

AAC-RERC
SPREAD THE WORD

The AAC-RERC Webcast Series

Duke University, Temple University,
Penn State University, Children's Hospital at Boston,
University of Nebraska at Lincoln,
Augmentative Communication Inc.,
State University of New York at Buffalo

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Maximizing the Literacy Skills of Individuals Who Require AAC

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Literacy skills are critically important for individuals who require AAC

- Education – learning and assessment
- Employment
- Social contact
- Daily living
- Organizational aids
- Internet access
- Self expression
- Communication – increased breadth,
generative capacity
- Competence/ self esteem

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Literacy outcomes for individuals who require AAC

- Currently, the majority of individuals who require AAC do not have functional literacy skills.
- Some individuals who require AAC do develop competencies in reading and writing.
 - A small number have high level literacy skills (Koppenhaver, Evans, & Yoder, 1991)
 - Many demonstrate difficulties with literacy (Kelford Smith, Thurston, Light, Parnes, & O'Keefe, 1989).
 - Many are "underachieving" in literacy skills (Berninger & Gans, 1986).

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Importance of evidence- based instruction

One of the major factors that has contributed to poor literacy outcomes is the lack of evidence-based instruction adapted to meet the needs of individuals who require AAC

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Goals of the webcast

- Share the results of a research study that evaluated the effects of adapted instruction on the literacy skills of individuals who use AAC
 - Describe the literacy instruction
 - Share case examples to illustrate intervention and outcomes
- Multiple baseline across participants
 - 8 participants (3 to 54 years old)

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How can we better support literacy learning?

- Effective evidence-based instruction is required to enhance literacy skills of individuals who require AAC
 - Appropriate instructional content
 - Appropriate instructional procedures
 - Adaptations to allow active participation of individuals who cannot produce spoken responses

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Instructional program

- Focuses on the transition to conventional literacy skills (reading and writing)
- Is grounded in literacy research in two areas
 - Literacy instruction for children at risk
 - E.g., The National Reading Panel, 2000
 - Adaptations for individuals who require AAC
 - E.g., Fallon et al., 2004; Millar et al., 2004; Light, McNaughton, et al., 2004

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Appropriate instructional content

- Read interesting texts to the student
- Build language skills
- Phonological awareness skills
- Letter-sound correspondences
- Early reading skills
 - Decoding skills
 - Shared reading
- Early writing skills

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Appropriate instructional content

- Read interesting texts to the student
 - Regularly read to the student
 - Choose texts that are interesting
 - Establishes the motivation /meaningfulness of reading
 - Talk about the text with the student
 - Relate the story to the student's experiences
 - Ensure the student has access to AAC
 - Encourage the student's active participation
 - Talking about the story
 - Asking questions
 - Filling in lines
 - Build the student's comprehension
 - Provide repeated readings to build competence

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Appropriate instructional content

- Build language skills
 - Learning to read and write depends on a foundation of language skills
 - Need to build semantic and syntactic knowledge
 - Develop vocabulary
 - Not just functional vocabulary but also vocabulary used in books
 - Teach syntax and morphology

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Appropriate instructional content

- **Phonological awareness skills**
 - Phoneme segmentation
 - Sound blending
- **Letter-sound correspondences**
- **Early reading skills**
 - Single word decoding
 - Decoding in context of shared reading
- **Early writing skills**
 - Dictating /telling stories
 - Writing stories
 - Sound spelling

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Appropriate instructional procedures

- **Instruction is based on principles of effective instruction** (Ellis et al., 1994)
 - Provide direct, explicit instruction in basic skills
 - **Model** the skill for the student
 - **Prompt** the student
 - Provide guided practice, helping the student do the skill
 - **Check** the student's performance
 - Provide opportunities for independent practice
 - Provide feedback

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Appropriate instructional procedures

- Provide scaffolding support initially
 - Gradually fade support as student develops competencies
- Provide repeated opportunities for student to practice skills
 - Ensure active involvement

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Appropriate instructional procedures

- **Incorporate skills into meaningful literacy experiences**
 - Use meaningful motivating materials
 - Have fun

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Adapted instruction for individuals who require AAC

