PolyMem Silver and PolyMem Dressings in the Treatment of Chronic Venous Leg Ulcers
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**INTRODUCTION**
This case follows the progress of an 80 year old male with a seven year history of non-healing, venous leg ulceration.

**BACKGROUND**
An 80 year old male patient has been attending the Wound Healing Community Outreach Service at Queensland University of Technology, since 21st May 2008 for assessment and management of chronic wounds located on his left and right medial malleoli.

The ulceration occurred secondary to corticosteroid-induced skin atrophy, a well-known side effect of long-term use of topical corticosteroids which were used in an attempt to relieve the discomfort of venous stasis eczema. Chronic venous stasis eczema is a chronic inflammatory disease of the skin. The main clinical features of chronic venous stasis eczema include a characteristic itch, which results in scratching, prurigo papules, lichenification, and eczematous lesions. Topical corticosteroids are frequently prescribed to reduce the symptoms associated with inflammation however they are not curative and do not address the underlying cause of the disease. In this case study, long-term use of a topical corticosteroid has resulted in desquamation of the tissue on both legs and skin atrophy. The potent anti-inflammatory effects of topical corticosteroids impede wound healing because they suppress the inflammatory process which is essential in wound healing.

**CLINICAL PROBLEM**
On initial examination the patient presented with non-healing ulcers located on his right medial malleolus measuring 3.7cm in length x 3.9cm in width (area = 9.0cm²) and an ulcer on his left medial malleolus measuring 5.4cm in length x 3.3 in width (area = 14.2cm²). The ulcers were producing moderate amounts of malodorous serous exudate, the wound beds were comprised of 100% tough tissue and the wound edges were sloping. The periwound skin was in poor condition including a characteristic itch, which results in scratching, prurigo papules, lichenification, and eczematous lesions. Topical corticosteroids are frequently prescribed to reduce the symptoms associated with inflammation however they are not curative and do not address the underlying cause of the disease. In this case study, long-term use of a topical corticosteroid has resulted in desquamation of the tissue on both legs and skin atrophy. The potent anti-inflammatory effects of topical corticosteroids impede wound healing because they suppress the inflammatory process which is essential in wound healing.

Unfortunately at week 18 the patient presented to the Wound Healing Service with a marked deterioration in his condition. This was associated with a week of extremely hot, dry weather which tends to exacerbate his eczematous symptoms. At this point the patient was advised to use compression bandaging and to use graduated compression hosiery to reduce the symptoms associated with a week of extremely hot, dry weather which tends to exacerbate his eczematous symptoms. At this point the patient was advised to use compression bandaging and to use graduated compression hosiery to reduce the symptoms associated with his ulceration.

**AIMS**
- To reduce bacterial colonisation
- To reduce pain and discomfort
- To control malodour and exudate
- To protect periwound skin
- Dressings to be cost effective

**MEDICAL AND SOCIAL HISTORY**
- Varicose veins
- Chronic venous insufficiency
- CVA 1997
- Moderate alcohol intake (1 glass/night)
- Lives alone
- Single, never married
- Retired book maker
- Good social support network

**TREATMENT PLAN**

**1. Week 8**
Dressing changed twice weekly.

**2. Week 24**
The ulcers had significantly improved and PolyMem was applied as the primary wound dressing. We continued with short-stretch inelastic bandaging. The patient declined to have community nurses assist with daily dressings.

**3. Week 52**
Dressings were changed twice weekly.

**4. Week 58**
The patient reported that dressing was painful and PolyMem was applied as the primary dressing.

**CONCLUSION**
In this case study, PolyMem Silver and PolyMem in combination with compression therapy were found to be effective in improving wound healing outcomes for this very challenging venous leg ulceration.

**BIBLIOGRAPHY**

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PolyMem wound dressings are made by Ferris Mfg. Corp., Burr Ridge, IL 60527 U.S.A