

USE OF ALLOGENIC DERMOEPIDERMAL GRAFTS CAN ACCELERATE HEALING OF DIABETIC FOOT DISEASE

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Aim: Our aim was to verify in this pilot study the effectiveness and safety of allogenic graft application in the healing of the diabetic foot and to compare our results with the use of xenogenic grafts.

Materials and methods: We used minimal modified, cryoconserved allogenic grafts containing epidermis and papillar part of dermis. This graft is indicated as a temporary covering for necrectomy areas or zones with complete lost of skin. The grafts are taken aseptically from cadaveric donors and stored in a tissue bank in accordance with the latest European standards. The first group (xenogenic) included 44 patients with diabetic foot disease (mean age $58,6 \pm 15,9$ years). The second group (allogenic) included 4 patients (mean age $55,5 \pm 9,1$ years). All patients of the second group had chronic 4-month persisting non-healing foot ulcers without signs of severe inflammation, osteomyelitis and without critical ischaemia. Both grafting methods were compared retrospectively according to defect area, length of therapy, microbiological cultivation and eventual adverse effects.

Results: We reached defect area reduction of 48,6 (-33,3; 100)% after the therapy by xenogenic grafts and 55,4 (37,6; 68,8)% after the application of allogenic grafts, no significant difference was found between these two methods. Mean time of application in xenogenic grafts was $32,14 \pm 19,21$ days, in allogenic grafts $19,5 \pm 2,7$ days. There was no substantial difference between microbiological cultivation before and after application of both types of grafts. No substantial adverse events were seen.

Conclusion: Allogenic dermoepidermal grafts are in special indication a safe and effective therapeutic method in healing of diabetic foot ulcers.

Supported by grant of Ministry of Health 00023001.