- **Adapt procedures to accommodate unique needs of individuals who require AAC**
 - Eliminate the need for spoken responses
 - Provide alternative response modes
 - e.g., point to AAC symbols, eye point to symbols, select symbols on SGD
 - Provide scaffolding support for the student
 - e.g., provide oral production/ rehearsal for student, provide access to speech output
 - Provide systematic data collection
 - use error analysis to identify specific difficulties

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Literacy instruction - First steps

- **Teach phonological awareness skills**
 - Initial phoneme segmentation
 - Sound blending
- **Teach letter-sound correspondences**
- **Also critical to**
 - Read to student regularly
 - Continue to build language skills
 - Vocabulary and syntax

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Phonological awareness

- An individual's understanding or awareness of the sound structure of language
 - the ability to notice, think about, and manipulate the phonemes of words
 - Torgesen, Wagner, & Rashotte, 1994
- Phonological awareness tasks include:
 - segmenting the sounds of words
 - blending individual sounds to form words
 - rhyming
 - etc.

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Instruction in segmenting initial sounds

- Goal
 - The student will match a target phoneme presented orally to the correct picture of a word that starts with the target phoneme
- Task
 - Present 4 pictures & label orally
 - Say target phoneme in isolation e.g., /b/
 - Show letter (e.g., b) at the same time
 - Student must point to the picture that starts with the target phoneme

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Specific instructional techniques

- Introduce task
- Model task for student
- Provide guided practice
 - Complete the task with the student
- Provide independent practice
 - If correct, confirm and provide encouragement
 - If incorrect, implement correction procedure
 - Model the correct answer for the student
 - Prompt the student
 - Re-check
- These instructional procedures are used across all skills

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Example of instruction in segmenting initial phonemes

- Goal
 - The student will match the phoneme /t/ to the picture of the word that starts with /t/
- Task
 - Present four pictures to the student and label them
 - up, tag, net, pop
 - Say the target phoneme /t/ and show the letter t
 - The student must point to the picture that starts with /t/
 - tag

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Example of instruction in segmenting initial phonemes

- Goal
 - The student will match the phoneme /t/ to the picture of the word that starts with /t/
- Task
 - Present four pictures to the student and label them
 - up, tag, net, pop
 - Say the target phoneme /t/ and show the letter t
 - The student must point to the picture that starts with /t/
 - tag

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Example of instruction in segmenting initial phonemes

- Goal
 - The student will match the phoneme /t/ to the picture of the word that starts with /t/
- Task
 - Present four pictures to the student and label them
 - up, tag, net, pop
 - Say the target phoneme /t/ and show the letter t
 - The student must point to the picture that starts with /t/
 - tag

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Instruction in blending sounds

- **Goal**
 - The student will blend 3 target phonemes presented orally in sequence (with each phoneme extended 1-2 seconds), determine the target word, and then point to the correct picture of the target word
- **Task**
 - Present 4 pictures & label orally
 - Say the target word orally with each phoneme extended 1-2 seconds
 - Student must blend the phonemes and point to the picture that starts with the target word

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Example of instruction in blending sounds

- **Goal**
 - The student will listen to the phonemes /t o s/ with each phoneme extended 1-2 seconds, blend them to determine the word (toss), and then point to the picture of toss
- **Task**
 - Present four pictures and label them
 - top, toss, tap, boss
 - Say the phonemes /t o s/ orally with each phoneme extended 1-2 seconds
 - The student must blend the phonemes and point to the picture for toss

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Example of instruction in blending sounds

- **Goal**
 - The student will listen to the phonemes /t o s/ with each phoneme extended 1-2 seconds, blend them to determine the word (toss), and then point to the picture of toss
- **Task**
 - Present four pictures and label them
 - top, toss, tap, boss
 - Say the phonemes /t o s/ orally with each phoneme extended 1-2 seconds
 - The student must blend the phonemes and point to the picture for toss

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Example of instruction in blending sounds

- **Goal**
 - The student will listen to the phonemes /t o s/ with each phoneme extended 1-2 seconds, blend them to determine the word (toss), and then point to the picture of toss
- **Task**
 - Present four pictures and label them
 - top, toss, tap, boss
 - Say the phonemes /t o s/ orally with each phoneme extended 1-2 seconds
 - The student must blend the phonemes and point to the picture for toss

