



Autism Doesn't Mean Can't!

Children with Autism CAN Learn to Read!



Cindy Bundren, M.Ed.
Colleen O'Leary Card, M.S. CCC-SLP
Special School District of St. Louis County

Session Overview

- Teaching students with autism to read and write can be very challenging. Early Literacy Skills Builder (ELSB) is a research-based, language-rich literacy curriculum for young children with moderate to severe disabilities, including autism.
- This session will examine case studies that demonstrate increased student performance using ELSB as a key component to literacy intervention.



SSD Autism Program Evaluation 2005

- Strengths and challenges
- Recommendations, including:
 - Model for training/support
 - Progress monitoring system
 - Resource identification in area of social skills
 - Increased communication between home/school
- Outcomes
 - Autism Program Quality Indicators
 - Effective Practice Specialists
 - Themes/priorities



Autism is...

- A neurobiological disorder
- First described by Leo Kanner in 1943
- A spectrum disorder
- Treatable, *not curable*
- A communication disorder, *not* a behavior disorder
- Becoming more prevalent—**1 in 110** (CDC)
- Usually diagnosed by 3
- Knows no racial, ethnic, or socio-economic boundary

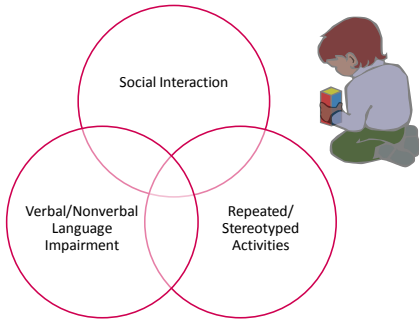


Autism is NOT...

- A mental/emotional illness or conduct disorder
- Curable
- Diagnosable by any type of medical procedure
- Simply a behavior disorder
- The same set of behaviors in all individuals



Autism Spectrum Disorders (ASD) *Triad of Impairments*



“Parents and practitioners often find teaching and engaging individuals with ASD to be among the most challenging undertakings of their lives. Often, individuals with ASD are viewed as “too impaired” to participate in literacy learning. Because of the limited expectations of their caregivers and teachers, individuals with ASD often do not have the systematic, natural exposure to literacy that their peers enjoy. Ironically, literacy, reading and writing are the very tools that will open the door to communication for many individuals with ASD.”



Dr. Joanne M. Cafiero, Ph.D
Special Ed Curriculum and Instruction
Conference Brochure

Autism and Literacy

- All students, regardless of their perceived functioning level, should have access to quality literacy instruction.
- A student-centered approach is crucial for building the literacy experiences of students with autism.
- Literacy experiences must be authentic and functional.
- Literacy experiences must take into account what we know about the processing style of students with autism.
- Literacy instruction must incorporate or build on the special interests of students.



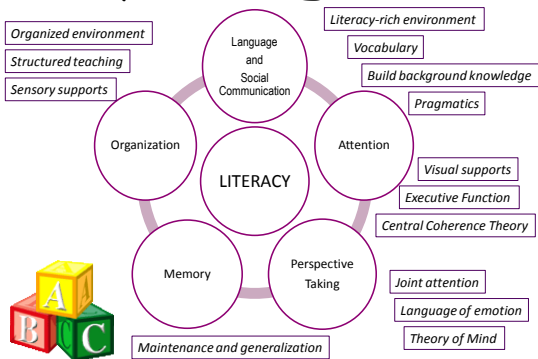
"An individual's ability to read, write, and speak in English, compute, and solve problems, at levels of proficiency necessary to function on the job, in the family of the individual, and in society."
 -Workforce Investment Act of 1998

Autism and Literacy

- Literacy skills provide the foundation for improving quality of life, regardless of ability or functioning level.
- Traditional literacy instruction without regard for the characteristics of autism and the individual is ineffective.
- Many students with autism are excluded from literacy experiences because of assumptions made about their cognitive and communicative abilities.
- Literacy can be defined as the skills that allow a student to have increased, meaningful engagement with his environment and those in it, including:
 - Reading
 - Writing
 - Functional communication
 - Listening comprehension
 - Critical thinking
 - Social communication



Autism and Literacy



Sample Student Profiles

P. is a 1st grader with autism. He is non-verbal and uses a communication device. He requires physical prompts to start tasks, visuals, and ABA supports.

Ky. is a 2nd grader with autism. He has limited communication, but with visuals, consistent routine, sensory breaks and modifications to curriculum, he is able to attend general education classes 60% of his day. Behavior is good but reading is a struggle. Kylan knows his letters but has no association with sounds or words.

Loves picture books.



Sample Student Profiles



Kh. is a 2nd grader with autism. He is non-verbal (some emerging Turkish language); has limited attending; difficulty following routines, teacher directions, and with transition; requires 1:1 support at all times. Shows minimal functional toy play; does not imitate; shows limited interest in books; does not match or show receptive discrimination.

