R. B. Turnbull Jr. MD WOC Nursing Education Program

Mini Case Scenarios: Wounds

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Reviewed by: _____ Date: _____

Score: /83

For the following wound case scenarios:

1. Identify the type of wound pictured.
2. Apply wound characteristics provided to identify recommendations/nursing orders for this patient & the wound.
3. Include the following in the recommendations/orders
    a. Dressing
        i. Type of dressing
        ii. Brand name(s)
        iii. Secondary dressing if needed
        iv. Dressing change schedule
    b. Other nursing orders pertinent to successful wound healing or prevention *(be specific as to schedule, turning surfaces if applicable, product, etc.)*
    c. Rationale for choices
4. Provide an alternative to your initial dressing choice. This should be a product substitution, not simply a brand name substitution.
5. Answer any additional questions.
6. *No advanced dressings such as NPWT or CAMPs (formerly called cellular tissue products) unless specifically requested. What would you use if these two dressing types are not available to you?
7. Throughout this assignment you will be applying evidence to treat various wound scenarios. As appropriate, if you use a reference, make sure to cite it correctly.
8. To support your actions, include at least three relevant references in addition to the course textbooks. (Use 7th edition APA formatting)

A case study has been completed for you. Below is an example.

Example Scenario

85-year-old in an extended care facility has a skin tear on her right forearm after a recent fall. The skin tear has been classified as Type ??? as described by the International Skin Tear Advisory Panel (ISTAP).

Image courtesy of Wound, Ostomy and Continence Nurses Society image library.

Wound type: Skin tear, Type 2
(1 point)

Wound Nurse recommendations/orders:

1. Use no rinse, pH balanced bath wipes at bathtime vs. soap, minimize rubbing at bath time, & gently dry fragile skin
2. Apply mesh contact layer (Hollister Adaptic)
3. Moisturize both arms daily with Medline Remedy moisturizing lotion
4. Wrap with roll gauze (Kerlix).
5. Change dressing on every shower day or if wet or soiled
6. Use long sleeve garments or sleeve covers for patient during waking hours

(3 points)

Rationale for choices

1. Bath wipes are pH balanced & soap is usually alkaline & difficult to rinse if person not showering
2. Rubbing creates friction which may cause skin tears
3. Contact layer prevents dressings from sticking to wound
4. Skin moisturizing is a preventive measure for skin tears
5. Roll gauze keeps contact layer in place & patient from touching wound & is non-adhesive
6. Long sleeves protects patient's skin and discourages picking at dressing

(2 points)

Identify 1 alternative primary/secondary dressing from a different dressing category. Write as a nursing order. Non-adhesive foam dressing, 5 layers, (Allevyn) secured with elastic mesh dressing (Medline elastic retention dressing). Change q3d and PRN
(2 point)

Scenario 1

You are asked to assess a new resident admitted with a sacral wound. Patient is 82-year-old and admitted with dementia. Wound on sacrum with 100% yellow slough and brown necrotic tissue at wound edges. No exudate noted. Wound measures approximately 4 cm x 3 cm x 2 cm. Periwound with blanchable erythema.
Image courtesy of Wound, Ostomy and Continence Nurses Society image library.

Wound type:
Unstageable Pressure Injury – Sacrum (covered with slough and necrotic tissue)
(1 point)

Wound Nurse recommendations/orders:

1. Cleanse wound with normal saline or wound cleanser (Vashe®) at each dressing change.
2. Apply enzymatic debriding agent – Collagenase (Santyl®) nickel-thick to wound bed.
3. Lightly fill wound depth with saline-moistened gauze or Adaptic Touch® contact layer to maintain contact with enzymatic agent.
4. Cover with silicone bordered foam dressing (Mepilex Border Sacrum® or Allevyn Life Sacrum®).
5. Change dressing daily and PRN if soiled or displaced.
6. Initiate pressure redistribution surface (low air loss mattress).
7. Implement turning and repositioning schedule minimum q2h in bed and offload sacrum using positioning wedges.
8. Maintain moisture management program; assess for incontinence and apply barrier cream (Triad® or Remedy Clinical Protectant®) to periwound skin.
9. Nutrition consult for protein/calorie optimization and hydration assessment.

