

DEBRIPHOR IN CHRONIC ULCERS

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SUMMARY

Debriphor, a dextran polymer has absorbent properties. In the present study twenty patients of chronic ulcers in adults have been treated with this substance with good results.

Chronic ulcers may be of varied etiology and there may be different causes leading to their chronicity. However the surgeon dealing with such patients, has one aim in mind viz. to obtain its healing in as short time as possible. To achieve this goal the ulcer must be rendered clean and fit for skin grafting as early as possible by using various antibacterial agents such as silver sulphadiazine, sulfamylon, gentamycin and povidone iodine. Healing of infected discharging lesions can be facilitated, if the kind of dressing employed constantly removes exudate from the surface of the wound (Scales, 1963). Debriphor, a dextran polymer crossed linked with O-glycerine groups, available in the form of small beads 0.1 to 0.3 mm in diameter has the property of absorbing the exudate from the ulcer surface (Arturson, 1978).

Material and Methods

This trial was carried out in twenty adult patients ranging in age between 21 to 57 years with chronic ulcers on the legs (7 cases), sacral region (7 cases) and other sites (6 cases). Seven ulcers were due to chronic venous insufficiency, seven were decubitus ulcers and the remaining six cases were due to trauma, burn and other causes. All the patients in the study group were dressed twice daily with a thick layer of Debriphor granules, covered by several layers of gauze and absorbent cotton. To compare the results, another 20 patients matched by age and sex were cleaned with a mild antiseptic and dressed with gauze soaked in saline. Following observations were recorded daily

(a) Inflammatory reaction (b) Pain and tenderness (c) Amount of discharge (d) Appearance of granulation tissue (e) Epithelialization.

Observations

The observations are given in Table I. The dressings seemed to absorb the exudate and

Table I. Clinical Observations

Clinical observations	Study group	Controls
Exudate clearance	3 days	6 days
Reduction of inflammatory reaction	3 days	6 days
Reduction of pain	2 days	4 days
Rate of epithelialization	No difference	No difference
Bacterial flora	No difference	No difference

appeared soaked. The Debriphor slough combine was easily rubbed off leaving an ulcer that was comparatively drier and cleaner than controls. The inflammatory reaction subsided faster. Pain became less, there were no allergic or anaphylactic reactions. No clear cut observation could be recorded regarding the rate of epithelialization. The ulcers became fit for skin grafting in 3 to 4 days.

Discussion

Venous ulcers and decubitus ulcers are chronic ulcers, resistant to early healing and epithelialization. Routine dressings with antiseptic ointment and cream failed to hasten the process of healing. Profuse discharge in the ulcer

seems to favour bacterial growth which is detrimental to healing. The use of Debriphor helps in absorbing the infected exudate, the wound becomes drier and the inflammatory reaction subsides faster giving relief to pain. Allergic or anaphylactic reactions are not seen. The beneficial effects of Debriphor seems to be due to the physiochemical properties of the beads i.e. the suction force, the storage capacity and the chromatographic properties. The cleansing effect results in the removal of the inflammatory

exudate along with the bacteria and the chemical mediators from the ulcer surface. It also reduces the tissue oedema (Jacobson et al., 1976). This favours quicker healing as such or by skin grafting.

Conclusion

In the opinion of the authors, Debriphor granules can clear exudates, reduce inflammation and pain faster than conventional dressings in chronic ulcers.

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