

Iowa Stroke Conference 2024

Aphasia Reading Club

An Approach to Supported Reading in a Group Setting

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Disclaimer

- The opinions expressed in this presentation are solely those of the presenter and may not necessarily reflect AHA/ASA's official positions. This presentation is intended for educational purposes and does not replace independent professional judgment. AHA/ASA does not endorse any product or device.
- This presentation showcases one approach to supported reading for individuals with aphasia, there are certainly other approaches that are beneficial.

Disclosures

- Salaried employee of the University of Iowa and University of Iowa Hospital & Clinics
- No other relevant and non-relevant financial disclosures.

Learning Objectives

- Describe patient interventions and modifications used to increase independence of the post-acute stroke patient as it relates to mobility, ADLs, and communication.
- Identify considerations concerning impairments, approaches to intervention, reading strategies, technology supports, and text when developing an aphasia reading group.

Aphasia

Communication Disorder

- Spoken language expression
- Written expression
- Spoken language comprehension
- Reading comprehension

Causes

- Stroke, traumatic brain injury, brain tumors, brain surgery, infections in the brain, neurodegenerative diseases

Challenges

- Daily communication
- Social interactions
- Understanding written information

Impact of Reading Impairment

(Knollman-Porter, et al., 2015)

- Changes in reading post-aphasia negatively impacted participation in activities they enjoyed before aphasia.
- Reading comprehension impairments also affect one's life activity engagement.
- Those with aphasia want to engage in social, leisure, and work activities that involve reading.
- Those with aphasia wanted reading experiences to be more satisfying.

Fall 2023

- Began supervising the Aphasia Reading Club at the Wendell Johnson Speech and Hearing Center
- Met once a week
- Variety of clients with different types of aphasia and reading levels
- 3 SLP Graduate Students



Considerations

Diverse reading abilities

Cognitive factors

Various approaches to reading

Use of technology

Reading material and complexity

Text modifications



Diverse Reading Abilities

Alexia; Impairments in Reading Comprehension (ASHA Practice Portal)

- Trouble recognizing words or letters
- Difficulties comprehending written language (words, sentences, paragraphs)
- Difficulties sounding out words or associating letters with sounds
- Misinterpreting the meaning of written words
- Difficulty reading function words (e.g., articles, prepositions, pronouns)
- Varying levels of self-monitoring and self-awareness

Cognitive Considerations

Cognitive Factors

- Working Memory and Attention (Smith & Ryan, 2020)
 - Comprehending a text requires working memory skills (holding onto information without losing track of what we' re doing).
 - When directing increased attention to decoding words, individuals will show reading comprehension deficits as their reading requires increased effort

Approaches to Reading

Oral Reading

- Activates both phonological and semantic routes
- Uses principles of two reading approaches:
 - Oral Reading for Language in Aphasia (ORLA)
 - Multiple Oral Re-Reading (MOR)

Strategy Based Approaches (Purdy et al., 2019)

- Covering up text above and below the target text
- Reading/re-reading three sentence chunks
- Summarizing main points
- Prediction/foreshadowing
- Highlighting key words/characters
- Mind-maps (who, where, what happened)
- Written summaries
- Modeling
- Shared reading
- Comprehension Questions

General Strategies

- General reading strategies include prioritizing the meaning over accuracy, rereading if comprehension is compromised, as well as slowing the pace and how much material read at one time (Knollman-Porter et al., 2015)

Combined Modality Use

- Visuals and/or auditory support
 - Visuals with high-context may increase success with reading and overall satisfaction (Knollman-Porter et al., 2016)
 - Some PWA may benefit from auditory and written modalities to support reading comprehension (Brown et al., 2019)
- Those with aphasia prefer high-context images (e.g., rich background; information about an environmental setting) as opposed to portraits or icons (Knollman-Porter, et al., 2016)



Technology

Technology



Text-to-Speech

Speech-Output (Rate Matters)
Text Highlighting



PowerPoint Immersive Reader

Reading Coach



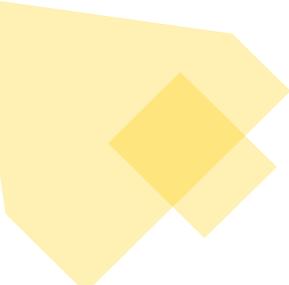
Tools

Google Translate
Reading Pen
Phones



Visual and audio supports

Images to support comprehension
Videos to provide additional context



March Madness is like a big basketball

party that happens every March, and it's
super exciting!

Did you know that it got its name way



Planning for ARC

The Reading Material

Choosing the Text



Interesting



Sparks conversation



Offers the opportunity to learn something new



Relevant

Variety of Reading Material

- News
- Emails
- Research
- Social Media
- Financial Reports
- Product Labels/Instructions
- Medication Labels/Instructions
- Cookbooks/Recipes
- Movie Reviews
- Product Reviews
- Bus Schedules
- Menus
- Advertisements
- Maps
- Store Signs

Material Modifications

“Aphasia Friendly” Text

LA

You

make this text aphasia friendly Donald Trump has clinched the Republican nomination for president, CNN projects, setting up a rematch with Joe Biden, the incumbent president who secured the Democratic nomination earlier Tuesday night.