(3 points)

Rationale for choices:

1. Presence of 100% slough and necrotic tissue prevents accurate staging and delays granulation, requiring enzymatic debridement.
2. Santyl selectively digests devitalized collagen without damaging viable tissue, appropriate in an elderly patient with dementia who may not tolerate sharp debridement.
3. Foam dressing provides cushioning, maintains moist wound healing, and protects sacrum from shear and friction.
4. Pressure redistribution and repositioning address the primary etiology (pressure) to prevent further tissue ischemia.
5. Periwound blanchable erythema indicates early pressure injury risk requiring protection from moisture and friction.

(2 points)

Identify 1 alternative primary/secondary dressing from a different dressing category. Write as a nursing order. Cleanse wound with normal saline. Apply medical grade honey alginate dressing (Medihoney® Calcium Alginate) to wound bed and cover with bordered sacral foam dressing. Change dressing every 48–72 hours and

PRN drainage or contamination. **(2 points)**

/8 points

Scenario 2

The wound care nurse is consulted to see a 54-year-old, post op day 4 after an abdominal surgery. Left heel has non-blanchable purple discoloration.

Image courtesy of Judy Mosier, MSN, RN, CWOCN.

Wound type:
Deep Tissue Pressure Injury (DTPI) – Left Heel
(1 point)

Wound Nurse recommendations/orders:

1. Cleanse heel gently with normal saline; avoid massage or friction to affected tissue.
2. Apply protective silicone foam heel dressing (Mepilex Border Heel® or Allevyn Heel®) for cushioning and shear reduction.
3. Offload heel completely using heel suspension device (Heelift® suspension boot or EHOB Foot Waffle Air Boot®) at all times while in bed.
4. Float heels off mattress ensuring heel is free from pressure.
5. Assess skin every shift for evolution of injury (DTPI may rapidly declare).
6. Reposition patient minimum q2h and avoid supine positioning when possible post-operatively.
7. Optimize perfusion and nutrition; consult nutrition for postoperative protein needs.
8. Avoid heating pads, massage, or compression directly over injury.
9. Dressing change: every 3–5 days or PRN displacement/soiling.

(3 points)

Rationale for choices:

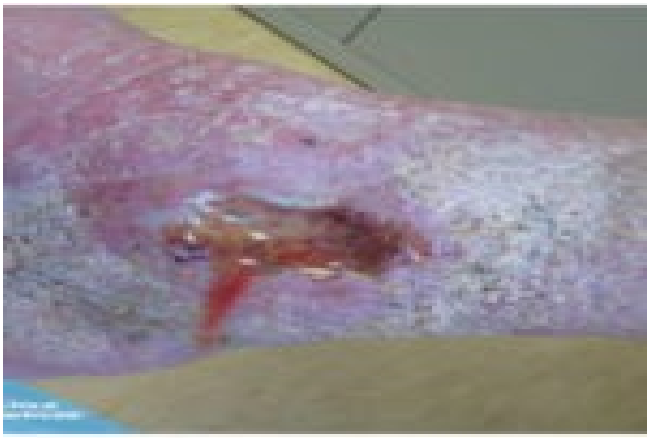
1. Non-blanchable purple discoloration indicates underlying tissue ischemia and possible muscle damage, consistent with DTPI.
2. Goal is pressure elimination, not moisture management or debridement at this stage.
3. Silicone foam decreases friction and shear while protecting fragile tissue.
4. Heel suspension is critical because heels experience high interface pressure and minimal tissue padding.
5. DTPI may evolve into full-thickness injury; frequent reassessment allows early intervention.

(2 points)

Identify 1 alternative primary/secondary dressing from a different dressing category. Write as a nursing order. Apply transparent film dressing (3M Tegaderm®) to intact heel skin for visualization and protection. Maintain strict heel offloading with suspension boot. Change dressing every 5–7 days or PRN lifting.
(2 points)

/8 points

Scenario 3



A 70-year-old arrives at the outpatient wound clinic with a nonhealing wound located on gaiter area of right lower extremity. The wound measures approximately 5 cm x 2.5 cm x 0.5 cm. The wound is a shallow, irregular shaped ulcer with moderate amount of exudate. Periwound is macerated. Hemosiderin staining is noted to BLE. Patient has ABI of 0.85 to RLE and 0.90 to LLE

Image courtesy of Wound, Ostomy and Continence Nurses Society image library.

