

clinell®

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Kills at least
99.9999%
of spores in 2 minutes
in dirty conditions¹

CLINELL SPORICIDAL WIPES

THE MOST CLINICALLY PROVEN DISINFECTANT WIPE IN THE WORLD

Effective against dry biofilms

Clinell Sporicidal Wipes have shown effective removal of dry biofilm pathogens as well as preventing transfer and regrowth².

Safe and easy to use

Premeasured dose is activated by wetting with water - no more dilution errors. No toxic fumes are produced upon activation so they are safe to use next to patients.

The most clinically proven wipe in the world

Clinell Sporicidal Wipes kill most known pathogenic microorganisms with a non-selective action. With a proven 6 log spore kill, in two minutes under dirty conditions, it is proven to outperform other leading sporicidal wipes^{1,3}.

Faster & more effective in highly soiled conditions

More effective than two-step cleaning and disinfection with chlorine⁴. Allows both cleaning and disinfection, remaining effective in highly soiled conditions unlike chlorine based products^{5,6}.

Compatible with most surfaces

With nearly neutral pH, Clinell Sporicidal Wipes can be used on most non-invasive medical devices and equipment without corrosion.

Patented formula

Clinell Sporicidal Wipes are CE certified class IIa medical devices that contain a unique powder combination to deliver peracetic acid on demand with just the addition of water.

WHY CHOOSE CLINELL SPORICIDAL WIPES?

Improved cleaning and disinfection of room surfaces decreases the risk of healthcare associated infections⁷.

Effective sporicidal agents

Enhanced environmental cleaning with sporicidal agents of rooms housing *Clostridioides difficile* infected patients is warranted⁸. Key measures to prevent *C. difficile* transmission include correct cleaning and disinfection of hospital room surfaces daily and at discharge. For effective disinfection of *C. difficile*, a sporicidal product plus correct practices are essential^{9,10}.

SPORICIDAL AND ANTI-BIOFILM

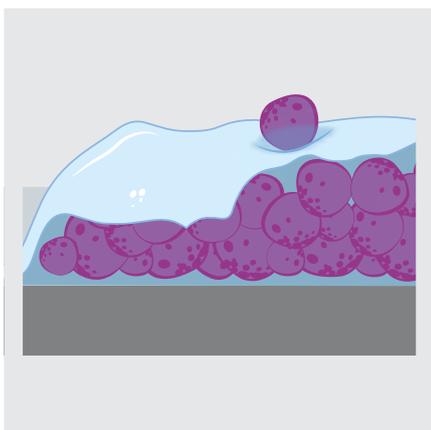
Quarternary Ammonium Compounds (QACs) are termed sporistatic³ meaning they only inhibit spore germination and/or outgrowth. Clinell Sporicial Wipes generate the oxidising agent peracetic acid, a well-known sporicidal agent. Clinell Sporicial Wipes also demonstrate efficacy against dry biofilms².

TOXICOLOGICAL HAZARDS

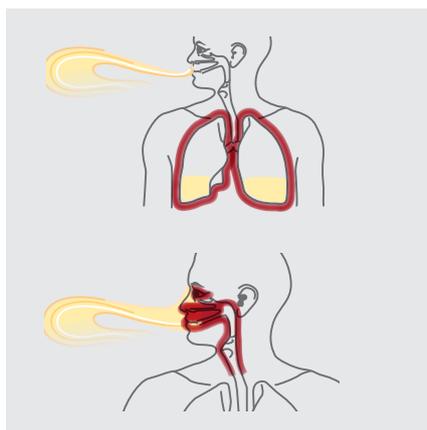
Chlorine solutions, made from tablets and powders, are hazardous to both the user and the patients: emitting toxic fumes and by-products. Chlorine has been shown to cause respiratory, nasal, skin and eye complaints¹².

CHLORINE IS INEFFECTIVE

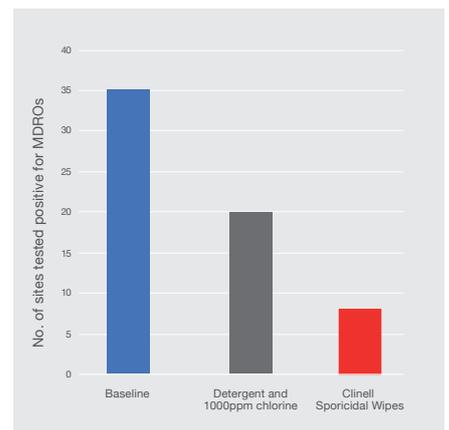
One step disinfectant wipes are more effective than two-step cleaning and disinfection with chlorine⁴. When preparing chlorine solutions, concentrations may be incorrect resulting in a disinfectant that is weak and ineffective and toxic to staff, patients and materials.



