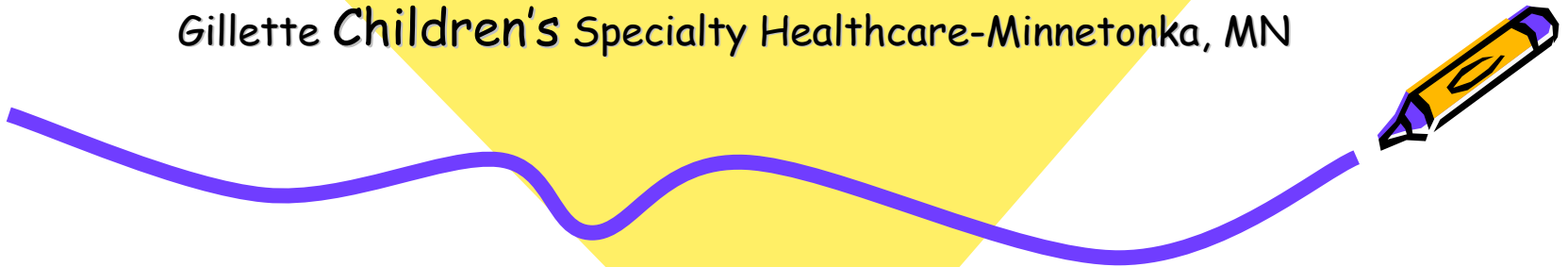




# Auditory Neuropathy/Dysynchrony

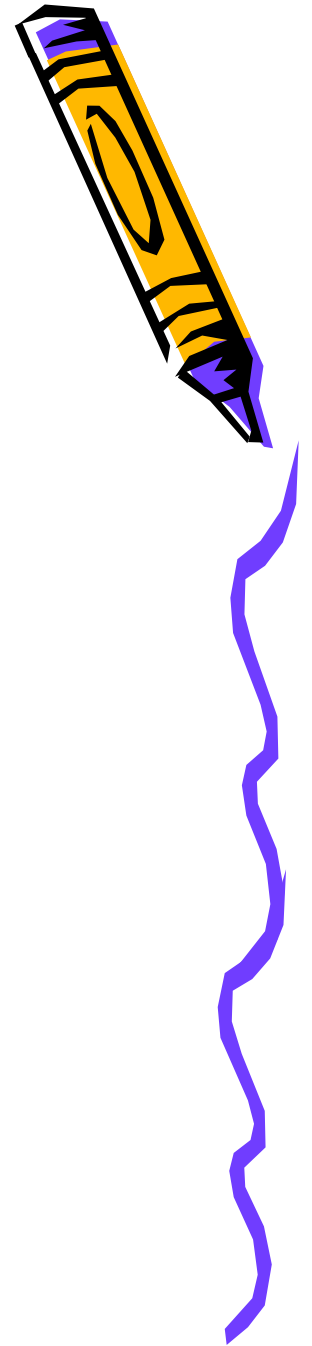
Laura Nyhus, MS CCC-SLP

Gillette Children's Specialty Healthcare-Minnetonka, MN



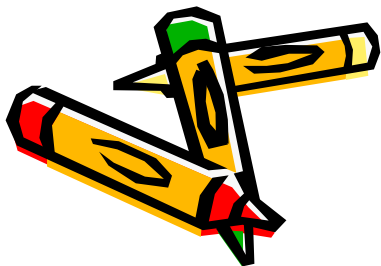
# AN and Communication

- 1) Early intervention
- 2) Speech Language Considerations
- 3) Awareness of Sound
- 4) Communication Systems
- 5) Communication Modalities



