STRONG CHILDREN'S RESEARCH CENTER

Summer 2014 Research Scholar

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ABSTRACT

Title: Utilization of Preventive Asthma Visits among Urban Children with Persistent Asthma

Background:

Asthma is the leading chronic childhood illness in the United States¹. Children in minority and poor populations are at an increased risk for both asthma-related morbidity and under use of ambulatory care services². It is recommended by the National Heart, Lung, and Blood Institute (NHLBI) that children with persistent asthma have at least two preventive asthma visits (PAV) per year⁴.

Objective:

To assess the percent of urban children with persistent asthma who had a PAV in the past year; describe socio-demographic and health characteristics associated with the utilization of PAVs; identify differences in asthma control and management associated with the utilization of PAVs in this population.

Results:

All of the children enrolled in the study suffered from significant asthma, but only 25% reported having a PAV in the past 12 months. While those children who reported a PAV were slightly more symptomatic, even those children who had no PAV experienced frequent symptoms — on average, 4 symptom-days and 4 days with activity limitation per two weeks. Among the 151 children sick enough to require emergency treatment for an asthma exacerbation at least once in the past year, less than half (36%) reported having a PAV. Having a PAV was significantly associated with child race, but not other socio-demographic variables. Reporting at least one PAV in the prior year was significantly associated with having a current preventive asthma medication, (OR 2.2; CI: 1.3,3.4), taking that medication daily (OR 1.8; 1.1,3.0), and having a medication action (new script, change of dose) (OR 3.5; CI: 1.0,11.6), according to parent report.

Conclusion:

Preventive asthma visits were under-utilized in this population, even though these children experienced frequent asthma symptoms. This under-utilization was not associated with sociodemographic variables that might reflect limited access to health services. Reporting a PAV was associated with benefits such as having a current preventive medication, taking that medication daily, and having a medication action. Novel ways to deliver care to these vulnerable children, particularly in community settings, may help ensure that they receive the standards of care recommended by NHLBI guidelines.