RADIOACTIVE SYNOVIOPTHESIS IN HAEMOPHILIC HAEMARTHROSIS. F.Fernandez-Palazzi and M.S. Bosch.
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Because haemarthrosis is the main musculoskeletal symptom in haemophilia, with bleeding originating from the synovial membrane, its prevention by either synovecotomy or intra-articular synoviotherapy must be the principal aim of orthopaedic treatment. Since 1976 we have treated 10 patients with recurrent haemarthrosis of joints (5 knees, 3 elbows and 2 ankles) with radioactive synoviotherapy with gold (Au 198), obtaining in all of them a distinct decrease in frequency of bleeding episodes and factor VIII requirements, and in 7 a total absence of new haemarthrosis. Previous to the synovecotomy, a joint screening with Tc-99m was performed, in order to compare the inflammatory status of the synovia with that five months after synoviotherapy. The technique used as well as dosage of Au 198 and factor VIII coverage, is presented.

A LASER SCALPEL FOR OPERATIONS ON HEMOPHILICS. H. Horowski, U. Solgeholm, M. Heim and L. Parini. Hemophilia Center, Chaim Sheba Medical Center, Tel-HaShomer, Israel.

The CO2 laser scalpel has an excellent hemostatic effect producing a minimal postincisional necrotic zone. Four severe hemophilia A patients were operated with the laser scalpel. Three underwent knee synovecotomy 2 of whom without placing a tourniquet. The fourth patient underwent an operation for hip contracture. Factor VIII levels at the beginning of the operations were gradually reduced from the first operation to the fourth as follows: 100, 80, 14.5 and 1.6 respectively. No significant bleeding was observed during any operation. 3 patients who underwent synovecotomy were ambulated as early as 3 days after operation. They were discharged after 20-26 days, which is considerably shorter than the mean stay of 39 days in the hospital in 8 patients who had been synovecotomized previously by the conventional method. An attempt to stop replacement therapy in the fourth patient on the 6th postoperative day resulted in bleeding. Thus, the advantages of the laser scalpel are: Excellent local hemostasis, tourniquet unnecessary, low levels of factor VIII sufficient at operation, early ambulation and discharge. It is not yet clear whether the amount of postoperative replacement therapy can be reduced. The disadvantages are: Longer operation time (by about a third); smokes produced at theatre; the price of the instrument.

SURGERY IN HEMOPHILIC PATIENTS WITH INHIBITORS. P.E. Kelly and J.A. Penner.
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Major surgical procedures were performed in two hemophilic patients who had developed inhibitors. A total hip replacement was accomplished in one patient with an inhibitor to Factor IX, while a massive retroperiitoneal pseudo-tumor was removed from another hemophiliac with a Factor VIII inhibitor. Both patients received a single dose of cyclophosphamide prior to surgery. Blood replacement during the procedures reduced inhibitor activity to levels which permitted correction of the patients' deficiencies with infusions of the appropriate factor. A subsequent rise in antibodies experienced by both patients was sufficient to neutralize the standard dose of factor at six days, and necessitated the use of an activated prothrombin concentrate, Auto IX (Nycomed). Peak inhibitor activity was observed at 27 days in the individual with hemophilia B, and fell to pretreatment levels at 7 months. Inhibitor patient, and has continued to fall slowly 2 months after surgery.