



Microdacyn® Wound Care Solution Microdacyn® Hydrogel

Clinically Proven To Heal Wounds Faster, With Fewer Infections



Antimicrobial | Anti-Biofilm | Healing | How to Use | Clinical Evidence

Microdacyn is a class IIb Medical Device for use in the debridement and moistening of acute and chronic wounds, ulcers, cuts, abrasions and burns including those located in any human cavity such as the oral, nasal or ear. Sodium hypochlorite and hypochlorous acid are ancillary substances may have a local antimicrobial effect. Through reducing the microbial load and assisting in creating a moist environment, it enables the body to perform its own healing process. Microdacyn® Wound Care can be broadly applied within a comprehensive wound treatment. Do not use if sensitive to hypochlorous acid or sodium hypochlorite. Always read the instructions for use, detailed instructions can be found at www.microdacyn.com.au



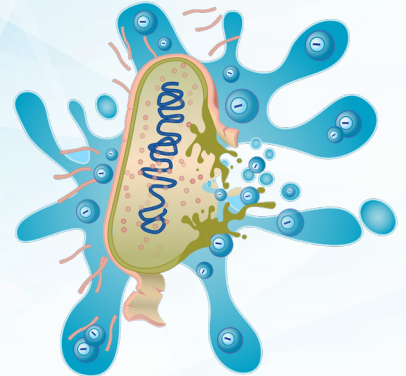
Antimicrobial | Biofilm

Super-oxidized solutions (SOS) and hydrogels utilize physiological concentrations of naturally occurring reactive oxygen species such as hypochlorous acid to induce osmolysis in a non-antibiotic & chemical free process

Hypochlorous acid is naturally present in the human body & is produced as a natural response to infection by the white blood cells in our immune system through a mechanism known as an oxidative burst.

Unlike traditional antiseptics & wound washes Microdacyn® only causes damage to single cell microbes such as bacteria and is not cytotoxic to human cells allowing the delicate cells involved in healing to progress unhindered¹⁵

Recent consensus²⁸ has concluded that **rather than inhibit wound healing, Microdacyn® improves wound healing** and is indicated for use without restriction in all areas of the anatomy due to its low cytotoxicity. This makes Microdacyn® highly versatile



Proven >99.99% effective against:
Bacteria (incl MRSA), Fungi, Viruses, Spores & Uniquely Penetrates Biofilms²

“Use antiseptics at the lowest effective concentration to minimize harm to skin and tissue cells involved in wound healing”²¹

International Wound Infection Institutes (IWII) Clinical Practice Guidelines 2016

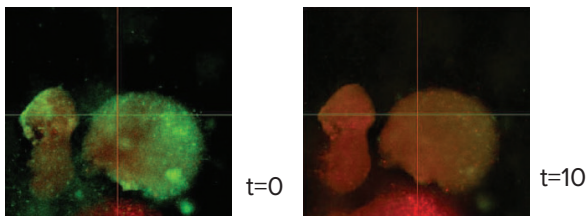
Treatment	Betadine®	Prontosan®	Microdacyn®
Generic Name	Antiseptic	Surfactant-based Antiseptic	Super-Oxidised Solution
Concentration	10%	0.1%	0.004%

The enormous difference in germicidal potency is due to the fact that pure HOCl as an uncharged species can penetrate microbial cell walls, whereas charged ionic species cannot¹

Super-Oxidised Solutions Do Not Promote Bacterial Resistance²¹

Biofilm

Super-oxidised solutions *“rapidly penetrate biofilms killing microbes from within”²¹*



An example of this rapid penetration is shown here:

Fluorescence microscopy of a mature, 6 day, *Pseudomonas aeruginosa* biofilm before and after 10 minutes of repeated exposure. It is clear to see uniform penetration and eradication of living microbes throughout the biofilm

Green | Living Microbes Red | Dead Microbes

Inflammation | Healing | Clinical Evidence



The low concentration super-oxidizing species found in Microdacyn® are naturally occurring in many of the bodies oxygen-dependent healing mechanisms including angiogenesis and tissue oxygenation

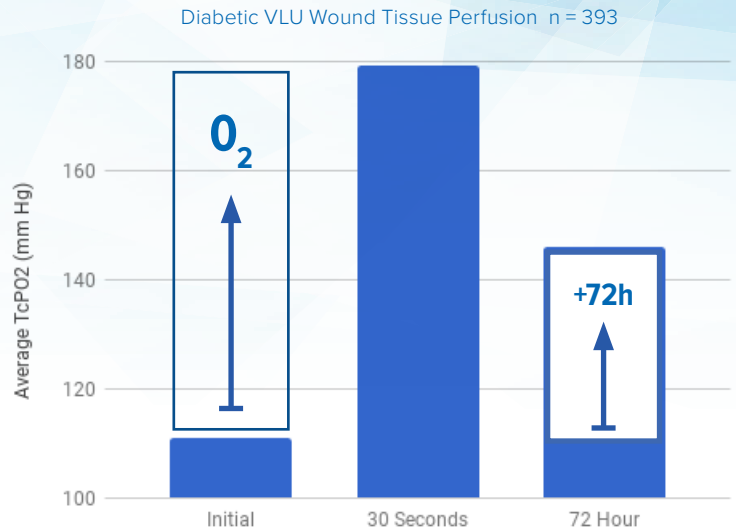
The use of Microdacyn has been demonstrated to:

- Reduce Inflammation, Itch & Irritation²⁰
- Increase available oxygen (TcPO₂ - mmHg)^{3,5}

Here we observe the average tissue oxygenation effects when applying Microdacyn® to 393 non-insulin dependent diabetic (NIDDM) patients venous leg ulcers. (VLU)

The TcPO₂ levels are significantly increased to quickly improve tissue conditions within the wound and are sustained above baseline for up to 72 hours⁵

Oxygen perfusion is crucial to achieving wound healing.



