Objectives:

1. The participant will be able to combine speech with tactile, visual, auditory, olfactory, gustatory and proprioceptive senses to increase receptive and expressive communication skills.
2. The participant will be able to modify curricular activities to incorporate the senses to increase communication.
3. The participant will be able to compare & contrast the various sensory communication components to determine best strategies for communicating new information.
4. The participant will be able to describe ways in which use of the senses can assist students’ communication skills in a variety of settings.

Revised Quote with Sensory Communication Slant:

"For persons with communication issues, there may be limits to the intelligibility and/or comprehension of speech, and visible behaviours such as gesture, gaze or facial expressions may not be perceived. Furthermore, these natural communication behaviours are fleeting and do not persist over time. Given these limitations, we must make use of all of the senses, if we are to communicate effectively with others."

Jessie Moreau's adaptation of the paragraph from "Theories and Methods in Mediated Communication"; http://dis.shef.ac.uk/stevewhittaker/CMC-review02.pdf

Multi-Sensory Communication: Who Benefits? Individuals...

- ... with speech impairments
- ... with hearing impairments
- ... with auditory processing disorders
- ... with cognitive impairments
- ... with visual impairments
- ... on the autism spectrum
- ... with physical impairments
- ... with multiple impairments...

...ALL INDIVIDUALS!
**Multi-Sensory Communication**

- **Receptive Communication**
  - requires hundreds of hours of language input
  - must be modeled for the learner
  - all senses need to be considered

- **Expressive Communication**
  - there is something to say about EVERYTHING
  - must have access to appropriate and individualized communication mode
  - more than one sense can be used simultaneously

**Stop More To Hearken The Senses**

(Smell, Move, Taste, Hear, Touch, See)


**Multi-Sensory Communication: Receptive**

- Auditory
  - Natural speech
  - Environmental sounds
  - Nature’s sounds
  - Audio files
  - Music
  - Sound effects

**Multi-Sensory Communication: Expressive**

- Speech
  - Natural voice output
  - Record speech
  - Use microphone

**Multi-Sensory Communication: Expressive**

- Augmented Speech
  - AAC with voice output (VOCA)
Multi-Sensory Communication:

---

**Expressive**

"I asked Connor, 'Who do you love? Who is your Valentine?' This is what he typed on his device: 'Eliza I love you.'

Contributed by Melanie Abad, Gwinnett County Public Schools

---

**Receptive**

- Visual
  - Viewing world around us
  - Facial expressions
  - Body language
  - Gestures
  - Sign language
  - Objects

---

**Expressive**

- Visual
  - Facial Expressions
  - Eye gaze
  - Gestures
  - Sign language

---

**Receptive**

- Visual
  - Tactilized pictures
  - Pictures
  - Symbols (iconic text)
  - Logos
  - Text
  - AAC

---

**Communication Strategies**

- Use of sign language
  - Use signs acceptable to the Deaf community (ASL, fingerspelling, pidgin English signs)
  - Online ASL resource for learning/reviewing signs: http://www.aslpro.com/cgi-bin/aslpro/aslpro.cgi

---

**Communication Strategies**

- Use of sign language
  - Signing Time Series:
    - Uses auditory, visual & proprioceptive senses
    - Students work on speech through use of the music
Multi-Sensory Communication: Expressive

- Visual
  - Written / Typed
  - Pictures
  - Symbols (iconic text)
  - Logos
  - AAC

Communication Strategies

- Visually represent a difficult concept

Which number is smallest?
Which number is largest?

Communication Strategies

- Use of picture symbols / iconic text
  - Avoid symbols for small words, e.g., it, the, am, etc. Students should learn to read most frequently used words.
  - Students generally can understand a variety of symbol sets.

Communication Strategies

- Use of photographs
  - Find clear photos through internet browser, e.g., Google Images
  - Keep in mind Educational Fair Use policies

Communication Strategies

- Use of photographs
  - Use pictures with clear/simple backgrounds (eliminates figure/ground problems)
**Communication Strategies**
- **Graphics / drawings / logos**
  - Can edit/revise with Microsoft Paint or other editing software
  - Find via PowerPoint Clip Art; internet, e.g. Google Images
  - Animate graphics to communicate specific concepts

**Multi-Sensory Communication: Receptive**
- **Olfactory**
  - One of the strongest senses
  - Elicits memories
  - Be cautious with scents as may trigger seizures/allergies

**Communication Strategies**
- **Gustatory**
  - Following picture recipes
  - Using AAC to read recipe

**Communication Strategies**
- **When creating materials**
  - Limit number of pictures per page
  - Keep illustrations as simple as possible

**Multi-Sensory Communication: Receptive**
- **Gustatory**
  - Taste food items
  - Touch to tongue
  - AAC including food items

**Communication Strategies**
- **Food items used for concept development**
**Multi-Sensory Communication: Expressive**

- Proprioceptive
  - Music & Movement
  - Motions for Curricular Concepts
  - Sign Language

**Multi-Sensory Communication: Receptive**

- Tactile
  - Touch
  - Touch cues (formal/informal)
  - Temperature
  - Environmental factors e.g., wind, rain, wet

**Tactile Communication Strategies**

- Air Movement & Temperature
  - Use foam blade fans to demonstrate wind
  - Use blow dryer to show hard wind, warmth
  - Use ice to indicate cold

**Multi-Sensory Communication: Receptive**

- Tactile
  - Objects
  - Partial objects
  - Tactilized pictures
  - AAC

**Communication Strategies**

- Tactilized Picture Symbols
  - Enlarge for ease in adding tactile items
  - Cut around the picture with ¼” white border
  - Print on cardstock when possible; laminate
  - Add tactile items with Velcro®, hot glue, tie on
**Multi-Sensory Communication: Expressive**

- **Tactile**
  - Braille
  - Tactile signing
  - Objects/partial objects
  - Tactilized pictures

**Multi-Sensory Communication: Expressive**

- **Tactile**
  - AAC devices

---

Teaching science information through use of tactilized picture sets, AAC device and tactilized "table/chart"