J. is a 2nd grader with autism who is non-verbal. He has difficulty attending to tasks and completing tasks without maximum prompting. Imitation skills are limited. Performance is inconsistent- demonstrates a skill one day, then not for months. J. loves looking at picture books.

G. is a 4th grader. She is nonverbal, though her use of a communication book for expressing wants/needs is emerging. She needs hand-over-hand for many classroom tasks. She requires verbal, visual, and physical redirection and praise to stay engaged and focused. G. learns best via 1:1 instruction, with extra time for processing.

A Search for Answers

What We Were Doing

- Literacy for Students with Significant Developmental Disabilities
- Multiple available assistive technology trainings
- Highly individualized instruction

Teachers were frustrated!



What We Set Out To Do

- Find a "curriculum" that teachers could implement with students with autism who did not respond to more traditional literacy programs
- Develop a system by which teachers could network, share common experiences, and experience (measurable) success with teaching literacy skills to their students with autism

Effective Literacy Instruction for Students with Autism (SSD)

- Existing Literacy Supports
- Early Literacy Skills Builder (ELSB)
 - Supplemental Curricula
- Regional Cohorts (Data Teams, PLCs)
- Steering Committee/Administrative Support
- Ongoing Training Opportunities



Existing Literacy Supports

- Potpourri
 - Edmark
 - Rebus
 - Scholastic
 - News-2-You
 - Adapted books
 - Other
- Trainings offered through Assistive Tech Dept.
 - Teaching Literacy Skills to Students with Developmental Disabilities
 - Electronic Storybooks
 - Boardmaker
 - Multiple assistive technology offerings



Early Literacy Skills Builder (ELSB)

ELSB is a research-based and language-rich literacy curriculum for children ages 5 to 10 with moderate to severe developmental disabilities. It incorporates systematic instruction to teach both print and phonemic awareness. ELSB is a multi-year program with seven distinct levels and ongoing assessments so students progress at their own pace.



Early Literacy Skills Builder (ELSB)

- Pre-literacy Curriculum
- Verbal and Non-Verbal Responding
 - Embedded Motivators
- Direct and Systematic Instruction (ABA)
 - Progress Monitoring
- Starting with Sight Words
 - Beyond Sight Words



Early Literacy Skills Builder (ELSB)

Building with Sounds and Symbols

- Scripted Lessons
- Print and Phonemic Awareness
 - 7 levels with 5 lessons
 - 14 Objectives



Early Literacy Skills Builder (ELSB)

Building with Stories

- Access to general education curriculum
 - Enhance Language
 - Enhance Listening skills



SSD ELSB "Pilots" 2009-2010

- Central Region- 6 programs
- North Region- 20 programs
- South Region- 11 programs
- West Region- 14 programs
- SSD Schools- 15 programs



Supplemental Curricula

- Animated Literacy (*Jim Stone*)
 - A comprehensive, researched based, multisensory approach to reading, writing, and oral language instruction; moves students from the earliest stages of literacy to fluency & independence in reading/writing at a 3rd grade level
 - Key elements of program- phonological awareness, phonics, vocabulary development, comprehension, and fluency
 - In addition to current reading research, Animated-Literacy makes direct use of language research & brain research including research in memory, motivation, and the role of emotion in guiding attention and learning
- Sounds and Symbols Early Reading Program (*Goldman & Lynch*)
 - Program provides research-based methods to address:
 - Discriminating sounds
 - Associating sounds with visual symbols
 - Determining sound positions (initial, medial, and final)
 - Segmenting or sounding out syllables and words
 - Deleting and substituting sounds in syllables and words
 - Blending sounds and symbols into words and sentences
 - Reading together to increase fluency



Regional Cohorts

- Collaborative, structured, scheduled meetings that focus on the effectiveness of teaching and learning (data teams)
 - Examine individual student work generated from common formative assessments
 - Strategize on interventions
- Secondary purpose, to provide a forum for networking and sharing
- Training and support also provided, as needed
 - Role play/practice ELSB
 - Representation level
 - Assistive technology
 - Progress monitoring tools



Steering Committee/Admin Support

- The ELSB Committee plans professional development for ELSB
- Makes recommendations for implementation and evaluates the ELSB program and related activities.
- Developed tools for fidelity checks
- Monitors data for trends, report outcomes to administration.



