RESPIRATORY COMPLICATIONS IN CHILDREN HOSPITALIZED WITH RSV INFECTION

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Background: Reported frequency of complications in children due to RSV infection is high. This study focuses on the frequency of respiratory tract complications [pneumonia, acute otitis media (AOM), conjunctivitis] in hospitalized children, and its correlation with risk factors.

Material and methods: In 2017-2018 season 111 children aged 12 days-91 months (median 10 months) were hospitalized due to RSV infection. Complications were seen in 61% of cases (68/111), including pneumonia- 33% (37/111), AOM- 48% (53/111), and 11% conjunctivitis (12/111). Being bronchiolitis considered a complication, the frequency increases to 98% (109/111), (with 57% risk of bronchiolitis).

Results: Children with complications (other than bronchiolitis) were older (median 6 vs. 2 months, p<0.01), fever lasted longer (mean 2.3 vs, 0.7 days, p<0.01), but had lower breath rate (median 50 vs. 57.5, p=0.03) on admission. Among risk factors, only age over 3 months (median in the group) was correlated with higher risk of complications (OR=5.2, 95%CI: 2-13.5), pneumonia (OR=2.8, 95%CI: 1.1-7.3), and otitis media (OR=9.8, 95%CI: 3.6-26.7), while prematurity, birth weight under 2500g, exposure to tobacco smoke during pregnancy, cease of breastfeeding before 6 months were statistically irrelevant in this group.

Conclusions: Complications are very frequent in hospitalized children and the risk increases with the age of patients. Nevertheless, other risk factors are difficult to predict.

This study was supported by CMKP grant no. 501-1-20-19-18