

Bivalve Casting

Benefits of Total Contact Casting while allowing Home Health access for dressing changes and minimizing cost

Scan QR code for how-to video



Case Study #1

06/14/2023 Wound #1 initial visit
Plantar right great toe
2.0 x 2.0 x 0.5 cm

06/14/2023 Gentian violet/
methylene blue

08/03/2023 Cadexomer iodine

09/12/2023 Honey alginate

11/15/2023 Wound extended
2.2 x 2.2 x 0.6 cm

12/13/2023 Bivalve casting initiated
Collagen and Nano crystal silver

12/13/2023 1.3 x 0.7 x 0.3 cm.

01/03/2024 0.1 x 0.1 x 0.1 cm

01/22/2024 Resolved with cast
in 68 days. Decreased 4.8 sq. cms



Case Study #2

04/15/2023 TMA site amp
07/17/2023 Wound #1 initial visit
Left TMA site plantar surface lateral foot
4.5 x 3.0 x 1.5 cm Cadexomer iodine

07/17/2023 Wound #2 Left TMA site
plantar surface medial
1.5 x 2.5 x 1.5 cm Cadexomer iodine

08/14/2023 **Bivalve casting**

08/14/2023 Wound #1 2.0 x 4.0 x 1.5 cm
Wound #2 1.0 x 1.0 x 1.5 cm

08/28/2023 NPWT initiated

09/18/2023 Wound #1 1.6 x 2.4 x 0.3 cm

09/18/2023 # 2 resolved with cast
in 35 days. Decreased 1.0 sq. cms

10/16/2023 NPWT discontinued

12/11/2023 Wound #1 0.8 x 1.5 x 0.5 cm
Bivalve cast discontinued
orthotic felt to off-load,
biologics started

01/15/2024 Wound #1 0.5 x 0.8 x 0.3 cm
4th application of biologic

01/15/2024 #1 Significant improvement in
120 days. Decreased 6.8 sq. cms



Case Study #3

06/21/2023 Wound #1 initial visit
Left 4th plantar metatarsal head MTH
0.5 x 0.5 x 1.6 probes near bone
Dressing - nanocrystal silver dressing all wounds

06/21/2023 Wound #2 midfoot plantar 3rd
MTH
2.0 x 1.8 x 1.3 tunnels at 1 and 3 o'clock, connects
to wound #3

Wound #3 left forth plantar surface MTH
0.8 x 1.2 x 1.5 cm probes near to bone tunnels to
wound #2

06/23/2023 Bivalve casting initiated

06/23/2023 0.5 x 0.5 x 1.6 cm

07/25/2023 #1 0.1 x 0.1 x 0.1 cm
granulation tissue

07/25/2023 #2 0.5 x 0.5 x 0.3 cm
tunnel 0.5cm granulation
tissue

07/25/2023 #3 0.7 x 1.0 x 0.5 cm
granulation tissue no tunneling

08/11/2023 Bivalve casting discontinued

08/11/2023 #1 0.1 x 0.1 x 0.1 cm

08/11/2023 #2 0.1 x 0.2 x 0.1 cm

08/11/2023 #3 0.5 x 0.5 x 0.2 cm

08/11/2023 All 3 resolved in 80 days.
Decreased 6.5 sq. cms



Gisele Castonguay APRN-CNP, CWOCN; Liz Beal MSN, RN, CWOCN

References

- Lazzarini PA, Jarl G, Gooday C, et al. Effectiveness of offloading interventions to heal foot ulcers in persons with diabetes: a systematic review. *Diabetes/Metabolism Research & Reviews*. 2020;36:1-28. doi:10.1002/dmrr.3275
- Bullen B, Young M. Unmasking the impact of clinical non-attendance on neuropathic diabetes foot ulcer management. *Diabetic Foot Journal*. 2019;22(4):28-33. Accessed October 30, 2023. <https://search.ebscohost.com/login.aspx?direct=true&db=ccm&AN=139353447&site=ehost-live>
- Sahu B, Prusty A, Tudu B. Total contact casting versus traditional dressing in diabetic foot ulcers. *Journal of Orthopedic Surgery (10225536)*. 2018;26(3):1. doi:10.1177/2309499018802486