Wound type:

Venous Leg Ulcer (VLU) – Right Lower Extremity, Gaiter Region

(1 point)

Wound Nurse recommendations/orders:

1. Cleanse wound with normal saline or wound cleanser (Vashe®) at each dressing change.
2. Apply calcium alginate dressing (Maxorb II® or Aquacel Extra®) to wound bed to manage moderate exudate.
3. Protect macerated periwound skin using skin protectant/barrier film (Cavilon® No Sting Barrier Film).
4. Cover with absorbent silicone foam secondary dressing (Mepilex Border® or Zetuvit Plus®).
5. Initiate compression therapy using multilayer compression wrap system (Profore® or Coban 2 Lite®) given ABI 0.85.
6. Encourage leg elevation above heart level several times daily.
7. Promote ambulation as tolerated to activate calf muscle pump.
8. Moisturize surrounding dry skin daily with pH-balanced emollient (Remedy® Moisturizing Lotion).
9. Dressing change schedule:
10. Every 2–3 days or PRN strike-through drainage.

(3 points)

Rationale for choices:

1. Location in gaiter area with hemosiderin staining and irregular shallow ulcer strongly indicates venous insufficiency etiology.
2. Moderate drainage requires absorptive dressing to prevent worsening periwound maceration.
3. Compression therapy is the gold standard treatment for venous leg ulcers when ABI >0.8, improving venous return and edema control.
4. Barrier protection prevents moisture-associated skin damage.
5. Leg elevation and ambulation enhance venous circulation and support healing.

(2 points)

Identify 1 alternative primary/secondary dressing from a different dressing category. Write as a nursing order. Cleanse wound with normal saline. Apply hydrofiber dressing with silver (Aquacel Ag®) to wound bed

and cover with compression wrap system. Change dressing every 48–72 hours and PRN drainage.
(2 points)

/8 points

Scenario 4

An 85-year-old is admitted to the hospital with a stage ??? pressure injury on sacrum and is bedridden. Full thickness wound measures approximately 8 cm x 10 cm x 0.4 cm. Wound bed pink with small amount of yellow slough. No structures, no bone noted. Wound has moderate serosanguineous exudate. NPWT is *not* available at this time.

Image courtesy of Judy Mosier, MSN, RN, CWOCN.

Wound type:
Stage 3 Pressure Injury – Sacrum
(Full-thickness skin loss without exposed bone, tendon, or muscle.)
(1 point)

Wound Nurse recommendations/orders:

1. Cleanse wound with normal saline or hypochlorous acid cleanser (Vashe®) at each dressing change.
2. Apply collagen dressing (Promogran Prisma® or Fibracol Plus®) to wound bed to support granulation and manage small areas of slough.
3. Fill wound lightly with calcium alginate dressing (Maxorb II®) to absorb moderate serosanguineous drainage.
4. Cover with sacral silicone bordered foam dressing (Mepilex Border Sacrum® or Allevyn Life Sacrum®).
5. Protect periwound skin using Cavilon® No Sting Barrier Film.
6. Implement turning and repositioning schedule q2h with 30° lateral positioning.
7. Limit head of bed elevation ≤30° unless medically contraindicated.
8. Manage moisture/incontinence with containment products and prompt cleansing.
9. Initiate nutrition consult for high-protein supplementation.
10. Dressing change schedule:
11. Every 2–3 days or PRN drainage/soiling.

(3 points)

Rationale for choices:

1. Full-thickness tissue loss without exposed structures confirms Stage 3 pressure injury.
2. Collagen promotes cellular migration and supports granulation tissue formation.
3. Alginate manages moderate exudate while maintaining moist wound healing.
4. Silicone foam reduces shear and protects sacral area from friction.
5. Pressure redistribution and moisture control address the primary etiologic factors causing pressure injury progression.
6. NPWT unavailable → advanced moist wound healing strategy used instead.

(2 points)

What support surface would you recommend (1pt) and why? (1pt)

Recommendation:
Low Air Loss (LAL) mattress system (e.g., Hillrom Envella® or IsoAir®).
Why:
Provides continuous pressure redistribution, microclimate control, and moisture management, reducing tissue interface pressure and promoting healing in a bedbound patient with a Stage 3 sacral pressure injury.
(2 points)

/8 points

Scenario 5

56-year-old alert and oriented male hospitalized for cardiac surgery. During the hospital stay, on day 2 post-op they developed painful open area to sacrum. The patient is incontinent of urine and stool and has not been repositioning in bed due to reported pain.

