Augmentative and Alternative Communication
What is AAC?

• Augmentative and alternative communication
  – A discipline in which systems of communication are designed to either augment or replace natural speech
  – Augmentative communication:
    • Modes of communication that can augment the individual’s limited speech abilities.
  – Alternative communication:
    • Modes of communication that can serve as a replacement for the absence of speech abilities.

(Lloyd et al., 1997)
Research

Beukelman and Ansel (1995) indicated:

- Approximately 0.8%-1.2% of people in the general population experience severe communication impairments that require AAC.
Who are we talking about?

• It is estimated that 2 million Americans have significant communication disabilities and require augmentative and alternative communication (AAC)  

  (Light, J.C. & Kent-Walsh, J.; 2003 May 27)
Who are we talking about?

• Congenital Disabilities:
  – Intellectual disability
  – Motor disabilities: cerebral palsy
  – Autism
  – Developmental apraxia of speech

• Acquired Impairments:
  – Amyotrophic lateral sclerosis (ALS)
  – Multiple sclerosis (MS)
  – Traumatic brain injury (TBI)
  – Stroke
  – Spinal cord injury

• Temporary conditions
Goal of AAC

• **Full participation** in home, school, work, play and other environments
  – Temporary means of communication
  – Long term means of communication
  – Facilitation of spoken communication development
  – Facilitation of concept, language, and literacy development
  – Other benefits such as reducing problem behavior
The AAC Communication Model

- Considers both sender and receiver
- Includes AAC transmission processes and interface
- The only differences between the AAC model and the human communication model are:
  - AAC processes and interfaces
  - Means to represent messages (aided or unaided)
  - Means to select messages (aided or unaided)
  - Means to transmit messages (aided or unaided)

(Lloyd, Quist, & Windsor, 1990)
Means to represent...

• Symbol:
  – methods used for “visual, auditory, and/or tactile representation of conventional concepts (e.g., gestures, photographs, manual sign sets/systems, picto-idiographs, printed words, objects, spoken words, Braille)”

(ASHA, 1991)
Means to select...

• The way in which the AAC user selects or identifies items from the selection set
  
  – Direct selection
  
  – Scanning
Means to transmit…

• Low technology
• High technology
Where can AAC be used?

• Everywhere!
  – School
  – Home
  – Work
  – Recreational leisure activities
  – Out in the community
Literacy skills and AAC

• “Because it is generally inappropriate to make assumptions about a young child’s future reading, writing and spelling potentials, it is important to include literacy activities from a young age”

(Beukelman & Mirenda, 1992)
Literacy skills and AAC

• In Patty King DeBaun states:
  – “Teach core words that are selected for their strong literacy and communicative base. Students learn how to identify words, read them, and use them to spell other words.”
Literacy activities should include:

• Reading and storytelling
• Writing and drawing
• Computer interventions
How to facilitate use of AAC during story reading?

- Symbols to adapt their own books
- Device overlay or communication board to use during book reading at home
- Program communication device with messages related to book reading
- Provide communication boards for literacy-enhancing activities such as: visiting the Library and checking out books, reading recipes and cooking, story-related art activities
How to support AAC users

- Routines and adaptive play
- Collaborative planning: family members, educators, school principles, support personnel, classmates
- Communicative temptations entice learner to emit signals
- Use milieu teaching strategies to elicit communication
- Limit your verbal communication
- Teach how to respond to communication breakdown.
- Reinforce!
- Offer opportunities to practice. Practice, practice!!!!

(Beukelman & Mirenda, 1998)
Why use AAC…

• Allows individuals with limited or no speech capabilities the opportunity to interact with others in a variety of settings

• General simplification of input
• Response production advantages
• Stimulus processing advantages
• Symbolic representation advantages