

**HARTMANN**



# Prevention of Pelvic Region Skin Injury



- + Understanding pelvic region skin injury
- + How to protect skin integrity
- + Clinical evidence recommendations

# Prevention of Pelvic Region Skin Injuries

Common pelvic region skin injuries such as incontinence associated dermatitis (IAD) and pressure injuries can have a significant impact on individuals' well-being, causing physical pain and mental distress, reducing their quality of life.<sup>1</sup> Pelvic region skin injuries also add to the workload of healthcare staff and directly contribute to increased care costs.

Healthcare industry discussions about pelvic region skin injuries tend to focus on best practices in treatment and assessment. However, there is consensus in the literature that pelvic region skin injuries are largely preventable. Implementing the right prevention strategy can improve clinical outcomes for the consumer and reduce the burden on healthcare.

The solution? A simple three-step skincare protocol that cleans, protects and cares for pelvic region skin.

IAD and pressure injury are costly. IAD can cost \$3,294 per month, assuming 20% occurrence in a 100-bed aged care facility.<sup>2</sup>

A stage IV pressure injury can result in care costs of \$22,446 and take up to 255 days to heal.<sup>3</sup>



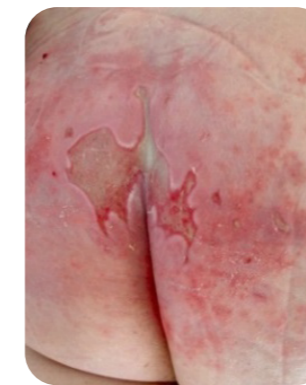
# Understanding Pelvic Skin Injury

When pelvic region skin is repeatedly exposed to moisture, such as sweat or urine, it becomes vulnerable to damage. Overhydration softens the stratum corneum – the skin's outermost layer, resulting in painful maceration.

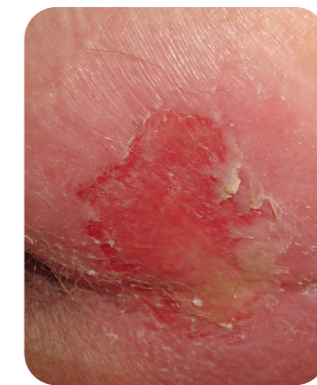
At the same time, urine, faeces and alkaline soaps change the pH of the acid protection mantle, the skin's first line of defence. Bacteria, viruses and fungi are then able to penetrate, triggering irritation. Left untreated, skin redness and excoriation can develop into a skin injury, potentially IAD and/or pressure injury.

Incidences of IAD and pressure injuries are more prevalent in older people. Intercellular lipids play an essential role in the epidermal barrier. But as we age, these intercellular lipids undergo changes in composition and structure, and the stratum corneum also grows thinner. External irritants can now pass through more easily. Mature skin is

## Pelvic Region Skin Injuries can include:



Incontinence Associated Dermatitis (IAD)



