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This qualitative study draws on 76 ethnographic case studies with Cash and Counseling participants, examines what participants and their caregivers saw the support broker doing, and looks at what the participants found helpful and less than helpful. Participants and their caregivers saw support broker duties as Coaching, Problem Solving, Advocacy and Monitoring. Equally important was how the support broker performed these roles. Six attributes that mattered to participants were: Familiarity, Supportive Relationship, Proactive Engagement, Responsiveness, Knowledge and Cultural Friendliness. These findings from the participant and caregiver perspective have great import for the training of present and future care managers and support broker, and have implications for regulatory and even licensure requirements. These results can be a first step in constructing a quality framework for self-directed supports and services.

#### WORK FORCE COMPETENCIES AND TRAINING FOR SELF-DIRECTED SERVICE PROGRAMS

Mark Sciegaj,<sup>1</sup> and Nancy Hooyeman<sup>2</sup>, *1. Penn State University, University Park, Pennsylvania, United States, 2. University of Washington, Seattle, Washington, United States*

In 2017 over one million individuals of all ages were enrolled in approximately 260 self-directed long-term services and support programs nationwide. Research conducted by the National Resource Center for Participant-Directed Care (NRCPDS) and the Council for Social Work Education identified training gaps among current aging and disability network professionals and within social work education. Believing that both self-directing individuals and their family caregivers would benefit from a workforce that has the knowledge and skills to implement the principles of self-directed care, NRCPDS and CSWE working with national professional organizations and government agencies have identified workforce competency domains and developed a number of training resources that can be used in both academic and professional settings. This presentation will review the work of NRCPDS and CSWE in workforce competencies, training resources, and recommendations for self-directed services training.

#### RESEARCH CAN CHANGE PROGRAMS AND POLICY

Lori Gerhard<sup>1</sup>, *1. U.S. Administration for Community Living, Washington, District of Columbia, United States*

In addition to increasing knowledge, research is meant to improve practice and policy. The papers presented in this symposium draw from the experiences and insights of actual participants and their caregivers in major government-sponsored program options for people with disabilities wanting to remain in the community. Many of these programs are administered by our Administration for Community Living. For all, ACL serves as a main source of information for people in the community. These papers give us first-hand knowledge of what participants like and what they want improved. They give us guidance on how consumers define quality; the

results can guide efforts to improve program design and the training of support brokers and representatives who assist people who want to manage their own supports and services. I will give a few examples starting with the paper on the Veterans-Directed Care Program and drawing ideas from the other papers.

### SESSION 1240 (SYMPOSIUM)

#### PERCEIVED MENTAL FATIGABILITY: NOVEL INSIGHTS INTO SOCIOBEHAVIORAL CORRELATES AND HERITABILITY

Chair: Nancy W. Glynn, *University of Pittsburgh, Department of Epidemiology, Pittsburgh, Pennsylvania, United States*

Discussant: Eleanor M. Simonsick, *Longitudinal Studies Section, Intramural Research Program, National Institute on Aging, Baltimore, Maryland, United States*

Fatigue, a common patient-reported outcome, is a unique risk factor associated with both cognitive and physical function. Perceived mental fatigability, a self-report measure of cognitive fatigue anchored to activities of fixed intensity and duration, eliminates self-pacing bias, and therefore is a more sensitive measure of the degree to which cognitive tiredness limits activity. Higher perceived mental fatigability has been associated with functional decline and lower grey matter brain volumes in older adults. We developed the Pittsburgh Fatigability Scale (PFS), a self-administered, 10-item tool to assess perceived physical and mental fatigability across a range of activities, which is widely used internationally. We previously validated the PFS physical subscale. Using a large multicenter international cohort, the Long Life Family Study, we will present the validation of the PFS mental subscale, examine its epidemiology, and explore genetic and socio-behavioral factors associated with perceived mental fatigability in older adults. Specifically, Ms. Renner will share the results of the validation of the PFS mental subscale; Ms. Meinhardt will present heritability and prevalence of higher perceived mental fatigability across age strata and sex; and Ms. Gmelin will consider the link between stress and coping styles on perceived mental fatigability. Further, using a smaller methodological study, the Developmental Epidemiologic Cohort Study, Ms. Graves will explore whether diurnal patterns of physical activity using accelerometry differ in older adults with higher versus lower perceived mental fatigability. Dr. Simonsick, our Discussant, will critically review the presentations and share future directions to inform potential interventions aimed at lowering perceived mental fatigability.