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Letter-sound correspondences

- **An individual's understanding of**
 - The sounds that correspond to specific letters
 - The letters that correspond to specific sounds
- **Involves**
 - phonological processing and
 - orthographic processing

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Instruction in letter-sound correspondences

- **Goal**
 - The student will match a target phoneme presented orally to the correct letter
- **Task**
 - Present 4 letters
 - Say the target phoneme e.g., /b/
 - Student must point to the letter that goes with the target phoneme

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Example of instruction in letter-sound correspondences

- **Goal**
 - The student will match the phoneme /t/ (or /a/ or /s/) to the letter t (or a or s)
- **Task**
 - Present four letters to the student
 - Say the target phoneme /t/
 - The student must point to the letter t

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Example of instruction in letter-sound correspondences

- **Goal**
 - The student will match the phoneme /t/ (or /a/ or /s/) to the letter t (or a or s)
- **Task**
 - Present four letters to the student
 - Say the target phoneme /t/
 - The student must point to the letter t

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Example of instruction in letter-sound correspondences

- **Goal**
 - The student will match the phoneme /t/ (or /a/ or /s/) to the letter t (or a or s)
- **Task**
 - Present four letters to the student
 - Say the target phoneme /t/
 - The student must point to the letter t

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Progression of instruction

- **Teach lower case letters first**
 - Most words use lower case letters
- **Teach letters that are used most frequently first**
- **Teach letters that are dissimilar first**
 - a m t s i f d r o g l h u c b n k v e w j p y
(Carnine et al. 1997)
- **Teach short vowels before long vowels**
- **Teach blends once most single letter-sound correspondences are mastered**

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Progression of instruction (continued)

- **Introduce letters incrementally**
 - As student masters a letter, introduce a new one
 - Provide regular review of known letters
- **Select foils carefully**
 - Start with a small number of foils that are dissimilar
 - E.g., b, m
 - Once successful, include more foils and ones that require finer visual and auditory discriminations
 - E.g., b d
- **As student develops competence, may choose letter from keyboard (adapted to meet needs)**

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Literacy instruction – Next steps

- **Once student**
 - Is competent with sound blending
 - Knows approximately 6-7 letter-sound correspondences
- **Teach single word decoding**
 - Requires integration of
 - knowledge of letter-sound correspondences and
 - skills in sound blending
- **Provide opportunities to use single word decoding skills in meaningful contexts**
 - Shared reading activities

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Literacy instruction – Next steps

- Continue to teach letter- sound correspondences
 - As student learns new letter-sound correspondences, include new words for decoding that use the new letter and old letters in combination
- Continue to practice phonological awareness skills
 - Build automaticity
- Continue to read to the student and build language skills

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Instruction in reading single words

- Goal
 - The student will decode / read a single word presented in writing and match the word to the correct picture
- Task
 - Present 4 pictures
 - Present the target written word
 - Student must read the word and point to the picture of the target word

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Error analysis

- Select foils carefully to allow systematic error analysis
 - One picture is target word (e.g., map)
 - One foil is an initial sound substitution (e.g., nap)
 - One foil is a medial vowel substitution (e.g., mop)
 - One foil is a final sound substitution (e.g., mat)

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Error analysis

- Pattern of errors may identify areas for additional instruction. For example:
 - Difficulty with initial sounds
 - Difficulty with medial sounds
 - Difficulty with final sounds
 - Difficulty with vowels

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Example of instruction in reading words

- Goal
 - The student will decode the written word *pet* and point to the picture of the pet
- Task
 - Present 4 pictures
 - pen, pat, pet, net
 - Present the written word *pet*
 - The student must read the word and point to the picture of the pet

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Example of instruction in reading words

- Goal
 - The student will decode the written word *pet* and point to the picture of the pet
- Task
 - Present 4 pictures
 - pen, pat, pet, net
 - Present the written word *pet*
 - The student must read the word and point to the picture of the pet

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Example of instruction in reading words

