Balancing Presumed Competence with Appropriate AAC System and Goal Selection

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Learning objectives

• **Objective 1:** Identify 3 limitations to presuming competence (PC) without consideration for an individual’s current abilities and zone of proximal development.

• **Objective 2:** Define stimulability and the zone of proximal development as they relate to the AAC system selection and goal development.

• **Objective 3:** Identify 2 tools that provide data to aid in goal development within the zone of proximal development.
Disclosures

- Speakers have no financial or non-financial relationships to disclose.

Boston Children’s Hospital
Augmentative Communication Program

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Why this topic?

• Experiences in our practice: system abandonment or mis-match

• Increasingly consumer-accessible SGD market (Gosnell, Costello, & Shane 2011)

• Increasing prevalence of recommendations being posted to social media sites

Why this topic?

• Investigate the origins and efficacy of presumed competence
  ▫ “The recent adoption of PC [presumed competence] and returning popularity of FC [facilitated communication] does not appear to be coincidental” (pg. 372, Travers and Ayres, 2015)

• Concern for growing popularity of an intervention strategy without knowledge of its efficacy

• Commitment to evidence-based practice and upholding ASHA’s code of ethics
“Presumed competence” (PC)

- **Presume:**
  - Suppose that something is the case on the basis of probability. (Oxford dictionary)
  - To believe something to be true because it is likely, although not certain (Dictionary.com)

- **Competence:**
  - The ability to do something successfully or efficiently. (Oxford dictionary)
  - Linguistics: A person's subconscious knowledge of the rules governing the formation of speech in their first language. (Oxford dictionary)

Presume competence- contemporary

- “Start by presuming that your client is a learner on his/her way to developing competence. Good intervention, consistent language models, the right tools, and plenty of practice will move them along the journey toward improved communication. It’s important that, as clinicians, we truly believe that. Yes, your clients may be impaired, perhaps significantly so, but they will certainly know if you don’t believe in their abilities. *Presume competence.*”

  - Carole Zangari, Ph.D., CCC-SLP
  
  http://praacticalaalc.org/strategy/strategy-of-the-month-engaging-the-learner/
Presumed Competence- contemporary

“Because we just don’t know the person’s skills or potential, we make the least dangerous assumption and presume competence. This does not mean, however, that we must presume that the person is already fully literate with age-appropriate receptive and expressive language skills. It means we don’t and can’t know what that person’s potential is until we provide him or her with accessible tools, and the training needed to use those tools. Everyone can learn and grow, given appropriate training and tools. This doesn’t mean that everyone can learn everything. Everyone has potential, but the proper AAC system and instruction are needed before that potential can be revealed and realized.”

- Everyone can learn: Presuming competence on vocabulary design, Jennifer Marden (AssistiveWare Blog post)
  http://www.assistiveware.com/everyone-can-learn-presuming-competence-vocabulary-design

Historical perspectives on disability

- Late 1970s - early 1990s
- IQ scores as a measure of ability
- Mass institutionalization (Travers and Ayers, 2015)
- Proof before progress (candidacy model)
Presumed competence- origins

• The Criterion of the Least Dangerous Assumption (Donnellan, 1984)
  ▫ “In the absence of conclusive data, educational decisions should be based on the assumptions which, if incorrect, will have the least dangerous effect on the student.” (p. 142)

• “Communication Unbound: Autism and Praxis” (Biklen, 1990)
  ▫ “Attitudinal Dimensions of Facilitated Communication […] 6. Assume the person’s competence”
  ▫ “Biklen was the first to suggest that practitioners and leaders presume competence in his endorsement of and guide to facilitated communication (FC).” (Travers & Ayers, 2015)
Presumed competence- origins

- “In its simplest articulation, presuming competence means that the outsider regards the person labeled autistic as a thinking, feeling person”
  - (Biklen (2005) as cited in Travers and Ayers (2015))

- Biklen (2006) article Presuming Competence, discusses “…the importance of presuming competence of students with disabilities, as for all students, and the link between this concept (presuming competence) and inclusive education.”

Evidence for PC

- There are no published experimental studies of PC in the professional literature.

- No empirical evidence for the efficacy of presuming competence, nor that it ensures the dignity of individuals with disabilities.

(Travers & Ayres, 2015)
Related evidence

• Studies have shown that the beliefs held by teachers regarding their students’ abilities to learn to communicate more effectively, is the strongest influence in their willingness to implement AAC. (Soto, 1997)

• Historical studies (Smith-Lewis and Ford, 1987 and Huer and Lloyd, 1990) cite perceived negative attitudes of professionals towards people with disabilities that decreased communication opportunities as major factor mentioned by AAC users.

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Limitations of PC

False dichotomy

- Thinking critically about PC does not mean that we aim to *presume incompetence*

- Travers and Ayres (2015) note that there is a “false dichotomy that failing to embrace PC means non-subscribers must believe students are inherently and therefore eternally incompetent” (pg. 373)
Limitations of PC
AAC system selection

- Importance of feature matching
- Opportunities that are mismatched or a poor fit are missed opportunities
- When PC is NOT the “least dangerous assumption”

Limitations of PC
AAC system selection

- Slow rate of progress
- Underestimation of skills due to mismatched system
- Missed time and opportunities
- Total system abandonment
AAC System Abandonment

- AAC system abandonment occurs in approximately ⅓ of cases (Zangari & Kangas, 1997).

