


**Alabama Early Screening Improvement Training**  
**Saturday, October 29, 2011**  
**Tuscaloosa, Alabama**

American Academy of Pediatrics   
DEDICATED TO THE HEALTH OF ALL CHILDREN™

Alabama Chapter

Produced by the Alabama Department of Public Health  
Video Communications and Distance Learning Division

**The Science of Developmental Screening**

**Faculty**

**Ashley Evans, MD, FAAP**  
**Pediatrician**  
**Tuscaloosa, Alabama**

**Commercial Interests Disclosure**

- Ashley Evans, MD, FAAP
- Does not intend to discuss any commercial products or services
- Does not intend to discuss any non-FDA approved uses of products/providers of service
- No significant financial relationship

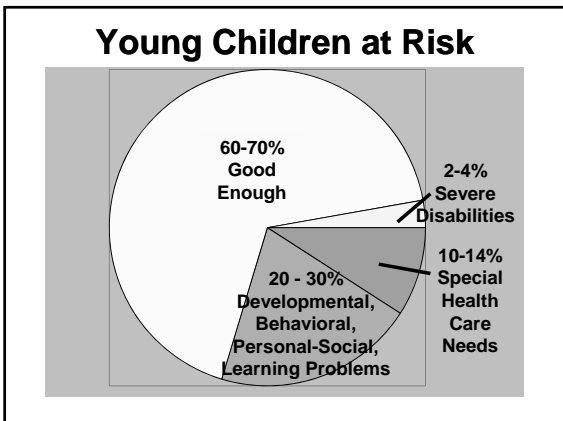
**Did You Know?**

- 20% of all visits to the pediatric PCP's office are developmental or behavioral in nature
- 80% of parental concerns are correct and accurate

**Did You Know?**

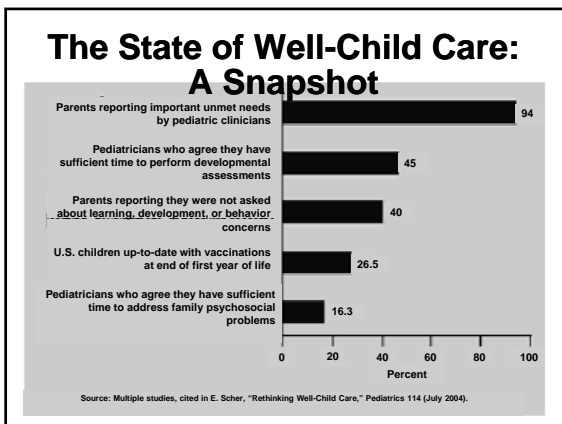
- By the time children enter kindergarten you can predict school drop-out rates with about 70% accuracy
  - By age five their developmental trajectory is more or less set

– Olsen Olson AC. How to establish family professional partnerships. Presented at: International Family Centered Care Conference, Sept. 5, 2003; Boston, MA



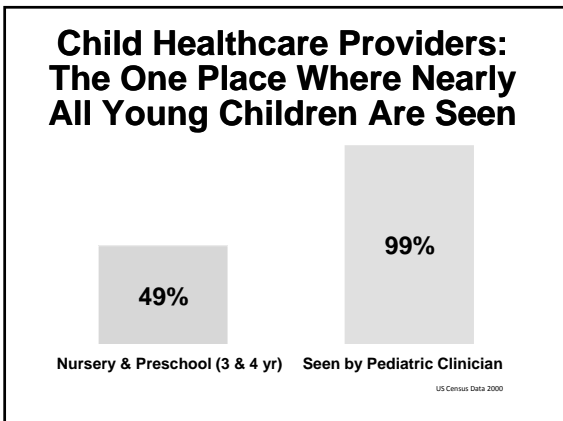
- ### Autism Spectrum Disorders
- 1 in 110 children
  - Age of diagnosis falling
    - Median 4.5- 5.5 years
  - 1/3 of parents of children with an ASD noticed a problem before their child's first birthday
    - 80% saw problems by 24 months

- ### Autism Spectrum Disorders
- Early detection crucial
  - AAP Autism Toolkit and CDC ALARM Initiative
  - Centers for Disease Control and Prevention 2010.  
Last retrieved September 15, 2010 at <http://www.cdc.gov/ncbddd/autism/data.html>



