PURPOSE:

1. To promote consistency in education and patient care between Home Peritoneal Dialysis (PD) Units and Community Health Service Providers.
2. To minimize the risk of infection and promote healing of the peritoneal catheter exit site.
3. To provide recommended guidelines for the development of program specific procedures.

Best Practice Recommendations:

1. The initial post-op dressing and follow-up care should be performed by a nurse educated to care for the patient recovering from PD catheter implantation.
2. Immobilization of the catheter during the post-op period is critical to promote the healing process and preventing trauma by mechanical action during handling and normal body movements.
3. The initial post-op dressing may be replaced by the maintenance dressing within the first 7 to 21 days according to the policy of the Home PD Unit and patient’s co-morbidities, except under the following conditions:

<table>
<thead>
<tr>
<th>Criteria for prn dressing change</th>
<th>Rationale</th>
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<tbody>
<tr>
<td>1. Pain at incision site/exit site</td>
<td>Assess site.</td>
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<tr>
<td>2. Wet dressing (i.e. leak, hemorrhage)</td>
<td>Assess source of leak. Reduce risks of infection.</td>
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<tr>
<td>3. Dressing integrity compromised</td>
<td>Maintain immobilization. Reduce risks of infection.</td>
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4. The peritoneal catheter implantation site should be:
   - covered with an absorbent sterile dressing (i.e. several layers of gauze)
   - immobilized to prevent trauma to the exit site
   - secured to minimize traction to the cuff(s)
   - cleansed with your hospital approved standard cleaning solution* for catheter care which may include:
     - chlorhexidine gluconate, 0.05% to 2% aqueous solution with or without isopropyl alcohol
     - 0.114% sodium hypochlorite (i.e. Exsept™)

   * a standard cleaning solution as recommended by the Home PD Units’ Infection Prevention and Control Departments – these solutions may vary as new products become available.

5. Minimal and gentle movements of the catheter should be used when carrying out the dressing procedure.

6. In order to minimize bacterial colonization of the exit site and tunnel during the early healing period, the dressing procedure is carried out as an aseptic procedure.
- Ensure door/window closed
- Avoid air recirculation - turn off fans, cover nearby heating/cooling vent
- No pets in room

7. Complications including leaking, trauma, and infection and bleeding must be reported to the Home PD Unit.

8. Tub baths are not recommended for patients with peritoneal catheters. Showers must be avoided until the exit site is well-healed (usually 2-3 weeks post-op). Sponge baths should be used during this period.

9. Use of a topical prophylactic antibiotic, sparingly applied, with exit site care is widely practiced. The choice of antibiotic used is up to the discretion of each program and should be based on available research. Examples include:
   - Mupirocin (Bactroban™)
   - Polymyxin B sulfate – Bacitracin - Gramicidin (Polysporin triple™)
   - Gentamicin Sulfate (Gentamycin™)

10. If the patient has multiple dressings on the abdomen, clean and dress each one separately, beginning with the PD catheter.

11. Instruct the patient not to lift anything heavier than a small bag of groceries for the six week postoperative period.

**PROCEDURE:**

1. Instruct the patient regarding the procedure and inform them that some discomfort may be associated with the dressing change.

2. Assist the patient as required to a lying position.

3. Gather the equipment:
   - sterile dressing tray (recommended)
   - masks for nurse and patient
   - sterile gloves + procedural gloves
   - hand washing cleansing agent
   - non-occlusive tape and gauze
   - abdominal pads as required
   - cleansing solution

4. Mask and have patient mask.

5. Handwash vigorously (preferably with soap and water - if unavailable, use antiseptic hand sanitizer).
6. Prepare dressing equipment for use (i.e. open packages, cleansing solution and gauze with topical antibiotic) in the sterile field.

7. Remove the old dressing, taking care not to forcibly remove any scab. Avoid pulling or twisting the PD catheter.

8. Assess the site for signs of infection (redness, crusting, swelling, tenderness, sanguineous or purulent discharge etc).

9. Hand wash.

10. Don sterile gloves. If gloves not available, use forceps and a non-touch aseptic approach.

11. If using a dressing tray, use drape to create a sterile field around incision and exit site.

12. Cleanse the following (with gauze or swabs saturated with a cleansing solution):
   - the exit site in a circular fashion, starting from the exit site and moving outwards to include the area that will be contained under the dressing
   - the incision line
   - the newly implanted PD catheter

13. Apply topical antibiotic sparingly around the exit site as ordered by the physician, using a gauze or sterile swab.

14. Gently lay the cleansed PD catheter onto a gauze on the abdomen.

15. Apply gauze:
   - Completely cover the exit site, incision, and catheter with several layers of gauze
   - Cover with an abdominal pad (optional)

16. Use non-occlusive tape to secure the dressing and immobilize the catheter.

17. As required, date and initial the dressing.

19. Document the procedure and condition of the exit site in the Patient Care Record. Notify the unit if there is anything unusual (i.e. leakage, discharge).

* a standard cleaning solution as recommended by the Home PD Units' Infection Prevention and Control Departments – these solutions may vary as new products become available

References