- System abandonment due to a variety of factors including (Johnson, J., Inglebret, E., Jones, C., & Ray, J. (2006):
  - Vocab/messages do not meet daily living needs
  - System too difficult or too simple
  - User’s cognitive abilities are over or underestimated
  - System is not modified in relation to the user’s progress or deterioration in communication
  - Mismatch between expectations and the user’s actual ability.

- “When a person who used AAC experienced success with the system and when that user and his or her communication partner highly valued the system, this resulted in success more than 90% of the time.” (Johnson et al, 2006)

Striking a balance
Striking a balance

- Many positive elements to the way many people in our field are using this term.
- However, we must acknowledge the wide range of skills and abilities of individuals with CCN and match a system that meets her/his individual needs.
- False dichotomy—“That a failure to embrace PC means embracing a position that the person is incompetent” (Travers & Ayres, 2015)

Evidence-Based Practice

- “It is the position of the American Speech Language Hearing Association that audiologists and speech-language pathologists incorporate the principles of evidence-based practice in clinical decision making to provide high quality clinical care. The term evidence-based practice refers to an approach in which current, high-quality research evidence is integrated with practitioner expertise and client preferences and values into the process of making clinical decisions.”
Evidence-Based Practice

Image retrieved from: https://www.asha.org/Research/EBP/.

Evidence-based practice
Thoughtful system selection

Dynamic assessment
Evidence-based trials
Evidence-based practice
Dynamic assessment considerations

- Gather information about all domains of assessment (motor, cognitive/linguistic, sensory, literacy, etc.)
- Feature matching (Shane & Costello, 1994)
- Stimulability testing
- Adapting and re-assessing over time
  - “In the broadest sense, the goals of augmentative and alternative communication (AAC) interventions are 1) to assist individuals who rely on AAC to meet their current communication needs and 2) to prepare them to meet their future communication needs.” (Beukelman & Mirenda, 2005)

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Stimulability

- Term generally used in speech sound assessment and choosing treatment objectives.
  - “Stimulability assessment seeks to determine whether production of an erred sound is enhanced when elicitation conditions are modified (i.e., simplified)” - (Powell, 2003)

- Assess during evaluations and ongoing trials/dynamic assessment
  - e.g.: symbolic understanding, linguistic complexity, navigation skills, etc

Zone of Proximal Development (ZPD)

- Things the learner can do independently
- Zone of Proximal Development- Learner can achieve with help
- Things the learner can not yet do

Vygotsky (1978)
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Evidence-based practice

**Dynamic Assessment: Assessment tools**

- **Formal assessment tools (examples)**
  - *Dynamic AAC Goals Grid 2 (DAAG-2)*
  - *Communication Matrix*
  - Functional Communication Profile-Revised
  - Augmentative & Alternative Communication Profile: A Continuum of Learning
  - Test of Aided-Communication Symbol Performance (TASP)
  - AAC Evaluation Genie
Trials

- Trial periods are critical for determining the effectiveness of a selected AAC strategy/tool.
- Component of evidence-based practice
Trial data collection

*General Guidelines:*

- Provide the individual with **ample opportunity to explore** the vocabulary within the device.

- **Model the language on the device** by using the device as you talk.

- **Choose activities that are fun and motivating.**

- Support use of the device for **many pragmatic functions.**

- Avoid frequently ‘testing.’

- Use a prompting hierarchy.

### Trial data collection: Planning

<table>
<thead>
<tr>
<th>Activity</th>
<th>Language goals</th>
<th>Support</th>
</tr>
</thead>
<tbody>
<tr>
<td>Example:</td>
<td></td>
<td>Example: Teacher’s assistant will provide initial model</td>
</tr>
<tr>
<td>- music</td>
<td></td>
<td>- Parent will help child navigate to page of school activities, ask multiple choice questions, and prompt as needed</td>
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<tr>
<td>- snack time</td>
<td></td>
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<tr>
<td>- after school</td>
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</table>
## Trial data collection

### Trial Summary

<table>
<thead>
<tr>
<th>Pre-trial</th>
<th>Using device (at the end of the trial)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Gender</strong></td>
<td><strong>Gender</strong></td>
</tr>
<tr>
<td>Generally uses 1 2 3 4+ word phrases (may include all modes of communication, speech, signs, devices, pictures, etc.)</td>
<td>Generally uses 1 2 3 4+ word phrases (may include all modes of communication, speech, signs, devices, pictures, etc.)</td>
</tr>
<tr>
<td>Communication for the following functions:</td>
<td>Communication for the following functions:</td>
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<tr>
<td>- Requesting</td>
<td>- Requesting</td>
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<tr>
<td>- Asking questions</td>
<td>- Asking questions</td>
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<tr>
<td>- Commenting</td>
<td>- Commenting</td>
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<tr>
<td>- Directing activities</td>
<td>- Directing activities</td>
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<td>- Providing information/answering questions</td>
<td>- Providing information/answering questions</td>
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<tr>
<td>- Managing attention</td>
<td>- Managing attention</td>
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<tr>
<td>- Conversation</td>
<td>- Conversation</td>
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<tr>
<td>- Other:</td>
<td>- Other:</td>
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<tr>
<td><strong>Communication about:</strong></td>
<td><strong>Communication about:</strong></td>
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<tr>
<td>- Things/activities within the physical environment</td>
<td>- Things/activities within the physical environment</td>
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<td>- Events in the past</td>
<td>- Events in the past</td>
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<tr>
<td>- Events in the future</td>
<td>- Events in the future</td>
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</tbody>
</table>

