

MANAGEMENT OF A COMPLEX VENOUS LEG ULCER WITH NECROTIC TENDON USING A NEXT GENERATION ADVANCED MULTI-ION STABLE WOUND CLEANSER IN DEBRIDEMENT: A CASE REPORT.

Ketan Shah, DPM; 9234 John F. Kennedy Boulevard, North Bergen, JN 07047

BACKGROUND

Non-healing venous leg ulcers (VLUs) complicated by underlying necrotic tendons or deep tissue pose a significant challenge in limb salvage. These wounds are frequently seen in patients with diabetes, poor circulation, and weakened immune systems. The presence of necrotic tissue acts as a breeding ground for bacteria, greatly increasing the risk of necrotizing infections, sepsis, and limb loss. Prompt and aggressive treatment is essential to stop disease progression and promote healing. This report describes the use of a next-generation hypochlorous acid-based wound cleanser* as an adjunctive debridement strategy in a complex VLU.

METHODS

A single patient (n = 1) presented with two chronic, non-healing VLUs associated with exposed necrotic tendon, tibial necrosis, and severe pain refractory to standard wound care was treated with a next-generation hypochlorous acid wound cleanser*. The cleanser was applied in the clinic during visits and by the patient at home twice daily between visits. Wound progression, tissue quality, pain response, and signs of healing were assessed clinically over a 60-day period. Arterial vascular studies were also performed and found to be normal.



Visit 1

- Patient presents with a non-healing venous leg ulcer (VLU) involving two wound areas, with significant necrotic tendon exposure (black eschar present).
- During in-office application of hypochlorous acid-based therapy* made wound cleaning easier, and the patient reported reduced pain during the procedure.
- Patient was discharged with hypochlorous acid-based therapy* with instructions to apply twice daily.



Visit 2
14 days
later

- Both wounds demonstrate healthy pink granulation tissue beneath areas of slough and purulent material, suggesting active healing. Hypochlorous acid-based therapy* appears to be effectively penetrating through exudate and wound fluid.
- Wound #1 (left): Necrotic tissue is nearly resolved, with marked improvement observed over 14 days.
- Wound #2 (right): Continues to show steady progression. The observed yellow sheen is consistent with healing tissue, not biofilm, indicating wound healing from the base upward.



Visit 3
7 weeks
after Visit 1

- Wounds are clean, pink, and well-granulating, with no purulence and healthy wound edges.
- Significant improvement in color and overall progression observed over 60 days.
- Granulation is complete, with the wound now in the proliferative phase of healing.



Visit 4
8 weeks
after Visit 1

- Wound #1 is closed (no photo).
- Wounds #2 show full granulation with continued edge progression; the wound is nearly closed.
- Treatment with hypochlorous acid-based therapy*, supported rapid improvement from necrotic, infected tendon to full granulation within ~60 days.

RESULTS

After initiation of next-generation hypochlorous acid-based therapy*, the patient reported immediate and sustained pain reduction, which had not been achieved with prior treatments. Clinical observation demonstrated effective liquid mechanical debridement with progressive removal of residual necrotic tissue.

Over 60 days, the wound transitioned from an inflammatory state toward the proliferative phase, with increased granulation tissue, improved tissue quality, and overall wound stabilization and healing progression.

No adverse effects were observed.

CONCLUSIONS

This case suggests that a next-generation hypochlorous acid wound cleanser*, may serve as a useful adjunctive debridement and wound-maintenance tool in complex VLUs with necrotic tendon involvement. Combined in-office and at-home use supported continuous debridement, pain control, and wound stabilization, indicating potential value in limb salvage strategies for high-risk chronic wounds.

Product notation: * Spectricept Skin and Wound Cleanser RX