

Nursing and patient led intervention case study



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Doris presented wound to left medial malleolus that has been caused by banging her left leg on fire 6 weeks ago. The wound measures 4 cm x 5 cm, filled 90% slough, 10 % granulation on wound bed and had copious odour to exudate.

SMART OUTCOME / OBJECTIVE

To reduce the size of Doris' ulcer from the current 4 cm x 5 cm to 2 cm x 3 cm within 6 weeks.

NURSING AND PATIENT LED INTERVENTIONS

- Introduce yourself to Doris and gain consent.

Introducing yourself to patient is respectful, polite and important in providing compassionate care. Nursing Midwifery Council (NMC) (2013) emphasises that patients should voluntarily give their valid consent before any intervention or procedure is undertaken. Furthermore, the NICE (2015) guideline states that part of patient-centred care is providing patients with sufficient information about their condition and encouraging them to participate in healthcare decision-making.

- Assess Doris' pain prior to cleaning the wound.

To reduce discomfort to patient and to structure the assessment for patient's dressing-related pain and implement effective management strategies immediately (World Union of Wound Healing Societies, 2014; Hollinworth, 2005). Gou and DiPetro (2010) explain that wound healing involves programmed phases and once interrupted, could lead to impairment and delays in wound healing. However, most healthcare practitioners fail to

assess levels of pain before cleaning the wound (Baranoski and Ayello, 2008). When pain is unmanaged, this could lead to complications and delayed wound healing (Hollinworth, 2005).

- Ask Doris if she has any allergies.

It is significant on assessment to find out whether patient has any allergies. It assists in making decisions such as prescribing medications and prevent any further allergic reactions and other complications (NICE, 2015).

- Perform hand washing using the correct techniques pre and post procedure.

Hands should be washed before and after patient contact. Adhering to standard precautions is essential in all aspect of patient care (NMC, 2015). According to Rowley and Clare (2011) proper hand washing before patient contact will prevent the risk of acquiring infections. Infection is the biggest risk that can delay wound healing. It also means your patient will be safe from risk of acquiring cross infections whilst carrying out care (World Health Organisation, 2009).

- Perform and maintain aseptic non-touch technique for all procedure to wound care.

The use of aseptic non touch technique reduces risk of patients acquiring infections. The aseptic non-touch technique is suggested when dressing the wound (WHO, 2009). Rowley and Clare (2011) have stressed that aseptic non-touch technique could reduce the risk of hospital acquired infections. Hence, the use of this technique could help reduce the risk of infecting

wound. As stated in the study of Guo and DiPietro (2010), infection could disrupt and delay the process of wound healing.

- Irrigate wound with saline at room temperature.

Irrigation is to clean out the wound. Cleansing removes debris and pathogens. However, one major drawback of this approach is that irrigation may accidentally remove areas of newly granulating tissue, thus will delay healing process (Kerstein, 1994). However, the National Institute for Health and Care Excellence (NICE, 2015) guideline states that necrotic material present in the margins of the wound could be sites for bacterial proliferation and should be removed through debridement. The SIGN (2010) guideline, nevertheless, could not find studies comparing debridement and no debridement in venous ulcer management. The guideline examined a number of debridement methods. Additionally, a prospective, double-blind, randomised controlled trial (RCT) (Weiss et al., 2013) suggests that tap water is as effective as normal saline for wound irrigation. There were no significant differences in the infection rates between wounds that were irrigated with tap water and those irrigated with saline solution. On the other hand, using tap water could be as effective and less costly for wound irrigation. The Scottish Intercollegiate Guidelines Network (SIGN, 2010) recommends that leg ulcers should be washed with tap water and dried carefully.

- Obtain wound swab as needed.

Wound cultures is a tool to determine possible infection in the wound bed (NICE, 2012). However, reliability is concerned with consistency and the extent to which results are accurate. There would be a consensus over <https://assignbuster.com/nursing-and-patient-led-intervention-case-study/>

whether or not to clean the wound before swabbing. Donovan (1998) and Kiernan (1998) all advise irrigation with warmed normal saline to which remove excessive debris and exudate, thus removing surface contamination. Bowler et al (2001) suggest that the laboratory should be informed if the wound is not clean so as to exclude wound contaminants. It must also be noted that antiseptic cleansing solutions must be avoided as the results may be distorted (Cuzzell, 1993; Kiernan, 1998).

- Assess the wound and document findings on wound assessment chart.

Proper wound assessment can significantly influence the intervention and prognosis (NHS, 2014a). In addition to assessment, the patient's past medical history should also be taken. It allows healthcare practitioners determine the cause of the leg ulcer. The NHS (2014b) states that it is also important to treat the underlying cause of patient's ulcer to prevent recurring of venous leg ulcer after treatment.

- Measure Doris wound and take photograph to sit as a baseline for wound care.

