Patient story one

Figure 1.

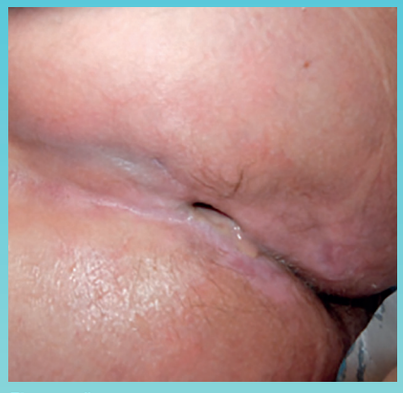

Figure 2.

This patient was an elderly gentleman who had been in hospital for prostate cancer and had had several rounds of chemotherapy. He also had spinal cord compression and so his mobility was extremely poor, which resulted in a category 3 pressure ulcer, with significant damage to the periwound skin (*Figure 1*). The wound was locally infected and so he was started with an antimicrobial dressing within the cavity, which was covered with a superabsorbent polymer (SAP) dressing, Zetuvit® Plus Silicone Border (HARTMANN UKI), ensuring that the dressing had contact with the skin at all times.

Initially, the dressing was changed twice daily, and he only had short periods out of bed. This had a significant impact on his quality of life because it was so restricted and he was extremely embarrassed by the odour from the wound. However, after two weeks' treatment, improvement was seen in the condition of the periwound skin. The odour had started to reduce and the patient felt willing for his family to visit, which he had not previously wanted because of the odour.

After six weeks, the periwound area had fully healed (*Figure 2*) and the patient was feeling well. The nurses reported that the dressings were easy to apply and remove and the odour had completely gone. The patient's quality of life changed because he was able to get out of bed, go to the local pub, and the nurses were able to start topical negative pressure therapy.

surface (Wounds UK, 2013). While some primary dressings require a separate method of fixation, or do not absorb much and so need a secondary absorbent dressing, others provide both the fixation and fluid-handling function in one (WUWHS, 2019). The dressing or dressing combination selected should be able to absorb exudate in a way that:

- Facilitates a moist wound healing environment without leakage or damage to the wound bed or surrounding skin (and be compatible with any periwound skin protectant products used)
- Remain in place for a suitable length of time (WUWHS, 2007).

Table 5: Causes of periwound skin damage (adapted from Bianchi, 2012)

■ Exudate – the harmful components of some exudate, exudate sitting on the skin causing maceration
■ Adherence of dressings — aggressive adhesives and materials
■ Allergic reactions to the components of dressings
■ Repeated application and removal of dressings
■ Presence of wound infection
■ Underlying aetiologies, e.g. those causing chronic oedema

Superabsorbent dressings have been designed to manage a high volume of exudate and have greater fluid-handling capacity than traditional foam dressings (Gardner, 2012; Barrett, 2015). They vary in the way that they absorb and retain fluid, and how they function under compression (Wounds UK, 2013).

Some superabsorbents can lock fluid inside the dressing — fluid which may contain bacteria and harmful MMPs (Wounds UK, 2013). These dressings have increasingly been used to manage excess exudate, which has been acknowledged in a recent consensus document (WUWHS, 2019).

It is also important to manage any underlying conditions which may be causing the high volume of exudate, such as infection and/or biofilm, as well as the removal of devitalised tissue within the wound bed by debridement.

PREVENTING PERIWOUND SKIN DAMAGE

Having a knowledge of the different causes of periwound skin damage helps to identify risk, initiate appropriate treatment strategies or allow referral to appropriate services (Bianchi, 2012). The potential causes of periwound skin damage are outlined in *Table 5*.

Highly exuding wounds often require more frequent dressing changes and the adherence of the dressing material to the wound bed

Remember...

Exudate is a good indicator of the state of a wound. Changes in colour, viscosity or smell should be a trigger to reassess the wound.

and periwound skin can damage newly formed cells and cause pain and distress to patients (Wounds UK, 2013). It can also lead to damage to the skin's surface and stripping of the skin's barrier, which in turn initiates an inflammatory skin reaction leading to oedema and pain (Young, 2017).