Image courtesy of Cleveland Clinic.

Wound type:
Incontinence-Associated Dermatitis (IAD) with Partial Thickness Skin Loss
(1 point)

Wound Nurse recommendations/orders:

1. Cleanse sacral/perineal skin after each incontinent episode using pH-balanced no-rinse cleanser (Remedy® Foam Cleanser or Aloe Vesta® Perineal Cleanser).
2. Apply zinc oxide moisture barrier (Triad® Hydrophilic Wound Dressing or Desitin® Maximum Strength) to affected areas BID and after each incontinence episode.
3. Apply silicone foam sacral dressing (Mepilex Border Sacrum®) for protection from friction and shear.
4. Implement structured repositioning schedule q2h despite discomfort; coordinate turns with pain medication administration.
5. Initiate fecal and urinary containment strategy (external catheter or fecal management system if indicated).
6. Use moisture-wicking underpads; avoid plastic-backed briefs while in bed.
7. Consult pain management to improve mobility tolerance.
8. Dressing change schedule:
9. Foam dressing every 3–5 days or PRN soiling; barrier ointment reapplied with each cleansing.

(3 points)

Rationale for choices:

1. Diffuse superficial tissue loss with irregular borders in setting of urine/stool exposure indicates moisture-associated skin damage, not pressure injury.
2. Primary treatment focuses on moisture control and skin protection, not debridement.
3. Zinc-based barrier protects skin from enzymatic stool damage and urine irritation.
4. Silicone foam reduces additional friction and shear while promoting healing.
5. Pain-controlled repositioning prevents conversion to true pressure injury.

(2 points)

Identify 1 alternative primary/secondary dressing from a different dressing category. Write as a nursing order. Cleanse skin after incontinence episodes and apply polymer-based liquid skin protectant (3M Cavilon® Advanced Skin Protectant) every 72 hours. Cover sacrum with non-adhesive absorbent dressing (ABD pad) secured with mesh underwear; change PRN saturation.
(2 points)

/8 points

Scenario 6

The wound care nurse is consulted to the intensive care unit to see a non-verbal 57-year old male respiratory failure patient for a new wound found under the patient's pulse oximeter during routine care. The patient has been admitted to the hospital for 14 days and has no previously documented wounds.

Image courtesy of CCF.

Wound type:
Medical Device–Related Pressure Injury (MDRPI), Stage 3 — secondary to pulse oximeter probe
(1 point)

Wound Nurse recommendations/orders:

1. Discontinue current pulse oximeter placement and rotate probe location at minimum q2–4 hours per device protocol.
2. Cleanse wound with normal saline or wound cleanser (Vashe® or normal saline) at each dressing change.
3. Apply calcium alginate dressing (Maxorb® II Alginate) to wound bed to manage exudate.
4. Cover with silicone foam dressing (Mepilex Lite® or Mepilex Border Lite®) to protect from continued pressure and shear.
5. Secure oxygen monitoring device using alternative site (forehead, toe, or ear rotation protocol).
6. Implement device-related pressure prevention protocol, including daily skin inspection under all medical devices.
7. Dressing change schedule:
8. Change every 24–48 hours or PRN drainage.

(3 points)

Rationale for choices:

1. Location and history confirm device-related pressure injury, a common ICU-acquired injury.
2. Tissue loss with slough indicates full-thickness injury, requiring moisture balance and protection.
3. Alginate manages localized moisture while supporting autolytic debridement.
4. Silicone foam minimizes additional pressure and friction from monitoring devices.
5. Frequent device rotation prevents ongoing ischemia and further tissue damage.

(2 points)

Identify 1 alternative primary/secondary dressing from a different dressing category. Write as a nursing order. Cleanse wound with normal saline and apply collagen dressing (Promogran Prisma® Collagen/ORC) to

wound bed, covered with non-adhesive foam dressing, change every 48–72 hours and PRN saturation. **(2 points)**

/8 points

Scenario 7

An 85-year-old presents to acute care with dry black eschar on left posterior heel. Cared for at home by elderly spouse, he has been bedridden for the past 6 months. The wound measures approximately 6 cm x 10cm x 0 cm. Wound edges are dry and periwound has no erythema.

