

## DETERMINANTS OF OUTCOME IN PATIENTS WITH ERYTHEMATOUS LUPUS AND RHEUMATOID ARTHRITIS IN RIO GRANDE DO NORTE

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The etiology of autoimmune disease is multifactorial and involves interactions among environmental, hormonal and genetic factors. Many different genes may contribute to autoimmune disease susceptibility. The aim of this study was to evaluate the influence of SLC11A1 gene in systemic lupus erythematosus (SLE) and rheumatoid arthritis (RA). Ninety-six patients with SLE, 37 with RA and 202 controls enrolled in this case-control study, were evaluated with regard to demographic, genetic, laboratorial and clinical data. SLE mainly affects females in the ratio of 18 women for each man, 88.3% of the patients aged from 15 to 45 years old and it occurs with similar frequency in whites and mulattos. The rate of RA between women and men was 11:1, with 77,1% of the cases occurring from 31 to 60 years. The analysis of the point mutation -236 of the SLC11A1 gene by SSCP did not show significant differences between alleles/genotypes in patients with SLE or RA when compared to controls. The most frequent clinical manifestations in patients with SLE were cutaneous (87%) and joint (84.9%). In patients with RA, the most frequent out-joint clinical manifestation were rheumatoid nodules (13,5%). Antinuclear antibodies were present in 100% of the patients with SLE. There was no significant relation between activity of disease and rheumatoid factor in patients with RA, however 55.6% of patients with active disease presented positive rheumatoid factor. Significant association between alleles/genotypes of point mutation -236 and clinical manifestations was not found.

**Key-words:** RA, SLE, SLC11A1, demographic, SLC11A1 gene and Rio Grande do Norte