- **Goal**
 - The student will decode the written word *pan* and point to the picture of the pan
- **Task**
 - Present 4 pictures
 - tan, pan, pin, pal
 - Present the written word *pan*
 - The student must read the word and point to the picture of the pan

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Reading words in context Shared reading of books

- Provide opportunities for students to use their decoding skills during shared reading
 - Highlight target words in the book for the student
 - Hooray for **pig** (target cvc word)
 - Read sentence out loud & track words with finger; pause at the highlighted target word
 - "Hooray for (pause)"
 - Student must decode highlighted target word and then select the picture of the target word from the communication display or SGD

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Example of shared reading

- **Goal**
 - The student will use his decoding skills to read written words during shared reading
- **Task**
 - Highlight the target word in the book
 - I steal the **ball**
 - Read the sentence out loud tracking words with finger; pause at the target word
 - I steal the (pause)
 - Student must read the word and point to the picture of ball

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Example of shared reading

- **Goal**
 - The student will use his decoding skills to read written words during shared reading
- **Task**
 - Highlight the target word in the book
 - I steal the **ball**
 - Read the sentence out loud tracking words with finger; pause at the target word
 - I steal the (pause)
 - Student must read the word and point to the picture of ball

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Example of shared reading

- **Goal**
 - The student will use his decoding skills to read written words during shared reading
- **Task**
 - Highlight the target word in the book
 - Hooray for **pig**
 - Read the sentence out loud tracking words with finger; pause at the target word
 - Hooray for (pause)
 - Student must read the word and point to the picture of pig

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Instruction – Next steps

- Teach single word decoding
- Integrate decoding skills into shared reading contexts
 - Instructor reads book
 - Student decodes target words in book
- Continue to review /build automaticity
 - Phonological awareness skills
 - Letter-sound correspondences
- Continue to read & build language skills to ensure comprehension
 - Semantic and syntactic knowledge
- Use written language to build spoken language
 - Encourage speech production

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Example of instruction in reading words

- **Goal**
 - The student will decode the written word *bed* and point to the picture of the bed
- **Task**
 - Present 4 pictures
 - red, beg, mad, bed
 - Present the written word *bed*
 - The student must read the word and point to the picture of the bed

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Example of instruction in reading words

- **Goal**
 - The student will decode the written word *bed* and point to the picture of the bed
- **Task**
 - Present 4 pictures
 - red, beg, mad, bed
 - Present the written word *bed*
 - The student must read the word and point to the picture of the bed

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Example of instruction in reading words

- **Goal**
 - The student will decode the written word *bed* and point to the picture of the bed
- **Task**
 - Present 4 pictures
 - red, beg, mad, bed
 - Present the written word *bed*
 - The student must read the word and point to the picture of the bed

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Transition to book reading

- Important to infuse new decoding skills into meaningful reading experiences
- E.g.,
 - Reading *I Spy* books
 - Shared reading of books

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Reading *I Spy* books

- **Goal**
 - The student will decode a single cvc word presented in writing and match the word to the correct picture in an *I Spy* book
- **Task**
 - Present the written phrase, ending with the target word
 - I spy a _____ (target cvc word)
 - Read out loud "I spy a (pause)"
 - Student must read target word and then point to the picture of the target word from the array of pictures in the *I Spy* book

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Example of reading *I Spy* books

- **Goal**
 - The student will decode the word *pin* and point to the picture of a pin in an *I Spy* book
- **Task**
 - Highlight the target word in the book
 - I spy a **pin**
 - Read the sentence out loud tracking words with finger; pause at the target word
 - I spy a (pause)
 - Student must read the word and point to the picture of pin

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Example of reading *I Spy* books

- **Goal**
 - The student will decode the word *pin* and point to the picture of a pin in an *I Spy* book
- **Task**
 - Highlight the target word in the book
 - I spy a **pin**
 - Read the sentence out loud tracking words with finger; pause at the target word
 - I spy a (pause)
 - Student must read the word and point to the picture of pin

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Example of reading *I Spy* books