Image courtesy of Wound, Ostomy and Continence Nurses Society image library.

Wound type:
Unstageable Pressure Injury – Stable Heel Eschar
(1 point)

Wound Nurse recommendations/orders:

1. Do NOT debride eschar at this time.
2. Cleanse surrounding skin with pH-balanced cleanser; keep eschar clean and dry.
3. Apply dry protective dressing (ABD pad or dry gauze) secured with roll gauze (Kerlix®).
4. Offload heel completely using heel suspension device (Heelift® Suspension Boot) at all times while in bed.
5. Float heels off mattress — pillows alone not preferred long-term.
6. Assess heel daily for signs of instability (drainage, erythema, fluctuance, odor, or bogginess).
7. Consult vascular service if perfusion concerns present prior to considering debridement.
8. Dressing change schedule:
9. Change daily or PRN contamination.

(3 points)

Rationale for choices:

1. Dry, intact heel eschar without erythema or drainage represents stable eschar, functioning as the body's natural biologic cover.
2. Debridement may expose poorly perfused tissue and increase infection or amputation risk.
3. Primary treatment is pressure elimination, not moisture donation or aggressive wound care.
4. Protective dry dressing prevents friction while maintaining stable environment.

(2 points)

Identify 1 alternative primary/secondary dressing from a different dressing category. Write as a nursing order. Apply liquid skin protectant (3M Cavilon® No-Sting Barrier Film) to periwound weekly and cover heel with silicone-bordered foam dressing (Mepilex Border Heel®) for protection only; change every 5–7 days while maintaining strict heel offloading.
(2 points)

/8 points

Scenario 8

Wound care nurse is consulted to see a 74-year-old for an abdominal wound several days post-surgery for ischemic bowel. Wound measures approximately 10 cm x 4 cm x 3 cm with visible sutures. Wound bed dry, pink with small areas of yellow tissue (less than 10% of wound base). Periwound skin intact. NPWT ordered by physician who has requested WOC nurse input into dressing instructions and pressure settings

Image courtesy of Wound, Ostomy and Continence Nurses Society image library.

Wound type:

Full-Thickness Surgical Wound (Dehisced Abdominal Surgical Wound)

(1 point)

Wound Nurse recommendations/orders:

1. Cleanse wound with normal saline or Vashe® wound cleanser at each dressing change.
2. Protect periwound skin using 3M Cavilon® No-Sting Barrier Film prior to NPWT application.
3. Apply non-adherent contact layer (Adaptic Touch® or Mepitel®) over visible sutures to prevent tissue trauma.
4. Apply black polyurethane NPWT foam (VAC GranuFoam®) cut to wound dimensions.
5. Initiate Negative Pressure Wound Therapy at −125 mmHg continuous suction.
6. Bridge dressing away from abdominal crease if needed to maintain seal.
7. Dressing change schedule:
8. NPWT dressing changes every 48–72 hours.

(3 points)

Rationale for choices:

1. Full-thickness post-surgical wound with depth benefits from macrodeformation and microdeformation provided by NPWT.
2. NPWT promotes granulation tissue formation, removes exudate, and reduces edema and bacterial burden.
3. Contact layer prevents foam adherence to sutures and protects viable tissue.

Continuous suction supports early wound stabilization in postoperative abdominal wounds.

(2 points)

Identify 1 alternative primary/secondary dressing from a different dressing category. Write as a nursing order. Cleanse wound with normal saline. Apply hydrofiber dressing with silver (Aquacel Ag®) to wound bed, lightly pack depth, and cover with silicone bordered foam dressing (Mepilex Border®). Change every 48 hours or PRN saturation.

(2 points)

/8 points

Scenario 9

Wound care nurse consulted to see a 45-year-old male with damaged skin. Patient has been at your facility for 2 weeks with diagnosis of C-Diff. You note some necrotic tissue in the right coccygeal area as well as painful weepy lesions across both buttocks and scrotum.

Image courtesy of Wound, Ostomy and Continence Nurses Society image library.