Ongoing Training Examples

- Autism
 - Communication
 - Social Skills
 - Behavior
 - Literacy
- Literacy
 - Multiple programs, including ELSB
 - Literacy for Students with Significant Developmental Disabilities
- Assistive Technology
 - Boardmaker
 - Electronic Storybooks
 - Classroom Suite
 - PixWriter
- Other
 - Make and takes
 - Websites
 - Wiki sites/materials sharing
 - Webinars and seminars
 - Fidelity checks

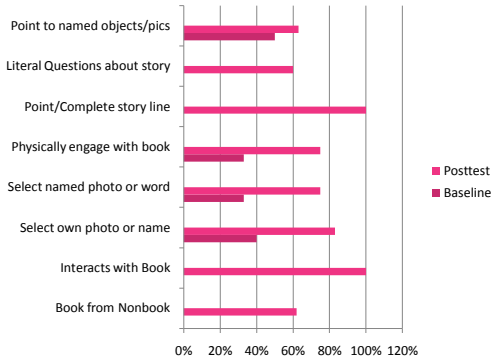


And, critical job-embedded training and support available by multiple resources

Student Outcomes- Level A

	BASELINE	TEST 2	TEST 3	TEST 4
Objective 1	3/3	2/3	3/3	3/3
Objective 2	1/1	1/1	1/1	1/1
Objective 3	2/3	2/3	3/3	3/3
Objective 4	0/5	2/5	3/5	2/5
Objective 5	1/4	0/4	1/4	3/4
Objective 6	0/3	0/3	1/3	3/3
Objective 7	2/5	2/5	1/5	3/5
Objective 8	3/6	3/6	2/6	5/6
Totals:	12/30	12/30	15/30	21/30
	40%	40%	50%	70%

Student Outcomes- Level A



Sample Class Outcomes- Level A

	Baseline	Posttest	Baseline	Posttest	Baseline	Posttest	Baseline	Posttest
	Student #1		Student #2		Student #3		Student #4	
Obj 1	0	3	2	2	3	3	2	3
Obj 2	0	1	0	1	1	1	1	0
Obj 3	0	2	1	3	1	3	2	2
Obj 4	2	3	1	1	3	5	2	2
Obj 5	3	2	1	3	3	4	1	1
Obj 6	0	2	0	2	1	2	0	2
Obj 7	0	0	0	0	0	0	0	0
Obj 8	1	3	2	4	8	6	4	5
	6/30	16/30	7/30	16/30	18/30	24/30	12/30	15/30
%	20%	53%	23%	53%	60%	80%	40%	50%

Student Outcomes- Levels A and 1

Student	Baseline	Test 2	Test 3	Test 4
J	Level A 90%	Level 1 73%	Level 1 84%	
T	Level A 50%	Level A 100%	Level 1 71%	Level 1 86%
E	Level 1 63%	Level 1 74%	Level 1 84%	
M	Level 1 92%	Level 1 97%		
W	Level 1 100%	Level 1 100%		
T	Level 1 59%	Level 1 87%	Level 1 100%	
J	Level 1 58%	Level 1 67%		
M	Level A 47%	Level A 53%	Level A 59%	
B	Level 1 67%	Level 1 100%		
J	Level 1 26%	Level 1 53%		
C	Level 1 21%	Level 1 100%		



Individual Student Successes SSD/County-Wide

P.



- After one year of ELSB instruction:
 - Increase in communication (2 word manding).
 - Prompting at gestural level.
 - Awareness of peers and increased interaction.
 - Print awareness, high interest in books, matching site word to picture.
 - Currently on Level 1

Ky.

- After One of year with ELSB instruction:
 - Kylan has moved from Level A to Level 4.
 - Completed his ALL About Me Book.
 - Is more interested in class reading instruction.
 - Phonics is a struggle but sight word acquisition is a strength.



Kh.

- After One of year with ELSB instruction:
 - Follows simple classroom routines independently
 - Shows a desire to learn- seeks out new experiences
 - Enjoys coloring/marketing with dry erase markers
 - Is imitating one and two word utterances
 - Spontaneously and accurately completes cloze exercises with familiar stories



J.

- After One of year with ELSB instruction:
 - Demonstrates increased independence moving through his environment
 - Eye contact and attending is increased
 - Follows one-step directions 70% of the time
 - Is able to track print as it is read using one-to-one correspondence 40% of opportunities (3-5 word sentence)
 - Starting to inserting text into a story and answering questions about a story by pointing to picture choices



G.

- After One of year with ELSB instruction:
 - Follows classroom routines and transitions with increased level of independence
 - Answers “who?” and “what” questions, and simple comprehension questions about text
 - Moved from an average score of 14% to and average score of 74% on early literacy skills checklist between September and January
 - Increased receptive vocabulary (0% accuracy to average of 80-100% accuracy on target vocabulary), using Tech Talk device with four to eight picture choices to demonstrate her understanding of the vocabulary





Lessons Learned

+ / ▲ Data



- Student attention
- Student engagement
- Emerging verbalizations
- Early literacy behaviors
- Measurable progress- even incremental growth
- Integration of technology
- Collaboration, meaningful discussions re: data/strategies
- Sequential, systematic curriculum
- Getting all of the data together
- Juggling materials
- Time- to prepare/make materials
- Having multiple groups running in one classroom
- Burn-out (teachers) from repetition
- Perseveration (students) from repetition

Where Are We Headed?

- Ongoing support
- Continued evaluation of program
- Continued training for literacy, communication, behavior, social skills, visual supports, assistive technology, and autism
- Most importantly, continued increase in student performance!



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