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High Frequency of Chlamydophila Pneumoniae in Children with Asthma Exacerbations

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Abstract : Asthma, described as a chronic inflammatory condition of the airways, courses accompanied by episodes known as exacerbations, characterized by a worsening of symptoms. Among the triggers, some allergen-irritative and infectious agents are found, including Chlamydophila pneumoniae which seems to play an increasingly important role. In this paper a PCR was used to detect C. pneumoniae in order to estimate the frequency of infections caused by this agent in pediatric patients with asthma exacerbations. C. pneumoniae distribution throughout the study period was also evaluated. 175 nasopharyngeal aspirates from children with asthma exacerbations were analyzed by PCR and sequencing. A global prevalence of C. pneumoniae of 53.71% was obtained. This study highlights a high circulation of C. pneumoniae during the study period, in children of all ages and especially in children under 5 years old. Molecular tests applied permit a rapid detection and improved our knowledge about these infections in children with asthma.

Keywords : Chlamydophila pneumoniae, detection, molecular techniques, pediatric asthma
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