Foot Care Policies and Procedures
Toenail & Callus Debridement
4-12-2012

1.0 Debridement
1.1 Toenail Debridement – reduction of the length, thickness or width of toenails as may be required to prevent pain, infection, ingrown edges, subungual ulcerations, dermal trauma to adjacent toes.

1.2 Hyperkeratotic Tissue Debridement – reduce the thickness of the nonviable tissue to: reduce pressure & pain on ambulation, prevent skin breakdown/ulceration, prevent cracking into deeper tissue which can lead to infection.

2.0 Equipment
- Personal protective equipment (mask, gloves, eye protection);
- Surgical toenail nippers (small and regular);
- Rotary Tool (Dremel, Water stream drill, Air suction drills);
- Burrs (carbide, diamond) or disposable sanding disk; curette,
- #15 blade disposable scalpel,
- 3WEA (softening solution),
- general medical supplies (gauze, antiseptic, Band-Aids, cleansing towels, disposable polyback paper chair protectors)

3.0 Procedure
Before patient treatment
- Clean rotary drills and other equipment with designated antimicrobial surface wipes
- Ensure that all equipment has been disinfected
- Place only the appropriate instruments on tray (Clean area)
- Set out all materials and other essential instruments to avoid cross contamination
- Position patient safely and so that provider has best access to feet
- Take or update medical history including medication changes
- Inquire about any specific concerns or questions that the patient has today
- Perform brief lower extremity examination with specific emphasis on Dermatology:
  - Skin integrity, wounds, macerations or cracks in innerspaces, edema, erythema, preulcerative lesions, thin skin, hairless, toenail thickness, periungual edema/erythema/drainage, signs of trauma. These are determinants of risk status for the procedure.
- Document all of above
**During patient treatment**

- Update patient’s medical history
- Offer patients protective masks and eye shields but do not insist on their use
- Treat all patients as potentially infectious.
- Wear appropriate personal protective equipment. (gloves, masks, eye protection)
- Change gloves immediately if they are torn, cut or punctured
- Change gloves if they contact blood and you must leave the area such as to acquire new supplies or instruments during treatment
- Ensure good ventilation of the treatment area
- Handle sharps carefully and only re-sheath needles using a suitable device

**Procedure for Toenails**

- Assess the nails individually for thickness, ingrown status, localized erythema, evidence of trauma.
- With gloved hands, support foot and stabilize (hold) the toe to be treated. Isolate this toe from other toes to prevent inadvertent trauma during debridement.
- If toenail is thicker than a normal nail, start with sanding to reduce bulk and make clipping less painful and more efficient.
- Take care to move the Burr/sanding disk to varying areas of the nail to prevent heat buildup on one section.
- In most cases, it is more time efficient to perform sanding/grinding of all nails before switching to nipper for nail shortening or narrowing.
- When using nail nippers on thinned nails, be sure to take small (2mm) “bites” with each “nip”. Do not try to use the entire length of the clipper mouth. This will be less painful for the patient and provide more accurate debridement. Small nails on toes 2 – 5, however, may sometimes be done in just one to two nips.
- Gently and carefully use the curette to explore the edges of the nail. This will allow you to assure that there are no nail remnants or spicules which may become ingrown in succeeding weeks of regrowth.
- If such remnants or spicules are detected, use the sharp edge of the curette to try to scrape it off. If this is unsuccessful after two or three attempts, take your smaller nippers and try to remove the piece. Thinning/sanding the very edge of the side of the nail (Dremel) will make debridement of remnants much easier to achieve.
- Remove as much nail material as possible with sander while being careful not to grind all the way through the nail plate to the underlying skin. After proctoring, you should be able to determine the remaining thickness of the nail plate by observing the color (pinkter is closer to skin) and flexibility (press your thumb nail gently on top of the nail to see if it flexes under the pressure). If you do cause bleeding, refer to Hemostasis and Infection Control protocols for care guidelines.
Procedure for Hyperkeratotic Lesions (corns & calluses)

- Assess the hyperkeratotic lesions individually for thickness, surrounding skin integrity, localized erythema, and evidence of trauma.
- With gloved hands, support foot and stabilize (hold) the foot to be treated.
- Debridement of corns and calluses should not cause pain or bleeding since only nonviable tissue is being removed.
- If the lesion is to be removed with a #15 scalpel, 3-WEA softening solution can be applied prior to debridement following product instructions. If the lesions are to be reduced with a rotary or manual sander, to not use 3WEA as it makes sanding more difficult.
- This tissue should be removed slowly in layers until it is appropriately thin.
- Lesions over bony prominences should be left slightly thicker as a protection during ambulation after treatment.
- Lesions not over bony prominences can be fully thinned to the level of epidermis. Recognition of this layer can be aided by color change (pinker), softness, visualization of skin lines if in an area with them (similar to fingerprints)
- Debridement can be performed with a #15 scalpel if the provider has been trained and proctored to use this instrument.
- Alternatively, the lesion can be sanded with a rotary or manual sander.
- If bleeding occurs, refer to Hemostasis and Infection Control protocols for care guidelines.
- If bleeding is minimal and well controlled, the debridement procedure may continue.

After patient treatment
Wash hands
Dispose of sharps via the sharps container
Segregate waste and dispose
Clean rotary drills and other equipment with designated antimicrobial surface wipes
Clean and inspect all instruments prior to placing in Cidex bath for 20 minutes
After disinfection bath, rinse instruments in tap water. Set on Clean towel to air dry
Inspect all instruments to ensure visibly clean and dry
Clean and disinfect all contaminated work surfaces
Prepare for next patient