

THE IMPACT OF RSV HOSPITALIZATION ON CHILDREN'S QUALITY OF LIFE

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Background: Respiratory syncytial virus (RSV) is one of the most frequent etiological factors of lower respiratory tract infections in children, potentially affecting patients' quality of life (QoL). We aimed to assess QoL in children under 2 years of age hospitalized due to laboratory-confirmed RSV infection.

Methods: A QoL was assessed by parents/tutors with the use of 100-point visual analog scale and compared against a disease-free period. We evaluated median (with interquartile range; showed in square brackets) utility, QoL loss (reported in days) and quality-adjusted life years (QALY) loss in related to RSV hospitalization.

Results: Assessments from 132 patients aged 17 days-24months (median 3.8months) revealed an average utility during hospitalization of 0.679 [0.6-0.757] with median loss of 0.321 [0.243-0.4]. Median utility on days 1-7 reached 0.5, 0.55, 0.6, 0.7, 0.9, 0.8, and 0.85, respectively. Median QoL loss reached 2.2 days [1.6-3.1], and QALY loss per hospitalization was $6.03 \cdot 10^{-3}$ [4.38-8.48 $\cdot 10^{-3}$]. Based upon final diagnosis, QALY loss per episode was 4.92 [2.93-6.03] for bronchitis, 5.96 [4.25-8.41] for bronchiolitis, and 6.99 [5.29- 13.7] for pneumonia.

Conclusions: RSV contributes significantly to QALY loss in the case of hospitalization, and the patient-reported data should be used in pharmacoeconomic assessments of RSV impact.