

10.7), TV: <20–80.9ml, SH in 17/28, AB: 0–6.87 (mean 2.58 UI/L) available in 20/28, and noR in 4/32 (12.5%), with A: 10–17mCi (mean 12.8), TV: 21.8–46.3ml, SH in 2/4, AB 2.68–28.53 (mean 11.63UI/L) available in 3/4. No significant differences between R and noR in terms of age, sex, A, CH or SH. **Conclusion:** After one year of follow-up, in our group of patients there was a good therapeutic response and without significant differences between MNG (89.4%) and GD (87.5%). Persistent hyperthyroidism was associated with a higher thyroid volume in MNG and in the group of GD with a tendency for higher AB levels, but without relation with the other assessed factors. **References:** None

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10-Years Results After 90-Yttrium and 166-Holmium Radiosynoviorthesis In Chronic Knee Synovitis Of Different Origin /820 patients/

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Aim/Introduction: In the case of chronic synovitis, the synovial membrane proliferates, producing fluid, then creeps onto the cartilage, causing first pannus formation, then serious destruction to both cartilage and bone. Our aim is to stop this process. **Study objectives:** Examination of anti-inflammatory effect of 90-Yttrium and 166-Holmium injections. **Materials and Methods:** Out of these 820 patients 460 suffered from rheumatoid arthritis, 68 ankylosing spondylitis, 52 other seronegative spondylarthritis, 188 suffered from inflamed osteoarthritis, 4 hydrops articularum intermittens, 4 synovitis villonodularis, 44 from chronic traumatic synovitis. Evaluation was based on the criteria as described by Müller, Rau and Scütte the score system was developed by the authors. **Results:** In the first 10 years excellent and good results were recorded in 71%. They achieved excellent as well as good results at 83% of patients with rheumatoid arthritis, at 50% of patients with ankylosing spondylitis and at 55% of patients with osteoarthritis. 10 years after radiosynoviorthesis 72% of patients did not need another puncture. **Conclusion:** Radiosynoviorthesis is an effective method of treating chronic synovitis as surgical synovectomy. Even after a 10 years period 71% the findings were rated as excellent or good. 72% of the patients do not need another puncture even after a 10 years period. The effectiveness is worsened significantly by the stadium of the disorder and the local x ray phase and diagnosis. $P < 0.00001$. The treatment must be done in rheumatoid arthritis Steinbrocker stadium I-II, local stadium I-II. **References:** no Szentesi M¹, Papp I¹, Farbaký Zs², Nagy Z³, Berkes I.4, Nagy Gy¹: Treatment of Chronic Knee Synovitis with Radiosynoviorthesis After Failure of Surgical Interventions. EC Orthopaedics 11.2 (2020): 01-14. Margit Szentesi¹, Zoltán Nagy¹, Pal Géher¹, István Papp¹, Willm

Uwe Kampen²): A prospective observational study on long-term results of 90Yttrium Citrate radiosynoviorthesis of synovitis in osteoarthritis of the knee joint. Eur. J. Nucl. Med. Mol. I. 46: 8pp. 1633-1641. 9p. (2019) Szentesi M.,¹ Takács S.,¹ Farbaký Zs.,¹ Nagy E.,¹ Környei J.,² Antalffy M.,² Törkő J.,² Géher P. 1.; 166Holmium-phytate-radiosynoviorthesis in rheumatoid arthritis. One year clinical results Phase III prospectiv study Ann. Rheum. Dis. 2006. 65. Suppl. 2. 346.

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Knee radiosynovectomy with Sm-153 hydroxyapatite compared to Y-90 hydroxyapatite: initial results of a prospective trial

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Aim/Introduction: **Introduction:** The most common clinical presentation in hemophilia patients consists of hemarthrosis. Various treatment strategies aim to control hemarthrosis to prevent secondary arthropathy, among them, radiosynovectomy with Y-90 hydroxyapatite (⁹⁰Y-HA). A few studies have shown a lower efficiency of knee radiosynovectomy with Sm-153 hydroxyapatite (¹⁵³Sm-HA) compared to ⁹⁰Y-HA. **Purpose:** The purpose of this investigation was to assess the efficacy and safety of knee radiosynovectomy with ¹⁵³Sm-HA compared to ⁹⁰Y-HA. **Materials and Methods:** Forty patients were prospectively assigned to undergo knee radiosynovectomy with ¹⁵³Sm-HA (19 patients) or with ⁹⁰Y-HA (21 patients). The frequency of hemarthrosis episodes before and after treatment was compared. **Results:** The response to knee radiosynovectomy stratifying according to radiotracer showed that after 6 months the median response rate with ¹⁵³Sm-HA was not significantly different from ⁹⁰Y-HA (87.5% vs 80.9%; $p = 0.576$). However, after 12 months the median response rate of knee radiosynovectomy with ¹⁵³Sm-HA was significantly better than with ⁹⁰Y-HA (87.5% vs 50%; $p = 0.037$), respectively. The reduction of joint bleeding by at least 50%, after 12 months, was greater in the group of patients treated with ¹⁵³Sm-HA compared to ⁹⁰Y-HA (74% vs 52%), respectively. **Conclusion:** Knee radiosynovectomy with high doses of ¹⁵³Sm-HA is safe, with an efficiency rate similar that is described in the literature by the ⁹⁰Y-HA. **References:** None