#### THE PITTSBURGH FATIGABILITY SCALE: VALIDATION OF THE MENTAL SUBSCALE IN THE LONG LIFE FAMILY STUDY

Sharon W. Renner,<sup>1</sup> Patrick J. Brown,<sup>2</sup> Todd M. Bear,<sup>3</sup> Stacy L. Andersen,<sup>4</sup> Stephanie Cosentino,<sup>5</sup> Robert M. Boudreau,<sup>6</sup> Adam J. Santanasto,<sup>6</sup> and Nancy W. Glynn<sup>6</sup>, *1. University of Pittsburgh Graduate School of Public Health, Pittsburgh, Pennsylvania, United States, 2. Department of Clinical Psychology in Psychiatry, College of Physicians & Surgeons, Columbia University, New York, New York, United States, 3. Department of*

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We previously validated the physical, but not the mental subscale of the Pittsburgh Fatigability Scale (PFS). Thus, we aimed to validate the PFS mental subscale in 1,738 individuals aged  $\geq 60$  from the Long Life Family Study (55.5% female, age  $74.8 \pm 11.1$  years, PFS mental score  $7.1 \pm 10.1$ , range 0-50). Confirmatory factor analysis with promax rotation showed all 10 items loaded on two factors: social and physical activities (SRMR=0.07, RMSEA=0.13, CFI=0.90). PFS mental score had strong internal consistency (Cronbach's  $\alpha=0.90$ ) and demonstrated moderate concurrent and construct validity using Pearson correlations against measures of cognition (Trail Making A ( $r=0.26$ ) and B ( $r=0.29$ ) time), gait speed ( $r=-0.30$ ), and the Center for Epidemiologic Studies Depression Scale ( $r=0.35$ ),  $p < 0.0001$  for all. In conclusion, by accounting for self-pacing inherent in common fatigue questionnaires, the validated PFS mental subscore may be a more sensitive tool to examine perceived mental fatigability as an important contributor to cognitive and physical function.

#### PREVALENCE AND HERITABILITY OF PERCEIVED MENTAL FATIGABILITY IN THE LONG LIFE FAMILY STUDY

Alexa J. Meinhardt,<sup>1</sup> Theresa Gmelin,<sup>2</sup> Allison L. Kuipers,<sup>2</sup> Stacy L. Andersen,<sup>3</sup> Stephanie Cosentino,<sup>4</sup> Mary K. Wojczynski,<sup>5</sup> Kaare Christensen,<sup>6</sup> and Nancy W. Glynn<sup>2</sup>, 1. *University of Pittsburgh, Department of Epidemiology, Pittsburgh, Pennsylvania, United States, 2. University of Pittsburgh Graduate School of Public Health, Pittsburgh, Pennsylvania, United States, 3. Boston University School of Medicine, Boston, Massachusetts, United States, 4. Columbia University Department of Neurology, New York, New York, United States, 5. Washington University School of Medicine in St. Louis Department of Genetics, St. Louis, Missouri, United States, 6. University of Southern Denmark, Odense, Nordjylland, Denmark*

We examined the prevalence and heritability of perceived mental fatigability among older adults enrolled in the Long Life Family Study. Participants (N=2342; 55% female) self-administered the Pittsburgh Fatigability Scale (PFS; scores range 0-50; higher score=greater fatigability). Using the PFS mental subscale, we evaluated differences across age strata (adjusted for family structure and field center) and estimated genetic heritability using the variance covariance methods implemented in SOLAR to determine genetic heritability (adjusted for age, sex, and field center). PFS mental score (mean $\pm$ SD) and prevalence of higher mental fatigability (PFS  $\geq 13$ ) was greater across age strata: 60-69 (N=996,  $5.9 \pm 6.5$ , 14.5%), 70-79 (N=830,  $6.8 \pm 7.6$ , 18.7%), 80-89 (N=251,  $11.7 \pm 10.8$ , 41.8%), and  $\geq 90$  (N=265,  $20.2 \pm 13.6$ , 67.2%),  $p < 0.0001$ . Only among those  $\geq 90$ , females ( $21.7 \pm 13.5$ ) had greater mental fatigability than males ( $18.0 \pm 13.5$ ),

$p=0.03$ . Residual heritability of mental fatigability was 0.17,  $p < 0.0001$ . Future analyses will evaluate correlates of mental fatigability to identify potential avenues for intervention.

