Results: Total of 54 patients evaluated, one patient excluded from the analysis as the patient nephritis was not related to lupus. 93% of the patients were females (49/53) while 7% were males (4/53). 42 patients underwent ultrasound guided kidney biopsy (79%) while 21% of the patients the histopathology class was not defined as no biopsy obtained either due to contra-indication to the procedure (i. e.: single kidney, flared during pregnancy) or the patient refusal to go for biopsy. 15 patients out of 53 (28%) had nephrotic range proteinuria (defined as urinary proteinuria level of more than 3.5 gm per 24 hours), on the other hand 72% (38/53) had sub nephrotic range. Linear regression Analysis revealed positive correlation between the two methods of estimation mainly at lower levels of proteinuria (less than 3.5 gm). We found a positive correlation between PCR and 24 hours UP quantification. The overall corrected correlation coefficient was $r=0.46$, with P value <0.0001 .

Abstract AB0572 – Figure 1

Conclusions: PCR in spot urine specimens is an accurate and convenient method to estimate the protein excretion in urine only when proteinuria is at sub nephrotic range. Prospective study is required to explore the effect of disease activity, disease duration and co-morbidities on the correlation and predictive power of the model.

REFERENCES:

- [1] G K Bertias, Joint European League Against Rheumatism and European Renal Association–European Dialysis and Transplant Association (EULAR/ERA-EDTA) recommendations for the management of adult and paediatric lupus nephritis, *Ann Rheum Dis*. 2012;71(11):1771–1782.
- [2] JAN J. WEENING, The Classification of Glomerulonephritis in Systemic Lupus Erythematosus Revisited, *J Am Soc Nephrol* 2004;15:241–250

Disclosure of Interest: None declared

DOI: 10.1136/annrheumdis-2018-eular.3785

AB0573

INFLUENCE OF SMOKING AND OBESITY ON THE RISK OF DEVELOPING PRIMARY SJÖGREN'S SYNDROME: A POPULATION-BASED COHORT STUDY

G. Maciel¹, L. Servioli¹, C. Nannini², C. Crowson³, E. Matteson³, D. Cornec⁴, A. Berti⁵. ¹Maciel Hospital, Montevideo, Uruguay; ²Department of Rheumatology, Hospital of Prato, Prato, Italy; ³Mayo Clinic, Rochester MN, USA; ⁴Rheumatology Department, Brest Teaching Hospital, Brest, France; ⁵Immunology, Rheumatology, Allergy and Rare Diseases Department, San Raffaele Scientific Institute, Milan; and Rheumatology Department, Santa Chiara Hospital, Trento, Italy

Objectives: Cigarette smoking and obesity have been identified as risk factors for developing several autoimmune diseases, and may be protective for others. This study explored the role of these risk factors in primary Sjögren's syndrome (pSS).

Methods: A cohort of Olmsted County, Minnesota residents diagnosed with pSS between January 1, 2000 and December 31, 2015 was identified based on individual medical record review. Each of the cases was matched to 3 age- and sex-matched comparators without pSS randomly selected from Olmsted County residents, indexed to the date of pSS diagnosis. Smoking status was divided into three categories of current smoker, ex-smoker and never smoker. The body weight and height closest to date of diagnosis/index date (± 1 year) were used. Obesity was defined as a body mass index (BMI) ≥ 30 kg/m².

Results: 106 incident cases of pSS and 318 controls were identified. The odds ratio (OR) of pSS comparing current smokers with never smokers was 0.34 (95% confidence interval (CI): 0.14, 0.85; $p<0.05$), while the OR for former smokers compared to never smokers was 1.27 (95% CI, 0.80, 2.03). Smoking status was

not associated with antinuclear antibody, anti-SSA, anti-SSB or rheumatoid factor positivity ($p>0.05$). The OR of pSS comparing obese subjects with non-obese subjects was 0.79 (95% CI, 0.48, 1.30), while the OR of pSS for BMI analysed as a continuous variable was 0.97 (95% CI, 0.94, 1.01).

Conclusions: In this population-based study, current smokers have a lower risk of developing pSS while BMI does not affect this risk.

Disclosure of Interest: None declared

DOI: 10.1136/annrheumdis-2018-eular.6580

AB0574

RENAL ACTIVITY PATTERNS AND THERAPEUTICS IN LUPUS NEPHRITIS OBSERVATIONS IN 5 MEXICAN RHEUMATOLOGY CENTRES

G. Pickens¹, D.A. Herrera-van Oostdam¹, F. Irazoque-Palazuelos², S. Cerpa-Cruz³, M.A. Saavedra-Salinas⁴, C. Mendoza-Pinto⁵, C. Abud-Mendoza¹.