Biofilm formation provides protection and nutrients for microorganisms, allowing them to survive in hostile environments¹³.



Chlorine vapour causes lung damage, eye irritation, nose and throat damage, coughs and shortness of breath¹².



Clinell Sporicial wipes are more effective at reducing the presence of Multi-Drug Resistant Organisms than two-step cleaning and disinfection with chlorine⁴.

Chronic inhalation of chlorine can increase the risk of lung fibrosis¹²

Proven to reduce *Clostridioides difficile* associated disease by **72%**¹⁴

Peracetic acid generating wipes activated by water, for surface disinfection and cleaning of non-invasive medical devices.



Clinell Sporicidal Wipes

Containing patented technology, Clinell Sporicidal Wipes are designed for use on all surfaces of non-invasive medical devices. Upon activation with water, they generate peracetic acid levels proven to kill most microorganisms including dry biofilm pathogens.

Clinell Sporicidal Wipes are a high level disinfectant wipe highly effective against *C. difficile* spores. They clean and disinfect, providing a more effective and safe alternative to two-step detergent cleaning followed by chlorine solution disinfection³⁻⁶.

ANTIMICROBIAL ACTIVITY

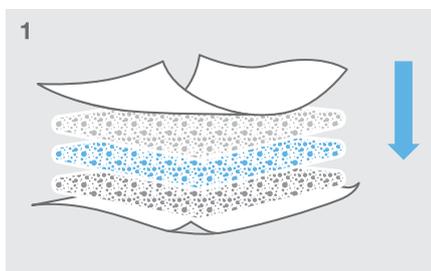
Powerful disinfecting composition using a pH optimised peracetic acid and hydrogen peroxide combination, generated from sodium percarbonate and tetraacetylenediamine.

High power oxidative kill against all microorganisms including non-enveloped viruses, bacterial endospores and dry biofilms².

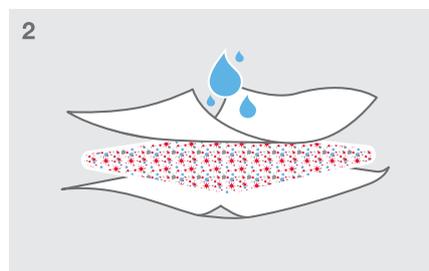
Conforms to EN1276, EN13704, EN14348, EN14476, EN14561, EN14562, EN14563 and EN16615.

* Independently tested in Professor Maillard's laboratory at Cardiff University. Test reports available on request.

BACTERIA	TEST
<i>Acinetobacter baumannii</i>	EN13727
<i>Escherichia coli</i>	EN13727
<i>Pseudomonas aeruginosa</i>	EN1276 - EN14561
<i>Staphylococcus aureus</i>	EN13727 - EN14561
<i>Enterococcus hirae</i>	EN13727 - EN14561
<i>Klebsiella pneumoniae</i> (ESBL)	EN13727
<i>Enterococcus faecalis</i>	EN13727
<i>Enterococcus faecium</i> (VRE)	EN13727
Dry <i>Staphylococcus aureus</i> biofilms	Cardiff University*
SPORES	
<i>Clostridioides difficile</i>	ASTM - E2362-09 EN13704 - EN16615
<i>Bacillus subtilis</i>	Bab et al
MYCOBACTERIA	
<i>Mycobacterium terrae</i>	EN14563 - EN14348
FUNGI	
<i>Candida albicans</i>	EN14562 - EN13727
<i>Aspergillus niger</i>	EN14562
VIRUSES	
Adenovirus	EN14476
Poliovirus	EN14476
Canine Parvovirus	



1 Dry before activation, each wipe consists of 2 non-woven fabrics bonded together with a unique powder combination in the middle layer.



2 Water activates the powder to generate high levels of hydrogen peroxide and peracetic acid.



3 This unique method of application ensures consistent efficacy, with no dilution errors.

PRODUCT INFORMATION	UNIT OF ISSUE	ORDER CODE	NHSSC
Sporicidal Wipes	Pack of 25	CS25	VJT113
Sporicidal Wall Mounted Dispenser for CS25		CSD	-

CE 0473 Class IIa Medical Device

USE DISINFECTANTS SAFELY. ALWAYS READ THE LABEL AND PRODUCT INFORMATION BEFORE USE. ALWAYS FOLLOW MEDICAL EQUIPMENT MANUFACTURER'S CLEANING PROCEDURES AND GUIDELINES.

