What is Aphasia?

According to the National Aphasia Association:

- The most common cause of aphasia is stroke (about 25-40% of stroke survivors acquire aphasia). It can also result from head injury, brain tumor or other neurological causes.
- Aphasia affects about two million Americans and is more common than Parkinson's Disease, cerebral palsy or muscular dystrophy. Nearly 180,000 Americans acquire the disorder each year. However, most people have never heard of it.
- While aphasia is most common among older people, it can occur in people of all ages, races, nationalities and genders.
Types of Aphasia

- Expressive Aphasia/Broca’s Aphasia
- Receptive Aphasia/Wernicke’s Aphasia
- Conduction Aphasia
- Global Aphasia
- Anomic Aphasia
- Primary Progressive Aphasia

Broca’s Aphasia

- Speech: Non-fluent and short
- Comprehension: Good

Wernicke’s Aphasia

- Speech: Fluent
- Comprehension: Poor
Conduction Aphasia

Speech: Relatively unimpaired but many errors
Comprehension: Good

Global Aphasia

• Speech: Non-fluent
• Comprehension: Poor

Anomic Aphasia

• Speech: Fluent but with circumlocutions
• Comprehension: Good
Primary Progressive Aphasia

• Speech: Fluent → Non-fluent
• Comprehension: Good → Poor

Aphasia Tests

• Mississippi Aphasia Screening Test (MAST)
• Brisbane Evidenced-Based Language Test (EBLT)
• Mt. Wilga High Level Language Test
• Western Aphasia Battery
• Boston Diagnostic Aphasia Examination

Receptive Aphasia
Receptive Aphasia Treatment Techniques

Incremental Approach

Context-Based Approach
Tips for Establishing Communication

- Use gestures
- Write down key words
- Keep things concrete and immediate
- Slow your rate of speech
- Eye contact

Expressive Aphasia

Expressive Language Treatment Techniques
Verb Network Strength Training (VNeST)

- Participants
- Dosage
- Transitive Verbs

VNeST

Materials Needed

- Pen and Paper
- Index Cards
- Whiteboard
Step One

1. Set down cards with the words "who" and "what" written on them or write on whiteboard or paper.
2. Point to each card and tell the participant that these cards say "who" and "what".
3. Place the card with the verb written on it between the "who" and "what" cards and ask "Who can/might (verb) something/someone?"
4. Facilitate creation of 3-4 pairs of agents/patients for the verb.

If the patient is unable to come up with anything provide semantically/contextual cues.

If the patient is still unable to provide a response provide cards with foils.

Foils

1. Provide one correct response with three foils.
2. Give the cards (or write on whiteboard and show incrementally) to the patient and have the patient read them. Discard those that are not good agents/patients.
3. If they cannot read independently, read them together. They will improve!
4. Do not lay them all out for them to choose from.
**Step Two**

1. Instruct the participant to read each agent-verb-patient triad aloud.
2. Move the card with the verb on it down for each triad, so that the words form a subject-verb-object order.
3. If the participant cannot read independently, do choral reading (read together) or have the participant repeat each word. Point to each word during choral reading or repetition.

**Step Three**

1. Ask the participant to choose one scenario that they would like to discuss in more detail.
2. Move the cards that correspond to the scenario that the participant has chosen away from the other responses.
3. Lay the where, why, and when cards down one at a time, and with each one, ask the corresponding wh-question.
4. Provide cueing as needed.
5. Once all the responses have been laid down, the participant should read them aloud.

**Step Three Example**

<table>
<thead>
<tr>
<th>Louise</th>
<th>drive</th>
<th>Mustang</th>
</tr>
</thead>
<tbody>
<tr>
<td>WHERE</td>
<td>to the store</td>
<td></td>
</tr>
<tr>
<td>WHY</td>
<td>to get groceries</td>
<td></td>
</tr>
<tr>
<td>WHEN</td>
<td>once a week</td>
<td></td>
</tr>
</tbody>
</table>
Step Four

Remove all the cards from the table.
Tell the participant that they will hear a number of sentences. Do not give the cards back until after the participant has given a response to the sentences. If the participant makes a mistake or does not respond, you may continue to give them the cards.

A total of 12 sentences, of 3 categories, are read.

Step Five

The participant is asked what verb/action they have been working on.

If the participant is not able to state the verb when prompted, then cue them/help them think about everything they have been talking about.

If this does not work, provide the card with the verb for them to read aloud.

Step Six

Step 1 is repeated, but no cues are given.
Step Seven

- After completion of all steps for one verb, move to another verb.
- We train 10 verbs.
- Once we train all 10 verbs, we cycle through them again.
- It is ideal to get through all 10 verbs in one week, if possible.
- Always try to end each verb on a positive note!

Copy and Recall Treatment

Specific Expressive Difficulties and Treatment
Semantics / Semantic Aphasia

• Meaning of a word, a phrase or a sentence.
• For example:

Animal
Lives in Zoo
Has Trunk

Semantic Feature Stimulation

Semantics Example

• Let's use the word cat to explain what the semantic features of a word may be:
  A) What category does it belong to? animal; mammal; pet
  B) What are its physical features? ears; tail; whiskers; fur
  C) What are its functions? Companionship; pest control
  D) What are its actions/verbs? purrs; jumps; meows; chases
  E) Where might you find it? House; apartment; farm
Lexical Aphasia

Reverse Semantic Feature Analysis

- Therapist lists the features
- The person with aphasia gives the target item

For example:
- occupation
- person
- school
- educates
- = teacher

Phonology / Phonological Aphasia
Increasing Syllables

- But
- Butter
- Butterfly
- Sock
- Soccer
- Soccer ball

Syntax / Syntactical Aphasia

Conjugation Treatment Module

- Conjugate Pronoun + verb:
  - I eat.
  - You eat.
  - He eats.
  - She eats.
  - It eats.
  - We eat.
  - They eat.
Conjugation Treatment Module

- Add an object:
  - I eat food.
  - You eat food.
  - He eats food.
  - She eats food.
  - It eats food.
  - We eat food.
  - You eat food.
  - They eat food.

Conjugation Treatment Module

- Add possessives:
  - I eat my food.
  - You eat your food.
  - He eats his food.
  - She eats her food.
  - It eats its food.
  - We eat our food.
  - They eat their food.

Speech Generating Devices
References


Connors, Bill. "The Visual Definition of Aphasia." Aphasia Toolbox, 30 June 2017, aphasiatoolbox.com/

