participants self-selected to read music notation. Participants scored an average Modified Mini Mental State Examination (3MSE) score of 81.3 (SD = 11.0). On average, participants' scores on the Orientation Test moved from 13.4 (SD = 1.9) to 14.1 (SD= 2.7), providing a cohen's d effect size of 0.3. Over the six weeks, 11 out of the 15 participants selected to read music for at least one class, indicating a statistically significant change using the Wilcoxon signed-rank test (Z = -3.16, p < 0.01), suggesting that older adults with cognitive changes may be able to learn to read music. This is important, as a spatially focused music program may maximize spatial skills that older adults need to successfully navigate their world safely and independently.

## DIVERSE SOURCES OF SOCIAL SUPPORT AND COGNITIVE FUNCTIONING BY RACE, ETHNICITY, AND NATIVITY

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This study examines the relationship between social support profiles and cognitive functioning by race, ethnicity and nativity in older adults using cross-sectional data drawn from the Health and Retirement Study (2010 and 2012). We employed a hierarchical clustering routine to generate nine support profiles that differentiated three sources of support: children, wider family relationships and friendships. Cognitive functioning was measured as the score on the Telephone Interview for Cognitive Status (TICS-m), a 27 point scale of cognitive function. Our approach explicitly acknowledges the ambivalence and multidimensionality of close relationships and the resources embedded within them. Descriptive analyses revealed significant differences in access to support across demographic groups. White respondents are over-represented in profiles that are characterized by support from friends, and under-represented in family support profiles. The reverse is found among Foreign-born Hispanic respondents who are over-represented in the profiles characterized by high family support and under-represented in those with high friend support. Native-born Hispanic respondents and Black respondents have less clear support patterns, although both are more likely to receive support from family and children compared to friends. Findings from the poisson regression suggest that the relationship between familial support and cognitive decline is stronger among Hispanic respondents, particularly those who are foreign born. These findings are supported even with the inclusion of other relationship quality indicators including negative support and frequency of contact.

## DOES COGNITIVE SELF-REPORT MEASURE TYPE DIFFERENTIALLY PREDICT COGNITIVE DECLINE? A SYSTEMATIC REVIEW

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Up to 47% of older adults without measurable cognitive impairment report difficulties with memory and thinking which potentially increases their risk for developing cognitive decline. Many measures are used for assessing selfreported cognition; however, certain types of these measures may be more predictive of cognitive decline. The purpose of this systematic review was to compare the role of cognitive self-report measure types in predicting risk for cognitive decline. PubMed, CINAHL, and PsycINFO databases were searched using the following inclusion criteria: longitudinal studies, outcome of cognitive decline, and two or more cognitive self-report measures. A total of 4,319 articles were identified during the initial search and narrowed to 19 final articles. The Quality in Prognosis Studies tool was used to determine study quality. Six comparison themes emerged during synthesis: self-reported cognition or memory with or without worry; self-reported global cognition or selfreported memory; self-reported memory decline and selfreported executive function decline; self-reported cognition and self-reported memory by others; self-reported memory and self-reported memory problems in comparison with peers; and self-reported memory and self-reported memory affecting daily function. Self-reported memory decline with worry and self-reported memory problems by others were most predictive of future impairment. It was difficult to definitively determine whether certain cognitive self-report measure types where more predictive of risk for cognitive decline because there were very few articles in some of the comparison groups. Future investigations of self-reported cognition should focus on using measures that have been shown to be the most efficacious at predicting risk for cognitive decline.

## EEG MEASURES OF VALUE-DIRECTED STRATEGIC PROCESSING IN OLDER ADULTS WITH AND WITHOUT MILD COGNITIVE IMPAIRMENT

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Value-directed strategic processing is important for daily functioning. It allows selective processing of important information and inhibition of irrelevant information. This ability is relatively preserved in normal cognitive aging, but it is unclear if mild cognitive impairment (MCI) affects strategic processing and its underlying neurophysiological mechanisms. The current study examined behavioral and EEG spectral power differences between 16 cognitively normal older adults (CNOA; mean age: 74.5 ± 4.0 years) and 16 individuals with MCI (mean age:  $77.1 \pm 4.3$  years) linked to a valuedirected strategic processing task. The task used five unique word lists where words were assigned high- or low-value based on letter case and were presented sequentially while EEG was recorded. Participants were instructed to recall as many words as possible after each list to maximize their score. Results revealed no group differences in recall of lowvalue words, but individuals with MCI recalled significantly fewer high-value words and total number of words relative to CNOA. Group differences were observed in theta and alpha bands for low-value words, with greater synchronized

theta power for CNOA than MCI and greater desynchronized alpha power for MCI than CNOA. Collectively, these findings demonstrate that more effortful neural processing of low-value words in the MCI group, relative to the CNOA group, allowed them to match their behavioral performance to the CNOA group. Individuals with MCI appear to utilize more cognitive resources to inhibit low-value information and might show memory-related benefits if taught strategies to focus on high-value information processing.

