IEI EVALUATION BRIEF

August 31, 2013

BACKGROUND STATEMENT

In the Colonias of Hidalgo County, rates of childhood asthma and asthma-related hospitalizations are higher than statewide averages. Families find it difficult to manage their children's asthma due to a lack of medicine and primary care, little access to asthma education, and because they are living in an area with numerous environmental triggers.

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PROGRAM DESCRIPTION

Integrated Educational Interventions (IEI) for Asthma Management was developed by the Texas A&M University School of Rural Public Health and educates both children and parents about how to reduce household triggers through separate but simultaneous 90 minute long educational sessions, as well as follow up home visits and telephone calls made by a Promotora. This Texas Asthma Control Project pilot evaluation conducted over the spring and summer of 2013 focused on increasing the evaluative capacity of IEI, examining the cultural relevance and appropriateness of assessment tools, and setting the stage to be able to demonstrate changes over time.

HIGHLIGHTS FROM THE EVALUATION

Evaluation Questions	Methods	Results
How well will the Asthma Home Environment and Trigger (AHEAT) checklist serve as an evaluation tool for the IEI program? Is it culturally relevant? Will it adequately capture positive changes that families are making? What challenges does the Promotora face when administering it?	The evaluation team shadowed the Promotora on home visits, interviewed her, and statistically examined baseline answers on the AHEAT (n=20).	While the sample size was small, it appears that the AHEAT functions best as a diagnostic tool that can guide goal setting and planning with the families. The survey needs cultural, language, and formatting modifications in order to effectively measure changes in program outcomes over time.
Has the asthma severity of participating children changed since baseline?	Compare baseline and follow-up administrations of the Childhood Asthma Control Test (C-ACT).	C-ACT scores for 62% of children indicated that their asthma was under control at baseline (n=23 out of 37). Among children with a follow-up (n=10), the proportion of children with controlled asthma symptoms increased from 60% to 80%.
How well will the battery of tools selected by the IEI program meet evaluation objectives to measure short, medium and long-term outcomes?	Examine baseline characteristics of asthma management knowledge questionnaires, the Child Health Survey for Asthma (CHSA) and the C-ACT, and consider their utility in evaluating outcomes for the IEI program.	1-The C-ACT showed high utility, as participants understood the items, it was easy to score, yet was sensitive enough to detect changes over time. 2-Different knowledge tests were administered to parents at baseline and the first home visit. They both showed a lack of variability and some redundancy between the tools. Recommendations include changing from a dichotomous response set to one that includes more variability, rethinking the use of items regarding behavior, increasing the time from pre to post test, and using only one tool for parents. 3-The CHSA appeared reliable and valid, but is lengthy and seemed redundant in combination with other assessments. It may be helpful to eliminate subscales and administer at the first educational session to better capture changes over time.

Spence-Almaguer & McWaters (2013)