PROMOTION RECOMMENDATION UNIVERSITY OF MICHIGAN MEDICAL SCHOOL DEPARTMENT OF PHYSICAL MEDICINE AND REHABILITATION

<u>Susan L. Murphy, Sc.D.</u>, assistant professor of physical medicine and rehabilitation, Department of Physical Medicine and Rehabilitation, Medical School, is recommended for promotion to associate professor of physical medicine and rehabilitation, with tenure, Department of Physical Medicine and Rehabilitation, Medical School [also being promoted to research associate professor, Institute of Gerontology, Medical School].

Academic Degrees:

Sc.D.	1999	Boston University
M.S.	1997	Boston University
B.S.	1994	Western Michigan University

Professional Record:

2008-present	Assistant	Professor	of	Physical	Medicine	and	Rehabilitation,
	University	of Michiga	an				
2006-present	Research.	Assistant P	rofe	ssor, Insti	tute of Ger	ontol	ogy, University

of Michigan

2004-2006 Research Investigator, Institute of Gerontology, University of

Michigan

Summary of Evaluation:

Teaching: Dr. Murphy has established herself as an innovator in teaching with the development of the Practice Oriented Research Training (PORT) Program. Based on an idea by Dan Clauw to train practicing clinicians in research and with support of the Physical Medicine and Rehabilitation (PM&R) Department, Dr. Murphy developed the program and recruited a colleague to co-lead it for clinicians in PM&R in 2008. The program was given annually and officially sponsored by MICHR in 2010 where Dr. Murphy now is a faculty lead in the MICHR Education and Mentoring Core. The program has served over 100 clinicians since 2008 and several have gone on to present their findings at meetings, publish manuscripts, and pursue additional funding. Her teaching efforts get very high ratings on evaluations. Due to its success. PORT is being 'exported' by MICHR to another university where Dr. Murphy will serve as a mentor to the future instructors of the sister program. Dr. Murphy's experience at MICHR has led to other leadership opportunities. Specifically, she was asked to be the interim associate director for the Education and Mentoring Core when the previous associate director decided to leave the university to take a Dean position in the School of Pharmacy. Dr. Murphy asked to serve as a co-lead in this position because she was writing her first R01 and did not think she could devote the time required to lead the core optimally alone. After serving five months as cointerim, a new person was hired and Dr. Murphy was approached about serving in additional leadership positions in MICHR. Currently, Dr. Murphy gives several presentations for MICHR

per year and will direct the On Job On Campus (OJOC) program in the Fall. Since 2008. Dr. Murphy has done extensive research mentoring of people at all levels ranging from students, staff, clinicians, and faculty. Most mentoring is with clinicians in the PORT program; she has also served on three dissertation committees and was a mentor of an undergraduate student's honors thesis. Recent mentoring has also included post-doctoral fellows and faculty members. Notably, one recent post-doctoral fellow completed her training and went to the University of Southern California where she is completing a fellowship and writing a K12 application. Another junior faculty member has a career development proposal at the VA under review in which Dr. Murphy is the primary mentor. Dr. Murphy's mentorship areas are becoming more refined over time and people often seek her mentorship in areas of osteoarthritis, clinical trials. physical activity measurement, and ecological momentary assessment. Lastly, Dr. Murphy continues to give presentations locally and nationally on various topics pertaining to research conduct and grant writing. One recent invited presentation given via webinar for the American OT Association was on how researchers and clinicians can collaborate to conduct high quality research. In her associate editor role at the American Journal of Occupational Therapy, she has written some recent editorials with the editor on issues of intervention fidelity and clinical trial reporting.

Research: Since 2008, Dr. Murphy has made it a priority to become an independently funded researcher. She has a strong record of career development funding from her pre-doctoral to current stage including two T32 grants, an F32 post-doctoral award, and a K01 award. She has also been consistently funded on research grants which included three internal grants, a foundation grant, and most notably, two VA Merit awards (one as co-PI and one as PI) from the VA Rehabilitation Research and Development Branch. The Merit awards are the VA equivalent to a NIH R01 award and they ranged in funding from \$750,000-820,000 in direct costs. Dr. Murphy recently secured a grant with a drug company to examine pain flares using her ecological momentary assessment method and received an additional two-year pilot grant from the VA RR&D. Dr. Murphy continues to have a 5/8th appointment at the VA and a 44% appointment at the University. Dr. Murphy's primary research goal is to develop optimal rehabilitation interventions for people with chronic pain. She has been working towards this goal in the area of osteoarthritis for the last seven years and has recently branched out into designing interventions for veterans with chronic low back pain. In addition, Dr. Murphy is a co-investigator on an R01 project examining the effects of acupressure on fatigue in breast cancer survivors and has been involved in several grant proposals with faculty from various departments including family medicine, social work, and anesthesiology.

Recent and Significant Publications:

Murphy SL, Smith DM: Ecological measurement of fatigue and fatigability in older adults with osteoarthritis. *J Gerontol A Biol Sci Med Sci* 65A:184-189, 2010.

