Dear Friends,

After a very cool and rainy spring, summer is finally upon us! That means it is time to re-connect with friends at an old-fashioned BBQ. We hope you can join us on Wednesday July 6th at our usual spot in Nancy Boyd Park in Martinez from 12-3pm (see p. 6 for details).

Our Center continues to be busy with a number of research studies. We have had a few papers accepted recently for publication in aphasia and neuroscience journals. One of these was a study outlining the brain regions critical for short-term memory. That’s the kind of memory that kicks in when someone tells you a phone number and you try to rehearse it in your head. In another recent study, we identified the fiber pathways in the brain that are critical for language comprehension. Previous studies of aphasia have focused primarily on the cerebral cortex (grey matter) of the brain, but we have found that the interconnections (white matter) between these regions are very critical to our ability to comprehend spoken language. These studies were also presented at conferences in San Francisco this past spring, and we received really good feedback from our colleagues.

In other news, our weekly Stroke Support/Speech Group has been having a good time at its new location in our research center. A huge thanks to Maya and Carl who have been responsible for running the group. And also a big thanks to our weekly participants who make the group so much fun.

We hope that you are doing well, and we hope to see you for the upcoming picnic. Stay cool and see you soon!

Sincerely,
Nina Dronkers, Ph.D.
Director
Center for Aphasia & Related Disorders
Therapeutic Effects of Reading Out Loud
by Carl A. Ludy

Humans have been reading for 6,000 years. However, silent reading (i.e., reading to yourself) is a relatively recent phenomenon. Modern reading, which is silent and rapid, emerged in the early middle ages. At that time, words and sentences began to be separated in written texts. Until then, the letters were run together, so a person had to read out loud in order to hear the sounds and make sense of them. By the 10th century, monks were reading to themselves with soft mumbling. Then the news spread that it was possible to read without moving the lips, and reading became associated with silent prayer. This new privacy in the reading experience is believed to have changed the nature of thought and culture, culminating in the modern era.

From a neuroscience point of view, this ability to read silently showed that language could be separated from the motor/movement aspects of speech. Once silent reading of language was possible, then thinking in silent language became more common. The result was a dramatic increase in what is called 'metacognition', or the control and mastery of processes of thought. The acquisition and development of metacognitive abilities is an important area of research today, and is central to the notion of literacy.

Reading out loud is the basis for what most of us do—silent reading to ourselves—and it is the way we first learn to read. Today, reading out loud is mostly limited to when we read for others. In our Wednesday Stroke/Speech Group, we read articles from the newspaper out loud, with each person reading one paragraph at a time. An attentive audience somehow makes it easier. No performance anxiety among friends! Reading aloud is good speech practice. It is talking, but without first having to think up the words and ideas. But it still uses the mechanics of speaking. When we read aloud, the ‘intonation pattern’ or sentence rhythm emerges. Reading out loud is also good practice for comprehension, both for the speaker and for the listeners.

When we read out loud, we reconnect not just with the foundation on which modern literacy is built, but with our personal learning experience as well. We expect that, both for the speaker and listener, the motor/acoustic activity will exercise the silent representations in the mind.

Anyone who has literacy, the ability to read, has a language life-preserver after a stroke. Reading gets more brain areas involved in the language game. Even if some brain areas are affected by a stroke, other brain areas can learn to keep the language network stimulated and in good practice. This is exactly what we are trying to do in our weekly reading group.


For more information on metacognition and literacy, see the work of J. H. Flavell, for example, “Speculation about the Nature and Development of Metacognition” in F. E. Weinert and R. H. Kluwe, eds., Metacognition, Motivation, and Understanding, Erlbaum, 1987.
1. Stop and name the process, for example: "I just realized that I am thinking about something completely different from what I want to be focusing my attention on."

2. Try to put them into categories. It takes about 30 seconds. If you exceed this time limit, you could be off track.

3. Ask: "What was the bridge that enabled my thought to jump off-track to this completely different topic?"

4. Ask yourself: "What was I talking about? What am I talking about now? What do I need to be talking about?"

5. Trace your thoughts backwards, from the last thought you had when you caught yourself being off-topic, and follow the thought back to your original focus of attention.

6. Jot down key words on a notepad while you speak to make sure that you are staying focused. You can casually refer to these as you speak – it lets you know where you are. Let key words act as speed bumps to keep you from rushing ahead.

7. After each point you make to ensure that the other person understands before you move on.

8. Another trick: Watch for a smile and/or nods. When either thing stops, or when people start looking down, finish your sentence. If they ask you to go on, do so. If they say nothing, or say "thank you", then stop.

9. : ask others in the meeting what their thoughts are. Many times, their response helps you figure out what point you were on!

10. : Say that you will get back to that aspect later in the meeting or conversation - remember, only YOU know that you completely forgot what you were talking about - they don't. Move on to another point that is relevant. You may never remember the original point, but most people don't notice anyway.

11. : When you lose your thought or words, take the focus away from you and ask questions of the other person. People's responses will hopefully trigger something that might help you back to the original thought.

12. or summarizing at logical stopping points – this reminds YOU of where you are.

