

# Lofarma

## SUMMARY OF **OTOVENT** SYSTEMATIC REVIEW

**Autoinflation for hearing loss associated with otitis media with effusion.**

Perera R, Glasziou PP, Heneghan CJ, McLellan J, Williamson I. - Cochrane Database of Systematic Reviews 2013, Issue 5



## Autoinflation for hearing loss associated with otitis media with effusion

This is an update of a Cochrane review first published in The Cochrane Library in Issue 4, 2006. The review was aimed to assess the effectiveness of autoinflation compared with no treatment in children and adults with otitis media with effusion. Randomised controlled trials were selected that compared any form of autoinflation to no autoinflation in individuals with 'glue ear'.

Eight studies, with a total of 702 participants, met the inclusion criteria. Overall, the studies were predominantly assessed as being at low or unclear risk of bias; unclear risk was mainly due to lack of information. There was no evidence of selective reporting. Pooled estimates favoured the intervention, but did not show a significant effect on tympanometry (type C2 and B) at less than one month, nor at more than one month. Similarly, there were no significant changes for discrete pure-tone audiometry and non-discrete audiometry. Pooled estimates favoured, but not significantly, the intervention for the composite measure of tympanogram or audiometry at less than one month; at more than one month the result became significant (RRI 1.74, 95% CI 1.22 to 2.50).

Subgroup analysis based on the type of intervention showed a significant effect using a Politzer device under one month (RRI 7.07, 95% CI 3.70 to 13.51) and over one month (RRI 2.25, 95% CI 1.67 to 3.04). None of the studies demonstrated a significant difference in the incidence of side effects between interventions. All of the studies were small, of limited treatment duration and had short follow-up. However, because of the low cost and absence of adverse effects it is reasonable to consider autoinflation whilst awaiting natural resolution of otitis media with effusion. Primary care could prove a beneficial place to evaluate such interventions and there is ongoing research in this area. Further research should also consider the duration of treatment, the long-term impact on developmental outcomes in children and additional quality of life outcome measures for children and families. Of the eight studies included, three (Blanshard 1993; Ercan 2005; Stangerup 1992) used a classic Otovent. The Williamson 2011 study started in September 2011 and it is hoped that results will be available during the winter of 2013-14.