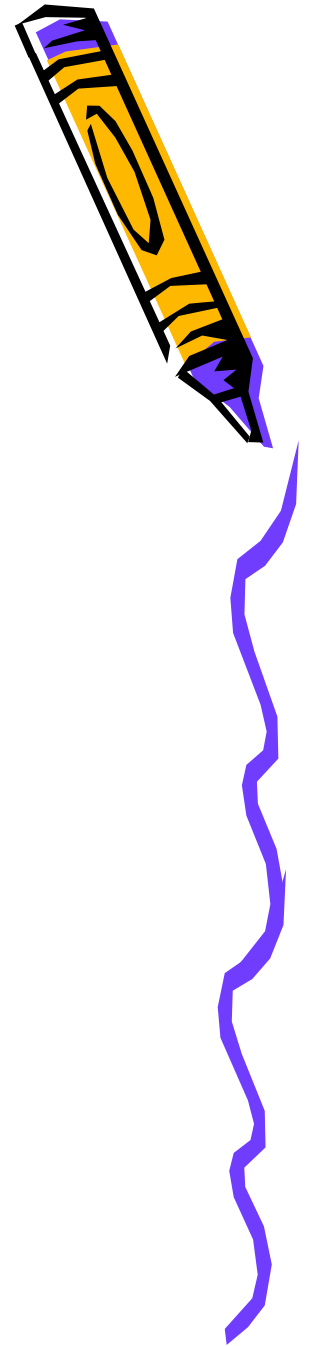
# Early Intervention

- Infants and children with Auditory Neuropathy will need consistent early intervention.
- It is important to seek out specialists who are familiar with children who have hearing loss and if possible, children who have AN.
- Team members may include
  - Audiologist
  - ENT
  - SLP
  - Neurologist
  - Teacher
  - Parent Advisor



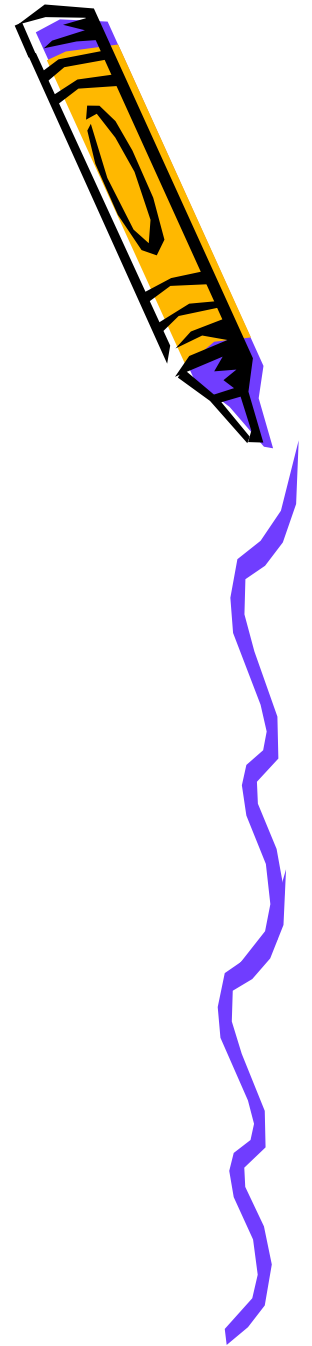
# Remember...

- **YOU** are a member of the team!
- **YOU** know your child best!



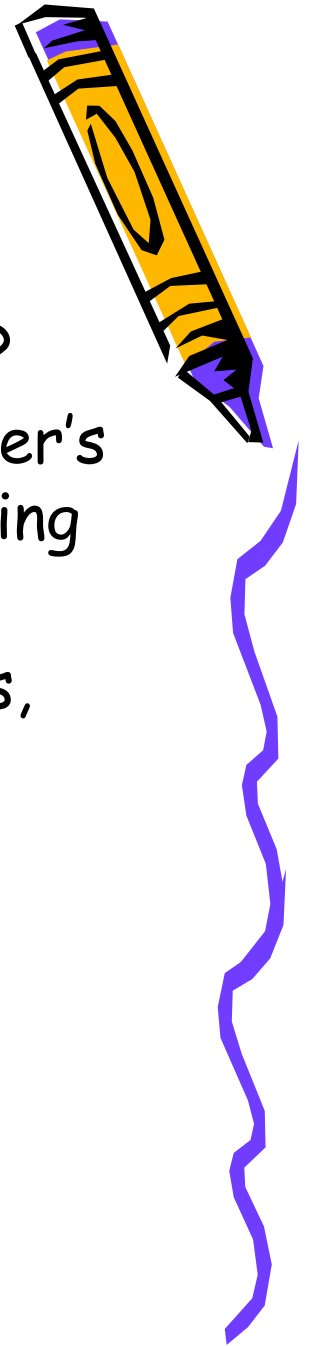
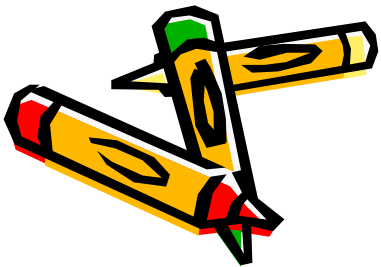
# Speech & Language Considerations

