Presencia de ADN bacteriano en el tejido valvular de pacientes con cardiopatía reumática crónica

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Abstract

Background: Rheumatic heart disease (RHD) is a delayed consequence of a pharyngeal infection with Group A streptococcus (GAS), usually ascribed to a crossreactive immune response to the host cardiac tissues. Acute rheumatic fever (ARF) and its ensuing valvular sequelae are thus considered the prototype of a postinfectious autoimmune disease, with no direct evidence of residual streptococcal antigen in diseased valvular tissues. However, recent studies concerning the antigenic specificity and clonality of intralesional lymphocytes have revealed oligoclonal expansions characteristic of an antigen specific response, that might be related to GAS. Aim: To search for bacterial DNA in valvular tissue from RHD patients and controls. Material and methods: We extracted DNA from surgically excised valve specimens from 15 RHD patients and 6 non RHD controls and tested for the presence of bacterial DNA by Polymerase Chain Reaction (PCR) with primers for 16S rRNA. Results: Eighty percent (12/15) of valve specimens from RHD patients were positive for bacterial DNA, as opposed to none of the valves (n = 6)from non RHD controls. **Conclusions**: These results suggest that GAS might persist in valvular tissue in patients with ARF and contribute to the inflammatory scarring lesion that leads to cardiovascular sequelae.