Pressure Injury

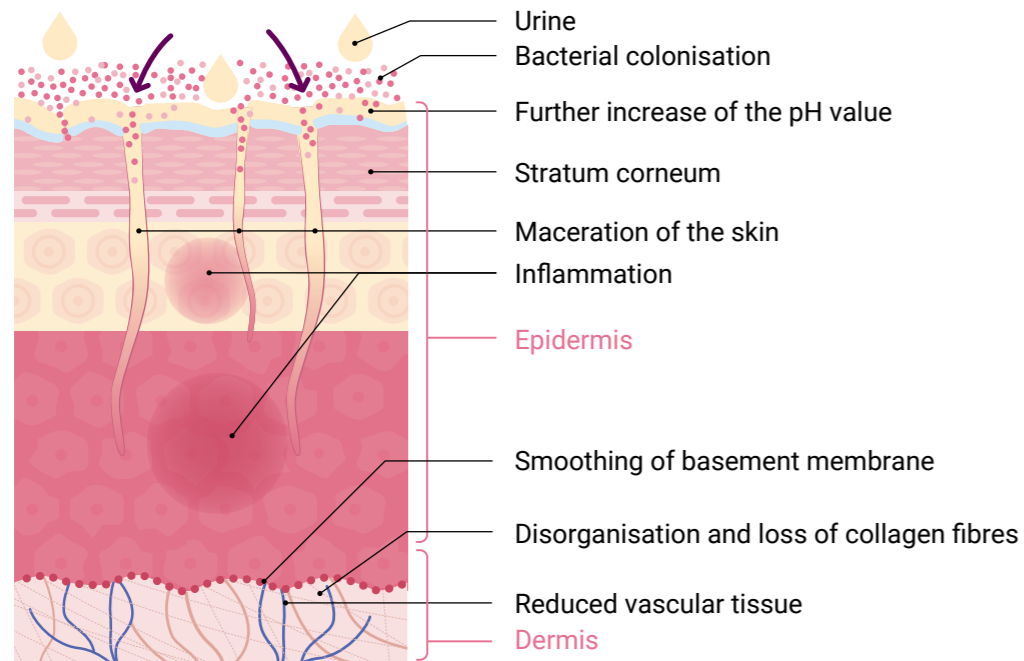


A study of IAD rates among aged care residents found that up to half of those affected by incontinence will develop IAD.<sup>4</sup>

\*Image source: See page 10 - References

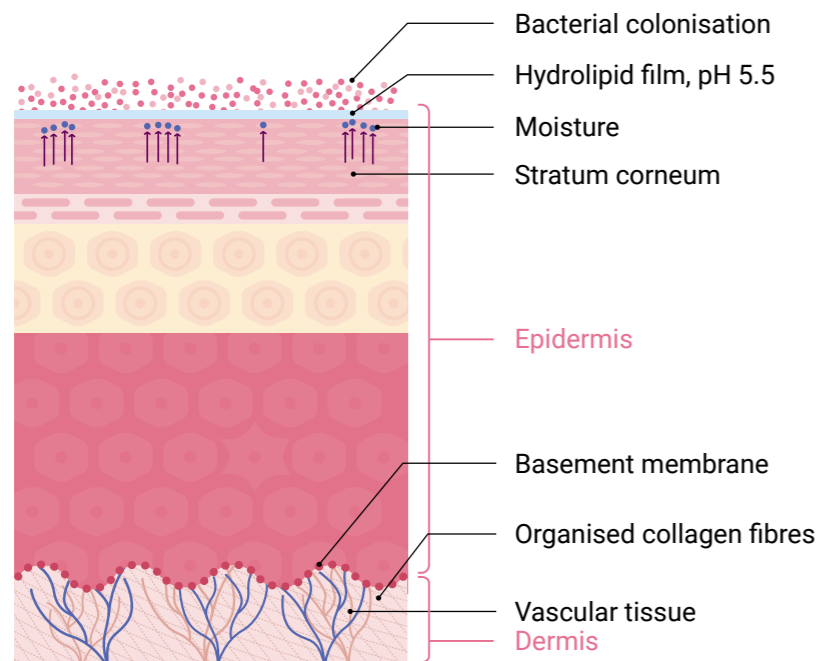
# Impaired Skin

The maceration of the skin on contact with moisture is reinforced in mature skin<sup>5</sup> and can impair the barrier function against unwanted water, chemicals and microorganisms.<sup>6</sup> A disturbance of the skin barrier may lead to inflammations.<sup>7,8,9</sup>



# Healthy Skin

The skin's hydrolipid film with pH 5.5 regulates bacterial colonisation and barrier function that prevents both drying of the skin and overhydration.<sup>7,10</sup>



# How to Protect Skin Integrity

Assessment of pelvic region skin can be complex. For example, IAD and pressure injuries share similar presentations and can co-exist in the same location, often resulting in misclassification, delayed healing, and increased costs. IAD is what is known as a top down injury, meaning that it begins on the skin surface, whereas pressure injuries are bottom up, starting with changes to the soft tissue beneath the epidermis. IAD is also a statistically significant risk factor in having a pressure injury.