Murphy SL, Lyden AK, Phillips K, Clauw DJ, Williams DA: The association between pain, radiographic severity, and centrally-mediated symptoms in women with knee osteoarthritis. *Arthritis Care Res* 63:1543–1549, 2011.

Murphy SL, Lyden AK, Phillips K, Clauw DJ, Williams DA: Subgroups of older adults based upon differing symptom presentation and potential underlying pain mechanisms. *Arthritis Res Ther* 13, R135, 2011.

Alshuler K, Hoodin F, Murphy SL, Rice J, Geisser ME: Factors contributing to disability in a chronic low back pain population: A comprehensive analysis using continuous ambulatory monitoring. *Pain* 152:2521-2527, 2011.

Schepens S, Kratz AL, Murphy SL: Fatigability in osteoarthritis: Effects of an activity bout on subsequent symptoms and activity. *J Gerontol A Biol Sci Med Sci.* doi:10.1093/gerona/gls076 9epub ahead of print.

Service: Dr. Murphy has many service roles in and outside the university. She serves on the Research Advisory Committee in PM&R, and is on several advisory committees for MICHR. Nationally, she serves as a member of the Scientific Advisory Council in the American College of Rheumatology's Research and Education Foundation, is on several advisory panels for the American Occupational Therapy Association, and was recently the conference president and executive committee member of the Society of Ambulatory Assessment, an international research group that University of Michigan hosted for their biannual scientific meeting. Dr. Murphy received an R13 conference grant from NIH to fund this conference. Dr. Murphy is an associate editor of the American Journal of Occupational Therapy and serves on the editorial boards of Arthritis Care and Research and the Journal of Applied Gerontology. She served on study sections for the American College of Rheumatology, Arthritis Foundation, and the VA Rehabilitation Research and Education Branch. She has been invited to serve as a grant reviewer on topics of physical activity and osteoarthritis from the Australian government and the UK research council. She continues to review manuscripts for a variety of journals.

External Reviewers:

Reviewer A: "Dr. Murphy has been a leader in the field of behavioral interventions for chronic pain....Dr. Murphy also shows a very strong commitment to education, including both teaching and mentoring. In particular, she has provided mentorship to an impressive number of junior health professional researchers....Dr. Murphy has served as a reviewer, editorial board member, and associate editor for multiple journals and has been a grant reviewer for multiple organizations. In summary, her track record with regard to organizational service and interdisciplinary achievement (as evidenced by the different professional organizations with which she has volunteered) is stellar."

Reviewer B: "Her work in physical and behavioral management of fatigue and pain is leading the profession's efforts to address the issues faced by older adults with chronic disease. Evidence of her accomplishments includes becoming a fellow of the Gerontological Society of America, an award that recognized her sustained contributions to the scientific support of aging....Dr. Murphy has not compromised her science by her service; rather, she has used the knowledge to influence the development of measures, practices and policy that will improve the health of older adults with chronic health conditions. Her service is at the international, national and university level. She is a good citizen."

Reviewer C: "Dr. Murphy has generated a series of high quality publications which are conceptually rich and have greatly increased our understanding of the relationship between chronic pain, fatigue, and physical activity, especially amongst older adults with osteoarthritis....I cannot think of any weaknesses in this candidate, and her strengths are considerable. Her academic achievement has already contributed significantly to rehabilitation science, and I envision continued success in research, in teaching, and in service."

Reviewer D: "Dr. Murphy is an excellent scientist with outstanding potential to continue her high level of scholarly productivity....Dr. Murphy has demonstrated the ability to publish in the best journals in her field and to secure external funding to support her research. She is actively involved in education and mentoring the next generation of researchers in rehabilitation. I am very confident that Dr. Murphy's application for promotion to associate professor would be successful at the best departments of rehabilitation in North America."

Reviewer E: "...Dr. Murphy would garner promotion to Associate Professor at our institution and deserves it at yours based on carving out a unique mix of research topics focused on the etiology of pain, applying rigorous methods to her work, and being able to communicate to those who are methodologically sophisticated and a readership that is largely interested in the results not the methods."

Summary of Recommendation:

Dr. Murphy has demonstrated a strong and consistent record of grant funding from various sources and has established herself as an expert in ecological momentary assessment and clinical trial designer of non-pharmacological chronic pain interventions. Further she contributes greatly to educational endeavors at the university and beyond. Her leadership and teaching contributions are valued and evident by her increased responsibilities and effort coverage from MICHR. We anticipate that this momentum will continue and feel fortunate to have her on faculty. I strongly recommend Susan L. Murphy, Sc.D. for promotion to associate professor of physical medicine and rehabilitation, with tenure, Department of Physical Medicine and Rehabilitation, Medical School.

James O. Woolliscroft, M.D.

Dean

Lyle C. Roll Professor of Medicine