point improvement of Lequesne index (difference clinically significant) between groups.

Conclusion Viscosupplementation by Synvisc improves algofunctional status of patients and has no significant impact on specific knee OA cost.

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SAT0075 EFFICACY OF INTRA-ARTICULAR HYALURONIC ACID INJECTIONS IN KNEE OSTEOARHRITIS

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Background

Objectives Our objective was to assess the effects of intra-articular injections of hyaluronic acid (HA) (Hylan G-F 20: Synvisc) on symptoms and functional outcome of knee osteoarthritis (OA).

Methods A total of 60 injections were performed in 17 patients involving 20 knees. These patients with symptomatic, radiological knee OA were randomly assigned to treatment with HA or placebo. Treatment group consisted of 12 patients received three weekly injections of HA into one or both (if bilateral symptomatic) knees (15 knees total). Control group consisted of 5 patients who received three intra-articular injections of 2-ml physiological saline with weekly intervals (5 knees total). Fifteen-minute walking period, range of motion, need of drug and painless walking time were noted at weeks 1,2,3,8. Pain at walking, resting, night and motion were evaluated by Visual Analogue Scale (VAS). Also, WOMAC Osteoarthritis Indexes (Pain by WOMAC-A, stiffness by WOMAC-B, activities of daily living by WOMAC-C) were evaluated by Likert scales in the same weekly intervals.

Results Statistically significant improvements ($p < 0.001$) in WOMAC-A-3 (3rd week), WOMAC-A-8(8th week), WOMAC-B-3, WOMAC-B-8, VAS walking-2,3,8, VAS resting-8, VAS motion-2,3,8, painless walking time-8,15 min walking period-8, need of drug-2,3,8 were found.

When compared with control group, statistically significant improvement was noted ($p < 0.05$) at WOMAC-A-8, WOMAC-C-8, VAS walking-8, VAS resting -3,8 painless walking time-2,3,8, need of drug-8. No side effect was encountered in both of the groups.

Conclusion Early signs of efficacy of intra-articular injections of HA for knee OA was beginning in the 2nd week. But this early improvement is not significant when compared with control group. The real effects of the HA treatment were seen at the 8th week. It is concluded that Hylan G-F 20 provided good clinical benefit for knee OA patients and the clinical improvement was prominent after 8 weeks.

SAT0076 PATIENTS WITH OSTEOARTHRITIS (OA) REPORT MORE SEVERE PAIN THAN AGE- AND GENDER MATCHED RHEUMATOID ARTHRITIS (RA) PATIENTS

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Background Patients with RA generally receive more attention by rheumatologists than patients with widespread OA. We wanted to examine if this difference in level of care is based on differences in severity of health status.

Objectives To compare age- and sex matched OA and RA patients regarding levels health status.

Methods Fifty-one patients between 50 and 70 years of age with generalised osteoarthritis (OA) including hand OA, previously referred to a rheumatology outpatient department, underwent a comprehensive clinical examination including completion of several self-reported health status questionnaires. Among these were AIMS2, SF-36, MHAQ, pain and fatigue on VAS. These OA patients were compared with 51 RA patients matched for age and gender. The RA patients were recruited from the Oslo RA register and had previously completed identical questionnaires. Groups were compared with the McNemar tests (categorical variables) and paired analyses (continuous variables).

Results Mean (SD) age was 66.1 (4.4) years, 4(8%) were males. Pain measures were numerically higher in OA than RA with statistically significant difference for 2 (AIMS2 and SF-36) out of 3 measures (Table 1). No statistically significant differences were found within the dimensions of physical and mental health, social functioning and self-efficacy.

Abstract SAT0076 Table 1

	OA (n = 51)	RA (n = 51)
Pain VAS	40.7 (19.3)	37.5 (23.2)
AIMS2 pain	5.85 (2.03)	4.66 (2.50)
SF-36 pain	37.8 (17.0)	46.3 (21.5)
MHAQ	1.48 (0.37)	1.61 (0.60)
SF-36 physical	54.3 (21.3)	45.1 (24.4)
AIMS2 physical	1.94 (1.09)	2.47 (1.57)
SF-36 mental	68.0 (22.7)	70.7 (21.9)
AIMS2 affect	3.65 (1.85)	3.22 (1.78)

Comparison health status (mean (SD) values).

Conclusion OA patients report more severe pain than RA patients matched for age and gender, whereas other dimensions of health status appear to be similar, with a tendency of worse physical health in RA and worse mental health in OA patients.

SAT0077 EXAMINATIONS OF THE NORWEGIAN VERSION OF AUSCAN ? A DISEASE SPECIFIC MEASURE OF HAND OSTEOARTHRITIS (OA)

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Background In clinical practice we have observed that patients with hand OA frequently have severe pain, stiffness and physical

disability. A new disease specific measure of hand OA has been developed, termed the Australian/Canadian (AUSCAN) osteoarthritis hand index.

Objectives To make preliminary investigations of the performance of the Norwegian version of AUSCAN by examining correlations between scores of AUSCAN and other generic and disease specific health status measures.

