

Screening for Social and Emotional Development and Linking to Program Planning

Jane Squires, Ph.D.

University Center for
Excellence in
Developmental Disabilities
University of Oregon

jsquires@uoregon.edu



Objectives

- Introduce selected tools
- Review psychometrics, utility
- Compare and contrast tools for different settings
- Discuss linking to program planning

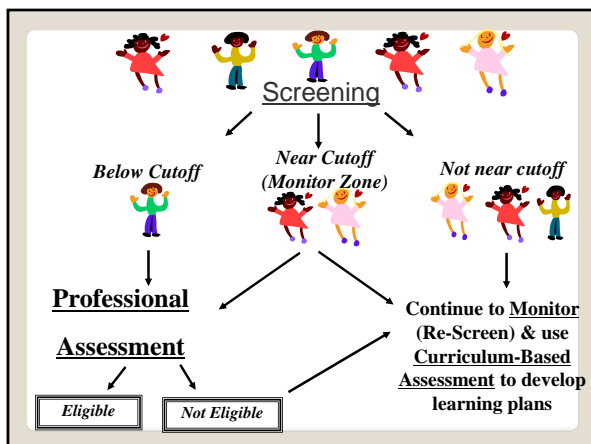


PEANUTS



A. Screening Assessment

- A brief assessment procedure designed to identify children who should receive more intensive diagnosis or evaluation from local early intervention, early childhood special education, health, mental health agencies.



Screening tools for early identification of Social-Emotional delays

- Ages & Stages Social-Emotional (ASQ:SE)
- Brief Infant Toddler Social Emotional Assessment (BITSEA)
- Devereux Infant Toddler and Early Childhood Assessment (DECA)
- Preschool and Kindergarten Behavior Scales (PKBS)

Screening tools for early identification of Social-Emotional delays

- **Temperament and Atypical Behavior Scale (TABS)**
- **Social Skills Rating System (SSRS)**

Ages & Stages Questionnaires: Social-Emotional

- Companion to Ages & Stages Questionnaires
- Parent/caregiver completed
- Identifies children in need of further assessment for social-emotional difficulties

Uses of ASQ:SE

- (Screening) To help guide decisions about referrals for further assessment
- Monitor child's social-emotional development
- Determine information/support services families may need
- Bridge communication between parents and professionals about child's behavior
- Assist with targeting prevention/intervention activities

ASQ:SE 6 month interval questions

Please read each question carefully and

1. Check the box that best describes your child's behavior and

2. Check the circle if this behavior is a concern

	NEVER OF THE TIME	SOMETIMES	RARELY OR NEVER	CHECK IF THIS IS A CONCERN
1. When upset, can your baby calm down within a half hour?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>
2. Does your baby smile at you and other family members?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>
3. Does your baby like to be picked up and held?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>
4. Does your baby stiffen and arch the back when picked up?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>
5. When talking to your baby, does he look at you and seem to be listening?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>
6. Does your baby let you know when she is hungry or sick?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>

ASQ:SE 48 month interval questions

Please read each question carefully and

1. Check the box that best describes your child's behavior and

2. Check the circle if this behavior is a concern

	NEVER OF THE TIME	SOMETIMES	RARELY OR NEVER	CHECK IF THIS IS A CONCERN
1. Does your child look at you when you talk to him?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>
2. Does your child cling to you more than you expect?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>
3. Does your child talk and/or play with adults she knows well?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>
4. When upset, can your child calm down within 15 minutes?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>
5. Does your child like to be hugged or cuddled?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>
6. Does your child seem too friendly with strangers?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/>

Features of ASQ:SE

Scoring options

- | | |
|-------------------------------|----------------|
| ▪ Most of the time | 0 or 10 |
| ▪ Sometimes | 5 |
| ▪ Never or hardly ever | 0 or 10 |
| ▪ Is this a concern? | Yes=5 |

Scores are totaled and compared with empirically-derived cutoff points.
High scores indicative of problems

Behavioral Areas	Definition
Self-regulation	Ability/willingness to calm, settle, or adjust to physiological or environmental conditions
Compliance	Ability/willingness to conform to the direction of others and follow rules
Communication	Verbal/nonverbal signals that indicate feelings, affect, internal states
Adaptive	Ability/success in coping with physiological needs
Autonomy	Ability/willingness to establish independence
Affect	Ability/willingness to demonstrate feelings and empathy for others
Interaction with people	Ability/willingness to respond or initiate social responses with caregivers, adults, peers

