AB0831

FREQUENCY OF RENAL CRISIS IN PATIENTS WITH SYSTEMIC SCLEROSIS: NEW DATA FROM A CHINESE COHORT AND A SYSTEMIC REVIEW WITH META-ANALYSIS

D. Xu¹, J. He², T. Li¹, R. Mu^{1,1,1}. ¹Peking University Third Hospital, Department of Rheumatology and Immunology, Beijing, China; ²The Third People's Hospital of Datong, Department of Rheumatology and Immunology, Datong, China

Background: Scleroderma renal crisis (SRC) is a rare but life-threatening complication in SSc, which defined as malignant hypertension and progressive renal failure [1]. Previous reports of the prevalence for scleroderma renal crisis (SRC) show variable outcomes.

Objectives: We aim to find out the prevalence for SRC in Chinese, and conduct a meta-analysis to assess the prevalence of SRC in worldwide and investigate possible factors of variability.

Methods: We evaluated the prevalence for SRC and compared the clinical characteristics in SSc patients with or without SRC. A systematic review on the prevalence of SRC was carried out in PubMed, Embase and Cochrane. Meta-analysis was performed using available data on the prevalence for SRC.

Results: 302 patients were enrolled in PKUPH-SSc cohort and the prevalence of SRC was 4.97%. In our cohort, SRC was found in 3.60% limited cutaneous SSc (lcSSc) and 7.75% diffused cutaneous SSc (dcSSc) patients. Twenty-nine studies including a total population of 22686 SSc patients were analyzed in the meta-analysis. The overall pooled prevalence of SRC was 4.0%, but heterogeneity among the studies was substantial ($I^2=86.1\%$, $P<0.00001$). Meta-regression revealed that subtype of SSc and geographic factors partially explained this heterogeneity. Sub-group analyses demonstrated that the prevalence of SRC in dcSSc and lcSSc were 9.0% and 2.0%. The SRC prevalence in SSc was 3.0% in Asia, 5.0% in Europe, and 3.0% in North America, respectively.

Conclusion: Data on our new cohort showed the prevalence of SRC was around 5% in China, and meta-analysis confirmed that the prevalence of SRC varies among centers. The marked heterogeneity of SRC prevalence was partially explained by subtype of SSc and geographic origin of patients.

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AB0832

PREVALENCE OF OCULAR DISEASES IN PATIENTS WITH SYSTEMIC LUPUS ERYTHEMATOSUS: A RETROSPECTIVE OBSERVATIONAL STUDY IN A TERTIARY HOSPITAL IN TAIWAN

J. H. Kao¹, T. Y. Lan¹, C. H. Lu¹, C. Y. Shen¹, K. J. Li¹, S. C. Hsieh¹. ¹National Taiwan University Hospital, Department of Internal Medicine, Division of Allergy, Immunology and Rheumatology, Taipei, Taiwan, Republic of China

Background: Systemic lupus erythematosus (SLE) could affect multiple parts of the eye. (1,2) Also, there is risk of ocular toxicity associated with treatment, such as hydroxychloroquine.(3) Early diagnosis is essential to avoid major ocular complications. However, complaints of eye discomfort may be vague, and various presentations may pose challenges on rheumatologists. Knowing the real-world prevalence of ocular problems in patients with SLE is important and helpful, yet this has been less common to be reported.

Objectives: To describe the prevalence of various ophthalmologic diagnoses in patients with SLE.

Methods: This is a retrospective observational study conducted in a tertiary hospital in Taipei, Taiwan. Patients diagnosed with SLE in the period between 1st Jan, 2002 and 31st Dec, 2015 and evaluated by ophthalmologists in 2 years before 29th Jan, 2021 were included. Demographic and clinical data, and ophthalmologic diagnoses were recorded by chart review.