- Meeting developmental milestones for communication
  - Gesture
  - Interaction/Attachment
  - Pragmatics
  - Play
  - Language Comprehension
  - Language Expression



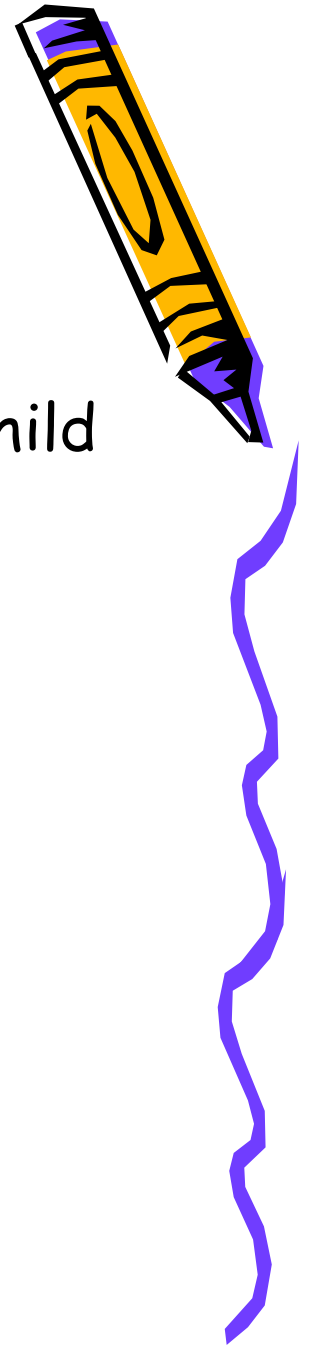
# Awareness of Sound

- Does the child consistently respond to sounds?
  - E.g. Everyday sounds such as a family member's voice, telephone ringing, music playing, barking dog.
  - If the child is responding to everyday sounds, was there a visual cue or was it the sound alone?
  - If the child does respond, does he/she do so consistently?
  - Are the sounds loud or soft?



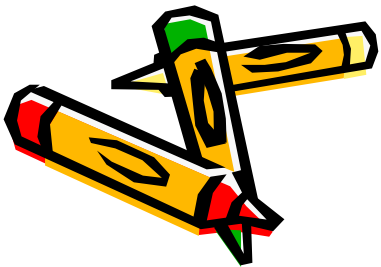
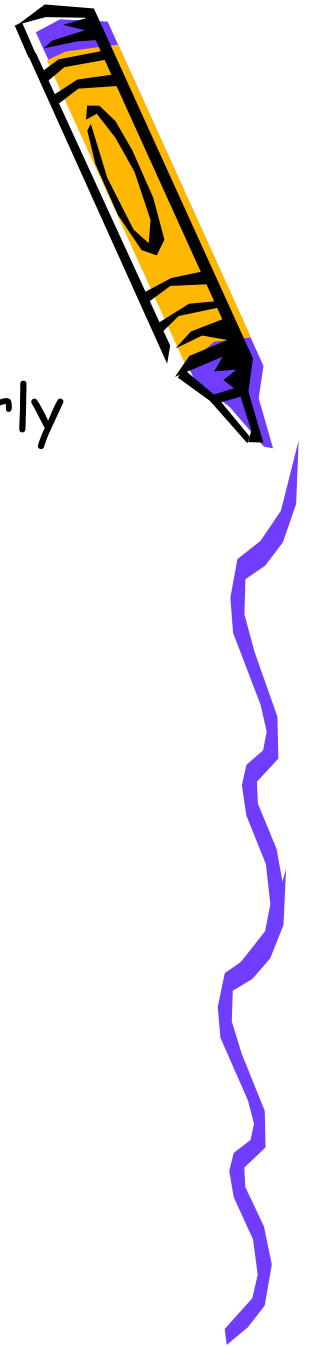
# Developing Awareness of Sound

- Try to be more aware of when and how your child responds to sound.
- This will be useful to the speech pathologist, audiologist, teachers, and others who may be working with the child.