Literature points to a structured skincare regime as being key to prevention of pelvic region skin injuries.<sup>11-13</sup>

Prevention of pelvic skin injury requires a three-step protocol using products specifically formulated to clean, to protect and to care. Select products on their ability to clean gently and effectively without further stressing the skin, and to protect and nourish it.

People with IAD have a

**↑ 37.5%**

**greater risk of developing a pressure injury.<sup>14</sup>**



# Clinical Evidence Recommendation

## CLEAN

- Use a low surfactant, pH balanced cleanser to promote healthy skin.<sup>11,15</sup>
- Use a product that will gently clean and moisturise at the same time.<sup>11</sup>
- Avoid traditional highly alkaline soaps and water.<sup>11,15</sup>

## PROTECT

- Protect the skin from moisture sources (e.g. incontinence) to reduce the risk of skin damage.<sup>13</sup>
- Use a pH balanced formulation that soothes and protects the skin.

## CARE

- Use a moisturiser to maintain moisture balance and reduce the risk of skin damage.<sup>13</sup>
- Use a product that is suitable for sensitive and stressed skin.

# The MoliCare® Skin Holistic Solution

The MoliCare Skin range is an easy to use, complete cleanse, protect and care solution that promotes skin integrity. MoliCare Skin products are pH balanced to promote healthy skin and contain specially formulated active ingredients to nourish and protect the skin.

## CLEAN, PROTECT & CARE



### MoliCare Skin 3in1 Wet Wipes

- Cleanses, protects and moisturises the skin in one simple step.
- Have a mild surfactant, pH-balanced formulation which supports the acid protection mantle, and so help to prevent skin deterioration.
- Contains Aloe Vera, Chamomile and Allantoin to moisturise, nourish and support skin regeneration.
- Contains Almond oil, a natural source of essential fatty acids and provides occlusive effect to protect the skin

## CLEAN



### MoliCare Skin - CLEAN

- Have a mild surfactant, pH-balanced formulation which supports the acid protection mantle, and so help to prevent skin deterioration.
- Contain moisturising and lipid restoring ingredients to promote skin integrity and reduce irritation.
- Are suitable for sensitive and irritated skin.
- MoliCare Skin No Rinse products enable effective, convenient cleansing without using water, helping to preserve skin integrity.

## PROTECT & CARE



### MoliCare Skin - PROTECT & CARE

- Contain the Nutriskin® Protection Complex with natural essential fatty acids, amino acids, almond oil and creatine to strengthen and regenerate the skin's natural barrier function.
- Water-in-oil-in water emulsion for rapid and deep penetration of skin layers for long lasting full protection.\*
- Have a pH-balanced formulation that soothes, protects and supports hydration of the skin.\*
- Form a transparent protective film on the skin to repel moisture and external irritants.
- Are suitable for sensitive and irritated skin.

\*MoliCare Skin Barrier Cream only



# The MoliCare® Skin Difference

A three-step skin care preventative strategy includes selecting the right products to suit the assessed needs of the skin. Skin at lower risk of irritation requires products that can support and maintain the acid protection mantle. While skin at a higher risk of irritation requires skin care formulations designed to penetrate the deeper layers of the skin for maximum nourishment and protection.

MoliCare Skin formulations use a combination of humectants, emollients and occlusives, to provide an optimal moisture balance for healthy skin<sup>16</sup>. Ingredients that provide mechanical protection for transepidermal water loss (TEWL), e.g. petrolatum, lanolin, or higher concentrations of synthetic silicone are avoided, as they provide little or no nourishment to the skin.