Methods The AUSCAN is a disease specific health status measure for hand OA measuring pain (5 items), stiffness (1 item) and difficulties with daily activities (9 items). The instrument was translated to Norwegian according to standardised procedures. Fifty-one patients between 50 and 70 years of age with hand OA (mean (SD) age 66.1 (4.4) years, 4(8%) males) underwent a comprehensive clinical examination including completion of several self-reported health status questionnaires. Among these were AUSCAN, AIMS2, SF-36, MHAQ, pain and fatigue on VAS. All patients had previously been referred to a rheumatology outpatient department. Internal validity was examined by Cronbach alpha, correlations with other scales by Pearson correlation coefficients. Our pre-study hypothesis was to confirm AUSCAN as a specific hand measure with strong or substantial correlations ($r > 0.50$) to hand measures of similar dimensionality, and lower correlations between the AUSCAN measures and generalised measures within the same dimension of health, and low correlations between AUSCAN scales and measures capturing different dimensions.

Results The internal validity of the AUSCAN scales was satisfactory (Cronbach alpha 0.95 and 0.93 for AUSCAN physical and pain, respectively). Correlations between AUSCAN physical and stiffness/pain were 0.67/0.85, between pain and stiffness 0.67. The correlation between the physical scale/pain scale/stiffness scales of AUSCAN with AIMS2 hand and finger function was 0.70/0.54/0.33 respectively, with grip strength $\pm 0.55/-0.42/-0.22$, MHAQ 0.49/0.37/0.39, AIMS2 physical 0.52/0.44/0.26, SF-36 physical $\pm 0.27/-0.23/-0.10$, WOMAC physical 0.37/0.43/0.33, WOMAC stiffness 0.20/0.27/0.27, WOMAC pain 0.27/0.40/0.28, pain VAS 0.31/0.45/0.33, AIMS2 pain 0.47/0.59/0.45, SF-36 pain $\pm 0.37/-0.42/-0.24$, fatigue VAS 0.34/0.37/0.11, AIMS2 affect 0.32/0.36/0.04, and with SF-36 mental $\pm 0.14/-0.13/0.17$, for the physical/pain/stiffness scales of AUSCAN, respectively.

Conclusion In general, our pre-study hypothesis was supported by the results. The physical dimension of AUSCAN appeared to be strongly or substantially correlated to other measures of hand function, and moderately correlated to other measures of physical disability. The pain measure was moderately correlated to other pain measures, whereas the correlation between the stiffness dimension of AUSCAN and WOMAC was rather low (0.27). These preliminary data indicate that the Norwegian version of AUSCAN is appropriate for use in patients with hand OA.

SAT0078 EXPERIENCES WITH A VISCOSUPPLEMENTATION (HYALGAN) CLINIC

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Background Osteoarthritis (OA) is the commonest condition to affect human joints. It is a major cause of pain, disability and handicap, and a difficult condition to treat. Pharmacological treatment has been limited to the use of analgesics, non-steroidal

anti-inflammatory drugs and the controversial use of intra-articular steroid injections. None of these options provide a truly effective treatment. Viscosupplementation has only recently become available in the UK. Hyaluronon in synovial fluid has multiple functions in joint homeostasis. It is reduced in concentration and molecular weight in OA. Therefore viscosupplementation would not only remove pathological synovial fluid (by prior joint aspiration) but also restore the molecular weight and concentration of hyaluronan.¹

Objectives We wished to evaluate viscosupplementation for OA of the knee, and to ascertain which patient groups would derive the most benefit from Hyalgan.

Methods We have an ongoing dedicated visco-supplementation clinic. Patients are assessed to ensure suitability and are also advised about weight reduction (if appropriate) and quadriceps exercises. They attend weekly for the course of 5 injections. The patients are asked to complete a WOMAC Questionnaire pre-course and at 6 weeks, 3 and 6 months after treatment. This is a health status instrument for measuring clinically important patient relevant outcomes to anti-rheumatic drug therapy in patients with osteoarthritis of the hip or knee.² No ethical approval was required.

Results Comparing pre-course WOMAC scores with all time intervals a statistically significant difference at 6 weeks (paired T test $p = 0.0081$) was found. Patients were sub-divided into 2 groups according to WOMAC scores, 1600. (Maximum score 2400, indicating maximum severity). These groups were also compared. Results to reach statistical significance were WOMAC changes at 6 weeks and 6 months in the >1600 group, compared to pre-course where $p = 0.0053$ and $p = 0.023$ respectively (unpaired T test).

Conclusion From our study patients reported an improved WOMAC at 6 weeks. Those with score >1600 , pre-course do better than those with scores inconclusive but do appear to offer some benefit to patients.³ As with intra-articular steroid injections in this condition, it is difficult to predict who will benefit.⁴ Our work would suggest that patients with higher initial scores on WOMAC questionnaire may respond better.

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SAT0079 VALIDITY OF ARTHROSCOPIC GRADING SYSTEM OF CHONDROPATY IN KNEE OSTEOARTHRITIS: CORRELATION WITH HISTOPATHOLOGICAL FINDINGS

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Background Clinical research in osteoarthritis (OA) requires objective methods able to evaluate cartilage status. Arthroscopic evaluation of the articular cartilage would be a reliable instrument for the measurement of the quantity, integrity or quality of articular cartilage in knee OA.

Objectives To correlate an arthroscopic grading system of chondropathy (CHGS) with the histopathological findings of the