

## AMERICAN SOCIETY OF HEMATOLOGY-ASP GERIATRIC HEMATOLOGY RESEARCH AWARD



### AWARD RECIPIENT

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### PROJECT

"FUNCTIONAL AND COGNITIVE ASSESSMENT IN OLDER ADULTS WITH ACUTE MYELOGENOUS LEUKEMIA"

### MENTORSHIP TEAM

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Optimal therapy for older adults with acute myelogenous leukemia (AML) is unclear. While selected older patients can benefit from standard therapies, as a group these patients experience increased treatment-related toxicity, decreased remission rates, and decreased overall survival. Research efforts to define optimal therapy have focused on age-related changes in tumor biology and their impact on prognosis. Less attention has been focused on host-specific clinical characteristics, which might predict vulnerability to toxicity and for which chronologic age alone is an inadequate measure. Practical clinical assessment tools that reflect both an individual patient's pathologic burden of disease and age-related physiologic changes could add important prognostic information by improving toxicity prediction.

We aim to explore (1) the predictive value of pretreatment self-reported physical function and objective physical performance assessment on treatment-related mortality and overall survival as well as (2) the relationship between cytogenetic risk group and measures of physical function. Building upon preliminary feasibility data, we proposed a prospective study of patients aged 60 years and older admitted to our leukemia service with newly diagnosed AML whose Eastern Cooperative Group Performance Score is 0-2. We will assess pretreatment physical function using measures previously validated in the geriatric population, specifically the Pepper Assessment Tool for Disability (PAT-D), Short Physical Performance Battery, and grip strength. Results from this study will be used to design a larger multi-site

study powered to determine which single measure of physical function best predicts specific treatment related toxicities in older adults with AML. Improving patient assessment strategies is critical to identify those patients who are most likely to benefit from standard therapies as well as to identify characteristics of vulnerable older adults who should be targeted for novel interventions.

Overall, my academic career goal is to become an independent clinician-researcher integrating the fields of hematology/oncology and geriatrics, focusing on three themes:

1. The predictive value of baseline physical and cognitive function on treatment response and toxicity.
2. The impact of cancer therapy on physical and cognitive function.
3. Interventions to promote functional independence during treatment.

I have completed specialty training in hematology, oncology, and geriatrics as well as a master's degree in health sciences research. The support of the American Society of Hematology-ASP Geriatric Hematology Research Award will provide a critical bridge from intramurally funded preliminary work to an externally funded research program focused on translating geriatric principles into the treatment of malignancies using AML as the model.