Prevention of periwound skin damage begins with a thorough wound and skin assessment and a management plan that includes avoiding contact between the periwound skin and moisture through appropriate device or dressing selection (WUWHS, 2019). Alongside appropriate dressing use, which should be applied in close contact with the wound as described in the patient stories here, skin protectants can be used which form a barrier between the skin and moisture (Beeckman et al, 2015). If there is already periwound skin damage present then it will be important to also restore the skins properties (Beeckman et al, 2015).

"Highly exuding wounds often require more frequent dressing changes and the adherence of the dressing material to the wound bed and periwound skin can damage newly formed cells and cause pain and distress to patients.

Prevention of periwound skin damage should always begin with thorough wound and skin assessment, and a management plan that protects periwound skin from the damaging effects of excess exudate through appropriate dressing or device choice (WUWHS, 2019). As well as selecting appropriate dressings — which should be applied in intimate contact with the wound, as in the patient stories here — skin protectants can be used to form a barrier between the skin and moisture (Beeckman et al, 2015).

Remember...

Management of the underlying cause of excess exudate and underlying comorbidities, along with enlisting the cooperation of the patient, are important if timely wound healing is to be achieved (Beldon, 2016).

Patient story two

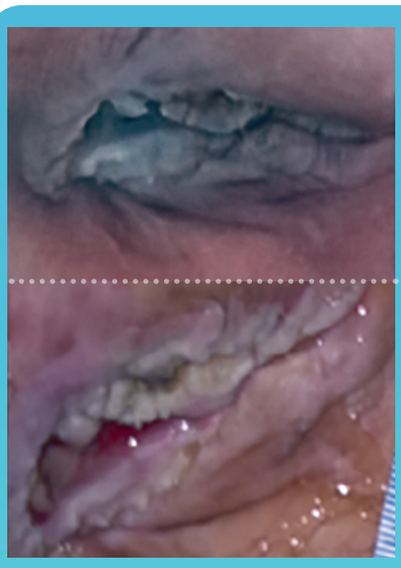

Figure 3.

This 24-year-old patient had a spinal injury. He had had four category 4 pressure ulcers for the past seven years and was awaiting plastic surgery. His concordance with treatment was poor, and he insisted on using foam dressings with adhesives, which were not managing the volume of exudate effectively and there was a great deal of periwound skin damage resulting in wound infection (*Figure 3*).

The decision was taken to try Zetuvit® Plus Silicone Border, again ensuring that the dressing was in intimate contact with the wound surface.

After just two weeks' treatment, the condition of the periwound skin started to improve (*Figure 4*) and the patient was concordant with treatment and a great deal calmer. He liked the dressing and was able to shower, and commented that the dressing was actually the 'boss', as it was improving his quality of life.

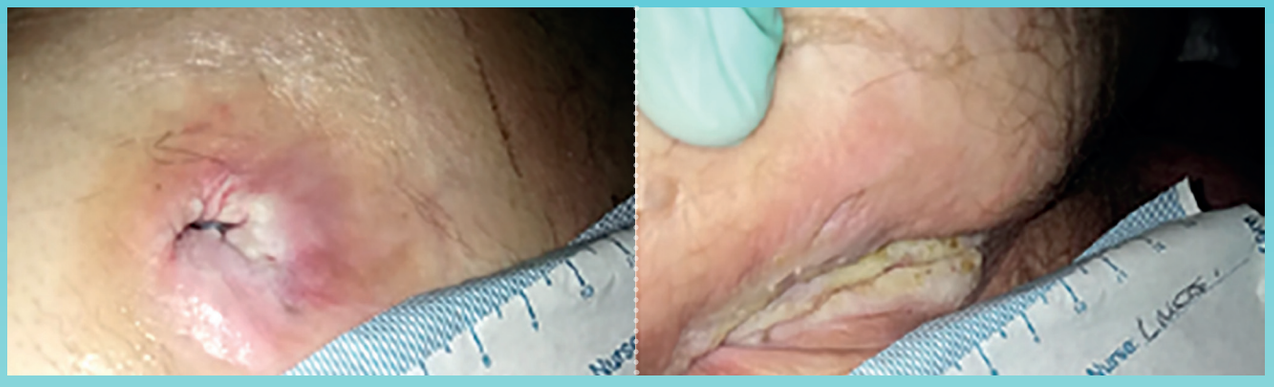

Figure 4.

