Acute Rheumatic Fever in South – East of Turkey: Clinical Features and Epidemiological Evaluation of the Patients over the Last Twenty Years

Erdem S., Ozbarlas N., Arslan A., Ayana M., Canan O., Okuducu Y.K., Gullu U.U., Demir H., Demir F., Kucukosmanoglu O.
Department of Pediatric Cardiology, Faculty of Medicine, Cukurova University, Adana, Turkey.

Objective: The aim of this study was to evaluate retrospectively clinical and epidemiological features of rheumatic fever and rheumatic heart disease using last twenty years of data of our hospital, to investigate incidence and seasonal prevalence, to detect changes over time in clinical and epidemiological features by comparing two periods (first 7 and second 13 years).

Materials and Methods: The medical records of 396 patients with rheumatic fever (first attack or recurrence), rheumatic heart disease or previous rheumatic fever who admitted to Pediatric Cardiology Department of the Çukurova University between January 1993 and January 2013 were analyzed retrospectively. First period was between 1993 and 2000, and the second 2000 – 2013.

Results: There were 206 patient in first period and 190 patients in second period. The mean age of patients was 10.8 years. No significant difference was found between the first and second periods in distributions of age and gender. The peak season for the initial presentation was winter in both period. The estimated incidence rates of acute rheumatic fever were 2.7/100,000 in 2000, 0.7/100,000 in 2012. Among the major findings, the most common included carditis at 81%, arthritis at 75.2%, Sydenham's chorea at 10%, and erythema marginatum at 0.5%, at first period and carditis at 86%, arthritis at 79%, Sydenham's chorea at 18%, and subcutaneous nodules at 1.6%, at second period respectively. There were no significant differences about major findings between two periods. At the follow up, three patients had died and 17 patients had underwent to surgery.

Conclusion: Although the incidence of acute rheumatic fever has decreased, it still continues to be an important disease can lead to serious morbidity and mortality in our country. In future although genetic factors can not be changed, changes in environmental factors and healthy policy will decrease the frequency of the disease and its complications.