Measuring wound diameter and taking a photograph would provide information to healthcare practitioners if wound contraction has begun and whether the wound is responding positively to interventions (NICE, 2015).

- Refer Doris to Tissue Viability Nurse.

A specialist nurse such as the tissue viability nurse would help promote wound healing. Tissue viability nurses have extensive knowledge on how to manage acute, chronic or complex wounds (NHS, 2014a). They also provide advice and support for healthcare practitioners, patients and their families or

cares (NHS, 2014a; SIGN, 2010). Since they are responsible in supporting wound care management in different healthcare settings, working closely with them would ensure that Doris receive quality care. A tissue viability nurse would also dispense advice on compression bandaging and other interventions to promote wound healing.

- Dress wound using hydrocolloid dressing.

Dressings the wound will create a clean and optimum environment for wound healing (NICE, 2012). Based on the Cochrane Review moist environment promotes wounds to heal more quickly than a dry one (Palfreyman et al, 2006). Meanwhile, wounds left to dry form a scab or eschar which forces migrating epidermal cells to move deeper, prolonging the healing process (Kerstein, 1994). However, it could be argued another drawback of wound dressings that can be sometimes develop sensitivities to ingredients and can be toxic to the wound (Robinson, 2000). Therefore, choice of wound dressings will be dictated by the nature of the wound (Grey, et al, 2006). Wound dressing could be as simple as non-adherent dressing (NHS, 2014a). The NICE (2015) guideline states that there is insufficient evidence to support advanced dressings as more effective than conventional dressings in wound management. Another drawback is caution on removing of an adherent dressing which causes pain and may accidentally remove areas of newly granulating tissue, thus will delay healing process (Kerstein, 1994). Meanwhile, wound like Doris' that is highly exuding and can be dress and cope with hydrogel dressings to avoid maceration (Jones et al 2006; Kerstein, 1994). Moreover, secondary dressings can be used as well to

relieve pain such as hydrocolloid and to absorb more exudate like alginate (NICE, 2012).

- Educate Doris about the dressings, showering, bathing and how long dressings can be left in place and to contact District Nurse if dressing becomes loose or removed.

Patient's awareness of potential causes of poor/delayed wound healing (Kerstein, 1994). This would enable Doris to receive patient education about wound care and intervention and management. The NICE (2015) guideline states that part of patient-centred care is providing patients with sufficient information about their condition and encouraging them to participate in healthcare decision-making regarding their care.

- Discourage Doris of rubbing and scratching the wound.

Scratching, rubbing and picking the wound can delay healing process and cause further injury to the tissue (Stander et al, 2003).

- Educate and encourage Doris to eat a balance diet and explain that protein is vital to wound healing and recovery.

Optimal nutrition is essential to wounds healing. Informing the patient's on the importance of good nutrition and improving the patient's diet if needed is important for good prognosis of wound healing. Educate patient on essential diet for good wound healing e. g. protein (fish, meat, cheeses and eggs) and vitamin c (found in orange juice and vegetables) (Bale, S and Jones, 2006). According to Dealey (2005) poor wound healing may indicate the patient's nutritional status needs to be enhanced. If wound healing is poor

accompanied by weight loss referral to dietician and prescribing practitioner for further advice and to consider supplemental nutrition for patient.

- Educate Doris to perform range of exercises whilst sitting.

It activates venous pump by mobilising calf's and feet whilst sitting and improve circulation and aid in wound healing (Callum, 1994). The NHS (2014b) states that it is also important to treat the underlying cause of patient's ulcer to prevent recurring of venous leg ulcer after treatment. Performing a range of exercise during sitting could help improve wound healing (NHS, 2014b).

- Give contact number to Doris and instruct to call if there any other concern and arrange follow up visit.

Arranging regular follow up to recognise risk factors and prevent further skin breakdown and reduce the risk of recurrence (NICE, 2012).

- Refer Doris for Doppler assessment and for further compression therapy

The aim is to identify potential arterial insufficiency that needs treatment and management (NICE, 2012). This will enable to provide information for long term intervention on maintaining integrity of the skin around the wound. Doppler assessment is necessary since this would assist healthcare practitioners in assessing leg ulcers. Although it is not diagnostic of venous ulceration, Doppler assessment could define a safe level for compression bandaging (NICE, 2015; SIGN, 2010). Doppler assessment is also helpful in determining when compression bandaging should not be used or is contraindicated (NICE, 2015). Hence, this assessment remains to be an

important tool in reducing tissue damage due to bandage pressure. This type of assessment would provide information on the ankle brachial pressure index (ABPI). If ABPI <0.8, Doris should be referred for a specialist assessment. Compression therapy has been shown to reduce risk of venous hypertension and increase venous return (Iglesias et al., 2004). A systematic review (O'Meara et al., 2009) also suggests that use of compression increases the rate of wound healing compared to not using compression. Since use of compression therapy may cause pressure damage to the surrounding skin, there is a need for compression to be graduated (SIGN, 2010).

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