

Perbandingan efektivitas beberapa bahan topikal dalam mengurangi medical adhesive-related skin injury dan parameter terkait dalam prosedur pelepasan perekat medis berbahan dasar akrilat pada kulit dewasa normal = Comparison of effectiveness of several substances in reducing medical adhesive-related skin injury and corresponding parameters in acrylic-based tape removal on the skin of normal adults

Michael Hartanto Angriawan, author

Deskripsi Lengkap: <https://lib.ui.ac.id/detail?id=20485153&lokasi=lokal>

Abstrak

ABSTRAK

Latar belakang: Perekat medis akrilat banyak digunakan dalam layanan kesehatan tetapi kerap menimbulkan Medical adhesive-related skin injury (MARSI). Pencegahan dapat dilakukan dengan menambahkan larutan NaCl 0,9%, vaselin album, atau alkohol saat pengangkatan. Namun belum didukung oleh penelitian. Tujuan: Mengetahui efektivitas penambahan bahan topikal dalam prosedur pelepasan perekat akrilat dalam mengurangi angka kejadian MARSI dan parameter objektif terkait. Metode: Penelitian ini adalah uji klinis acak tersamar tunggal. Dilakukan penempelan perekat akrilat pada empat lokasi di kulit lengan atas dewasa normal. Pada hari ketiga dan keenam perekat diangkat dengan/tanpa menambahkan bahan topikal secara acak pada keempat lokasi dan dilakukan evaluasi angka kejadian MARSI, skor eritema klinis, nilai eritema mexameter, TEWL, dan skor VAS nyeri. Hasil: Terdapat 224 lokasi uji dari 56 sampel. Angka kejadian MARSI pasca pengangkatan pertama 49,5% dan kedua 59,3%, terendah pada alkohol 50%. Alkohol menunjukkan peningkatan rerata skor eritema terendah baik klinis ($p=0,102$) maupun mexameter ($p=0,024$). Alkohol dan vaselin menghasilkan peningkatan nilai TEWL terendah ($p=0,709$). Alkohol dan NaCl 0,9% tidak bermakna meningkatkan skor VAS nyeri ($p=0,173$ dan $p=0,699$). Kesimpulan: Penambahan bahan topikal dapat mengurangi angka kejadian MARSI, namun tidak bermakna secara statistik. Alkohol secara konsisten menunjukkan perubahan parameter terkait yang lebih baik.

ABSTRACT

Background: Acrylic-based tapes are widely used in medicine but frequently associated with medical adhesive-related skin injury (MARSI). Addition of normal saline, vaseline or alcohol in its removal may prevent this, but studies are lacking. Aim: To determine the effectiveness of topical substances in reducing MARSI and related parameters during the removal of acrylic-based adhesives. Methods: We conducted a single-blind randomized controlled trial on the skin of normal adults. Tapes were placed on four sites on the upper forearms which were removed on the third and sixth days with/without applying the substances. The incidence, erythema based on clinical scores and mexameter, TEWL, and pain VAS were measured. Results: We obtained 224 test locations from 56 subjects. The incidence was 49.5% on the third day, increasing to 59.3% on the sixth; it was lower in alcohol group (50%). Alcohol resulted in lower mean of clinical erythema ($p=0.102$) and mexameter scores ($p=0.024$). Both alcohol and vaseline gave the lowest TEWL increase ($p=0.709$). Alcohol and normal saline was insignificantly increasing pain score ($p=0.173$ and $p=0.699$).

Conclusion: Application of substances reduced MARSI incidence, but not statistically significant. Alcohol consistently demonstrated more favorable outcome in MARSI-related parameters.