compared to healthy controls ($n=26$) (figure 1a, b). And Tph cells were much higher in active group than those in inactive group (13.21 ± 5.96 vs. 4.19 ± 1.59 , $p < 0.0001$) (figure 1a, c). Secondly, like Tfh cells ($r=0.611$, $p < 0.0001$), Tph cells ($r=0.829$, $p < 0.0001$) were significantly associated with SLEDAI scores (figure 1d). Tph cells were associated with IgG ($r=0.650$, $p < 0.001$) (figure 1e), C3 ($r=-0.528$, $p=0.001$) (figure 1 f), C4 levels ($r=-0.561$, $p=0.001$) (figure 1 g), but not ESR, CRP, IL-2, IL-6, TNF- α , IFN- γ , and IL-17A levels. Furthermore, Tph cells were much higher in lupus patients with arthritis (17.71 ± 10.05 vs. 11.14 ± 6.84 , $p=0.045$), in skin mucous group (18.71 ± 6.08 vs. 10.32 ± 7.32 , $p=0.004$), in pleuritis (20.60 ± 8.87 vs. 11.40 ± 7.24 , $p=0.025$), in pericarditis group (26.65 ± 0.21 vs. 11.58 ± 7.25 , $p=0.006$), in group with haematological involvement (15.51 ± 7.76 vs. 8.97 ± 6.58 , $p=0.010$), when compared to patients without relevant symptoms.

Conclusions: Our data suggest that increased Tph cell proportions seem to have an important role in lupus disease development.

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SAT0463

OLFACTORY IMPAIRMENT IN PATIENTS WITH PRIMARY SJÖGREN'S SYNDROME AND ITS CORRELATION WITH ORGAN INVOLVEMENT AND IMMUNOLOGICAL ABNORMALITIES

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Background: Recent findings suggest that autoimmune disorders predispose to a diminished capacity to smell. This has been shown for patients with systemic lupus erythematosus as well as for patients with rheumatoid arthritis. However, this problem has not received much attention in primary Sjögren's syndrome (pSS).

Objectives: The aim of the study was to assess the olfactory functions of patients with primary Sjögren's syndrome and to correlate these findings with their disease activity.

Methods: Fifty-two patients with primary SS and 52 age- and sex-matched healthy control subjects underwent clinical and laboratory examination. Olfactory functions were evaluated using olfactory function assessment by computerised testing including the three stages of smell: threshold, identification and memory of the different odours. The disease activity was assessed by the EULAR SS Patient Reported Index (ESSPRI) and the EULAR SS Disease Activity Index (ESSDAI).

Results: All the olfactory scores (odour threshold, odour memory and identification) in patients with pSS were significantly below the scores in the control group (all $p < 0.001$). Multivariable regression analysis revealed that smell threshold score correlated negatively with ESSPRI and ESSDAI (adjusted $R^2=0.381$, $p < 0.05$). Smell threshold score was decreased in pSS patients with anti-SSA antibody compared with those without ($p < 0.05$). Total smell scores were significantly reduced in patients with thyroid involvement ($p < 0.01$).

Conclusions: Our findings indicate that olfactory functions are impaired in pSS patients. There was close correlation between olfactory dysfunction with disease severity and serological abnormalities. Therefore, imperative that physicians should make their patients to be aware of these sensory dysfunctions and educate them on methods to cope with it for better quality of life.

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SAT0464

COMPARISON OF DISEASE ACTIVITY SCORES PREDICTING MORTALITY IN PATIENTS WITH SYSTEMIC LUPUS ERYTHEMATOSUS IN COLOMBIA

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Background: Systemic lupus erythematosus (SLE) is a disease with multisystem involvement. Throughout history, different activity indices have been developed trying to identify patients who have the flare of the disease. These indexes measure different aspects of the disease. Among the most recognised score is SLEDAI 2 K. Others that had been evaluated is the SLEDAI MEX and the ECLAM. The performance of the measurement of the SLEDAI 2 K is more expensive because of the number of variables evaluated. ECLAM score and the SLEDAI MEX have less number of variables and therefore costs are minor.^{1, 2, 3}

Objectives: To compare the predictive capacity of mortality of three different scores of disease activity (SLEDAI 2 K, SLEDAI MEX, and ECLAM) in a Colombian population with SLE.

To compare the predictive capacity of mortality of three different scores of disease activity (SLEDAI 2 K, SLEDAI MEX, and ECLAM) in a Colombian population with SLE.

Methods: Cross-sectional study, in which descriptive analysis with measures of frequency, central tendency and dispersion were made. Subsequently, mortality prediction analysis of the three scales was performed through the evaluation of the ROC curve. Analysis of classification statistics was done.

Results: A total of 200 patients with SLE were included, with mortality of 11%. The averages of disease activity were: for SLEDAI 2 K was 14.5 with standard deviation (SD) of 9.7, for SLEDAI MEX 9.26 with SD of 5.93 and for ECLAM 4.39 with SD of 2, 28. The area under the curve of the ROC curves was 0.9082, 0.9206 and 0.8917 for the scales SLEDAI 2 K, SLEDAI MEX and ECLAM respectively. Regarding classification statistics, a sensitivity of 36.3% was found for the SLEDAI 2 K scale, specificity was 97.7%, positive predictive value 66.6, negative predictive value 92.5% and correct classification of 91%. For the SLEDAI MEX scale were: Sensitivity 50%, specificity 96.6%, positive predictive value 64.7%, negative predictive value 93.9% and correct classification of 91.5%. Finally, for the ECLAM scale, it was obtained the following results: sensitivity 9.09%, specificity 98.88%, positive predictive value 50%, negative predictive value 89.8% and correct classification in 89%.

Conclusions: It can be observed that the predictive capacity for mortality in the patients evaluated is good with the three different scales. The sensitivity found for the three scales is not optimal for making a promptly medical decision, so later it will be necessary the formulation of a new index in which higher number of patients with SLE can be detected with death risk. An additional relevant result is that the SLEDAI MEX activity index has a similar performance than the SLEDAI 2 K activity index for predicting mortality, with the advantage of being a practical index easy to apply and a lower cost of the evaluation.

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