

RESPIRATORY INFECTION CAUSED BY CHLAMYDOPHILA PNEUMONIAE IN CHILDREN AND ADOLESCENTS IN THE LOWER SILESIA REGION OF POLAND

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Objective: To assess the incidence of Chlamydia pneumoniae respiratory tract infection in children and adolescents in the Lower Silesia region in Poland in 2009.

Material and methods: 641 throat swabs obtained from 326 girls and 315 boys, aged from 11 months to 18 years, were assessed diagnostically. The patients enrolled into the study were treated on an outpatient basis due to various, non-specific respiratory ailments. The most common presenting clinical symptom of a respiratory problem was dry cough, which occurred in 295 studied subjects, followed by runny nose and cough with discharge in 176 subjects, and other minor symptoms in 35 subjects. The assessment was conducted by an indirect immunofluorescence antibody (IFA) Chlamydia Testing kit (Cellabs, Sydney, Australia).

Results: Overall, Chlamydia infection was detected in the respiratory tract of 43.1% (276/641) children. There were no gender differences in the prevalence of Chlamydia, as the infection was present in 41.4% (135/326) of girls and in 44.8% (141/315) of boys. Of the 295 subjects presenting with dry cough, 122 (41.4%) tested positively for Chlamydia. Of the 176 subjects with runny nose and cough and the 35 subjects with other symptoms, 83 (47.2%) and 8 (22.9%) tested positively for Chlamydia, respectively. In the asymptomatic children who had direct contact with a Chlamydia infected person, there were 29.6% (8/27) positively tested cases, whereas in the children presenting symptoms the percentage of positive tests was 48.3% (29/60).

Conclusions: In children living in the Lower Silesia region of Poland, there is a substantial ~50% rate of Chlamydia infection, transmitted via airborne droplets. The finding of Chlamydia infection should signal the need for testing other subjects from the child's closest environment.

Keywords: Chlamydomphila pneumoniae, infection