

## Clinical, and immunological characteristics in 290 patients with systemic lupus erythematosus

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**Background/Purpose:** Systemic lupus erythematosus (SLE) demonstrates a wide spectrum of disease manifestations according to race, ethnicity, and geographic region. There are studies regarding to clinical characteristics in patients with SLE in several countries, mostly from Middle Eastern Asia and Western countries. Our study aimed to investigate the demographic, clinical, and immunological features in patients with SLE in South Korea.

**Methods:** We reviewed the medical records of 290 SLE patients diagnosed at a university-affiliated rheumatology center in South Korea from January 1998 to January 2015. All patients fulfilled 1997 revised American College of Rheumatology classification criteria for SLE. **Results:** Twenty-six patients (9%) were male, 90 patients (31%) had biopsy proven lupus nephritis (LN), 30 patients (10.3%) were diagnosed prior to age 18 (pediatric SLE) and the mean age at diagnosis was  $31 \pm 12.3$  years. The most common clinical manifestations were arthritis (57.9%), followed by alopecia (47.2%), malar rash (44.1%), fever (43.1%), and oral ulcer (34.1%). Anemia was found in 81%, hemolytic anemia in 10.0%, leucopenia ( $<4,000/\text{mm}^3$ ) in 70.7%, thrombocytopenia ( $<100,000/\text{mm}^3$ ) in 44.5%, and pancytopenia in 21.7%. Antinuclear antibodies were detected in 98.2%, anti-Sm in 37.5%, anti-cardiolipin IgG in 25.7%, anti-cardiolipin IgM in 10.5%, lupus anticoagulant in 24.5%, anti-dsDNA IgG in 59.8%, anti-Ro in 65.7%, anti-La in 31.3% and hypocomplementemia in 36.3%. The cumulative frequency of pericarditis, anemia, hemolytic anemia, thrombocytopenia, and pancytopenia were more prevalent in patients with LN, as compared with those without LN. At the time of SLE diagnosis, patients with LN had significantly higher anti-dsDNA IgG titer and lower complement levels than patients without LN. Additionally, pediatric SLE patients were diagnosed early ( $5.4 \pm 6.8$  months vs  $12.8 \pm 27.2$  months,  $p=0.002$ ) and had more neuropsychiatric symptoms (38.9% vs. 17.4%,  $p=0.028$ ), as compared with adult-onset SLE. **Conclusions:** Our study provides new epidemiological data regarding the clinical and immunological characteristics in patients with SLE in South Korea.

## Chronic daily headache deteriorate to the quality of life in lupus patients

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**Background:** Headache is common in patients with systemic lupus erythematosus (SLE). Chronic daily headache (CDH) is a category of headache disorders that occur more than 15 days per month and associated with profound decline in quality of life. **Objective:** The aim of this study is to investigate the clinical characteristics of CDH in patients with SLE and their association with the disease severity and the quality of life. **Methods:** A total of 40 consecutive patients with SLE underwent the survey. We investigated headache characteristics, visual analogue scale (VAS) for pain, and six-question headache impact test (HIT-6) to evaluate the impact of headache on quality of life. The patients underwent required blood tests for assessment of the disease activity by the Systemic Lupus Erythematosus Disease Activity Index (SLEDAI). **Results:** Six patients (15%) met the criteria for CDH. The total score of HIT-6 is significantly higher in SLE patients with CDH than in them suffered from headache without CDH ( $p=0.027$ ). Especially, SLE patients with CDH had more "wish could lie down" than they suffered from headache without CDH ( $p=0.017$ ). The multivariate regression analysis indicated that the headache days per month was predictor for the headache-related disability. **Conclusions:** As far as we know, this is the first study evaluating correlation of CDH and the quality of life in Korean patients with SLE. CDH may deteriorate to the quality of life in patient with SLE.