Clinical Evidence

Microdacyn® is clinically proven to heal wounds faster than saline or antiseptics²³



Improves Healing

- **Improved Healing**
 - Improve wound healing^{5-9,11,13-15}
 - Reduce wound healing time^{5-9,11,13-15}
 - Improve wound bed oxygen supply (TcPO₂)^{3,5}
 - Improve wound bed granulation^{3,11,13}
 - To be non-cytotoxic^{1-2,11,14,19,21}



Prevents Infection

- **Prevents Infection**
 - Improve infection control^{2,4,7,14,16}
 - Reduce the requirement for antibiotic use to manage infection¹⁰
 - Reduce post-surgical infection rate^{2,7,12,15}



Reduces Inflammation

- **Patient Well Being**
 - Reduce pain associated with wound cleansing¹⁷
 - Reduced wound associated malodour¹¹
 - Reduce patient length of stay^{8,16-17}
- **Additionally**
 - To be at least as effective as certain oral antibiotics for treatment of mild diabetic foot infections¹⁰
 - To be a wider spectrum antimicrobial compared to commonly used topical-antimicrobials^{12,17-18}

How to Use | Product Details

Microdacyn® should be applied liberally at every dressing change or up to 3 times daily in place of saline or antiseptics
Microdacyn® is used in conjunction with manual debridement not as a replacement.

1 Saturate



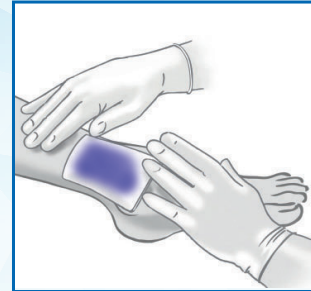
Irrigate the wound by **generously** applying Microdacyn® Wound Care Solution directly onto/into the wound to the point of saturation. Microdacyn® can also be used to clean the surrounding peri-wound.

2 Irrigate + Clean



Use Microdacyn® liberally to irrigate/flush the wound clean during debridement. A gauze soaked in Microdacyn can be used to manually clean with light abrasion, as a compress soak to aid desloughing or both to achieve a clean wound bed ready for dressing.

3 Treating & Healing



To the **clean wound** bed, apply gauze soaked in Microdacyn® for up to 10 minutes. This will assist in reducing the remaining bacterial load and biofilm post debridement. Extending contact time will improve anti-biofilm efficacy
Do Not Rinse Out

Cover & Dress

100%
Compatible
incl Ag

+ Higher Risk Patients, Infected, Chronic or Non-Healing Wounds



Increasing the contact time in situ increases antimicrobial effectiveness ensuring persistent microbes and biofilms are eliminated

If starting treatment in an existing chronic wound, soak for 15+ minutes for maximum effect.
Microdacyn® soaked gauze is a suitable packing medium

+ Spray On Hydrogel



Apply 2-5mm thick when a hydrogel is suitable to donate moisture and promote autolytic debridement.

Microdacyn® Hydrogel will gel on contact with the air immediately after being sprayed. It may be refrigerated before use for soothing burns and can be used several times a day. For chronic wounds it may remain on the wound for up to 3 days



Microdacyn® Wound Care

Super-Oxidised Water, Sodium Chloride (0.022%), Hypochlorous Acid (0.004%), Sodium Hypochlorite (0.004%), Ancillary Substances including Oxygen & Ozone

Microdacyn® Hydrogel

Super-Oxidised Water, Sodium Chloride (0.066%), Hypochlorous Acid (0.004%), Sodium Hypochlorite (0.002%), Ancillary Substances including Oxygen & Ozone
Additionally Sodium Magnesium Fluorosilicate Gelling Agent (3.0%)

“Stop anointing wounds & start cleansing wounds”

International Wound Infection Institutes
Clinical Practice Guidelines

Microdacyn® is compatible with:

- All Wound Dressings
- Leaving Soaked Gauze in the Wound
- Pulse Lavage / Wound Irrigation
- Under Occlusion
- NPWTi & Ultrasonic Debridement

Microdacyn® can be used on:

- Skin
- Mucosa
- Exposed Ligament, Joints, Bones & Tendons
- Sensitive Areas Such as Eyes
- Children

Product Information

- Ready-to-use, pH neutral solution
- 24 month unopened shelf life
- Discard Within 60 Days of Opening
- Does not promote bacterial resistance²¹
- Available from your local pharmacy

Microdacyn®.com.au

Product Description	Internal Code	
Microdacyn® Wound Care Solution 120ml	MDWC120	Box 24
Microdacyn® Wound Care Solution 250ml	MDWC250	Box 12
Microdacyn® Surgical Irrigation Solution 990ml	MDSIWT990	Box 6
Microdacyn® Hydrogel 60g	MDHG60	Box 24