# EFFICACY OF DIFFERENT TYPES OF EXERCISE ON COGNITIVE FUNCTION IN PEOPLE WITH MCI OR DEMENTIA: A NETWORK META-ANALYSIS

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With the accelerating progress of population aging, cognitive dysfunction is becoming increasingly prevalent. Exercise, as a promising non-pharmaceutical therapy, showed favorable effects on cognitive function. But which type is the most effective exercise treatment is still unclear. This study compared the efficacy of different types of exercise interventions based on network meta-analysis and aimed to explore the optimal exercise treatment for cognitive decline. The electronic databases of PubMed, Web of Science, Embase, Cochrane Central Register of Controlled Trials, SPORTDiscus, PsycInfoy, and OpenGrey were searched from inception to September 2019. We only included randomized controlled trials that examined the effectiveness of exercise interventions in people with MCI or dementia. Primary outcomes were global cognition, executive function and memory function. Standard mean difference (SMD) and its 95% confidence interval (CI) were calculated to estimate the effect sizes. Finally, 73 articles with 5748 participants were included. The results showed all kinds of exercise interventions were effective on global cognition and resistance exercise was probably the most effective exercise treatment to prevent the decrease of global cognition (SMD=1.05, 95%CI 0.56-1.54), executive function (SMD=0.85, 95%CI 0.21-1.49) and memory function (SMD=0.32, 95%CI 0.01-0.63) for people with cognitive dysfunction. Subgroup analysis revealed multi-component exercise showed more favorable effects on global cognition (SMD=0.99, 95%CI 0.44-1.54) and executive function (SMD=0.72, 95%CI 0.06-1.38) in people with MCI. In conclusion, resistance exercise tended to be the optimal exercise type for people with cognitive dysfunction, especially for people with dementia. And multi-component exercise also should be recommended for people with MCI.

### FAVORITE ACTIVITY PATTERNS AMONG OLDER ADULTS WITH AND WITHOUT DEMENTIA: FINDINGS FROM THE NHATS

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Favorite activities are usually meaningful and valuable to older adults. However, information on favorite activity patterns and their relationship with cognitive function from large samples is still limited. Using Round 1 data from the National Health and Aging Trends Study, we examined favorite activity patterns among community-dwelling older adults with and without dementia (N=6,565). Based on the 8-item Ascertain Dementia (AD8) dementia screening interview, participants were classified into no dementia, possible dementia, and probable dementia. Favorite activity was assessed by asking participants, "What their favorite activity they are currently able to do?" Multinomial logistic regression models were used to examine the association between each of the top three favorite activities and the cognitive impairment categories, controlling for demographics and general health. The sample was on average, 77±7.45 years old, non-Hispanic White (69.8%), female (57.3%), and 35.0% had high school education. The three most popular favorite activities among probable dementia participants were watching TV, walking, and outdoor maintenance. Participants who liked watching TV most were more likely associated with possible dementia (Relative Risk Ratio [RRR] = 1.49, p=0.044) compared to participants without favorite activities. Participants who liked walking most were less associated with possible dementia (RRR=0.58, p=0.003) and probable dementia (RRR=0.39, p<0.001) compared to those without favorite activities. Similarly, participants who liked outdoor maintenance most were less likely to develop possible dementia (RRR=0.48, p<0.001) and probable dementia (RRR=0.27, p<0.001) than participants without favorite activities. Researchers may use older adults' "active" favorite activities to create tailored interventions to slow dementia progression.

# LIKELIHOOD OF PARTICIPATION IN HOME-BASED COGNITIVE ASSESSMENT: THE ROLE OF SUBJECTIVE COGNITIVE DECLINE AND AGE

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Home-based cognitive assessment (HBCA) services are emerging as a convenient alternative to in-clinic cognitive assessment and may aid in mitigating barriers to detecting cognitive impairment (CI). It is unknown which older adults would be likely to participate in HBCA. Here we investigated the role of age and Subjective Cognitive Decline (SCD). SCD has demonstrated an increased risk for progression to CI/dementia. A nation-wide community-dwelling sample of 494 adults age 50+ were recruited via Amazon Mechanical Turk to complete an online survey assessing perceptions around HBCA and SCD. Our sample was 91.9% White and 66.8% female. It consisted of 174 respondents aged 50-60, 265 aged 61-70, and 55 aged 71-79. Age groups were comparable with respect to their acceptance of cognitive assessment (Range 4-20, higher score=higher acceptance, 7.9±3.3, 8.15±3.2, 8.05±3.43) and SCD-Q total (43.1±5.8, 43.2±5.7, 43.3±5.7). Correlation analysis revealed a relationship between SCD-QSCD total and perceived likelihood of participation in HBCA for those ages 61-70 (r(263) = .222)