

**ID:** 1924

**Title:** Partial Medial Meniscus Substitution With The Collagen Meniscal Implant, 10-Years Follow-Up

**Abstract:** Summary: Partial substitution of the medial meniscus with the Collagen Meniscal Implant showed to be safe and to provide good or excellent functional and radiographic results in 80% of the cases at minimum 10-years follow-up. Purpose: The aim of the study was to evaluate the clinical outcome of a collagen meniscus graft implanted in an injured medial meniscus after a minimum 10-year follow-up. Methods: Twenty-five patients underwent arthroscopic implantation of the collagen meniscus device. They had either persistent compartmental joint line pain due to a previous medial meniscus resection (5 cases) or a large irreparable meniscus tear at arthroscopy (20 cases). Twenty-two patients returned for clinical, functional and radiographic evaluation. Magnetic resonance imaging (MRI) was also performed, and was analyzed with the Genovese's criteria (grade III, normal/grade I, completely abnormal). All the aforementioned evaluations were carried out at a minimum of 10 years (range, 10.1-12.5) after the procedure. Results: The mean Lysholm score improved from 59.9 preoperatively to 89.6 at 1-year ( $p < 0.001$ ) and stood at 87.5 at final follow-up ( $p < 0.001$ ). The results were good or excellent in 80% of the population. No differences were observed upon comparing at 1-year follow-up with the final Lysholm score ( $p > 0.05$ ). The average visual analogue scale pain score improved by 3.5 points at final follow up. Patient satisfaction with the procedure was 3.4/4 points. Radiographic evaluation showed either minimal or no narrowing of the joint line. MRI showed 64% grade-II and 21% grade-III. All cases showed less volume than expected (89% size grade II). The failure rate in the patient population was 8% (2 out of 25). There were no complications related to the device. Conclusions: Meniscal substitution with the collagen meniscal implant provides significant pain relief and functional improvement after a minimum ten-year follow-up. In addition, the procedure proved to be safe and had a low rate of implant failure on a long-term basis.