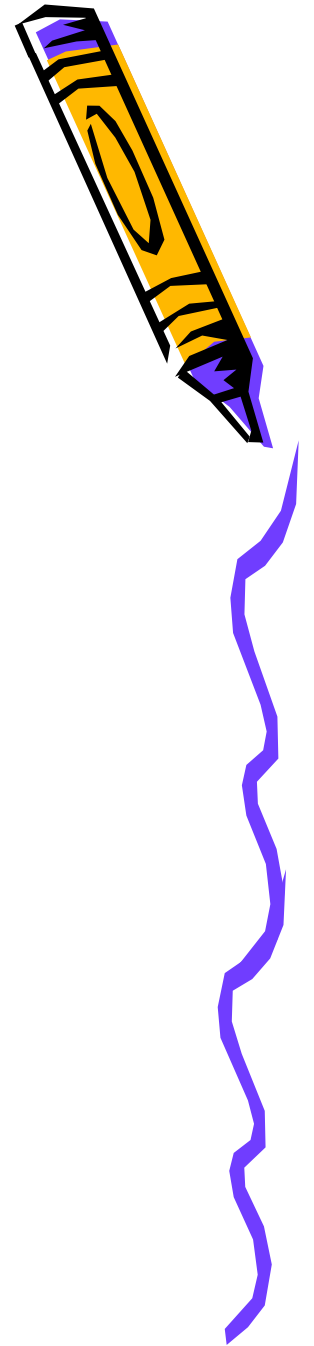
# Communication Systems

- Many researchers agree that a visual communication system should be included in early programming for children diagnosed with AN (Hood, 1998; Simmons & Beauchaine, 2000).
- Some people, however, believe visual communication may be a negative influence to speech development if speech is the desired outcome.
- Choosing a communication system can be controversial and is highly individual.



# Communication Modalities

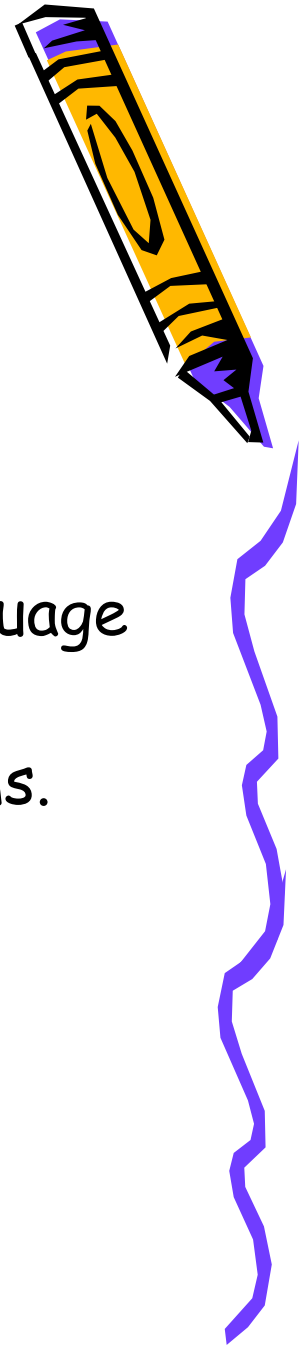
- Auditory Oral
- Auditory Verbal
- Cued Speech
- Total Communication
- American Sign Language (ASL)



# Communication Modalities cont...

- Auditory-Oral

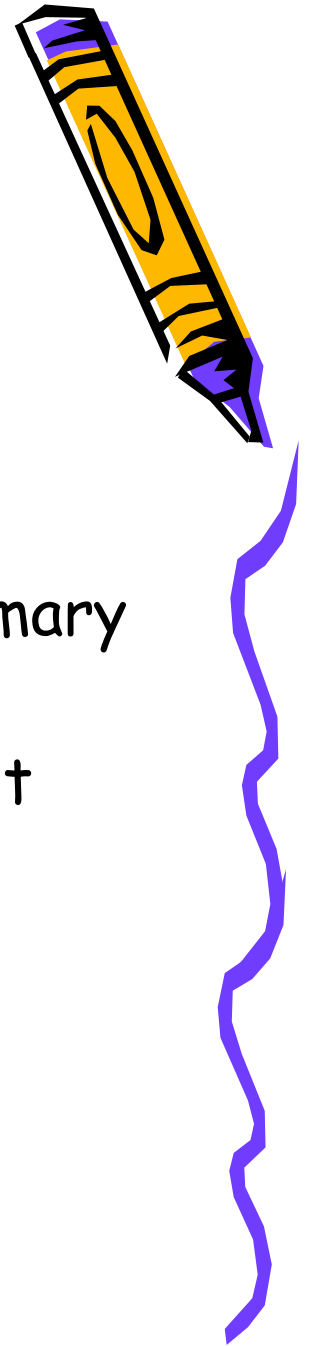
- Focuses on the development of spoken language through listening and speechreading.
- Children wear hearing aids &/or FM systems.
- Sign language is not used.