ASQ:SE Sample

- **3104 questionnaires**
- **National sample**
- **Ethnicity**
 - **59% White**
 - **9% Black**
 - **9% Hispanic**
 - **6% Asia Pacific Islander**
 - **2% Native American**
 - **16% Mixes**

Concurrent Validity

Comparison of ASQ:SE classification with standardized tools

- **Achenbach Child Behavior Checklist**
- **Vineland Social Emotional Early Childhood**

Comparison of ASQ:SE classification with social-emotional diagnosis

- **DSM-IV**
- **DC:0-3**
- **EI/ECSE Behavioral Diagnosis**

ASQ:SE Cutoffs on ROC (N=1043)

Months	N	Cutoff	Sens.	Spec.	% Agree
6	71	45	78.6	98.2	94.0
12	85	48	71.4	97.2	93.0
18	99	50	75.0	96.6	93.9
24	152	50	70.8	93.0	89.5
30	115	57	80.0	89.5	87.8
36	179	59	77.8	93.0	89.9
48	174	70	76.9	94.6	92.0
60	171	70	84.6	95.8	94.0
Overall		78	94.5	91.8	

ASQ:SE Reliability

- **Alpha -- .67 to .91**
- **Test-retest**
 - **Parent at time 1 and 2**
 - **N= 367**
 - **.94 agreement**



ASQ Research: Online vs. Paper.

Are there differences between questionnaires completed online vs. paper?

- **Currently on line and paper versions**
- **Over 10,000 on-line questionnaires completed :**
- **Few differences found between on-line versus paper completed ASQ's.**
- **Differential item functioning = 45/500 items**



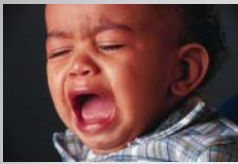
"On the Internet, nobody knows you're a dog."

Brief Infant-Toddler Social-Emotional Assessment (BITSEA)

- Designed for the early identification of social and emotional competencies and problems
- Parent completed with professional assistance in scoring
- For use with children 12-36 months
- 10 minutes to complete
- 4th-6th grade reading level

1. Shows pleasure when s/he succeeds (For example, claps for self).
2. Gets hurt so often that you can't take your eyes off him/her.
3. Seems nervous, tense or fearful.....
4. Is restless and can't sit still.....
5. Follows rules.
6. Wakes up at night and needs help to fall asleep again.....
7. Cries or tantrums until s/he is exhausted.....
8. Is afraid of certain places, like stores, elevators, parks, or cars.....
What is s/he afraid of?: _____
9. Has less fun than other children.
10. Is very loud. Shouts or screams a lot.
11. Looks for you (or other parent) when upset.....
12. Spits out food(s).....
13. Is disobedient or defiant. For example, refuses to do as you ask. ..

BITSEA



- 60 items drawn from ITSEA
- 3-point scale
- 1-2 year olds
- 2 scales
 - Problem
 - 49 items
 - Competence
 - 11 items

BITSEA Problem Scale Items

- Eating
- Negative Emotionality
- Sensory Sensitivity
- Separation Distress
- Sleep

BITSEA Competence Scale Items

- Attention
- Compliance
- Imitation/Play
- Mastery Motivation
- Empathy
- Prosocial Peer and Social Relatedness

Validity

- 1,280 children from the community and 270 children involved in Early Intervention
- Compared to full ITSEA
- Sensitivity of the Problem Scale:
 - ✓ Ranges from 81% to 96.7% with the Community sample
 - ✓ 96.6% to 98.6% for the Early Intervention sample

Validity

- Compared to full ITSEA
- Specificity:
 - ✓ Ranges from 80.3% to 87.7% for the Community sample
 - ✓ 50% to 70.9% for the Early Intervention sample

Devereux Early Childhood Assessment Program (DECA)

- Devereux Foundation
- Kaplan Press
- \$200 for kit; need protocol forms
- Infant Toddler: birth-2 years
- Preschool: 2-5 years

DECA

- Measures resilience
- Assesses maladaptive and maladaptive behaviors
- Identification and strengthening of protective factors

DECA

- Parent or teacher observations
- During quiet time, no distractions
- <http://www.devereux.org>
- Needs to be administered and scored by trained individual

DECA-IT

- Infant and toddler version (2007)
- 1 month - 36 months
- DECA-IT Assessment (36 items)
- Reflective Checklists for Infants
- Adult Resiliency Checklist
- Infant and Toddler Strategies Guide

DECA-IT

- Strength/typical/area of need
- Domains
 - Attachment/Relationships
 - Initiative
 - Self-Regulation
- Sample—2183
- Reliability—high (internal consis/test-re/interob)
- Validity evidence (convergent, criterion, groups)

