better. For long delay recall performance, there was a similar trend though it did not reach statistical significance F (2, 114) = 3.03, p = .052; Wilk's Λ = 0.949, partial η2 = .51.
Conclusions: Data showed that patients who reported trauma exposure scored significantly higher on immediate recall performance on CVLT and WMS-LM than those who did not report trauma exposure. Although research suggests that patients who were exposed to trauma often experience cognitive deficits on verbal memory tasks, evidence also shows that trauma exposure can lead to higher immediate recall performance in memory related to attentional allocation modeling (Hayes et al., 2012).

Categories: Memory Functions/Amnesia
Keyword 1: post-traumatic stress disorder
Keyword 2: memory: normal
Keyword 3: learning
Correspondence: Halima Hussaini, The Neurology Center, Halima.Hussaini@neurocenter.com

7 Self Assessment Memory Scale, a new simple method for evaluating memory function

Hisatomo Kowa
Kobe University Graduate School of Health Sciences, Kobe, Hyogo, Japan

Objective: Given the results of the clinical trials for the disease-modifying therapy for Alzheimer's disease and its mechanism of action, it is necessary to start at the early stage as soon as possible. To this end, there is a need for a tool that allows easy periodic home assessment of memory change from the early stages of the disease. The purpose of this study is to establish a new method of memory evaluation showing well- correlated with Logical Memory (LM) II subtest score of the WMS-R and that, at the same time, can be done easily in a short time.
Participants and Methods: The subjects were 85 subjects (including 12 MCI, 8 AD, and 65 age people with normal cognitive function). In the new method, 8-picture recall and 16-word recognition were assessed, respectively, and the index was calculated by adding up the ratio ofcorrect responses to both tests (max point is two). The correlation with the LM II score was examined.
Results: Our statistical analysis showed that 8-picture recall (R=0.872, p<0.001) and the index (R=0.857, p<0.001) showed a significantcorrelation with the LMII score. On the other hand, the 16-word regression and LM II score was R = 0.691(p<0.001), relatively lower than the other two scores, because this task may have been higher than the true ability due to the false recognition of words that were not there.
Conclusions: Our new method can easily predict the LM II score of WMS-R in about one third of the time required by conventional methods. We named this index as Self Assessment Memory Scale (SAMS), and are planning to develop a digital tool to enable easy andself-accessible evaluation of recall.

Categories: Memory Functions/Amnesia
Keyword 1: cognitive screening
Keyword 2: aging (normal)
Correspondence: Hisatomo Kowa, Kobe University, kowa@med.kobe-u.ac.jp

8 Computational Modeling of Memory Processes in non-CNS Cancer Survivors

Ruben D Potthoff, Sanne B Schagen, Joost A Agelink van Rentergem
Netherlands Cancer Institute, Amsterdam, Netherlands

Objective: Cognitive impairment is an often-overlooked issue that non-CNS cancer survivors face. Our current understanding of their issues is lacking, as traditional memory sum scores grant us little insight into the underlying cognitive processes of memory and its impairment. We can improve the informativity of memory impairment studies by isolating which cognitive processes are impaired.
Participants and Methods: Participants were breast cancer survivors who received chemotherapy (n=68), and women controls (n=157). The participants completed the Amsterdam Cognition Scan (ACS), in which classical neuropsychological tests are digitally recreated for online at-home administration. Online administration reduces the burden on patients and allows for recording measurements with greater precision. The specific test used to

https://doi.org/10.1017/S1355617723006793 Published online by Cambridge University Press

illustrate the effectiveness of our computational modeling approach was the ACS equivalent of the Rey Auditory Verbal Learning Test, in which participants are tasked with recalling a list of 15 words five times. We formulated a Hierarchical Bayesian Cognitive Model to replace traditional sum scores and disentangle performance into the more theoretically meaningful concepts of 'memory storage' and 'memory retrieval'.
Results: A traditional analysis of the sum of trials 1-5 indicated no significant difference between patients and controls ($t(223)=-0.99$, $p = 0.323$), with a small effect size (Cohen's $d = -0.14$).
For the newly isolated cognitive process "memory storage", a non-significant difference was found between patients and controls ($d=0.10$, 95% credible interval on Cohen's d: [-0.25, 0.43]). On the "memory retrieval" process, a medium significant difference was found between patients and controls ($d = -0.57$, 95% credible interval on Cohen's d: [-1.00, -0.19]).
Conclusions: The results indicate that the impaired memory processes in cancer patients are not a general impairment across all memory functions, but rather a selective impairment of memory retrieval. Our method of analysis revealed information that would have been left unnoticed had we relied on traditional sum over trials 1-5.

Categories: Memory Functions/Amnesia
Keyword 1: cancer
Keyword 2: cognitive processing
Keyword 3: memory complaints
Correspondence: Ruben D. Potthoff, Netherlands Cancer Institute, r.potthoff@nki.nl

9 Connecting memory and functional brain networks in older adults: a resting state fMRI study

Jori L Waner[1,2], Hanna K Hausman[1,2], Jessica N Kraft[1,3], Cheshire Hardcastle[1,2], Nicole D Evangelista[1,2], Andrew O'Shea[1], Alejandro Albizu[1,3], Emanuel M Boutzoukas[1,2], Emily J Van Etten[4], Pradyumna K Bharadwaj[4], Hyun Song[4], Samantha G Smith[4], Steven T DeKosky[5], Georg A Hishaw[6,7], Samuel S Wu[8], Michael Marsiske[1,2], Ronald Cohen[1,2], Gene E Alexander[4,9], Eric C Porges[1,2], Adam J Woods[1,2,3]

[1]Center for Cognitive Aging and Memory, McKnight Brain Institute, University of Florida, Gainesville, FL, USA. [2]Department of Clinical and Health Psychology, College of Public Health and Health Professions, University of Florida, Gainesville, FL, USA. [3]Department of Neuroscience, College of Medicine, University of Florida, Gainesville, FL, USA. [4]Department of Psychology and Evelyn F. McKnight Brain Institute, Tuscon, AZ, USA. [5]Department of Neurology and McKnight Brain Institute, Gainesville, FL, USA. [6]Department of Psychiatry, College of Medicine, University of Arizona, Tuscon, AZ, USA. [7]Department of Neurology, College of Medicine, University of Arizona, Tuscon, AZ, USA. [8]Department of Biostatistics, College of Public Health and Health Professions, College of Medicine, University of Florida, Gainesville, FL, USA. [9]Department of Psychiatry, Neuroscience and Physiological Sciences Graduate Interdisciplinary Programs, and BIO5 Institute, University of Arizona and Arizona Alzheimer's Disease Consortium, Tuscon, AZ, USA

Objective: Nonpathological aging has been linked to decline in both verbal and visuospatial memory abilities in older adults. Disruptions in resting-state functional connectivity within well-characterized, higher-order cognitive brain networks have also been coupled with poorer memory functioning in healthy older adults and in older adults with dementia. However, there is a paucity of research on the association between higher-order functional connectivity and verbal and visuospatial memory performance in the older adult population. The current study examines the association between resting-state functional connectivity within the cingulo-opercular network (CON), frontoparietal control network (FPCN), and default mode network (DMN) and verbal and visuospatial learning and memory in a large sample of healthy older adults. We hypothesized that greater within-network CON and FPCN functional connectivity would be associated with better immediate verbal and visuospatial memory recall. Additionally, we predicted that within-network DMN functional connectivity would be associated with improvements in delayed verbal and visuospatial memory recall. This study helps to glean insight into whether within-network CON, FPCN, or DMN functional

https://doi.org/10.1017/S1355617723006793 Published online by Cambridge University Press