

STRONG CHILDREN'S RESEARCH CENTER

Summer 2012 Research Scholar

Name: Rebecca Sharma
School: Cornell University
Mentor: Heather Paradis, MD, MPH

ABSTRACT

Title:

Assessing a Developmental Screening Program in Primary Care

Background:

The American Academy of Pediatrics (AAP) suggests that primary care providers conduct structured developmental screening using a standardized instrument at 9-, 18-, and 24- or 30-months of age. Additionally, the AAP recommends that children be screened specifically for autism spectrum disorders (ASDs) during the 18- and 24- month visits. In response to these guidelines, the Pediatric Practice at Strong adopted the Ages & Stages Questionnaire (ASQ) for developmental screening at the 9-, 18-, and 30-month well child visits and the Modified Checklist for Autism in Toddlers (M-CHAT) at the 24-month well child visit to detect possible ASDs. ASQ screening began in the fall of 2007 and routine M-CHAT use began in 2009.

Objective:

To measure the rates of developmental screening and autism-specific screening through chart reviews and examine the rates and outcomes of referrals to developmental services

Results:

We identified 176 eligible subjects with continuous well-child care in our practice. Of these, 52% were male, 87% were covered by public insurance, 52% were the first child, and 82% were ASQ screening rates were 83% at 9 months, 82% at 18 months, and 81% at 30 months. M-CHAT completion was documented at 69% of 24-month visits. There were no differences in ASQ screening rates by provider type; however, nurse practitioners were significantly more likely than physicians to perform M-CHAT screening (83% vs. 64%, $p=0.008$). When we considered the number of times each child was screened over the 4 visits, only 40% had the recommended screening performed at all four time points, 37% had three, 20% had two, and 3% had only one screening test performed. No significant differences were found among children who had 1 or 2 screens performed and those who had 3 or 4 performed.

Conclusion:

A routine screening program for general development and autism is both feasible and sustainable within a busy primary care practice. We found that over 80% of patients with consistent well child visits are receiving the appropriate developmental screen at 9-, 18-, and 30-months. However, there is room for improvement. Fewer than half of patients received all four AAP recommended screenings. Autism-specific screening rates are lower than those for the ASQ and nurse practitioners demonstrate higher screening rates compared to physicians. Further improvement in the screening process is needed to assure early detection of developmental delays and promote positive outcomes among high-risk patients.