13. : Say, “There are 3 points I would like to make” before just jumping in to the answer. If you number them on your fingers non-verbally while holding your hand in your lap, you will have the “3” as a visual reminder.

14. and print it out in type that is larger than usual print size, so that it's easy to read at just a glance.

15. Remind yourself “I have not fallen off the wagon...” Being hard on yourself about getting off track can just make it worse.
Stroke Recovery Resources in the Bay Area

**Project Recovery**
This is an adaptive physical exercise program for those with physical disabilities including moderately self-ambulatory, ortho-multi-handicapped, and other health impairments. The program will increase fitness, balance, strength, and range of motion.

Mon/Wed: 1:30-2:30pm or 2:30-3:30pm
Tue/Thur: 2:00-3:00pm or 3:00-4:00pm.

**Location:**
Family YMCA, Mt. Diablo Region YMCA Office
395 Civic Drive
Pleasant Hill, CA 94523

**Contact:**
Libby Luxemberg
(925) 687-8900.

**Stroke Support Group of Contra Costa County**

**Location:**
Mt. Diablo Medical Center
Concord, CA 94520
or
John Muir Medical Center
601 Ygnacio Valley Rd.
Walnut Creek, CA 94596

**Mailing Address:**
Ann Dzuna
1174 Alta Mesa Dr.
Moraga, CA 94556-2042

**Contact:**
Ann Dzuna, B.S., MBA
(925) 376-6218
adzuna@comcast.net

**Cal State University East Bay Aphasia Group**

**Location:**
California University - East Bay
Speech, Language & Hearing Clinic
MB# 1097A
Communicative Sciences and Disorders
Hayward, CA 94542

**Mailing Address:**
Shelley Simrin, M.A., CCC-SLP
California State University - East Bay
Dept. of Communicative Sciences & Disorders
MB# 1097A
25800 Carlos Bee Blvd.
Hayward, CA 94542-3065

**Contact:**
Shelley Simrin, M.A., CCC-SLP, Clinic Director
(510) 885-4762 or (510) 885-3233
ssimrin@cshayward.edu

**Aphasia Center of California**

**Location:**
200 Grand Ave.
Oakland, CA 94610

**Mailing Address:**
Roberta Elman, Ph.D., CCC-SLP, BC-NCD
Aphasia Center of California
3996 Lyman Rd.
Oakland, CA 94602

**Contact:**
Roberta Elman, Ph.D., CCC-SLP, BC-NCD
(510) 336-0112
rjelman@aol.com

**Website:** http://www.aphasiacenter.org

**Stroke Club San Francisco**

**Location:**
Stonestown Family YMCA Senior Annex
3150 20th Ave.
San Francisco, CA 94132

**Contact:**
Kathy Orsi
(415) 242-7117
Do you know the warning signs of a stroke?

Be sure to call 9-1-1 if you or someone you know has ANY of these symptoms with no known cause:

- A sudden, severe headache
- Sudden blurred vision
- Sudden dizziness
- Sudden difficulty moving one or both sides of the body
- Sudden difficulty with balance and/or walking
- Sudden difficulty speaking or understanding what is being said

For more information, visit www.strokeassociation.org
Stroke Support Group

Annual Summer Picnic!

When
Wednesday, July 6th, 12:00-3:00 p.m.

Where
Nancy Boyd Memorial Park
4738 Pleasant Hill Rd.
Martinez, CA, 94553

Directions to Nancy Boyd Park:
* From Highway 4, take the Alhambra Ave. exit
* Go South on Alhambra Ave. for 3/4 mile to Truitt Ave.
* Go left on Truitt Ave.
* Make first left on Valley Ave.
* You will see the park in front of you once you hit Church St.

What to bring
A dish or drink to share if you can.

Questions? Call Juliana at (925) 372-4649
# Game Zone

Can you find all the summer words below?

## Summer Fun

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Aphasia News
Center for Aphasia and Related Disorders
150 Muir Road 126 (s)
Martinez, CA 94553

http://www.ebire.org/aphasia

Newsletter Information
If you would like to receive this newsletter or you have comments/suggestions, e-mail Juliana at juliana@ebire.org, call her at (925) 372-4649 or write to:

Center for Aphasia and Related Disorders
VA Northern Calif. Health Care System
150 Muir Road 126 (s)
Martinez, CA 94553

We welcome your comments and questions!

Center Members & Affiliates
Nina Dronkers
Janet Patterson
Sharon Willock
Carl Ludy
Luci Varian
Juliana Baldo
Carolyn Benjamin
Patty Phaneuf
Andrea Zvinakis
And Turken
Ana Soper
Cami Bebarta
Maya Ravi

We would also like to thank the members of the Stroke Support Group and their families, the Speech Pathology staff, and the East Bay Institute for Research and Education.

The Center for Aphasia and Related Disorders is supported by the VA Northern California Health Care System, the VA Medical Research Program, the National Institutes of Health, and the University of California at Davis and San Diego, as well as through generous donations from private foundations and individuals. Please feel free to contact Dr. Dronkers at (925) 372-2925 if you would like more information.