¹Rheumatology, Hospital Central Dr. Ignacio Morones Prieto, San Luis Potosí;

²Rheumatology, Centro Médico Nacional "20 de Noviembre", Ciudad de México;

³Rheumatology, Hospital Civil de Guadalajara Fray Antonio Alcalde, Guadalajara;

⁴Rheumatology, Hospital de Especialidades Centro Médico Nacional "La Raza", Ciudad de México;

⁵Rheumatology, Hospital General Regional Numero 36 "San Alejandro", Puebla, Mexico

Background: Lupus nephritis (LN) develops in 40%–60% of Systemic Erythematosus (SLE) patients; 45% don't achieve complete response or eventually relapse and 10%–20% progress to end stage renal disease.

Objectives: Describe renal activity patterns and therapeutic schemes employed in 5 Mexican Rheumatology Centres.

Methods: Retrospective analysis of renal activity in 193 patients with LN with ≥ 6 months follow-up. If follow-up was ≤ 1 year, response was classified as complete (CR), partial (PR) or no response (NR). If follow up was > 1 year, response was classified as one of the following patterns: persistent inactive (PI), relapsing-remitting (RR), chronic active (CA) and mixed.

Results: Biopsy was available in 166 subjects (86.01%): class IV (42.77%), III (23.49%), V (10.24%), II (9.03%). The most prevalent schemes were CYC+MMF 46.6%, only CYC 18.13%, only MMF 12.4%, CYC+MMF+ TAC 9.84%. Thirty eight patients had follow-up ≤ 1 year with the following response: CR 16 (42.1%), NR 13 (34.21%) y PR 9 (25.7%). One hundred and fifty five patients had > 1 year follow-up with the following activity patterns: PI 55 (35.48%), RR 38 (24.51%), CA 31 (20%), mixed 31 (20%).

We then compared patients whose therapeutic schemes were classified as the National Institutes of Health regime ($n=109$) (as considered by the treating physician) to those with different therapeutic schemes. We observed a higher final GFR (100 ± 39.2 SD VS 87.1 ± 37.9 SD, $p=0.029$) and more frequent CYC use (106 ± 100 SD VS 37 ± 49.3 SD, $p<0.0001$) in the NIH group. There weren't statistically significant concerning renal response or activity patterns. Although treating physicians stated they had used the NIH regime in 57.9%, 64.03% actually received CYC+MMF and 11.4% CYC+MMF+ TAC. We then compared the group that received CYC monotherapy to the groups that received CYC+MMF and CYC+MMF+ TAC and did not observe any statistically significant differences.

Conclusions: The most prevalent renal activity patterns were those that translated intermittent of continuous activity (64.51%). Strict adherence to the original NIH regime is questionable, most subjects actually received CYC+MMF at some point. We did not observe any statistically significant superiority of renal outcomes of combination therapy over CFM monotherapy. Limitations: preliminary initial analysis, heterogeneous information and missing data.

REFERENCES:

- [1] Yurkovich M, Vostretsova K, Chen W, Aviña-Zubieta JA. Overall and cause-specific mortality in patients with systemic lupus erythematosus: A meta-analysis of observational studies. *Arthritis Care Res*. (Hoboken) 2014 Apr;66(4):608–16.
- [2] Mok CC, Kwok RCL, Yip PSF. Effect of renal disease on the standardized mortality ratio and life expectancy of patients with systemic lupus erythematosus. *Arthritis Rheum* 2013 Aug;65(8):2154–60.

Disclosure of Interest: None declared

DOI: 10.1136/annrheumdis-2018-eular.6023

AB0575

CLINICAL ANALYSIS OF 22 CASES OF SYSTEMIC LUPUS ERYTHEMATOSUS COMPLICATED WITH HEMOPHAGOCYTIC LYMPHOHISCYTOSIS

D. xu, L. zhang, Y. li, D. jiang, Y. guo, J. tang, X. zheng, L. lu, Z. li, Y. li, G. gao. the First Affiliated Hospital of Zhengzhou University, Zhengzhou Henan, China

Objectives: To investigate the clinical features of hemophagocytic lymphohiscytosis (HLH) in systemic lupus erythematosus (SLE).