Devereux Early Childhood Assessment for Infants
Record Form
(1 month up to 18 months)

Mary Mackrain, Paul LeBefve and Gregg Powell

Infant's Name _____ Gender _____ DOB _____ Age _____
 Person Completing this Form _____ Relationship to Infant _____ (in Months)
 Date of Rating _____ Site/Program _____ Room _____

This form describes a number of behaviors seen in some infants. Read the statements that follow the phrase: *During the past 4 weeks, how often did the infant...* and place a check mark in the box underneath the word that tells how often you saw the behavior. Answer each question carefully. There are no right or wrong answers. Please answer every item. If you wish to change your answer, put an X through it and fill in your new choice as shown to the right.

Item #	During the past 4 weeks, how often did the infant...	Never	Rarely	Occasionally	Frequently	Very Frequently
1	try to do new things?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2	respond when spoken to?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3	imitate actions of others?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4	enjoy interacting with others?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5	keep trying when unsuccessful?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6	enjoy being cuddled?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7	show interest in what others were doing?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
8	show affection for a familiar adult?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
9	notice changes in surroundings?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
10	seek comfort from familiar adults?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
11	adjust her/his energy level to the type of play?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
12	act in a good mood?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
13	act happy when praised?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
14	make eye contact with others?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
15	explore surroundings?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

DECA-Preschool

- 10 minutes to administer
- Validity and reliability data
- National standardization (2000)
- Includes kit with observation journal, classroom activities, technical manual, guide for families
- Intervention activities suggested

The Devereux Early Childhood Assessment
(for children ages 2 through 5 years)

Paul A. LeBefve & Jack A. Naglieri

Child's Name _____ Gender _____ DOB _____ Age _____
 Site/Program _____ Classroom _____
 Person Completing this Form _____ Relationship to Child _____ Date of Rating _____

This form describes a number of behaviors seen in some young children. Read the statements that follow the phrase: *During the past 4 weeks, how often did the child...* and place a check mark in the box underneath the word that tells how often you saw the behavior. Answer each question carefully. There are no right or wrong answers. If you wish to change your answer, put an X through it and fill in your new choice as shown to the right. Please do not skip any items.

Item #	During the past 4 weeks, how often did the child...	Never	Rarely	Sometimes	Frequently	Very Frequently
1	set in a way that made adults smile or show interest in her/his?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2	do things for himself/herself?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3	shows up to a task but was "chasing the teacher"?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4	likes to be helped?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5	enjoys being hugged?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6	responds positively to adult comforting when upset?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7	participates actively in tasks before play with others (line-up, etc.)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
8	did he show joy or gladness at a happy occasion?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
9	shows affectionate responsiveness?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
10	shows affection for familiar adults?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
11	likes being touched?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
12	enjoys being praised?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
13	enjoys being hugged?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
14	likes to be with children/adults?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
15	uses creative gestures or offensive language?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Preschool and Kindergarten Behavior Scales (PKBS) 2nd ed.

- Merrell, 2002
- Designed for use by parents and teachers to assess typical social-emotional behavior of children ages 3-6
- 76 items on 2 separate comprehensive scales for social skills and problem behavior

Preschool and Kindergarten Behavior Scales (PKBS) 2nd ed.

- Norm group: 3,317 cases age 3-6; separate norms for school-based raters (1,467) and home-based raters (1,846)
- Rating form available in both English and Spanish

Social Skills Scale					
	Never	Rarely	Sometimes	Often	Scoring Key
1. Works or plays independently	0	1	2	3	
2. Is cooperative	0	1	2	3	
3. Smiles and laughs with other children	0	1	2	3	
4. Plays with several different children	0	1	2	3	
5. Tries to understand another child's behavior ("Why are you crying?")	0	1	2	3	
6. Is accepted and liked by other children	0	1	2	3	
7. Follows instructions from adults	0	1	2	3	
8. Attempts new tasks before asking for help	0	1	2	3	
9. Makes friends easily	0	1	2	3	
10. Shows self-control	0	1	2	3	
11. Is invited by other children to play	0	1	2	3	
12. Uses free time in an acceptable way	0	1	2	3	
13. Is able to separate from parent without extreme distress	0	1	2	3	
14. Participates in family or classroom discussions	0	1	2	3	
15. Asks for help from adults when needed	0	1	2	3	
16. Sits and listens when stories are being read	0	1	2	3	
17. Stands up for other children's rights ("That's his!")	0	1	2	3	
18. Adapts well to different environments	0	1	2	3	
19. Has skills or abilities that are admired by peers	0	1	2	3	
20. Comforts other children who are upset	0	1	2	3	

