbial load on inanimate surfaces Swinburne University of Technology, Australia	A 30 seconds application was effective in reducing the microbal load by 100%for representative Gram positive bacteria, Gram negative bacteria, filamentous fungi and yeasts. A 30 seconds application reduced the load of bacterial endospores by 97%.
Evaluation of the virucidal effectiveness (H1N1) Biolab Laboratory Biolab, Vimodrone (province of Milan), Italy	in accordance with European standard EN 14476, the test showed that the Sani System was more effective than what is required by European standards in lowering the viral load of the H1N1 virus. It was able to lower the viral load by over 99.99 %in only 15 seconds, thus obtaining a reduction in excess of 4 logarithmic orders.

THE ADVANTAGES OF USING SANI SYSTEM

Effective: It lowers the bacterial, fungal and viral load on any type of surface.

Rapid: The dry atomized steam evaporates within 30 to 45 seconds without leaving any residue behind. There is no need to use conventional chemical disinfectants.

Safe: Spraying for **30 seconds per square meter** is sufficient to eliminate the microbiological contamination from surfaces.

Total action: The mixture of steam and HPMed can be released in the presence of people. In addition, it does not require any contact with the surfaces to be sanitised, and therefore eliminates any risk of cross contamination. HPMed has been subjected to skin tests.

It reaches all surfaces, even the most inaccessible corners that are difficult to reach with conventional methods, guaranteeing total sanitising of all contaminated areas.

Inexpensive: It reduces the costs of chemical surface disinfectants and reduces the costs of infection related consequences.

PRODUCT RANGE

The Sani System product range currently comprises of three machines and a sanitising solution (**HPMed**).

EXPRESS

Steam Delivery

- Patented Steam Nozzle
- 180° C super heated dry steam
- Continuous steam quantity adjustment from 0 to 100 g/min
- HPMed consumption: 0.4 ml/min (minimum)
- HPMed single-use bottle, placed under the steam nozzle

Boiler

- Auto refill
- Boiler Capacity : 3 L
- Max pressure: 6 bar
- Extra Alp Alloy boiler

Convenience

- Manual cable winder
- Flex hose length: 2.5 m
- Electrical cable length : 4 m
- Pull out handle for easy transport
- Height of the carrier handle : min. 49cm, max 68cm

Electrical & Dimensions

- Total power: 2650 Watt max
- Dimensions (DxH): 45x39 cms
- Net weight:10 Kgs

SANI SYSTEM

Steam Delivery

- Patented Steam Nozzle
- 180°C super heated dry steam
- Continuous steam quantity adjustment from 0 to 100 g/min
- HPMed consumption: 0.4 ml/min (minimum)
- HPMed single-use bottle, placed under the steam nozzle

Boiler

- Auto refill
- Boiler Capacity : 5 L
- Max pressure: 6 bar
- Pressure gauge
- Reinforced Aisi 316 Stainless steel boiler

Convenience

- Manual cable winder
- Flex hose length: 2.5 m
- Electrical cable length : 5 m
- Stainless steel handle for easy transport
- 4 anti-trace revolving wheels (1 antistatic) with brakes

Electrical & Dimensions

- Total power: 2500 Watt max
- Dimensions (LxWxH): 47x45x90.5 cms
- Net weight: 27.5 Kgs

SANI SYSTEM CHECK

The system allows the operator to programme and control the functioning of Sani System.

It also confirms by print-out that the activity of steam disinfection has been completed as per protocol

Steam Delivery + Boiler + Convenience : same as Sani System

Electronics

- System for all functions management and control.
- 4 preset sanitization programs.
- User identification system through RFID cards.
- Built-in thermal printer.
- Numeric interface with back-lit LCD display

Electrical & Dimensions

- Total power: 2250 Watt max
- Dimensions (LxWxH): 47x45x107 cm
- Net weight: 29 Kgs

12 HPMed 50 ml single-use bottles (HPMed is an hydro-alcohol solution containing sodium metasilicate and sodium carbonate).

Marketed in India by :

Faith Biotech Pvt. Ltd.

Delhi Office: E-107, Lajpat Nagar-I, New Delhi-110024
Tel : 91 11 41727403, 29819429 Fax : 91 11 29811912
Mumbai Office: B 56, 2nd Floor, Kiran Ind. Estate
Off MG Road, Goregaon (W), Mumbai 400062
Tel : 91 22 65280669 Fax : 91 22 28765632
E-mail : info@faithbiotech.com Url : www.faithgroup.co.in

Faith biotech

ISO 9001

POLTI MEDICAL DIVISION