Active Ingredient	What is it?	Benefit	MoliCare Skin Products
<b>Panthenol</b>	Vitamin B5 Humectant – Moisturiser	<ul style="list-style-type: none"> <li>Moisturises the skin</li> <li>Helps fast regeneration and wound healing</li> <li>Smooths skin</li> </ul>	<ul style="list-style-type: none"> <li>Cleansing Foam</li> <li>Wash Lotion</li> <li>Shampoo</li> <li>Wash Gloves</li> </ul>
<b>Creatine</b>	Humectant – Moisturiser	<ul style="list-style-type: none"> <li>Stimulates the skin's energy metabolism, helping skin cell renewal</li> </ul>	<ul style="list-style-type: none"> <li>Cleansing Foam</li> <li>Barrier Cream</li> <li>Protection Foam</li> </ul>
<b>Almond Oil</b>	Natural Emollient – Moisturiser with Occlusive Effect	<ul style="list-style-type: none"> <li>Restores lipids and softens and smooths the skin</li> <li>Provides occlusive effect to protect against moisture and irritants</li> </ul>	<ul style="list-style-type: none"> <li>Wash Lotion</li> <li>Shampoo</li> <li>Barrier Cream</li> <li>Protection Foam</li> <li>3in1 Wet Wipes</li> </ul>
<b>Chamomile</b>	Humectant – Moisturiser	<ul style="list-style-type: none"> <li>Anti-bacterial and anti-inflammatory effect</li> <li>Soothes irritated skin</li> </ul>	<ul style="list-style-type: none"> <li>Wash Gloves</li> <li>3in1 Wet Wipes</li> <li>Moist Skin Care Tissues</li> </ul>
<b>Linseed Oil</b>	Omega 3 Essential Fatty Acid – Occlusive	<ul style="list-style-type: none"> <li>Boosts production of new, robust skin cells to speed up the regeneration of aged skin</li> <li>Anti-inflammatory effect (occlusive – barrier effect)</li> </ul>	<ul style="list-style-type: none"> <li>Barrier Cream</li> <li>Protection Foam</li> </ul>
<b>Amino Acids</b>	Humectant – Moisturiser	<ul style="list-style-type: none"> <li>Restores the acid protection mantle</li> </ul>	<ul style="list-style-type: none"> <li>Barrier Cream</li> <li>Protection Foam</li> </ul>
<b>Allantoin</b>	Humectant & Emollient – Moisturiser	<ul style="list-style-type: none"> <li>Naturally soothing and healing agent for irritated skin</li> </ul>	<ul style="list-style-type: none"> <li>Barrier Cream</li> <li>3in1 Wet Wipes</li> </ul>

# Choose your MoliCare® Skin solution

MoliCare Skin CLEAN, PROTECT AND CARE					
Code	Product Name	Size	Units Per Pack	Pack Per Carton	Old Code
995096	MoliCare Skin 3in1 Wet Wipe <span style="background-color: yellow; border-radius: 50%; padding: 2px;">NEW</span>	19 x 29.5 cm	50 wipes/pack	12	N/A

MoliCare Skin CLEAN					
Code	Product Name	Size	Units Per Pack	Pack Per Carton	Old Code
995075	MoliCare Skin Moist Skin Care Tissues	20 x 30 cm	50 tissues/pack	12	995038
995074	MoliCare Skin Impregnated Wash Gloves	17.5 x 12 cm	8 gloves/pack	24	995056
995016	MoliCare Skin Cleansing Foam	400mL	1	12	N/A
995077	Molicare Skin Rinse Free Shampoo Cap <span style="background-color: yellow; border-radius: 50%; padding: 2px;">NEW</span>	One size fits all	1 cap/pack	30	N/A
995076	MoliCare Skin Shampoo	500mL	1	12	995017
995089	MoliCare Skin Wash Lotion	500mL	1	12	995014
995047	MoliCare Skin Wash Lotion (Sachet)	10mL	1	100	N/A