Subscales of the PKBS

A: Social Skills	B: Problem Behavior
Social cooperation	<i>Externalizing Problems:</i>
Social Interaction	Self-Centered/Explosive
Social Independence	Attention Problems/Overactive
	Antisocial/Aggressive
	<i>Internalizing Problems:</i>
	Social Withdrawal
	Anxiety/Somatic Problems
SOCIAL SKILLS	PROBLEM BEHAVIOR
TOTAL SCORE	TOTAL SCORE

Reliability of the PKBS

- N - 3,317 in home/school settings
- Internal consistency: .96 to .97 for total scores, .84 to .94 for subscales
- Test-retest: .60s to .90s at 3-weeks; .70 range at 3-months
- Interrater: between teachers and parents low to modest (.50s or less), indicating substantial *setting variance*

Validity of the PKBS

- Strong convergent validity with SSRS, and other behavior scales
- Strong sensitivity and discriminating power to group differences:
 - ✓ developmentally delayed vs. normal
 - ✓ child find referrals vs. normal
 - ✓ internalizing vs. normal
 - ✓ ADHD characteristics vs. normal
 - ✓ antisocial-conduct problems vs. normal

Social Skills Rating System

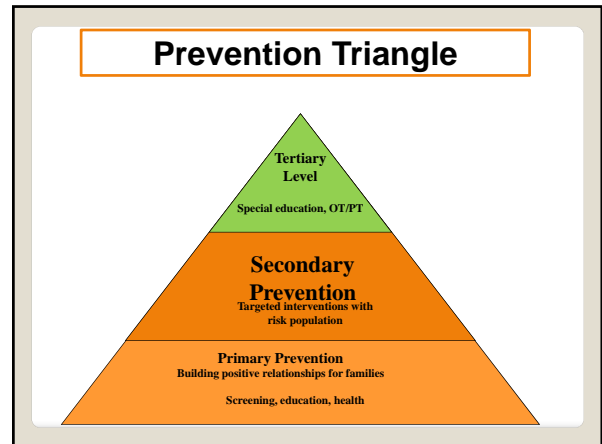
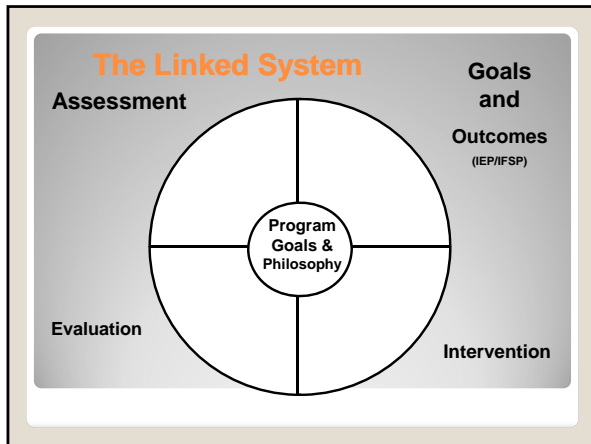
- Gresham & Elliott, 1990
- Assess children who have problems with behavior and interpersonal skills
- Detect the problems behind shyness, trouble initiating conversation, and difficulty making friends
- Select behaviors for treatment and assist in planning intervention

SSRS


- 3-5 years, Preschool Level
- Parent and teacher forms
- 8-10 minutes to complete
- Validity, reliability studies are sound
- 49 items

SSRS

- Positive social behaviors
 - ✓ Cooperation
 - ✓ Empathy
 - ✓ Assertion
 - ✓ Self-Control
 - ✓ Responsibility



- ### Prevention Activities
- Target domains or skills with low/risk screening scores
 - Develop activity plans for embedding practice opportunities
 - Parents/families
 - Practitioners
 - Reassess domain or skill in 1-2 months
 - Re-screen as appropriate

- ### ASQ Related Follow-Up Activities
- ASQ/ASQ:SE User's Guide activities
 - ASQ Learning Activities (available in Spanish)
 - Beautiful Beginnings (Raikes & Whitmer)
 - Creative Curriculum
 - DECA Strategy Guides
 - Pathways to Competence (Landy, 2009)
- 

- ### Summary
- **Newly-developed measures to assist in early identification**
 - **Early identification is critical for improving outcomes and providing family support**
 - **Prevention activities can be linked to screening results**

- ### Summary
- **Strong links between healthy brain development, social emotional competence, and academic outcomes**
 - **Increased awareness of importance of mental health or social-emotional competence of our youngest children**



Thank you