COVID Update: In-person Research Starts Again

After the suspension of most of our in-person research studies in March, the University of Colorado (CU) Alzheimer's and Cognition Center has started up human subject research again!

Consistent with University guidelines, the Center initiated a phased return of its research studies. Initially, only participants currently enrolled in our studies that require a follow-up visit, or who were participating in a clinical drug trial were contacted for scheduling. However, we were recently approved to start new recruitment for all of our studies, and we are excited to once again be fully operational.

For participants coming in for our studies, many safety precautions have been put in place. For example, for visit activities that require extended time with a research assistant, such as cognitive testing, a plexiglass shield is placed between the participant and the research assistant. However, precautions may vary by study, so please check with the study coordinator for the most up-to-date steps being taken for a specific study visit.

Also, at the beginning of September, the Memory Disorders Clinic increased its capacity to 75% of all visits happening in-person. We continue to make patient safety our priority, with mandatory masks and health screenings required for staff and patients. Our staff remain available for our current patients via our answering service (720-848-2080) or through MyHealth Connection.

If you have any research-related questions, contact 303-724-7670 or CUAlz@cuanschutz.edu.

Center Hosts Webinar for Colorado Policy Makers

How can we improve aging brain health and dementia care in Colorado? This was the major question answered in a webinar on August 26th, 2020, hosted by the CU Alzheimer's and Cognition Center and the Alzheimer's Association of Colorado.

Brianne Bettcher, PhD, and Samantha Holden, MD, presented to Colorado policy makers and their staff, as well as to invited members of the community. Both speakers emphasized the importance of early intervention and of maintaining a healthy lifestyle.

U.S. Representative Jason Crow, D-Colorado, opened the event and introduced the current state of dementia in Colorado. The Anschutz Medical Campus is in the 6th congressional district, which is represented by Rep. Crow.

Dr. Bettcher presented first and explained the need for understanding differences between normal aging and the early stages of cognitive decline.

There are many people who have Alzheimer's pathology in the brain, but do not show cognitive symptoms, and are deemed healthy. She indicated that this raises important questions about resilience in aging.

She also stressed that including both healthy older adults and those with symptoms of cognitive decline in our studies helps researchers learn more about the risk factors as well as the protective factors for Alzheimer's disease and related dementias.

Dr. Holden, who directs the Memory Disorders Clinic, went on to discuss what clinicians are doing now for people who need dementia care, and what still needs to be improved. She went over the process at the clinic for obtaining a diagnosis of one of the various types of dementia, and why it is important to obtain a diagnosis, and obtain it early.

Dr. Holden also emphasized

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The Alzheimer’s Association held its annual Alzheimer’s Association International Conference (AAIC) at the end of July. This conference, which is usually held in various locations around the world, was held virtually this year. For the first time ever, it was free to register, making it widely available to the public.

Research conferences like the AAIC are a key aspect of research, since they provide an essential opportunity for scientists to share exciting new research findings, to receive feedback from their peers and the community, and to discuss hot topics in the field with experts from around the world.

Presentations at AAIC vary in their mode of dissemination – researchers present their unpublished data in poster sessions, oral presentations, discussion sessions, and workshops with invited speakers.

At this year’s AAIC, the Center had multiple posters on display during the poster sessions focused on laboratory research. For example, Mihret Elos, a research assistant who works in Dr. Huntington Potter’s lab, along with others from his lab, presented a poster on their research into mosaic aneuploidy (abnormal number of chromosomes) in human and mouse model cells and its role in the development and progression of Huntington’s disease.

Peter Pressman, MD, and other members of the Center collaborated on a project presented by Luis Medina, PhD, from the University of Houston. This presentation was focused on promoting community engagement among the Hispanic/Latinx community in aging research through a process called Boot Camp Translation. The Center will be participating in this outreach effort with Dr. Medina in the coming years.

The AAIC usually highlights presentations showing groundbreaking research that makes national news. This year, one of the big stories was about a blood test that measures biomarkers, or proteins, in the body and may be used to indicate whether a person has Alzheimer’s disease.

However, while it is very appealing to have a potential blood test to predict Alzheimer’s, the use of a test like this in clinics is still a ways off, and many things will have to be considered before it is used, such as what exactly these biomarkers mean for people on an individual basis. Nonetheless, the research is still exciting, and we will be able to see how it progresses at future conferences.

Conferences such as the AAIC are a time for researchers to gather, share their work, and collaborate on a global scale, to ensure that the field is continuously moving forward at the fastest pace. CU Alzheimer’s and Cognition Center researchers are always excited and honored to present their work at these events.
The CU Alzheimer’s and Cognition Center held its 4th Annual Research Education Event on September 25, 2020. We hold this event every year to show our appreciation for our research participants who have dedicated their time and energy to help us conduct our research.

This year, the research education event occurred a little differently, as it was virtual. By using this format, people were able to attend the event safely from their homes. Many participants who live further away and may not normally have been able to attend were also able to join us. Huntington Potter, PhD, the director of the CU Alzheimer’s and Cognition Center, led off the event with an update on the Center and the various research projects we are doing, both in the laboratory and clinical trials.

Other presentation topics included COVID-19 and dementia, how research with human subjects fits into the process of getting a drug on the market, ethics and research, and concussions and Alzheimer’s disease. There was also a presentation from the African American Alzheimer’s Advisory Council, a community advisory board whose members work closely with the Center.

While we hope to return to hosting an in-person event next year, we were very pleased to have an opportunity to host it virtually this year, and to show our immense gratitude to the participants who have contributed to our studies.

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Investigator Spotlight: Peter Pressman, MD

Peter Pressman, MD, is a cognitive and behavioral neurologist for the CU Alzheimer’s and Cognition Center.

In addition to Alzheimer’s disease, Dr. Pressman specializes in atypical forms of dementia that influence a person’s speech and behaviors, such as behavioral variant frontotemporal dementia and primary progressive aphasia. He oversees many clinical drug trials for the Center and also conducts observational research studies.

His research is focused on building tools that facilitate earlier and more accurate diagnoses of Alzheimer’s disease and related disorders. He especially hopes to make these tools easy for primary care physicians to use in their everyday practice.

Speech patterns are one area that Dr. Pressman specifically studies to help develop these tools – not only what someone says, but also how they say it. He researches spontaneous conversational speech, such as the kind that may occur between a doctor and patient, to see if it could be used to screen for cognitive disorders.

For example, if a doctor notices that a person has increased the frequency with which they use place holders such as “um” or if their speech has slowed down or has become less frequent, these changes may signal that there has been a shift in their cognition, and the doctor could order more detailed cognitive testing.

While people in the technology field frequently study and develop tools that analyze speech, this area is not as commonly studied in the medical field. Through his work, Dr. Pressman strives to help bridge the two fields.

Alzheimer’s and other forms of dementia look different in everyone, creating a critical unmet need for diverse tools that allow early detection and more detailed testing. Dr. Pressman hopes to develop tools for the medical field that improve how people with neurocognitive disorders are diagnosed and cared for. To learn more about his research, visit https://medschool.cuanschutz.edu/alzheimers.