- **Goal**
 - The student will decode the word *man* and point to the picture of a man in an *I Spy* book
- **Task**
 - Highlight the target word in the book
 - I spy a **man**
 - Read the sentence out loud tracking words with finger; pause at the target word
 - I spy a (pause)
 - Student must read the word and point to the picture of man

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Example of instruction in reading words

- **Goal**
 - The student will decode the written word *hum* and point to the picture of hum
- **Task**
 - Present 4 pictures
 - ham, hum, hug, yum
 - Present the written word *hum*
 - The student must read the word and point to the picture of hum

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Example of instruction in reading words

- **Goal**
 - The student will decode the written word *hum* and point to the picture of hum
- **Task**
 - Present 4 pictures
 - ham, hum, hug, yum
 - Present the written word *hum*
 - The student must read the word and point to the picture of hum

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Example of instruction in reading words

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 - The student will decode the written word *hum* and point to the picture of hum
- **Task**
 - Present 4 pictures
 - ham, hum, hug, yum
 - Present the written word *hum*
 - The student must read the word and point to the picture of hum

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Shared reading of story books

- **Goal**
 - The student will decode single cvc words presented in the context of a story and will say the word or match the word to the correct picture on a communication board or SGD
- **Materials**
 - Simple books of interest to student
 - Highlight cvc words that student can read
 - Adapt text as required to include additional cvc words

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Shared reading of story books

■ Task

- Introduce the book to the student
- Present the written text with target words highlighted for the student
- Read sentence out loud and track words with finger; pause at the highlighted target word
- Student must decode highlighted target word and then say the word or select the picture of the target word from AAC system

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Example of shared reading of story books

■ Goal

- The student will use his decoding skills to read written words during shared reading

■ Task

- Highlight the target words in the book
 - Can baby bear sit on daddy's **lap** ?
 - Oh no, daddy bear **fell** !
 - Will he get **wet** ?
- Read the sentence out loud tracking words with finger; pause at the target word
 - E.g., Oh no, daddy bear (pause)
- Student must read the word

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Example of shared reading of story books

■ Goal

- The student will use his decoding skills to read written words during shared reading

■ Task

- Highlight the target words in the book
 - Can baby bear sit on daddy's **lap** ?
 - Oh no, daddy bear **fell** !
 - Will he get **wet** ?
- Read the sentence out loud tracking words with finger; pause at the target word
 - E.g., Oh no, daddy bear (pause)
- Student must read the word

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Adapting instruction to meet complex needs

■ Utilize highly motivating materials

■ Provide large print

- Accommodate vision

■ Adapt instruction in letter sound correspondences

- Modify sequence of letter-sounds to accommodate hearing loss
- Provide visual cues initially - fingerspelling

■ Incorporate instruction in sight words also

- Provide access to reading as soon as possible

■ Use written words & sign to augment input

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Example of instruction in reading words

■ Goal

- The student will read written words and then match them to the correct picture

■ Task

- Present 6-8 pictures /AAC symbols
- Present written words one at a time
 - E.g., dog, cat, mom
- The student must read the word and match it with the correct picture

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Example of instruction in reading words

■ Goal

- The student will read written words and then match them to the correct picture

■ Task

- Present 6-8 pictures /AAC symbols
- Present written words one at a time
 - E.g., dog, cat, mom
- The student must read the word and match it with the correct picture

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Example of instruction in reading words

- **Goal**
 - The student will read written words and then match them to the correct picture
- **Task**
 - Present 6-8 pictures /AAC symbols
 - Present written words one at a time
 - E.g., dog, cat, mom
 - The student must read the word and match it with the correct picture

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Example of shared reading using personalized stories

- **Goal**
 - The student will use her decoding skills to read written words during shared reading of stories about her experiences
- **Task**
 - Develop short stories using photographs of the student's experiences
 - Highlight target words in the book
 - E.g., dad, ball, mom, me, on
 - Read the sentence out loud tracking words with finger; pause at the target words
 - Student reads the word & signs

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Example of shared reading using personalized stories

- **Goal**
 - The student will use her decoding skills to read written words during shared reading of stories about her experiences
- **Task**
 - Develop short stories using photographs of the student's experiences
 - Highlight target words in the book
 - E.g., dad, ball, mom, me, on
 - Read the sentence out loud tracking words with finger; pause at the target words
 - Student reads the word & signs

