The Role of Adhesives in Dermatologic Surgery: Tips, Tricks and Review

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The Role of Adhesives in Dermatologic Surgery: Tips, Tricks, and Review of the Literature

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Objectives

• Briefly review indications and labeled uses of tissue adhesives
• Compare tissue adhesives to sutures regarding use in dermatologic surgery
• Discuss off-label uses of tissue adhesives in dermatologic surgery
Tissue Adhesives

- Tissue adhesives are composed of cyanoacrylate compounds
- FDA approved for superficial lacerations and incisions
  - **N-butyl-2-cyanoacrylate** (Indermil, Covidien)
    - 30 sec polymerization
    - More rigid
  - **Octyl cyanoacrylate** (Dermabond)
    - 150 second (2.5 min) polymerization
    - More flexible
- Wound strength equivalent to 5–0 epidermal sutures
Adhesives vs. Sutures

Advantages of Adhesives
• Equivalent cosmesis on face
• Faster closure
• Ease of wound care
• No need for suture removal
• Increased patient satisfaction
• Antimicrobial properties
• No tissue toxicity or delayed wound healing
• Avoids tissue reactivity induced by sutures
• Decreased risk of needle stick

Disadvantages of Adhesives
• Worse cosmesis on trunk and extremities
• Cannot adjust wound edges when dry
• Requires a dry surface
• Increased risk of dehiscence
• Does not help wound eversion
• Equivalent strength to 5-0 suture
• Can cause allergic contact dermatitis
• Can cause foreign body reaction
Tips, Tricks, Novel Techniques

- Increase skin integrity to support sutures
- Hemostasis in patients with low-grade oozing postoperatively
- Secondary intention healing

Tayebi, Bailey MD, MBA; Kaniszewska, Monika MD; Mahoney, Anne Marie MD; Tung, Rebecca MD A Novel Closure Method for Surgical Defects in Atrophic Skin Using Cyanoacrylate Adhesive and Suture, Dermatologic Surgery: January 2015 - Volume 41 - Issue 1 - p 177-180
Tips, Tricks, Novel Techniques

• Full-thickness and split-thickness skin grafting
• Hair transplantation
• Tissue specimen handling for Mohs Micrographic Surgery


Thank You

Today's Weight Loss Tip:
Use SuperGlue as Lip Gloss
References

References

- Use of 2-octyl Cyanoacrylate to Obviate Daily Wound Care After Mohs Surgery
- Clifford C Sung 1, Kavita Mariwalla
References

- --No difference at 1 year