

Extensive Posteromedial Soft Tissue Release for Skeletally Mature Patients With Rigid Pes Cavus Deformity

Khaled M Emara¹, Ramy Diab, Khaled Abdelghafar Alabd, Mohamed Noureldeen Mohamed Essa, Ahmed Emara, Kyrillos Magdy Rashid, Mostafa Gemeah

¹ain shams univ.

INTRODUCTION: Adult-onset cavovarus foot deformity is a highly disabling condition that can seriously interfere with daily activities. Charcot-Marie-Tooth is the most common etiology associated with cavus foot.

METHODS: We reviewed 30 feet in skeletally mature patients with rigid cavovarus deformities who were treated with extensive posteromedial soft tissue release without performing osteotomies or internal fixation. Clinical evaluation was done using the Foot Function Index for the pain, disability, and limitation of movement. The radiologic assessment was done by measurement of the lateral talo-first metatarsal angle, the lateral calcaneal-first metatarsal angle, and the lateral tibio-calcaneal angle in standing lateral foot radiographs. All patients were followed up for a mean of 36 months postoperatively.

RESULTS:

Throughout the course of the study, the Foot Function Index for pain, disability, and limitation improved from an average of 51.46 points, 47.06 points, and 22.6 points preoperatively to postoperative averages of 23.65 points, 21.88 points, and 10.2 points, respectively. Radiologically, the talo-first metatarsal angle, the calcaneo-first metatarsal angle, and the tibio-calcaneal angles had preoperative values of 28.9 degrees, 132.4 degrees, and 62.35 degrees which improved postoperatively to 7.55 degrees, 117.65 degrees and 50.35 degrees, respectively.

DISCUSSION AND CONCLUSION: The outcomes of this study shed light on the use of pure soft tissue release without associated osteotomies as a simple, safe, and effective technique in treating rigid cavovarus deformities in skeletally mature patients. This could carry some advantages regarding preserving foot function as it preserves the integrity of foot joints.