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Writing instruction

- **Literacy instruction should focus on**
 - Reading
 - Writing
- **Writing is often neglected**
- **The development of writing skills relies on integration of**
 - World knowledge
 - Language skills
 - Knowledge of vocabulary / syntax
 - Narrative skills
 - Phonological awareness skills
 - Phoneme segmentation skills
 - Knowledge of letter-sound correspondences
 - Access to writing tools

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Literacy instruction First steps

- **Read, read, read!!**
- **Build language skills**
 - Vocabulary
 - Syntax/ morphology
- **Teach phonological awareness skills**
 - Sound blending
 - Phoneme segmentation
- **Teach letter sound correspondences**

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Writing instruction

- **Engage student in interesting experiences**
 - Build world knowledge
 - Ensure student has something to write about
- **Provide opportunities to engage in meaningful writing activities**
 - Telling stories to adults
 - Patterned story telling
 - Writer's workshop
 - Publishing books
 - Use the books for reading activities
 - Share books with others

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Ensure access to writing tools

- Ensure access to writing materials
 - May require adaptations
- Ensure access to letters and sounds
 - AAC systems
 - Output should be phonemes not letter names
- Provide access to word banks

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Writing instruction – First steps Patterned story writing

- Read familiar stories with repeated pattern
 - E.g., Brown Bear, Brown Bear
- Build new story with student following familiar pattern
 - Model writing for the student
 - Provide slots for the student to “write”
 - maximal scaffolding support
 - Allow the student to choose content
 - Publish the story
 - Scan the story into the student’s AAC system
 - Provide opportunities for repeated readings

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Example of patterned story writing

- Read the book *Brown Bear Brown Bear* with the child
- Have the student build a new story following the pattern of *Brown Bear*
 - Model writing the first line of the story
 - Encourage the child to use AAC to choose the next animal
 - E.g., zebra
 - Encourage the child to use AAC to choose the color
 - E.g., pink zebra
 - Continue until the child finishes “writing” the story
 - Publish the story and provide opportunities for repeated readings

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Example of patterned story writing

- Read the book *Brown Bear Brown Bear* with the child
- Have the student build a new story following the pattern of *Brown Bear*
 - Model writing the first line of the story
 - Encourage the child to use AAC to choose the next animal
 - E.g., zebra
 - Encourage the child to use AAC to choose the color
 - E.g., pink zebra
 - Continue until the child finishes “writing” the story
 - Publish the story and provide opportunities for repeated readings

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Writing instruction – Next steps Writing with familiar story schema

- Read familiar story books
 - E.g., PJ Funny Bunny
- Build new story with student following the familiar story schema
 - Model writing for the student
 - Provide scaffolding support for story writing
 - Student has opportunity to develop parts of the story
 - Allow the student to choose content
 - Publish the story
 - Scan the story into the student’s AAC system
 - Provide opportunities for repeated readings

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Example of writing using familiar story schema

- Read the book *PJ Funny Bunny* with the child
- Have the student build a new story following the story schema of *PJ Funny Bunny*
 - Model writing the first line of the story
 - Encourage the child to use AAC to decide what animal PJ goes to live with
 - E.g., horse
 - Encourage the child to use AAC to explain why PJ does not like the horses
 - E.g., They were too fast
 - Continue until the child finishes “writing” the story
 - Publish the story and provide opportunities for repeated readings

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Example of writing using familiar story schema

- Read the book *PJ Funny Bunny* with the child
- Have the student build a new story following the story schema of *PJ Funny Bunny*
 - Model writing the first line of the story
 - Encourage the child to use AAC to decide what animal PJ goes to live with
 - E.g., horse
 - Encourage the child to use AAC to explain why PJ does not like the horses
 - E.g., They were too fast
 - Continue until the child finishes “writing” the story
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Example of writing using familiar story schema

- Read the book *PJ Funny Bunny* with the child
- Have the student build a new story following the story schema of *PJ Funny Bunny*
 - Model writing the first line of the story
 - Encourage the child to use AAC to decide what animal PJ goes to live with
 - E.g., horse
 - Encourage the child to use AAC to explain why PJ does not like the horses
 - E.g., They were too fast
 - Continue until the child finishes “writing” the story
 - Publish the story and provide opportunities for repeated readings