PROBLEMS WITH EXISTING SOLUTIONS

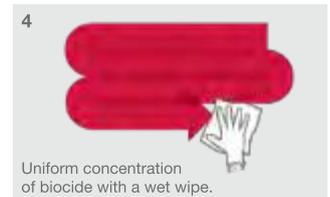
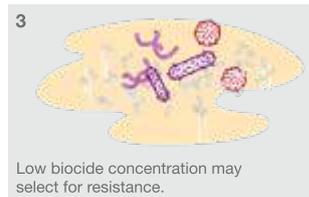
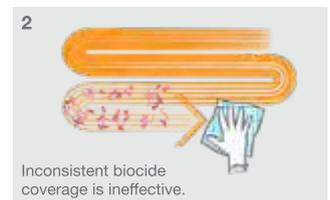
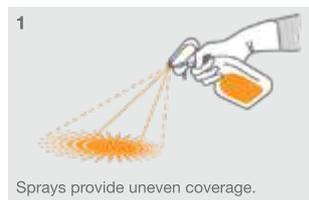
Irregular spray patterns lead to areas of low biocide concentration. Wet wipes always deliver the correct dose.

Sprays and wipes

When using sprays and dry wipes, it is common to end up with variable concentrations of biocides¹⁵. Impregnated wet wipes are significantly better at removing microbial bioburden than when using a spray and dry wipe¹⁶.

Low concentrations of biocides can cause microorganisms to develop cross-resistance to antibiotics^{17,18}.

Provided there is proper use of efficacious surface disinfectants, avoiding low concentrations of biocides, present scientific data does not suggest that resistance problems will emerge^{19,20}. Wet wipes have the advantage of delivering a pre-measured dose of biocides, avoiding the risk of resistance.



Two chamber sprays

Due to instability of the active biocide, or to prevent degradation over time, dual chamber sprays function by mixing two solutions within the spray head. It is common to use sprays at an angle, to shoot down onto the surface, meaning more solution will enter the head from one chamber than the other. This creates an uneven mix which can lead to suboptimal concentration of biocides.

In a laboratory setting, biocides may not be tested from dual chamber spray bottles – hence test data may not reflect practical, in-use, conditions. In addition to affecting the efficacy of the biocide, inconsistent mixing increases wastage – reducing number of uses and resulting in increased cost.

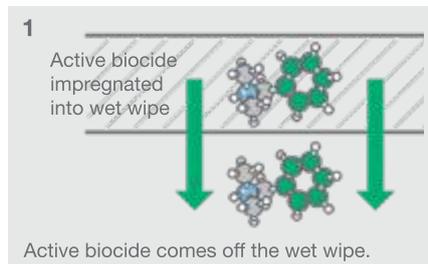
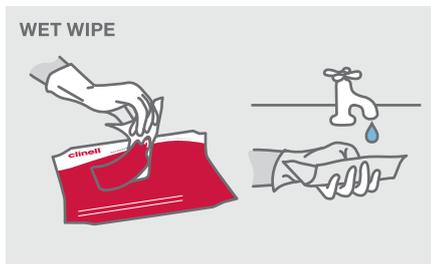
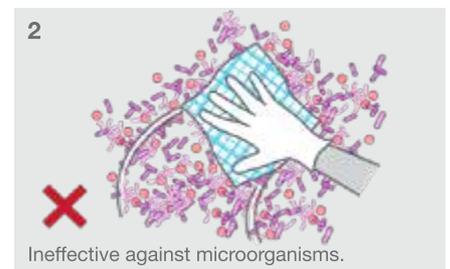
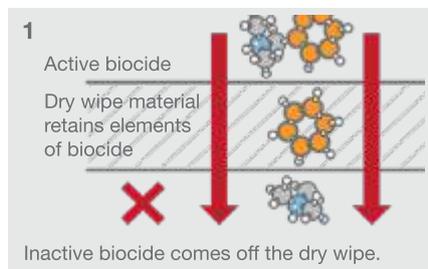
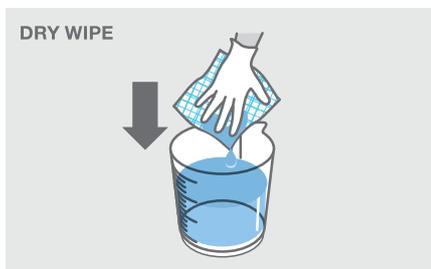
The final mixed can build up over time and clog the nozzle. Blocked nozzles lead to even greater inconsistency of coverage than usual, resulting in low concentrations of biocides, which can allow microorganisms to develop cross-resistance¹⁷.