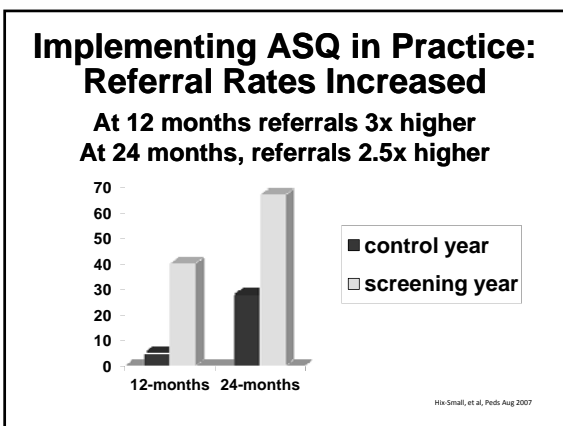
- ### Facts About Pediatric Screening
- Only 15-20% of pediatricians use standardized screening tools routinely (AAP Survey 2002)
  - 23% of pediatricians used screening tools only when parents expressed concern or child was known to be at risk (AAP Survey 2002)

- ### Facts About Pediatric Screening
- Only 12.1% of Alabama children received standardized developmental screening (National Survey of Children's Health 2007)



### Detection Rates Using Standardized Screening Tools

|                           | WITHOUT<br>Screening Tools                              | WITH Standardized<br>Screening Tools                       |
|---------------------------|---|--|
| Developmental<br>Delays   | 30%<br>identified<br><small>Palfrey et al, 1994</small> | 70-80%<br>identified<br><small>Squires et al, 1996</small> |
| Mental Health<br>Problems | 20%<br>identified<br><small>Lavigne et al, 1993</small> | 80-90%<br>identified<br><small>Sturner, 1991</small>       |



### Are We Meeting the Needs of Our Families?

We're in the "developmental  
assurance" business

### To Ensure No Child Reaches Kindergarten with an Undetected Developmental Delay...

Surveillance vs. Screening vs. Diagnosis

### What Is Surveillance?

- A flexible, continuous process, in which knowledgeable professionals perform skilled observations of children during child health care
  - In consultation with families, specialists, child care providers, etc.

– SM Dworkin, A Shannon, and P Dworkin. ChildServ Curriculum. Center for Children's Health and Development, St. Francis Hospital and Medical Center; 1999; Hartford, CT

### **Surveillance: 5 Components**

1. Eliciting and attending to the parent's concerns
2. Maintaining a developmental history
3. Identifying the presence of risk and protective factors

### **Surveillance: 5 Components**

4. Making accurate and informed observations of the child and the parent/child relationship
5. Documenting the process and findings

- AAP Policy - Pediatrics 2006; 118; 405-420

### **Developmental Surveillance Is More Than Screening for Developmental Delay**

- Partnership building with parents
- Addressing parental concerns
- Assessment of developmental risk

### **What Is Screening?**

- Brief, objective, and validated test
- Goal is to differentiate children that are "probably ok" vs. "needing additional investigation"
- Performed at set points in time and when a specific concern arises

- AAP Policy - Pediatrics 2006; 118; 405-420

### **Importance of Being Objective**

- Touch or take temperature?

### **What Is Diagnosis/Evaluation?**

- Accurate diagnosis is the next step done when screening identifies child as "at risk"
- Diagnosis may be done by Pediatrician, Early Intervention or Developmental Specialist

### What Is Diagnosis/Evaluation?

- Aimed at identifying specific developmental disorders affecting the child
- Done in conjunction with a medical diagnostic evaluation

### AAP Algorithm for Developmental Surveillance and Screening

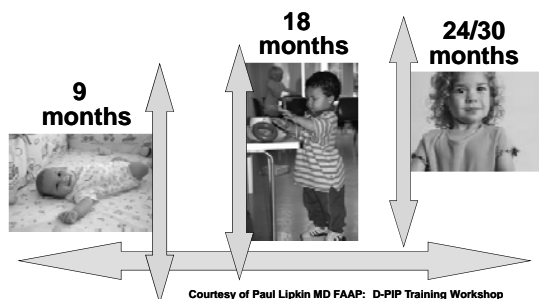
- Developmental surveillance every well child visit
- Standardized general developmental screening tool at 9, 18, and 24-30 months

### AAP Algorithm for Developmental Surveillance and Screening

- Standardized Autism Spectrum Disorder screening tool at 18 and 24 months
- Did not make specific tool suggestions

- Pediatrics Vol. 118 (1) 2006

### Developmental Surveillance and Developmental Screening



Courtesy of Paul Lipkin MD FAAP: D-PIP Training Workshop

### Benefits of Screening

- Better patient care
- Improves patient/family satisfaction
- Earlier identification improves child/family outcomes
- Results in access to services
- Cost effective
- Early intervention IS prevention!

### Barriers to Screening

- Time
- Knowledge of tools, methods, and billing
- The “wait and see” approach
- Failure to trust screening tests or results
- Continued reliance on observations

### **Barriers to Screening**

- **Continued reliance on poor quality or homemade tools**
- **Knowledge of referral resources**

— Journal of Developmental/ Behavioral Pediatrics 24:409–417, 2003

### **Get the Right START!**

- **Universal, standardized developmental screening is standard of quality care in the medical home**