

# USE OF DEHYDRATED HUMAN AMNIOTIC MEMBRANE ALLOGRAFT TO TREAT LEG AND FOOT WOUNDS OF VARYING ETIOLOGIES

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## OBJECTIVE

This case series will demonstrate use of Dehydrated Human Amniotic Membrane Allograft<sup>®</sup> (DAMA) to treat leg and foot wounds of varying etiologies.

## PURPOSE

Lower extremity ulcers can be challenging to heal thus leaving wound care practitioners searching for novel solutions. An amniotic membrane provides a non-immunogenic structural matrix<sup>1</sup> that contains growth factors and cytokines<sup>2</sup> which are essential to wound healing.

## METHODOLOGY

DAMA is dehydrated human amnion only tissue allograft that provides inherent structural extracellular matrix components, growth factors & cytokines to provide an environment to advance soft tissue reconstruction & regeneration.

## RESULTS AND CONCLUSIONS

DAMA was used on an array of different wound types and with patient's of varying ethnicity and age. The wounds healed in 5.8 weeks on average after previously failing to heal with other standard advanced wound care interventions. Further research is suggested with this novel therapy.

### References:

1. Wierler B, Martin E. A prospective study of 20 foot and ankle wounds treated with cryopreserved amniotic membrane and fluid allograft. The Journal of Foot and Ankle Surgery. 52 (2013) 615-621.
2. Fettesof DE, Snyder RJ. Scientific Clinical Support for the Use of Dehydrated Amniotic Membrane in Wound Management. Wounds 2012; 24 (10): 299-307.

<sup>®</sup>AMNIOEXCEL<sup>®</sup> is a registered trademark of BioD, LLC made available by Derma Sciences Inc, Princeton, NJ  
<sup>®</sup>OmniP<sup>®</sup>, Smith & Nephew, London, UK

### CASE 1

55 year old African American male with controlled diabetes, diabetic neuropathy and chronic venous hypertension with a traumatic left lateral lower leg ulcer measuring 3.2 cm x 6.0 cm x 0.1 cm. This wound was treated with compression, periodic sharp debridement and collagenase<sup>®</sup> for 6 weeks with minimal resolution. DAMA was initiated 5/22/14 then applied every other week. The wound closed in 5 weeks after 3 applications.



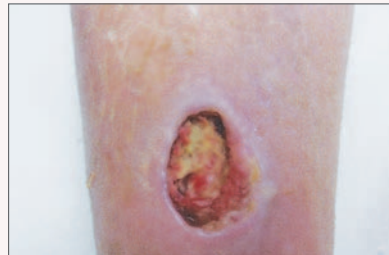
5/22/14



6/26/14

### CASE 2

97 year old Caucasian female with a right anterior lower leg wound secondary to trauma measuring 2.5 cm x 1.5 cm x 0.3 cm. The wound was present since 4/20/14. It was previously treated with compression, sharp debridement and collagenase. DAMA was initiated on 6/12/14 and applied weekly for 3 weeks in conjunction with compression. Pt was hospitalized during the course of treatment, but went on to close in 7 weeks.



6/12/14



7/29/14

### CASE 3

58 year old Caucasian male with poorly-controlled diabetes and left great toe wound present since 6/1/14 measuring 1.5 cm x 0.6 cm x 0.1 cm. Wound culture was (+) for MRSA, treated with culture-guided antibiotic. The wound was offloaded with bulk dressings and a post-op shoe. After adequate wound bed preparation, and with the wound stalled, DAMA was initiated 7/8/14 and applied weekly. The wound progressed to healing after the 6th DAMA application, despite being non-compliant with off-loading. The last photo was taken on 8/21/14 as seen below.



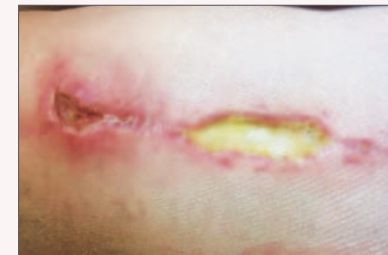
7/8/14



8/21/14

### CASE 4

54 year old Caucasian female s/p right total knee replacement April 2014 presented to WCC 7/10/14 with an open wound due to wound dehiscence suffered during a fall. After a course of Negative Pressure Wound Therapy to granulate the wound bed, wound healing stalled. DAMA was initiated on 10/3/14 after wound was debrided. The photo seen below is prior to sharp debridement. After 3 applications, the wound was resolved as of 11/3/14.



10/3/14



11/3/14