#### ROLE OF COPING STYLES AND NEGATIVE LIFE EVENTS ON HIGHER PERCEIVED MENTAL FATIGABILITY IN OLDER ADULTS

Theresa Gmelin,<sup>1</sup> Stacy L. Andersen,<sup>2</sup> Robert M. Boudreau,<sup>3</sup> Kaare Christensen,<sup>4</sup> Mary K. Wojczynski,<sup>5</sup> Stephanie Cosentino,<sup>6</sup> and Nancy W. Glynn<sup>3</sup>, 1. *University of Pittsburgh, Department of Epidemiology, Pittsburgh, Pennsylvania, United States, 2. Boston University School of Medicine, Boston, Massachusetts, United States, 3. University of Pittsburgh, Pittsburgh, Pennsylvania, United States, 4. University of Southern Denmark, Odense, Syddanmark, Denmark, 5. Washington University School of Medicine in St. Louis, St. Louis, Missouri, United States, 6. Columbia University, New York, New York, United States*

Older adults are vulnerable to negative recent life events (RLE) which deplete attentional resources and leads to cognitive exhaustion. Adaptive coping styles reduce perceived stress severity but their role on cognitive tiredness is unknown. We examined RLE and coping styles on perceived mental fatigability (Pittsburgh Fatigability Scale (PFS), 0-50pts, higher=greater fatigability) in the Long Life Family Study (N=1464, age= $74.7 \pm 12.6$ , female=57.7%, 43.9%  $\geq 1$  major RLE past 6 months, 27.8% higher mental fatigability  $\geq 13$ ). All analyses adjusted for family structure, field center, age, and sex. PFS mental scores correlated with all NEO-FFI (60-item, 5-domain) personality traits representing maladaptive (neuroticism  $r=0.25$   $p < 0.0001$ ) and adaptive (conscientiousness  $r=-0.18$ , extraversion  $r=-0.24$ ,  $p < 0.0001$ ) coping. Having  $\geq 1$ RLE was associated with higher mental fatigability (OR=1.4, 95% CI:1.2,1.8,  $p=.0004$ ); adjustment for neuroticism (OR=1.3, 95% CI:0.9,1.7,  $p=.06$ ) attenuated the association. Education on adaptive coping may be a modifiable skill that allows older adults to maintain lower perceived mental fatigability despite stressful events.

#### IS VARIABILITY OF FREE-LIVING ACTIVITY ASSOCIATED WITH PHYSICAL AND MENTAL FATIGABILITY IN OLDER ADULTS?

Jessica L. Graves,<sup>1</sup> Robert T. Krafty,<sup>2</sup> Jaroslaw Harezlak,<sup>3</sup> Eric J. Shiroma,<sup>4</sup> and Nancy W. Glynn<sup>2</sup>, 1. *University of Pittsburgh, Department of Epidemiology, Pittsburgh, Pennsylvania, United States, 2. Department of Biostatistics, Graduate School of Public Health, University of Pittsburgh, Pittsburgh, Pennsylvania, United States, 3. Department of Epidemiology and Biostatistics, School of Public Health, Indiana University, Bloomington, Indiana, United States, 4. Laboratory of Epidemiology and Population Science, National Institute on Aging, Bethesda, Maryland, United States*

Greater fatigability in older adults may be moderated by physical activity (PA). However, what features of PA timing are most strongly related to fatigability remains unknown. We examined the relationship between variability of free-living activity patterns and perceived physical and mental fatigability using the Pittsburgh Fatigability Scale (PFS, 0-50pts, higher=greater fatigability) in older adults from the Developmental Epidemiologic Cohort Study (DECOS, n=57,