ABSTRACT NUMBER: 1654

Predictive Factors According to Type of Infection in Systemic Lupus Erythematosus Patients: Data from a Multi-Ethnic, Multi-National, Latin-American Cohort

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SESSION INFORMATION

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Session Time: 9:00AM-11:00AM

Background/Purpose: While infections are a one of the main causes of mortality in systemic lupus erythematosus (SLE), the type of infections and the factors predisposing to them have not been properly evaluated. The aim of the present study was to identify predictive factors accounting for the different types of infections in SLE patients.

Methods: A multi-ethnic, multi-national cohort from nine countries was utilized for these analyses. The following type of infections were considered: skin, lung, urinary tract, digestive tract and gynecological. Cox regression models were used to evaluate the predictors of new infections (global and per organs involved) using a backward elimination procedure. Potential predictors were demographic factors, clinical manifestations, SLEDAI, SDI and treatment at baseline.

Results: Predictive factors of skin infections were dose of prednisone between 15 and 60mg/d (HR: 1.73; CI: 1.16-2.57) and ≥60mg/d (HR: 1.63; CI: 1.01-1.91), lymphopenia (HR: 1.38; CI: 1.01-1.91), shorter disease duration at baseline (HR: 0.94; CI: 0.91-0.97), and previous infections (HR: 1.77; CI: 1.18-2.65). Predictive factors of lower airway infections were previous infections (HR: 2.39; CI: 1.38-4.13), lung involvement (HR: 2.81; CI: 1.38-5.71), and shorter disease duration at baseline (HR: 0.94; CI: 0.90-0.98). Predictive factors of urinary tract infections were higher damage at baseline (HR: 1.17; CI: 1.02-1.35), older age at diagnosis (HR: 1.02; CI: 1.01-1.03), shorter disease duration at baseline (HR: 0.93; CI: 0.89-0.96), female gender (HR: 3.03; CI: 1.11-8.23), and Mestizo ethnicity (HR: 1.98; CI: 1.29-3.04). Predictive factors of digestive tract infections were higher disease activity at baseline (HR: 1.05; CI: 1.02-1.08), lower socioeconomic status (HR: 2.1; CI: 1.02-4.40), and lower educational level (HR: 0.36; CI: 0.16-0.78). Predictive factors of gynecological infections were dose of prednisone between 15 and 60mg/d (HR: 2.05; CI: 1.05-3.99) and higher disease activity at baseline (HR: 1.03; CI: 1.01-1.07).

Conclusion: Female gender, older age at diagnosis, lower socioeconomic status, lower educational level, shorter disease duration, lymphopenia, previous infections, lung involvement, higher damage accrual, higher disease activity, dose of prednisone >15mg/d, and Mestizo ethnicity were predictive of at least one type of infection.

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