Wound type:
Incontinence-Associated Dermatitis (IAD) with Partial-Thickness Skin Loss and Areas of Moisture-Associated Skin Damage (MASD)
(1 point)

Wound Nurse recommendations/orders:

1. Cleanse affected buttocks, coccyx, and scrotal area after each incontinent episode using pH-balanced no-rinse cleanser (3M Remedy® Clinical Cleanser or Sage Comfort Shield® wipes).
2. Apply Triad® Hydrophilic Wound Dressing paste to all denuded and weeping areas twice daily and after incontinence episodes.
3. Apply antifungal moisture barrier ointment (Critic-Aid AF®) to perineal folds and scrotum due to high risk of candidal involvement.
4. Initiate fecal management system (Flexi-Seal® or equivalent) if liquid stool persists and patient meets criteria.
5. Use moisture-wicking underpads and avoid disposable briefs while in bed.
6. Implement turning schedule every 2 hours and offload sacral area with positioning devices.

(3 points)

Rationale for choices:

1. Frequent liquid stool from C-diff causes chemical skin injury from digestive enzymes, not pressure injury.
2. Triad provides protection and moist wound healing without requiring removal during frequent cleansing.
3. Antifungal barrier reduces secondary Candida infection common in prolonged moisture exposure.
4. Stool containment and moisture control are essential to stop ongoing tissue destruction.
5. Reducing occlusion and pressure prevents conversion to pressure injury.

(2 points)

Identify 1 alternative primary/secondary dressing from a different dressing category. Write as a nursing order. Cleanse skin with pH-balanced cleanser after each incontinent episode. Apply zinc oxide barrier ointment (Desitin® 40% zinc oxide) to affected areas and cover denuded regions with silicone foam dressing (Mepilex

Transfer®) to manage exudate. Reapply barrier with each episode and change foam daily or PRN saturation. **(2 points)**

/8 points

Scenario 10

A 75-year-old is admitted to acute care setting from home with pneumonia. They have a history of Raynaud Disease and Diabetes Mellitus. Has been seen at an outpatient wound clinic but is uncertain what the treatment plan is and you have no access to those medical records.
Open wound on dorsum of foot with exposed tendon. Measures approximately 8 cm x 12 cm x 0.2 cm. Wound bed 60% pink tissue and 40% yellow/black, brown tissue. Scant amount of tan drainage. Periwound intact with epibole.
Image courtesy of Wound, Ostomy and Continence Nurses Society image library.

Wound type:
Full-Thickness Diabetic/Ischemic Foot Ulcer with Exposed Tendon
(1 point)

Wound Nurse recommendations/orders:

1. Cleanse wound with normal saline or Vashe® wound cleanser at each dressing change.
2. Apply non-adherent contact layer (Adaptic Touch® or Mepitel®) directly over exposed tendon to prevent desiccation and trauma.
3. Apply hydrogel (SoloSite® or Intrasite® Gel) to areas of nonviable yellow/black tissue to support autolytic debridement.
4. Cover with hydrofiber dressing (Aquacel®) to maintain moisture balance.
5. Secure with non-adhesive foam dressing (Mepilex Border Flex®).
6. Dressing change schedule:
7. Change every 48 hours or PRN drainage.
8. Initiate strict offloading of affected foot using heel suspension boot or offloading device.
9. Consult vascular surgery due to Raynaud disease and diabetes with exposed structure.
10. Obtain ABI/toe pressures or vascular studies if not recently completed.
11. Maintain blood glucose control and nutrition consult for wound healing optimization.

(3 points)

Rationale for choices:

1. Exposed tendon must remain moist and protected to prevent necrosis and loss of structure.
2. Hydrogel promotes autolytic debridement in wounds with minimal drainage.
3. Hydrofiber maintains balanced moisture without maceration.
4. Diabetes and Raynaud disease indicate possible arterial compromise, requiring vascular evaluation before aggressive debridement.
5. Offloading reduces mechanical stress and prevents further tissue destruction.

(2 points)

Identify 1 alternative primary/secondary dressing from a different dressing category. Write as a nursing order. Cleanse wound with normal saline. Apply collagen dressing (Promogran Prisma®) to wound bed and cover with silicone foam dressing (Allevyn Life®). Change dressing every 72 hours or PRN saturation.
(2 points)

/8 points

References (3 points):

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