Results: A total of 121 patients were included, and 118 (97.5%) were female. Average age was 46.2 years [standard deviation (SD) 11.4 years] upon ophthalmologic evaluation, and average duration suffering from lupus was 11.6 years (SD 3.3 years). Keratoconjunctivitis sicca ($n = 48$, 39.7%), myopia ($n = 39$, 32.2%), and cataract ($n = 21$, 17.4%) were the most common findings. It was also noted that suspicious finding of hydroxychloroquine retinal toxicity was found in 12 patients (9.9% of total patients). Also, two patients had lupus retinopathy, and another two were diagnosed with cytomegalovirus retinitis. In addition, glaucoma was diagnosed in 9 patients (7.4%), which seemed to be higher than the general population.

Conclusion: Higher prevalence of different ocular problems is noted in this cohort of SLE patients. Keratoconjunctivitis sicca was the most common ocular diagnosis, which is consistent with literature. However, high rates of myopia, cataract, glaucoma, and suspicious hydroxychloroquine retinal toxicity were also found. Above result warrants more aggressive ophthalmologic evaluation in SLE

patients. More research on the association of lupus and different ocular diseases is needed in the future.

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Table 1. Demographic data and ophthalmologic diagnosis of patients with systemic lupus erythematosus (N = 121)

Variable	n (% of N)
Age (years) average (SD)	46.2 (11.4)
Disease duration average (SD)	11.6 (3.3)
Female sex	118 (97.5)
Chronic medical disease	
Hypertension	28 (23.1)
Diabetes mellitus	4 (3.3)
Dyslipidemia	7 (5.8)
Cancer	3 (2.5)
End-stage renal disease	1 (0.8)
Ophthalmologic diagnosis	
Keratoconjunctivitis sicca	48 (39.7)
Myopia	39 (32.2)
Cataract	21 (17.4)
Glaucoma	9 (7.4)
Suspicious retinopathy related to HCQ	12 (9.9)
Unspecified retinopathy	5 (4.1)
Lupus retinopathy	2 (1.7)
CMV retinitis	2 (1.7)
Central retinal vein thrombosis	1 (0.8)
Retinal break	1 (0.8)
Optic neuritis	1 (0.8)
Vitreous hemorrhage	1 (0.8)
Myodesopia	4 (3.3)
Scleritis	1 (0.8)

SD, standard deviation; HCQ, hydroxychloroquine; CMV, cytomegalovirus.

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AB0833

HOSPITAL ADMISSIONS FOR RHEUMATOID ARTHRITIS AND OTHER INFLAMMATORY POLYARTHRITIS IN THE BRAZILIAN PUBLIC HEALTH SYSTEM

A. Dal Pra Wendt¹, F. Milene Cardozo¹. ¹Feevale University, Institute of Health Sciences, Novo Hamburgo, Brazil

Background: Rheumatoid arthritis is an idiopathic autoimmune disease that is characterized by symmetrical peripheral polyarthritis. The disease leads to the destruction of joints due to erosion of both bone and cartilage. The other inflammatory polyarthritides are a group composed of 61 diseases, according to the International Classification of Diseases (ICD-10). Drug treatment is carried out through outpatient follow-up, with no need for hospitalization in mild and / or controlled cases. When surgical treatment is recommended or there are complications from rheumatoid arthritis or other inflammatory polyarthritides, hospitalization is indicated. In addition, Brazil has a broad public health system, called the Unified Health System (UHS), responsible for most health procedures carried out at the national level, especially with regard to the socioeconomically vulnerable population.

Objectives: To investigate the number of hospital admissions for rheumatoid arthritis and other inflammatory polyarthritides in UHS during the past three years.

Methods: This is a quantitative and retrospective survey based on the data available on the website of the Department of Informatics of the Brazilian Unified Health System. The data are freely accessible and public domain. Information was collected about the period between December 2017 and November 2020, referring to the number of hospitalizations for rheumatoid arthritis and other inflammatory polyarthritides in all five regions that make up Brazil.

Results: The number of hospitalizations for rheumatoid arthritis and other inflammatory polyarthritides fluctuated, between December 2017 and November 2020, from 1083 to 1311 per month, with an average of 1184 and a total of 38228 hospitalizations over the three years analyzed. Throughout the national territory, the region with the least monthly admissions was the central-west (which comprises the states of Mato Grosso, Mato Grosso do Sul, Distrito Federal and Goiás), with 2562 total admissions and an average of 71.1 monthly admissions.