

TREATMENT OF COMPLEX HEEL DEFECTS

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The heel, the skin, and the calcaneus as a whole play an important part in weight bearing, and their loss means the foot loses its walking ability.

In the Department for Plastic Surgery, Clinical Hospital "Dubrava" since 1995. There were 12 patients treated for heel defects. The causes of heel defects were injury in 11 patients while one patient was treated for neurotrophic ulcer. In 2 patients there was severe loss of calcaneus and in 2 patients there was concomitant Achilles tendon defect. 2 patients with loss of bone were reconstructed with iliac crest osteocutaneous free flap and with forearm osteocutaneous free flap. In 2 patients with Achilles tendon defect, composite forearm osteocutaneous free flap with incorporated palmaris longus tendon were utilized. In the remainder of patients with soft tissue defects 2 latissimus dorsi musculocutaneous, 3 forearm fasciocutaneous, and 3 anterior lateral thigh perforator flaps were used. Functional results are very good, and each patient is able to perform ambulation without assistance. There was no flap loss, and only minor complications were encountered.

Functional and esthetic reconstruction of the bony and tendinous structures with a stable, sensate soft tissue integument after complex posttraumatic defects of the heel is demanding. Cases of heel reconstruction are rare in the literature and hardly comparable due to their diversity. The reconstructive approach has to consider both patient profile and the reconstructive tree, with free microvascular flaps playing a primary role.