

memory functioning. While some research has found that SMC may be predictive of future cognitive impairment and dementia (Glodzik-Sobanska et al., 2007; Wang et al., 2004), others have suggested that SMC are common among healthy older adults (Cooper et al., 2011) and are not strongly related to objective memory performance. Researchers suggest that SMC may be more strongly related to affective factors (e.g., depression and anxiety; Rowell, Green, Teachman, & Salthouse, 2015). The current study examined the relationship between SMC, objective episodic memory performance (OEMP), along with depression and anxiety in a sample of 18-99 year olds (N = 5,430) from the Virginia Cognitive Aging Project (VCAP). Structural equation modeling with full information maximum likelihood estimation was used to investigate whether clinically-relevant depression and anxiety levels moderated the relationship between SMC and OEMP, controlling for age, education, gender, and health. OEMP was represented as a latent construct while the remaining variables were observed. Although depression and anxiety are significantly related to SMC ( $r$ 's = .29, .17, respectively), they are not correlated with OEMP. Furthermore, depression, but not anxiety, moderated the relationship between SMC and OEMP, such that those at risk for depression had a stronger relationship between SMC and OEMP (-.07,  $p < .05$ ) compared to those not at risk (-.02,  $p = .31$ ). This suggests that SMC may not be a valid indicator of OEMP as it may reflect variance from other sources, such as depression.

#### MEDIATORS OF GENETIC AND ENVIRONMENTAL MECHANISMS ON SELF-RATED HEALTH

Catalina M. Zavala,<sup>1</sup> Carol A. Prescott<sup>1</sup> and Susan Lapham<sup>2</sup>, 1. *University of Southern California, Los Angeles, California, United States*, 2. *American Institutes for Research, Washington, District of Columbia, United States*

Self-rated health (SRH), an individual's assessment of their own health status, is associated with older adults' chronic and acute health conditions, as well as mortality. Assessments of SRH indicate individual's global health is likely multifaceted. Level of education, particularly amount of post-secondary schooling, is associated with better SRH. Other indices of socioeconomic status (SES) such as income and wealth, have varying associations with SRH partly dependent on relative deprivation (e.g. Gini Index). The current study utilized data from 2,500 members of the Project Talent Twin and Sibling (PTTS) Study interviewed as adolescents in 1960 and followed up 54 years later. In 2014, participants were, on average, 70 years of age. Women comprised about 54% of the sample. We examined rearing family wealth, years of education, and functional independence as mediators of variance in SRH. Mean-level results indicated small positive associations between SES and SRH. Activities of Daily Living (ADL) accounted for about a quarter of variance in SRH, with higher functional independence predicting better SRH. Biometric analyses indicated that family wealth had small mediation effects on SRH via familial-environment (S) influences. Education mediated individual-specific (E) environmental influences. Functional independence (measured by ADL) mediated SRH via both additive genetic (A) and E influences. After adjusting for overall effects of sex, age, and specified mediators, a large portion of remaining variation

in SRH was due to individual-specific (E) environmental influences. Current results suggest complex underlying genetic and environmental mechanisms contributing to an older adult's assessment of their own health.

#### REDUCED ENDOTHELIAL FUNCTION IS ASSOCIATED WITH DEEP WHITE MATTER LESION VOLUMES AMONG HEALTHY OLDER ADULTS

Regina S. Wright,<sup>1</sup> and Desiree Bygrave<sup>1</sup>, 1. *University of Delaware, Newark, Delaware, United States*

Reduced endothelial function (EF) is a subclinical cardiovascular disease (CVD) risk factor and precursor to hypertension and atherosclerosis. Among older adults with CVD, reduced EF has been associated with poorer outcomes in a number of cognitive domains, partly explained by the presence of white matter lesion volumes (WMLV) detectable on brain magnetic resonance imaging (MRI). The role of EF as a key, early predictor of brain decrements among older adults without CVD, however, is not well understood. Therefore, the objective of the study was to examine associations between endothelial function and WMLV among cognitively intact older adults free of CVD. A diverse sample of 138 community-based older adults (30.4% male; mean age=68.54y) enrolled in the Healthy Heart & Mind Study underwent cognitive and psychosocial assessment, vascular testing, and brain MRI. Multiple regressions were run to examine associations between endothelial function, as measured by % change in brachial artery flow-mediated dilation (FMD), and MRI-assessed WMLV in brain regions of interest, after controlling for age, sex, race, education, depression, mean arterial pressure, total cholesterol, and hypertension medication use. Results showed a significant inverse association between % FMD change and deep WMLV ( $p < .05$ ), but no other regions of interest. Results suggest that reduced EF is associated with greater deep WMLV, an outcome variable attributable to small vessel disease and linked to Alzheimer's disease in previous studies. The implications of this finding for predicting risk for cognitive impairment among healthy older adults will be discussed.

#### SHRINKING AND GROWING SOCIAL NETWORKS IN THE SYDNEY MEMORY AND AGEING STUDY

Anne-Nicole S. Casey<sup>1</sup> Nicole A. Kochan,<sup>2</sup> Perminder Sachdev<sup>2</sup> and Henry Brodaty<sup>3</sup>, 1. *Centre for Healthy Brain Ageing, University of New South Wales (UNSW) Sydney, Sydney, New South Wales, Australia*, 2. *Centre for Healthy Brain Ageing, Sydney, New South Wales, Australia*, 3. *Centre for Healthy Brain Ageing (CHeBA), UNSW Sydney, Sydney, New South Wales, Australia*

Gerontological research suggests that shrinking social networks are characteristic of older age. Socioemotional selectivity theory suggests that older adults proactively reduce their networks over time. Core relationship networks consist of friends and family who are contacted at least monthly. Studies of perceived social support indicate that shrinking networks increase risk of isolation, loneliness, and associated ill health effects. Our research aimed to investigate change in size of older adults' core relationship network over time, and to explore associations between network size and participant characteristics, using data from the first four waves of the Sydney Memory and Ageing Study. Participants completed: