

IMPACTS OF CEREBROVASCULAR AND NEURODEGENERATIVE DISEASES ON SURVIVAL OF LUNG CANCER PATIENTS

J. Kravchenko¹, M.F. Berry², K.G. Arbeev³, H. Lyerly^{1,4}, A.I. Yashin³, I. Akushevich³, 1. *Department of Surgery, Duke University, Durham, North Carolina*, 2. *Stanford University, Stanford, California*, 3. *Center for Population Health and Aging, Duke University, Durham, North Carolina*, 4. *Department of Pathology, Duke University, Durham, North Carolina*

Approximately 25% of lung cancer patients aged 65+ have cerebrovascular and neurodegenerative comorbid diseases; however, their impacts on patients' survival remain understudied. **Methods.** The impacts of acute (including stroke) and chronic cerebrovascular conditions, Alzheimer's disease (AD), Parkinson's disease (PD), and dementia on survival of lung cancer patients were studied at baseline and during follow-up for stage-/treatment-specific groups of patients aged 65+. Effects of cancer treatment (identified using procedure codes in SEER-Medicare data) were estimated using the Cox model, controlling by age, TNM stage, and 85 comorbidities of various systems. **Results.** 95,167 patients with stage I (31.4%), II (5.4%), IIIa (12.5%), IIIb (18.9%), and IV (31.8%) lung cancer were studied. Studied diseases significantly affected survival at all stages, with higher impacts of diseases occurred during follow-up. The effects were more pronounced for stages I-IIIa patients who underwent surgery and were decreased with advancing to stage IV. AD and dementia had the highest (HRs up to 5.62, varying by stage and treatment, $p < 0.05$) and PD had the lowest (HRs up to 1.88, $p < 0.05$) impact on survival. Occurrence of multiple cerebrovascular/neurodegeneratives comorbidities potentiated the death risk compared to the sum of the effects of each comorbid disease: e.g., the increases were detected for patients after surgery and after/during chemotherapy by factors of up to 1.5 ($p < 0.05$) and 1.9 ($p < 0.05$), respectively. **Conclusion.** The impact of cerebrovascular and neurodegenerative comorbidities on older lung cancer patients survival varies by stage and treatment. These results can aid the treatment selection process for patients with these comorbid conditions.

FACTORS ASSOCIATED WITH FUNCTIONAL DECLINE IN ALZHEIMER'S DISEASE

F. Yu¹, D. Vock², 1. *University of Minnesota School of Nursing, Minneapolis, Minnesota*, 2. *University of Minnesota Department of Biostatistics, Minneapolis, Minnesota*

Background: Decline in activities of daily living (ADLs) contributes to many poor health outcomes such as hospitalization, institutionalization, accelerated cognitive decline, and mortality in Alzheimer's disease (AD). Preventing decline in ADLs could mitigate those outcomes. **Methods:** This study examines factors associated with ADLs in older adults with AD using baseline data from an exercise study ($n=28$). ADLs were measured using the Disability in AD scale. Independent variables included measures of global cognition using the AD Assessment Scale-Cognition and Mini-Mental State Examination (MMSE); executive function using the Behavioral Dyscontrol Scale-I, Trail Making Test, Executive Interview-25 (EXIT-25), Controlled Oral

Word Association Test, and Stroop; physical fitness using the Shuttle Walk Test (SWT), physical function using the 6-minute Walk (6MW) and Short Physical Performance Battery (SPPB), behavioral and psychological symptoms of dementia (BPSD) using Neuropsychiatric Inventory-Caregiver (NPI-Q), AD stage using the Clinical Dementia Rating (CDR), and demographics. The Pearson correlation between ADLs and independent variables were calculated and a multivariable linear regression model was fit. **Results:** The sample was on average 78.1-years-old with 16.1-year education, MMSE 19.7, and 61% female. Variables significantly associated with ADLs included CDR ($r=-.58$, $p=.001$), 6MW ($r=.45$, $p=.018$), SWT ($r=.49$, $p=.009$), SPPB ($r=.55$, $p=.002$), NPI-Q caregiver distress ($r=-.39$, $p=.043$), NPI-Q severity ($r=-.38$, $p=.045$), and EXIT-25 ($r=-.41$, $p=.028$). The regression model with those variables as predictors explained 68.2% of the variance in ADLs ($p=.009$). **Conclusions:** Dementia stage, executive function, physical fitness, physical function, and BPSD are associated with ADLs in AD, which provides therapeutic targets for maintaining ADLs.

SESSION 1245 (PAPER)

ELDER ABUSE

AGE-FRIENDLY BANKING: BEST PRACTICES IN FIGHTING FINANCIAL EXPLOITATION, CAREGIVER SUPPORT AND ACCESSIBILITY

J. Gunther, AARP, Washington, District of Columbia

Age-friendly banking is becoming ever more important. While an important and influential segment of the population, the 50+ are also some of the most vulnerable to financial exploitation. Every year \$3 billion is stolen from seniors; the average victim loses \$120,303, which is nearly 90 percent of the amount saved by older families for retirement. As America's older population grows there is a need for the financial system to adapt to a new norm. New groundbreaking AARP research shows the current banking trends of seniors and accessibility needs of seniors so banks can provide a positive user experience. In addition, this research shows how banks play a central role as the aging population grows as banks will experience a rise in their bank deposits as well as deposit rise in deposit fraud. Banks are in the special role to provide damage control on the cost of fraud both in training employees but also by providing products and services that empower seniors and their caregivers to prevent exploitation. This study examines ways in which banks across the world have been working to address fraud and ways in which your bank can be your ally in preventing these frauds. This paper examines case studies of three banks across the world and the practices products and services that these financial institutions are adopting to better protect the financial resiliency of the 50+.