Use of a PVA Gelling Fiber to Heal Complex Wounds, Reduce Pain & Suffering, and Save Time: A Retrospective Review

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Background

In the United States, wounds affect 8.2 million people and cost up to $96.8 billion to treat.[1] Much of this cost is an avoidable result of sub-optimal wound management associated with clinicians trying to effectively navigate an infinite list of seemingly similar products.[1-3]

Aims

The aim of this study was to assess the healing capacity of a PVA Gelling Fiber♥, by analyzing patient and wound outcomes across a diverse sample of wound cases.

Setting & Sample

Case Contributions:

- 10 clinicians • 5 countries • 5 years
- 34 patients • 34 wounds
- 4 healthcare settings
- 8 wound types
- Silver (70.6%) & Non-Silver (29.4%)

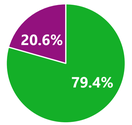
Methods

A retrospective review of published case studies was undertaken. Inclusions were all cases where a Polyvinyl Alcohol (PVA) Gelling Fiber was used as the only primary dressing. A standard data collection form was designed and automated. Patient, wound, and dressing performance data was collated, analyzed in aggregate form, and pre- and post-PVA gelling fiber outcomes reported.

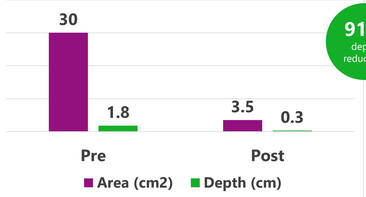
Results

HEALS Complex Wounds

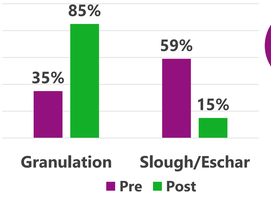
Wound Status at Last Visit — 100% healing



Mean Wound Size (pre vs post) — 94% area reduction; 91% depth reduction

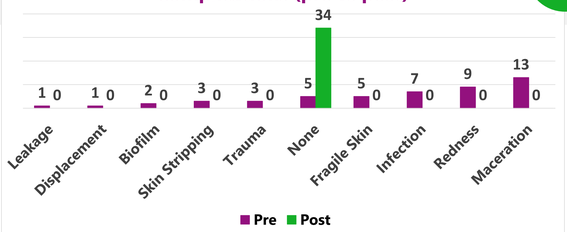


Tissue Type (pre vs post) — 142% increase in granulation; 74.6% decrease in necrosis

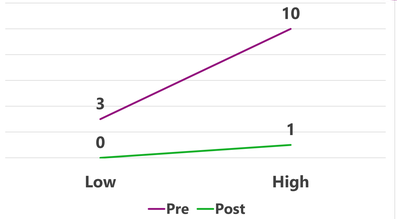


REDUCES Pain & Suffering

Complications (pre vs post) — 100% complications resolved

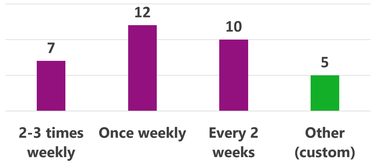


Visual Analog Scores (pre vs post) — 99.9% pain reduction



SAVES Time & Money

Change Frequency (# Wounds) — 85.3% employed UWH



Wound Duration (pre vs post)

Pre-PVA Gelling Fiber (mean):

- 103 months (8.5 years)
- Range: 1month – 204months

Post-PVA Gelling Fiber (mean)

- 7 weeks
- Range: 2 weeks – 16 weeks

Discussion

Evidence-based product selection is essential to achieving better patient, clinical, and financial outcomes. Use of a PVA gelling fiber resulted in increased granulation, decreased necrosis, resolution of care complications, reduced pain, self care for 3 patients and a mean healing time of 7 weeks, compared to a pre-intervention mean wound duration of 8.5 years. Patients and clinicians also reported positive experiences with the dressing, per the callouts below.

Conclusion

Faster wound healing without complications is associated with reduced costs over time.[1] In this study, the use of a PVA gelling fiber reduced treatment time and pain, alleviated complications of care, and healed acute and chronic wounds, even in patients with complex medical histories.

References

1. Sen, C.K. (2019). Human wounds and its burden: An updated compendium of estimates. Advances in Wound Care, 8 (2), 39-47. DOI: 10.1089/wound.2019.0946
2. McNichol, L., Ratliff, C., & Yates, S. (2021). Wound, Ostomy, and Continence Nurses Society Core Curriculum: Wound Management. Wound, Ostomy, Continence Nurses Society. Wolters Kluwer: 2nd Edition.
3. Gefen A, Timmons J, Carlsson E et al. (2021). Exufiber® and Exufiber® Ag+: A review of the scientific and clinical evidence. Wounds International, London. Available to download from www.woundsinternational.com

♥ = Product Reference: Exufiber® and Exufiber® Ag+