Wet wipes are significantly better at removing microbial bioburden than spray and dry wipes⁴

The molecular structure of the dry wipe can alter the formulation of the disinfectant by binding certain components and rendering them inactive²¹.

Do dry wipes affect your disinfectant?



Dry wipes made of either synthetic or natural materials can bind the biocide, changing the concentration of active disinfectant released²¹.

This means that the liquid coming off the dry wipe may not be the same concentration as the liquid that went into it. For example, the combination of quaternary ammonium compounds (QACs) with an inappropriate type of fabric will effectively abolish its antimicrobial activity²².

Efficacy testing of disinfectant sprays and solutions has been performed on the liquid.

Efficacy testing of wet wipes is performed on the solution released by the wipe, and the wet wipe itself, so you know the end product exactly conforms to efficacy testing data.

Dry wipes can interfere with the action of hospital disinfectants²¹

Pre-impregnated wet wipes are proven to increase staff compliance²³



CHLORINE SOLUTIONS

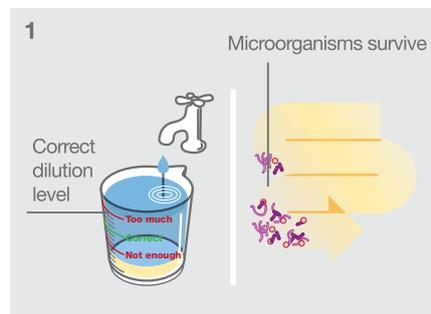
If a used wipe is plunged back into a bucket of chlorine, organic matter can be introduced. This accelerates breakdown of the active disinfectant.

Double dipping

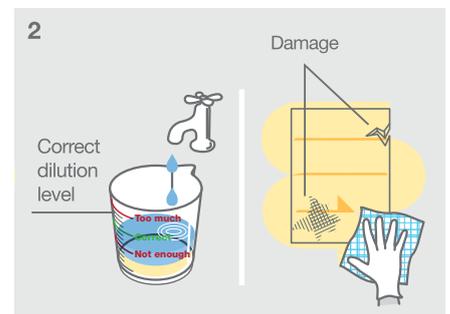
When a used wipe is dipped back into the bucket, organic matter is introduced, increasing breakdown of the active disinfectant.

The incompatibility of cloths and chlorine-based products has been clearly demonstrated¹¹. Chlorine solution is tested in the laboratory for its effectiveness, however testing is not done on solution in conjunction with the cloth, but only on the solution by itself.

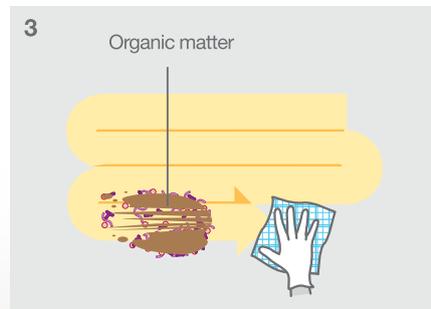
Shown to be more effective than two-step detergent cleaning followed by chlorine disinfection, Clinell Sporicidal Wipes contain detergent to clean as they disinfect whilst remaining effective in dirty conditions^{1,3}.



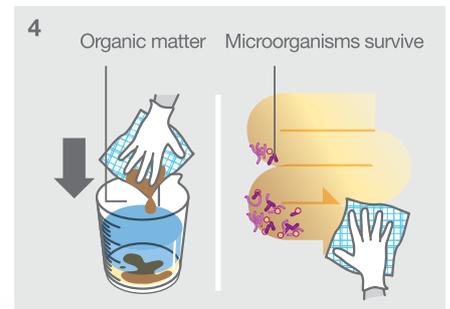
Over diluted solutions are weak and ineffective.