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Writing instruction – Next steps Expand writing experiences

- Use photos, student experiences, pictures as prompts
- Encourage student to write stories
 - Model writing process for student
 - Encourage student to write using letters and sounds
 - Accept sound spelling
 - Provide word bank for student
 - Relevant sight words, difficult words
 - Provide opportunities to revise
 - Publish the story
 - Scan the story into the student’s AAC system
 - Provide opportunities for repeated readings

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Example of expanding writing experiences

- Use pictures of a witch as a story prompt at Halloween
- Have the student write a story
 - Model writing the first line of the story using an alphabet board
 - Encourage the student to write using letters and sounds
 - Accept sound spellings
 - Provide a word bank for the child
 - E.g., witch
 - Publish the story and provide opportunities for repeated readings

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Example of expanding writing experiences

- Use pictures of a witch as a story prompt at Halloween
- Have the student write a story
 - Model writing the first line of the story using an alphabet board
 - Encourage the student to write using letters and sounds
 - Accept sound spellings
 - Provide a word bank for the child
 - E.g., witch
 - Publish the story and provide opportunities for repeated readings

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Baseline prior to instruction

- Recognizes her name in print
- Knows many letter sound correspondences
 - Most consonants
 - Difficulty with short vowels
- Phonological awareness skills
 - 45% accuracy with initial phoneme segmentation tasks
 - 75% accuracy with sound blending tasks
- Does not decode words

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Example of instruction in reading words

- **Goal**
 - The student will decode the written word *cap* and point to the picture of cap
- **Task**
 - Present 4 pictures
 - nap, cup, cat, cap
 - Present the written word *cap*
 - The student must read the word and point to the picture of cap

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Example of instruction in reading words

- **Goal**
 - The student will decode the written word *cap* and point to the picture of cap
- **Task**
 - Present 4 pictures
 - nap, cup, cat, cap
 - Present the written word *cap*
 - The student must read the word and point to the picture of cap

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Example of instruction in reading words

- **Goal**
 - The student will decode the written word *cap* and point to the picture of cap
- **Task**
 - Present 4 pictures
 - nap, cup, cat, cap
 - Present the written word *cap*
 - The student must read the word and point to the picture of cap

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Example of shared reading of story books

- **Goal**
 - The student will use her decoding skills to read written words during shared reading
- **Task**
 - Highlight the target words in the book
 - The **Cat Sat** on the **Mat**
 - Read the sentence out loud tracking words with finger; pause at the target word
 - Student must read the word

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Example of shared reading of story books

- **Goal**
 - The student will use her decoding skills to read written words during shared reading
- **Task**
 - Highlight the target words in the book
 - The **Cat Sat** on the **Mat**
 - Read the sentence out loud tracking words with finger; pause at the target word
 - Student must read the word

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Research to practice

- Students who require AAC can acquire literacy skills when provided with effective instruction to teach
 - Phonological awareness skills
 - Letter sound correspondences
 - Decoding skills
 - Shared reading activities
 - Writing skills
- Research is available to guide in planning & implementing literacy instruction

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The Art and Science of Literacy Intervention



■ The science

- Implementation of evidence-based instructional procedures
- Monitoring effectiveness
- Evaluating results

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The art

■ The art

- the belief and the commitment to the right of all individuals to express themselves fully and seek their full potential

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The commitment to literacy intervention

- The belief and the commitment to the right of all individuals to express themselves fully and seek their full potential

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The commitment to literacy intervention

- The belief and the commitment to the right of all individuals to express themselves fully and seek their full potential
 - “They said I’d never learn to read.”
 - “Well, you just proved them wrong!”

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The commitment to literacy intervention

- The belief and the commitment to the right of all individuals to express themselves fully and seek their full potential
 - “They said I’d never learn to read.”
 - “Well, you just proved them wrong!”

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Teaching literacy skills is
the single most
empowering thing that we
can do for individuals who
require AAC
(Lindsay, 1990)



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