# Communication Modalities cont...

- Auditory-Verbal

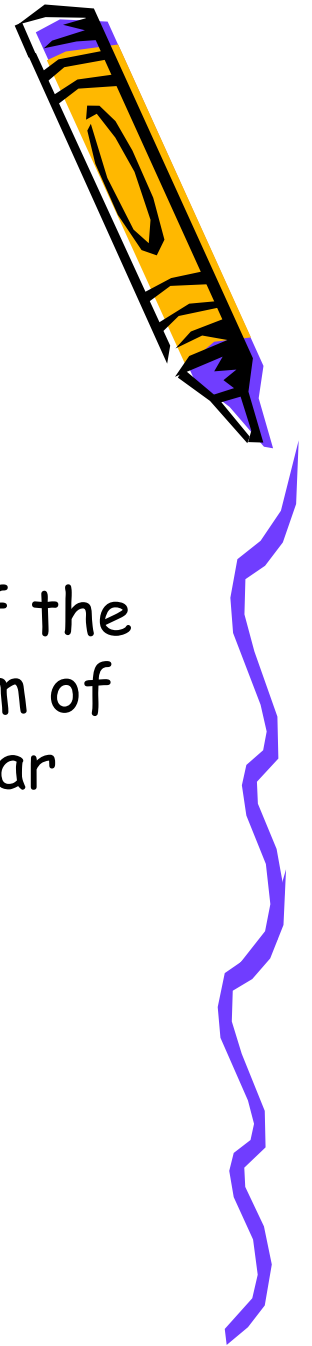
- Emphasizes use of residual hearing and primary means of developing spoken language
- Visual cues (lipreading and gestures) are not encouraged.
- Usually clinically-based



# Communication Modalities cont...

- Cued Speech

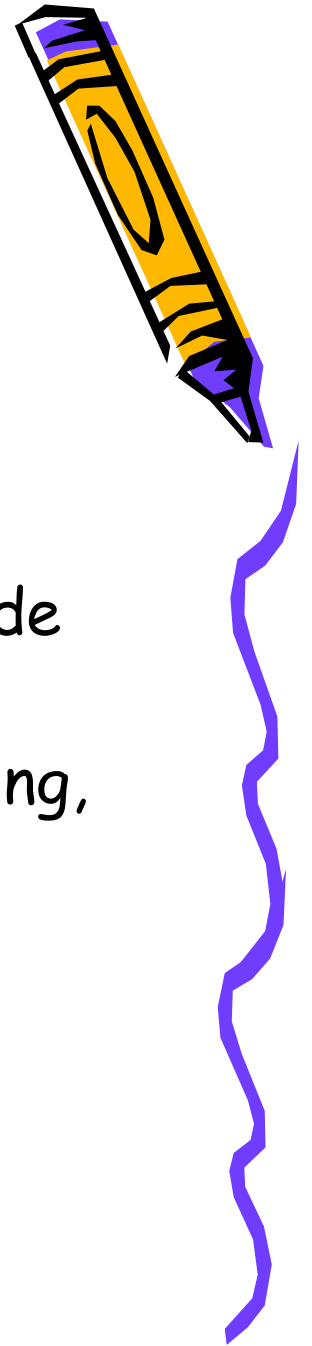
- Provides visual clarification of lipreading of the sounds of spoken language through a system of eight handshapes made in four locations near the face.



# Communication Modalities cont...

- Total Communication

- Based on spoken language that utilizes a wide range of communication strategies
- Can include sign language, lipreading, listening, spoken language



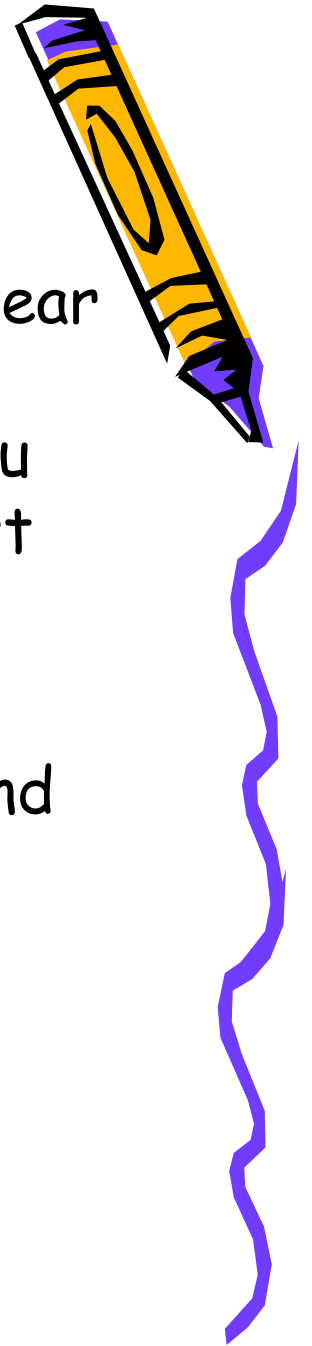
# Communication Modalities cont...