### Use the following parts of speech:

- Nouns
- Verbs
- Adjectives
- Prepositions
- Other:

Does the child?

- Seek out the device?
- Turn it on by independence?
- Use "operational buttons" such as play, go back, home, etc.
- Attend to others when using the device? (i.e., shift attention between the device and communication partner)?
- Access the device easily and with accuracy?

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### Data/Time Activity/Trial the device was used in: Level of Prompting Interactions observed Number of Times it was observed (fally) Examples:

**EXAMPLE:**

<table>
<thead>
<tr>
<th>Date/Time</th>
<th>Activity/Trial the device was used in</th>
<th>Level of Prompting</th>
<th>Interactions observed</th>
<th>Number of Times it was observed (fally)</th>
<th>Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>2/16 @ 6:30 Morning meeting</td>
<td>Independent Minimal Moderate Maximum</td>
<td>Initiating Uncommenting Requesting Responding to a question Directing Sharing information</td>
<td>I</td>
<td>&quot;The weather is sunny!&quot;</td>
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<tr>
<td></td>
<td>Independent Minimal Moderate Maximum</td>
<td>Initiating Uncommenting Requesting Responding to a question Directing Sharing information</td>
<td>III</td>
<td>&quot;This weekend I went to Grammy's!&quot;</td>
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<td>Independent Minimal Moderate Maximum</td>
<td>Initiating Uncommenting Requesting Responding to a question Directing Sharing information</td>
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Created by Jessica Caron, Ph.D., CCC-SLP

2013
Trial data collection - Realize Language

Week ending January 13, 2018

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<th>Mon 01/08</th>
<th>Tue 01/09</th>
<th>Wed 01/10</th>
<th>Thu 01/11</th>
<th>Fri 01/12</th>
<th>Sat 01/13</th>
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</tbody>
</table>

Parts of Speech

- Noun: 121
- Verb: 10
- Adjective: 56
- Determiner: 51
- Preposition: 28
- Pronoun: 26
- Adverb: 16
- Other: 12
- Phrasal: 1
- Conjunction: 10
- Interjection: 1
- Question: 1

Try and read the text.
Short term goal development

- Base goals on ZPD and stimulability testing
- Consider goals in all areas of AAC competence
- Consult objective data (e.g., DAGG-2, Communication Matrix, other formal testing measures)
SGD tools that support current ability and long-term growth potential

- Hidden buttons features
- Progressive vocabulary sets (Progressive language in Proloquo2Go, Vocabulary Builder in PRC Unity)
- Multi-level vocabulary sets (e.g., WordPower, Proloquo2Go Crescendo, Snap + Core First)

Hidden buttons: TouchChat HD with WordPower

User interface

Hide mode
Hidden buttons:
Tobii DynaVox Snap + Core First

Progressive vocabulary sets:
Proloquo2Go
Progressive vocabulary set:
Vocabulary Builder/Masking (PRC)

Multi-level vocabulary sets:
WordPower
Multi-level vocabulary sets: Snap + Core First

Multi-level vocabulary sets: Proloquo2Go Crescendo
Multi-level vocabulary sets: PODD

Image retrieved from: https://cpec.org.au/store/podd/

Multi-level vocabulary sets: CoreScanner (PRC)
Summary points

• The phrase “presumed competence” has pseudoscientific origins.

• Some contemporary use encourages frequent opportunities and high expectations.

• Limitations of presuming competence without evidence may include system mismatch, system abandonment, and missed opportunities/time.

Summary points

• Thoughtful/evidence-based system selection is necessary to reveal each individual’s potential.

• Assessment should include stimulability testing to determine the zone of proximal development and guide goal development.

• Many tools exist to aid in assessment, data collection, and goal development.
“The only presumptions required are individual worth, dignity, and a right to effective interventions and supports.”

-Travers & Ayres, 2015

Questions?
References


Thank you for attending!

• CEUs: Session Code: AAC-31
  ▫ More info at: https://www.atia.org/conference/education-program/ceus/
  ▫ Visit the information desk for more information on CEUs. ASHA and ACVREP forms must be submitted before departing the conference. AOTA and IACET forms can be submitted online.
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  ▫ Handouts are available at: http://s3.goeshow.com/atia/orlando/2018/handouts.cfm
  ▫ Handout link remains live for 3 months after the conference ends.
Thank you for attending!

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