Providing modern Wound dressings, with little means

a simple guide by Hubert Vuagnat

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Providing modern Wound dressings, with little means

Head chapters

• WAWLC 6 basic principles for easier woundcare
• Basic materials
• Removing the dressing (if present)
• Cleaning the wound
• Evaluating the wound and choosing action
• Taking care of the skin around the wound
• Preparing a Vaseline impregnated gauze (primary dressing)
• Closing the dressing (secondary dressing)
• How to hold the dressing
• Alternate dressing material
To be made easy, modern wound care can be based on the following 6 basic principles

1. Evaluate and correct:
   1. The specific cause of the wound
   2. The patient’s general condition

2. Keep the wound in moist environment

3. Protect it from any additional trauma
   1. Physical, chemical
   2. Protect peri wound (surrounding) skin

4. Promote a clean wound bed without infection

5. Control the peri wound (surrounding) for Lymphedema (swelling)

6. Prevent or correct any secondary disability (retractions)
What is required for a dressing

Materiel:
• 2 containers/bags (one for clean material, one for dirty material)
• Clean water, boiled or heated over 70°C
• Soap
• Gauze or clean cloth
• Vaseline or vegetal oil or grease
• Tape, plastic film, bandage

A convenient place for treatment:
• Clean, good light, peaceful, away from latrines
• Comfortable position during treatment
• Separation of clean and dirty objects
Doing a modern wound dressing

Clean your hands:
• With water and soap
• Or disinfect with hydro alcoholic solution

Prepare a plastic water bottle for irrigation:

Heat a metallic object, use it to make a hole in the lid
To irrigate press the bottle
First, let's remove the previous dressing

- First, take off the bandage and the non-sticking part of the dressing.
- Dirty dressing must be placed away from the clean material.
- As soon as it resists, pour a large amount of clean water or saline solution over the gauze and between the skin and the gauze.
- Pull gently, allow time, repeat if necessary.
- The aim is: peeling off existing dressing, without pain or trauma.
Wound cleansing and preparation

• Rinse the wound abundantly with clean water or saline, using a shower is an alternative

• The aims are:
  • Softening dead tissues
  • Washing residues secretions
Wound cleansing and preparation

• Dry the skin around the wound by gently pressing a gauze on it.
• Water can remain on the wound bed.
• **The aim is:** to avoid damaging new tissues growing in the wound.
• Dead tissues can be removed from the wound by rubbing with a gauze. The use of instruments (blade/scalpel) is generally left to professionals only.
Wound cleansing and preparation

• During these actions, observe the wound:
  • Size and wound color
  • Exudates/secretions
  • State of peri wound skin (skin around the wound)
  • Odor
  • Oedema/swelling

• Observe patient:
  • Pain, attitudes
Wound colors and meaning

- **Red** or pink: good evolution
- Black: sign of dead tissue to be removed
- White/Yellow: fibrin to be removed
- **Green/Yellow** and/or inflamed: suspect infection
Clinics and actions

• Necrosis (dead/black) : instrumental debridement (using a scalpel, usually done by a health professional)

• Very abundant exudates/secretion +++ : add gauze layers to absorb

• No or little exudates : add a plastic film on top to retain moisture

• Infection :
  – More frequent rinsing of the wound
  – Antibiotics should be given only by the vein or mouth (systemic antibiotherapy)
  – Antibiotic cream should not be used
Peri wound skin (skin around the wound) protection

- To be done before the dressing
- This can be done with a fatty medium:
  - Vaseline
  - Paraffin
  - Vegetable oil
  - Vegetable grease
  - Zinc oxide paste
  - Body cream
Skin protection

- Spread fatty medium on the intact skin (light movement, no massage)

- Then a small layer of fatty medium on the entire dry or inflammatory (red, sometime swollen) skin

- Note that on the greased area it will not be possible to stick a tape (dressing will need a bandage to stay in place)
If you have no petroleum jelly gauze (Vaseline gauze) prepare your own

• Put fatty medium on a clean gauze
• If no gauze is available, use clean cloth (cotton)
• To be clean:
  • Throw away the first centimeters getting out of the tube
  • Do not touch the gauze with the tube
If you have no petroleum jelly gauze (Vaseline gauze) prepare your own

• Spread, without excess, the fatty medium on the gauze

• Use a sterile spatula or an instrument or piece of metal that has been heated to be sterilized
Primary dressing
• Primary dressing means the dressing directly on the wound
• Put primary dressing on the wound
• Put fatty medium side on the wound
Secondary dressing

- The secondary dressing is installed over the primary one.
- If the wound generates exudate, place one or more layers of gauze over the primary dressing.
- **Aim at:** keeping the dressing in place for 24 hours at least.
- Sanitary napkins, diapers can also be used.
In very dry wounds

- You can put a plastic film over the primary dressing such as:
  - Plastic alimentary film
  - The blister pack of gauze compresses

The aim is to:

- Keep humidity in wound
How to hold the dressing

• Medical tape should be used for smaller wounds

• Bandage is preferable for larger wounds, among them: elastic, crêpe, Velpeau, cohesive

• Tubular or net bandage can also prove useful

• Alternatively, cut any kind of fabric long enough to use as bandage

• Alimentary film rolls make good bandages, they can also be used as primary dressing as they do not stick on the wounds
How to hold the dressing

Bandage technique:

• Use the bandage both to hold the dressing in place but also to limit the oedema (swelling)
• On a limb, try not to use bandage just over the dressing but cover the whole limb
• Always begin on the distal part of limb (hand or foot)
• Give a little more pressure at the extremity and less pressure at the root of the limb
• If the lesion on the tibia, consider including toes
• If the lesion on the arm, consider including fingers
• The bandage must give a little pressure but not squeeze in excess, try to finish with one turn of bandage (to avoid tourniquet effect)
• Hold it with tape, no metallic attaches as they can harm the skin
What else than medical material can you use?

<table>
<thead>
<tr>
<th>Medical</th>
<th>Alternate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Petroleum jelly / paraffin / Vaseline</td>
<td>Vegetable oil or grease <em>(can be used both around and in the wound)</em></td>
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<tr>
<td></td>
<td>Honey or sugar paste <em>(to be used in the wound only)</em></td>
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<tr>
<td>Gauze</td>
<td>Cotton/linen</td>
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<tr>
<td></td>
<td>Boiled potatoes peels <em>(inner part on the wound)</em></td>
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<tr>
<td></td>
<td>Boiled cabbage leaves</td>
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<tr>
<td></td>
<td>Sanitary napkin, diapers <em>(especially on exuding wounds)</em></td>
</tr>
<tr>
<td>Bandage</td>
<td>Cotton/linen <em>(cut 6 to 10 cm wide)</em></td>
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<tr>
<td></td>
<td>Plastic alimentary film *(wrapped over the dressing. can also be placed</td>
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<tr>
<td></td>
<td>directly over the wound if needed)*</td>
</tr>
<tr>
<td>Medical tape</td>
<td>Any tape that sticks enough <em>(if to strong it can damage the skin)</em></td>
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</tbody>
</table>

- At what frequency should a dressing be renewed?
  - If infected or dirty, every day with a large and powerful irrigation
  - If not infected, good looking *(red or pink tissues)* then twice a week or less