



# Xylazine Associated Wounds: An Emerging Epidemic

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## INTRODUCTION

Over the past few years, the opioid crisis has seen a new and dangerous additive in the fentanyl community; the veterinary sedative, xylazine, also known as *tranq*. While the etiology of xylazine-associated skin necrosis is not well understood yet, these wounds are becoming more prevalent in our community and carry increased risk of bacteremia, amputations, and death. As this is a new and distinct wound category, much remains unknown about the best treatment plan for these complex wounds in patients that often have significant barriers to care. Outpatient and inpatient care can be hindered by opioid withdrawal, unmanaged pain, and previous poor experiences in the hospital setting related to feelings of stigmatization. Our goal is to maximize healing opportunities.

## METHODOLOGY

As there is no current standard of care, we describe a prospective treatment modality instituted by our facility. Conservative treatment using a combination of pure hypochlorous acid-based wound cleanser\* (pHA) and topical debridement (both enzymatic<sup>∞</sup> and autolytic<sup>±</sup>), has been beneficial prior to surgery, as an alternative to surgical intervention, and as an ongoing treatment to help decrease bioburden, remove necrotic tissue, and maintain a pH that mimics human skin to support epithelialization and angiogenesis.

## TRADEMARKED ITEMS

<sup>°</sup>Aquacel<sup>®</sup> Ag Extra<sup>™</sup>, <sup>∞</sup>DuoDerm<sup>®</sup>, ConvaTec, Inc., Bridgewater, NJ, USA  
<sup>\*</sup>Vashe<sup>®</sup> Wound Solution, <sup>‡</sup>UrgoTul<sup>™</sup>, Urgo Medical North America, Fort Worth, Texas, USA  
<sup>∞</sup>Santyl<sup>™</sup>, Smith & Nephew, Inc. Fort Worth, Texas, USA  
<sup>±</sup>Medihoney<sup>®</sup>, Integra LifeSciences, Princeton, NJ, USA

### CASE STUDY #1

52-year-old female with history of opiate abuse and diabetes mellitus presented to ED 8/15 for a worsening R thigh wound sustained from repeatedly injecting Xylazine into it. Surgical consult preferred conservative therapy. Acute Surgical Wound Service collaborated with the Wound Ostomy Continence team and patient was placed on daily collagenase<sup>™</sup> dressings with a pure hypochlorous acid based wound cleanser (pHA)\*- moistened gauze.



R anterior thigh: 8/16/24 8/23/24

### CASE STUDY #2

40-year-old female presented with a chronic RLE wound due to Xylazine injections. She has a very low pain tolerance. Although she has been treated with silver impregnated hydrofiber<sup>®</sup> and has had multiple surgical debridements, she has not progressed well. Her wound therapy was modified to collagenase<sup>™</sup> and a <sup>‡</sup>nonadherent contact layer. This resulted in reduced microbial colony levels based on clinical observations and significant wound progression, without relapse due to less painful dressing changes.



RLE: 6/23/24 7/15/24

### CASE STUDY #3

44-year-old female presented 5/23 to ED with BUE wounds from Xylazine injections. Surgery was consulted and performed I&D of an abscess in her left antecubital; but collaborated with Acute Surgical Wound Service to initiate collagenase<sup>™</sup> and pHA\*- moistened gauze daily for RUE management.



RUE: 5/23/24 7/8/24

### CASE STUDY #4

41-year-old male seen in the ED 8/1/24 for worsening BLE wounds after injecting Xylazine into both legs. Surgery was consulted and case discussed with Acute Surgical Wound Service and recommend no surgical debridement at this time. Collagenase<sup>™</sup> and pHA\*-moistened gauze dressings were ordered daily.



RLE: 8/2/24 8/23/24 LLE: 8/2/24 8/23/24

## FINDINGS / RESULTS

Eight patients, in their twenties to fifties, had extensive Xylazine-associated wounds involving their extremities. These were full thickness involving soft tissue, muscle, tendons, and bone, yet they were successfully managed with pHA combined with topical debridement, promoting healing. This novel approach enabled patients to tolerate wound care with significantly less pain than alternative treatment modalities requiring frequent removal of products, thereby exacerbating the wounds. This treatment allowed for limb salvage in most of these patients. No adverse events, such as bleeding or reactions were noted.

## Discussion

These dressing changes are less frequent and less painful, facilitating patient/caregiver trust which encourages patients to remain inpatient longer to promote healing. This wound care regimen is easily taught and can help patients prevent readmissions for grossly infected soft tissue wounds. As more of these patients are seen, continued surveillance will provide more insight into the effectiveness of this treatment modality.

## REFERENCES

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## DISCLOSURES

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