- American Sign Language
  - Completely visual
  - Language of the Deaf Culture and is considered the "natural language of the Deaf"
  - ASL is taught at the first language and English is taught as a second language.



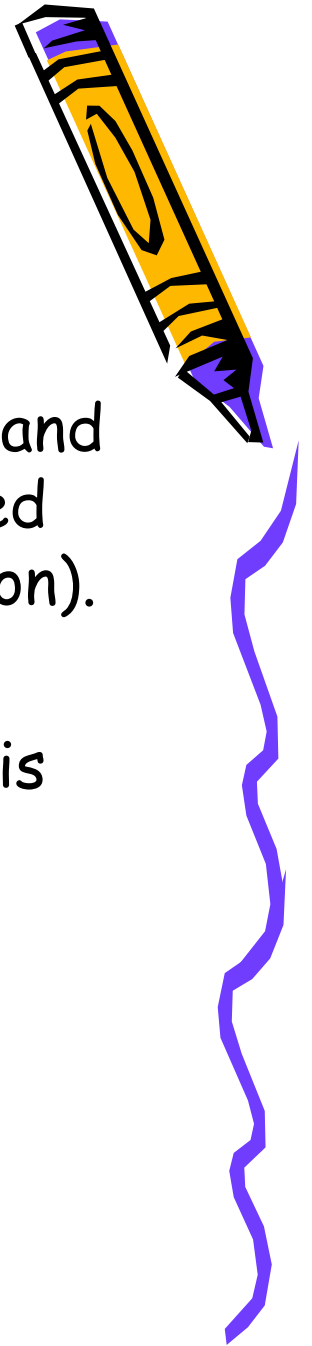
# Ideas

- If your child wears amplification or has a cochlear implant, notice any differences in auditory behavior and write down your observations. You can share this information with your Audiologist and SLP.
- Does your child respond differently in noise (and in different types of noise?) Jot down any changes you may notice.

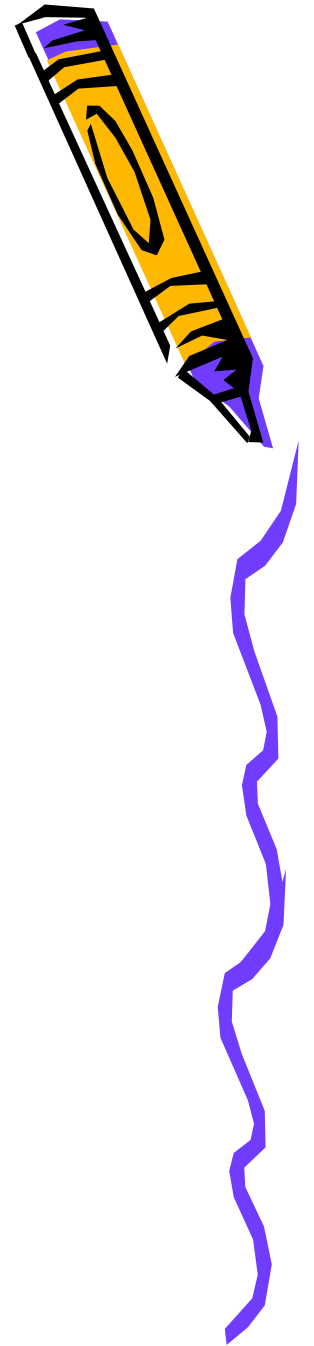


# Ideas cont...

- Try and develop a greater awareness of when and how your child responds to sound (e.g. repeated ma-ma-ma, turned head to radio when turned on).
- Be sure to keep copies of all assessments. This can be helpful to document changes.



# Questions?



Note: Reference page available upon request.