If there is already periwound skin damage present, the additional step of helping to restore the skin may be required (Beeckman et al, 2015).

CONCLUSION

Exudate plays a key role in wound healing in certain situations and scenarios.

Effective assessment and management of exudate is therefore key to ensuring timely wound healing without complications. GPNs should have the appropriate skills and training to ensure that they understand the importance of accurate assessment of exudate as part of holistic assessment of a patient and their wound. When this is combined with a good understanding of wound dressings and devices used to manage a high volume of exudate, improvements for the patient and their quality of life will be seen. GPN

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REFERENCES

Adderley U (2008) Wound exudate: what is it and how to manage it. *Wound Essentials* 3: 8–13

Barrett S (2015) Cost-effective management of wound exudate. *Wound Essentials* 10(1): 66–73

Beeckman D, Campbell J, Campbell K, et al (2015) *Incontinence-associated dermatitis: moving prevention forward*. Wounds International. Available from www.woundsinternational.com

Beldon P (2016) How to recognise, assess and control wound exudate. *J Community Nurs* 30(2): 32–8

Bianchi J (2012) Protecting the integrity of the periwound skin. *Wounds Eessentials* 1: 58–64

Brown A (2015) Phases of the wound healing process. *Nurs Times* 111(46): 12–13

Coleman S, Nelson EA, Vowden P, et al (2017) Development of a generic wound assessment minimum data set. *J Tissue Viability* 26(4): 226–40

Dowsett C, Allen I (2013) Moisture-associated skin damage made easy. *Wounds UK* 9(4): 1–4

Gardner S (2012) Managing high exudate wounds, how to guide. *Wound Essentials* 7(11)

Geraghty J (2016) Expert commentary. *J Community Nurs* 30(2): 38

Gethin G, Grocott P, Probst S, et al (2014) Current practice in the management of wound odour: an international survey. *Int J Nurs Stud* 51: 865–74

Herber OR, Schnepp W, Rieger MA (2007) A systematic review on the impact of leg ulceration on patient's quality of life. *Health Qual Life Outcomes* 25(5): 44

Kerr A (2014) How best to record and describe wound exudate. *Wounds UK* 10(2): 50–7

Lloyd Jones M (2014) Exudate: friend or foe? *Br J Community Nurs (Suppl):* S18–23

Moore Z, Strapp H (2015) Managing the problem of excess exudate. *Br J Nurs* 24(15): S12–17

Nichols E (2016) Wound assessment part 2: exudate. *Wound Essentials* 11(1): 36–41

Tickle J (2017) Introducing a new superabsorbent dressing to manage wound exudate. *Br J Nurs* 26(sup 20): published online

Key points

- Wound exudate is part of the normal wound healing process.
- Too much exudate and its composition can delay or prevent wound healing, affecting patients' physical and psychological wellbeing.
- Assessment of wound exudate should take place in the context of holistic wound assessment
- Dressings are the main option for managing a high volume of exudate, but there are other devices that can be useful.
- Superabsorbent dressings have been designed to manage excess exudate, having a greater fluid-handling capacity than traditional foam dressings.

Timmons J (2006) Skin function and wound healing physiology. *Wound Essentials* 1: 8–17

Vowden P, Bond E, Meuleneire F (2015) Managing high viscosity exudate. *Wounds UK* 11(1): 56–60

World Union of Wound Healing Societies (2007) *Wound exudate and the role of dressings; A consensus document*. MEP Ltd, London

World Union of Wound Healing Societies (WUWHS) Consensus Document (2019) *Wound exudate: effective assessment and management*. Wounds International, London

Wounds UK (2013) *Best Practice Statement: Effective exudate management*. Wounds UK, London

Wounds UK (2018) *Best Practice Statement: Improving holistic assessment of chronic wounds*. Wounds UK, London

Wounds UK (2019) *Best practice Statement: Addressing complexities in the management of venous leg ulcers*. Wounds UK, London. Available online: www.wounds-uk.com

Young T (2017) Back to basics: understanding moisture-associated skin damage. *Wounds UK* 13(2): 56–65