MoliCare Skin PROTECT					
Code	Product Name	Size	Units Per Pack	Pack Per Carton	Old Code
995086	MoliCare Skin Barrier Cream	200mL	1	12	n/a
995051	MoliCare Skin Barrier Cream (Sachet)	10mL	1	100	n/a
995087	MoliCare Skin Protection Foam	100mL	1	12	n/a

MoliCare Skin CARE					
Code	Product Name	Size	Units Per Pack	Pack Per Carton	Old Code
995088	MoliCare Skin Body Lotion	500mL	1	12	995019
995048	MoliCare Skin Body Lotion (Sachet)	10mL	1	100	n/a
995020	MoliCare Skin Hand Cream	200mL	1	12	n/a

References

1. Campbell et al., (2020) A clinical guide to pelvic skin assessment. Available online at www.woundinternational.com.
2. Bliss et al., An economic evaluation of four skin damage prevention regimens in nursing home residents with incontinence; economics of skin damage prevention; J Wound Ostomy Continence Nurse. 2007;34(2): 143-152. April 2018 AUD exchange rate applied.
3. Nguyen,K-H., Chaboyer,W., Whitty,J., Pressure Injury in Australian Public Hospitals: A cost of illness study, Australian Health Review, 2015.
4. Halfens R. 3. G, Meesterbererds E, van Nie-Visser N. C., Lohrmann C., Schênher S., Meljers J. M.M., Hahn \$., Vangelooven C. & Jos M.G.A. Schols International prevalence measurement of care problems: results, Journal of Advanced Nursing 698), May 2013.
5. Minematsu T, et al. J Dermatol Sci. 2011;62(3):160-8.
6. Langemo D, et al. Adv Skin Wound Care. 2011;24(3):126-40; quiz 141-2.
7. Beeckman D. Wounds International 2015 [Internet]. Available from www. woundsinternational.com.
8. Beeckman D, et al. Res Nurse Health. 2014;37(3):204-18. 9. Gray M, et al. J Wound Ostomy Continence Nurs. 2012;39(1):61-74.
10. Beeckman D, Van Damme N, Van den Bussche K, De Meyer D. Dermatological Nursing. 2015;14(4):32-6.
11. Ousey et al; (2017) IAD Made Easy. Available online at www.woundsinternational.com.
12. KH Park et al Effect of a Structured Skin Care Regime on Patients with Faecal incontinence 2014.
13. Haesler, (2018) Evidence Summary: Skin care to reduce the risk of pressure injury. Wound Practice & Research.
14. Pathology - E-Book: Implications for the Physical Therapist https://books.google.com.au/books?isbn=0323291228 Catherine C. Goodman, Kenda S. Fuller-2014.
15. Fletcher J, Beeckman D, Boyles A et al (2020) International Best Practice Recommendations: Prevention and management of moisture-associated skin damage (MASD). Wounds International. Available online at www.woundsinternational.com.
16. Harwood A, Nassereddin A, Krishnamurthy K. Moisturizers. 2022 Aug 21. In: StatPearls [Internet]. Treasure Island (FL): StatPearls Publishing; 2023 Jan-. PMID: 31424755.

\*Image source:

Incontinence Associated Dermatitis (IAD): Beeckman D., et. al.. The Ghent Global IAD Categorisation Tool (GLOBIAD). Skin Integrity Research Group - Ghent University 2017.

Pressure Injury: Illustrations purchased from the National Pressure Ulcer Advisory Panel 2011 European Pressure Ulcer Advisory Panel, National Pressure Injury Advisory Panel and Pan Pacific Pressure Injury Alliance. Prevention and Treatment of Pressure Ulcers/Injuries: Clinical Practice Guideline. The International Guideline. Emily Haesler (Ed.). EPUAP/NPIAP/PPPIA:2019

Notes

Series of horizontal lines provided for taking notes.



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