Biden and Trump will win their parties’ presidential primaries in Georgia, Mississippi and Washington, CNN projects. Also Tuesday, Hawaii Republicans are holding caucuses, while voting wraps up in the primary for Democrats Abroad, the official arm of the Democratic Party for Americans living overseas. Biden is the projected winner of the Democratic primary in the US territory of the Northern Mariana Islands, held earlier Tuesday.

IOWA

Bruce Willis retires – level 2



06-04-2022 07:00

Level 1 Level 2 Level 3

On Wednesday, the family of American actor Bruce Willis announced that he suffers from aphasia.

Aphasia is a disease which impacts a person’s **ability** to speak and to understand what other people speak or write. The disease usually starts after a **stroke** or a head injury. If a person has aphasia and he works in a job with language, it can cause a big impact on his work. For that reason, Willis decided to **retire**.

The 67-year-old actor became famous in the 1980s thanks to the TV series ‘Moonlighting’. He then played in five ‘Die Hard’ films, which made him an international star. He played in more than 100 films, and eight of them were in 2021. They weren’t Willis’s best films, but fans still loved the actor, and the news about his disease shocked them.

Difficult words: **ability** (the skill or power to do something), **stroke** (a sudden attack when the brain doesn’t get enough blood), **retire** (to stop working).

You can watch the original video in the Level 3 section.

News in Levels
Bruce Willis Retires – Level 2

0:58

3.8K

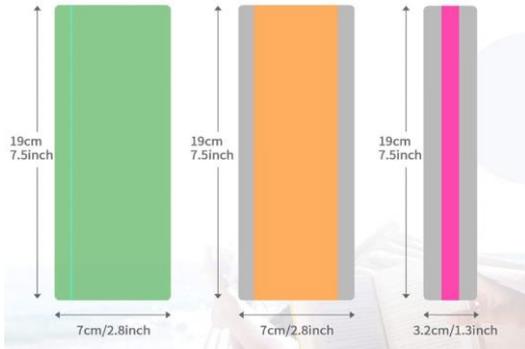
Privacy policy

- News in Levels
- AI - Chat GPT
- Talk Path News
- Readability Statistics (Microsoft Word)

Modifications

- Abundant white space, avoid long sentences with complex sentence structure and words, relevant visual supports, enlarged font (Brennan et al., 2005)
- Sans-serif font and lower—case font (Wilson & Read, 2015)
- High context visuals

External Supports



Reading in Levels – Level 1



American

Job

Disease

Aphasia

Language

Actor

Famous

Popular

Fans

Shock

Bruce Willis is an American actor. He is 67 years old. He ends his job. Willis has something called aphasia. A person with aphasia has problems with language. He has difficulty to speak. He can't understand what people say or write. Now it is impossible for Willis to work as an actor. His family says that Willis retires. Willis becomes famous in the 1980s. He plays in the TV series 'Moonlighting'. He plays in five 'Die Hard' films. He becomes very popular in all the world. His fans love him. The news about Willis' s disease is a shock for them.

Level 2

Diagnosed
Impacts
Speak
Understand
Stroke
Work
Retire
Films
International
Loved



On Wednesday, the family of American actor Bruce Willis announced that he has been diagnosed with aphasia. Aphasia impacts a person's ability to speak and to understand what other people speak or write. Aphasia usually starts after a stroke or a head injury. If a person has aphasia and he works in a job with language, it can cause a big impact on his work. For that reason, Willis decided to retire. The 67-year-old actor became famous in the 1980s thanks to the TV series 'Moonlighting'. He then played in five 'Die Hard' films, which made him an international star. He played in more than 100 films, and eight of them were in 2021. They weren't Willis's best films, but fans still loved the actor, and the news about his disease shocked them.

Level 3

Impacting
Cognitive
Aphasia
Condition
Comprehension
Profession
Difficulties
Achieved
Appeared
Acclaim

According to his family, American actor Bruce Willis is retiring from acting after being diagnosed with frontotemporal dementia that was impacting his cognitive abilities. This also results in aphasia. Aphasia is a condition that affects a person's ability to communicate. It can affect the speech and comprehension of both spoken and written language. Typically, aphasia occurs suddenly after a stroke or a head injury. If a person works in a profession that requires language and he has aphasia, he will have difficulties. Willis, who's 67, achieved initial fame for the 1980s TV series 'Moonlighting' before he became an action hero in five 'Die Hard' films. The actor has appeared in about 100 films, and he won acclaim for his roles in 'Pulp Fiction' and 'The Sixth Sense'.

Develop Comprehension Questions

- Questions related to:
 - Key details
 - Main ideas
 - Explicit and implicit information

ARC

1. Start each session discussing reading from the week
 - Sports scores
 - Weather
 - News
 - Social Media
 - Books/Audiobooks
2. Level 1: Single word reading
3. Level 1: Each member takes turns reading aloud 1-2 sentences
4. Level 1: 3 comprehension questions following each " level"
5. Discussion– anything surprising or unfamiliar, additional questions and/or thoughts group members may have
6. Repeat 2-5 for level 2 and 3 text
7. Clinician provides additional reading to be read at home

Group Information

- Wendell Johnson Speech and Hearing Center
- MAGIC Tuesdays 2-3
- Aphasia Reading Club Thursdays 3-4
- Fall, Spring, and Summer Semesters
- In-person and Zoom
- Laura-Schmitt@uiowa.edu

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