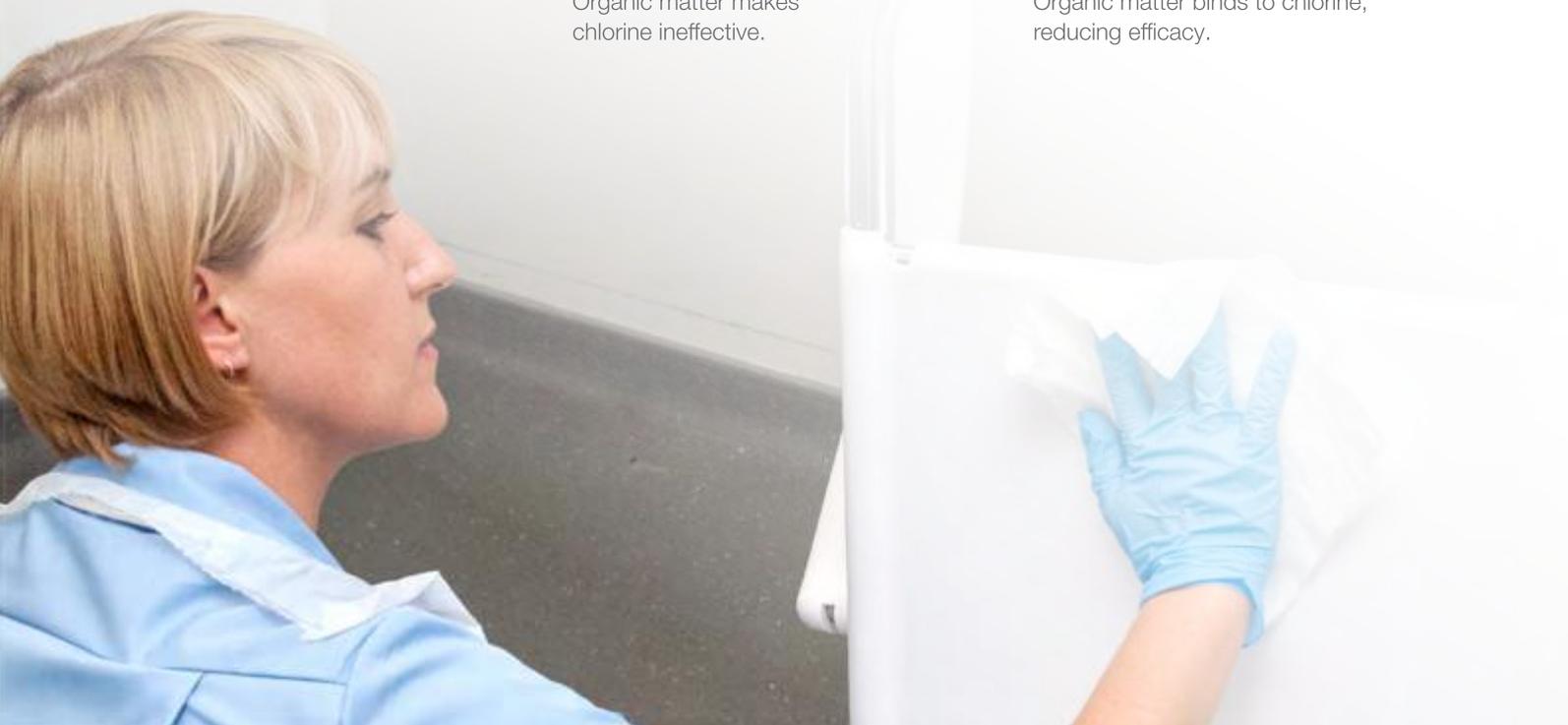
Under diluted solutions are toxic and can cause damage to materials.



Organic matter makes chlorine ineffective.



Organic matter binds to chlorine, reducing efficacy.



DRY BIOFILMS

Dry biofilms pose significant challenges in clinical settings because they protect organisms contained within them, they are difficult to eradicate and are invisible to the naked eye¹³.

Biofilms within healthcare settings

MICROORGANISM ACCUMULATION

Microorganisms accumulate and attach to surfaces forming communities known as biofilms²⁴. It is thought that biofilm formation provides protection and nutrients for microorganisms allowing them to survive in hostile environments¹³.

DIFFICULT TO REMOVE

Biofilms are difficult to remove and survive decontamination methods previously thought to be effective in environmental decontamination²⁵. The presence of dry biofilms harbouring bacterial pathogens is virtually universal on commonly used items in healthcare². Many existing disinfectants do not demonstrate efficacy against dry biofilms.

FOUND ON COMMONLY USED HEALTHCARE ITEMS:

- Patient folders
- Clipboards
- Chairs
- Commodes
- Sanitising bottles
- Trolleys
- Keyboard keys

Measuring efficacy against dry biofilms

In collaboration with Cardiff University we have developed a method that has enabled measurement of the efficacy of Clinell Sporidical Wipes against dry biofilms based on transferability, regrowth and removal²⁶.

Transferability

Determines how well pathogens from dry biofilm can transfer to other surfaces post-wiping.

Regrowth

Measures the time needed for a treated biofilm to regrow.

Removal

Log reduction gives the number of bacteria that are removed following wiping.



Clinell's industry leading aftercare and training services

Including a revolutionary training kit, specialised nurse trainers, educational materials, customised posters and dispenser installation.

Contact us on: 020 7993 0030 or info@clinell.com.

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