

## OAS Research Articles Bibliography

1. Bruzzese JM, Markman LB, Appel D, Webber M. An evaluation of *Open Airways For Schools*: Using college students as instructors. *Journal of Asthma*. 2001; 38(4):337-42.

Fifteen years ago, *Open Airways For Schools* (OAS) was found to be an effective asthma education program for elementary school children when taught by professionals. To determine whether OAS is effective when taught by college students and whether it could withstand potential cohort effects, 54 inner-city fourth and fifth graders were taught OAS. Paired t-tests revealed that OAS improved asthma knowledge, self-efficacy, self-management skills, social support, and perception of well-being ( $p < 0.05$ ). Fifteen years later, OAS continues to improve children's self-management skills. Facilitators with little prior experience who received brief training in asthma knowledge and group leadership skills can effectively teach OAS.

2. Clark NM, Brown R, Joseph CLM, et al. Effects of a comprehensive school-based asthma program on symptoms, parent management, grades, and absenteeism. *Chest*. 2004;125:1674-1679. < <http://www.chestjournal.org/content/125/5/1674.full>>

Study Objective: This study assessed the impact of a comprehensive school-based asthma program on symptoms, grades, and school absences in children, and parents' asthma management practices.

3. Daus, Carol. Open Airways for Schools. *RT for Decision Makers in Respiratory Care*. 1998August/September <[http://www.rtmagazine.com/issues/articles/1998-08\\_02.asp](http://www.rtmagazine.com/issues/articles/1998-08_02.asp)>

ABSTRACT: A novel program is helping elementary schoolchildren manage their asthma more effectively-and spend more days in school s a result.

4. Evans D, Clark NM, Feldman CH, Rips J, Kaplan D, Levison MJ, Wasil Y, Levin B, Mellins RB. A school health education program for children with asthma aged 8-11 years. *Health Education Quarterly*. 1987 Fall;14(3):267-79.

ABSTRACT: It was hypothesized that a health education program for children with asthma aged 8-11 years that was delivered in elementary schools, would increase children's asthma management skills, self-efficacy and influence on parents' management decisions; reduce school absences and improve school performance. The study population consisted of 239 low-income, predominantly Hispanic and black children from 12 elementary schools (six experimental and six control) in New York City. Parents did not attend educational sessions but received written materials. The program emphasized the child's responsibility for recognizing symptoms and taking appropriate management steps. Follow-up data obtained

one year after the program showed that compared to controls experimental group children had higher scores on an index of asthma management ( $p$  less than 0.05), greater self-efficacy with respect to asthma management skills ( $p$  less than 0.05), more influence on parents' asthma management decisions ( $p$  less than 0.05), better grades in school ( $p = 0.05$ ), and fewer episodes of asthma ( $p$  less than 0.01) of shorter average duration ( $p$  less than 0.01). No differences were observed for changes in number of school absences. These findings show that asthma health education designed for delivery to children can significantly increase management skills, reduce symptoms of asthma, and improve school performance.

5. Evans N, Clark NM, Levison MJ, Levin B, Mellins RB. Can children teach their parents about Asthma? *Health Education & Behavior*. 2001 Aug;28(4):500-11.

ABSTRACT: The Open Airways for Schools (OAS) program has been shown to improve the self-management skills and health outcomes of students with asthma in Grades 3 to 5. This report examines the impact of OAS on students' parents. Because pilot studies showed that parental attendance at school-based sessions was low, the authors held six sessions at school for children and gave children homework assignments to complete with parents at home to teach parents about asthma and build support for children's self-management efforts. Analysis of 1-year follow-up data showed that children's participation in OAS was a significant predictor of parental self-management skills ( $p < .03$ ) and that OAS children's communication was more strongly associated than controls' with parents' self-management ( $p = .05$ ). The findings show that health education activities brought home from school by children can positively influence parents' self-management of a complex chronic disease such as asthma.

6. Horner, SD. Using the *Open Airways* curriculum to improve self-care for third grade children with asthma. *Journal of School Health*. 1998;68:329-333

ABSTRACT: A 12-week, pilot intervention study was conducted in five elementary schools with third grade children who have asthma to test instruments, feasibility of providing the *Open Airways* classes in less time, and to identify potential problems in study implementation. The sample consisted of 10 boys and five girls ranging in age from 8-9.5 years. Asthma management knowledge improved significantly ( $t = -2.30$ ,  $p = .019$ ). Findings supported the reliability and readability of the instruments and the feasibility of briefer class sessions. The *Open Airways* curriculum can be modified to facilitate delivery to school-based groups without interfering with academic time.

7. Spencer GA, Atav S, Johnson Y, Harrigan JF. Managing childhood asthma: The effectiveness of the *Open Airways For Schools* program. *Family and Community Health*. 2000; 23(2):20-30.

ABSTRACT: In 1998, as a result of a collaborative effort, the open airways for schools (OAS) program was implemented in New York state. The program included 40 schools from 8 school districts throughout the state. The purpose of the OAS program was to assist children in managing symptoms and feelings about asthma and help parents to effectively manage their child's asthma. The OAS program consisted of six sessions for the children and two sessions for the parents. This project demonstrated that the OAS program significantly affected both the parents' and the children's asthma symptom management behaviors