PROMOTION RECOMMENDATION The University of Michigan School of Nursing

Patricia A. Abbott, associate professor of nursing, without tenure, School of Nursing, is recommended for the granting of tenure to be held with her title of associate professor of nursing, School of Nursing.

Academic Degrees:

1999	University of Maryland, Operations Analysis/Information System Science,
	Baltimore, MD
1996	University of Maryland, Operations Analysis/Information System Science,
	Baltimore, MD
1992	University of Maryland, Nursing Informatics, Baltimore, MD
1989	University of Maryland, Nursing, Baltimore, MD
1978	Harford Community College, Bel Air, MI
	1996 1992 1989

Professional Record:

2015 - Present	Director, Hillman Scholars Program, School of Nursing, University of
	Michigan
2012 - Present	Associate Professor, School of Nursing, University of Michigan
2012 - 2012	Associate Professor, School of Medicine, Johns Hopkins University
2012 - 2017	Adjunct Associate Professor, School of Medicine, University of Maryland
2012 - 2013	Adjunct Associate Professor, School of Nursing, Johns Hopkins University
2010 - Present	Adjunct Associate Professor, American University of Beirut, Lebanon
2009 - 2012	Associate Professor and Co-Director of the World Health Organization/Pan
	American Health Organization, School of Nursing, Johns Hopkins University
2009 - 2012	Associate Professor, School of Medicine, Johns Hopkins University
2006 - 2008	Research Fellow, School of Medicine, Johns Hopkins University
2003 - 2008	Assistant Professor and Co-Director of the World Health Organization/Pan
	American Health Organization, School of Nursing, Johns Hopkins University
2003 - 2008	Assistant Professor, School of Medicine, Johns Hopkins University
2001 - 2002	Assistant Professor, School of Medicine, University of Maryland
1999 - 2003	Adjunct Assistant Professor, School of Nursing, University of Maryland
1999 - 2003	Director of Graduate Programs, School of Nursing, University of Maryland
1998 - 2003	Assistant Professor, School of Nursing, University of Maryland
1997 – 1998	Clinical Instructor, School of Nursing, University of Maryland

Summary of Evaluation:

<u>Teaching:</u> Professor Abbott focuses her teaching in the realm of data-driven science and health informatics. She has been involved in the teaching of 11 didactic courses, one independent study and supervised students in N995 and N955. In addition, she has held Hillman Scholar doctoral seminars, including graduate courses: N654, N811, N653, N510, N710, N955, N995 and N697. Teaching evaluations are consistently strong across all of Professor Abbott's teaching, with a range of 4.1 to 5.0 for all teaching evaluations. Since 2012, she has been the chair of one PhD committee, served on two PhD committees, chaired two DNP project committees and served on one DNP project committee. A peer observation of teaching provides evidence of the high quality of Professor Abbott's didactic teaching and highlights her ability to engage and stimulate diverse students.

Professor Abbott led the initiation and development of the health informatics programming in not only the School of Nursing but across the discipline. Professor Abbott has been instrumental in developing and implementing teaching in the area of informatics since 2012; developing new courses, routinely contributing to curricular design and mentoring approximately 10 students per year in the informatics concentration of the Master's Program. In its second year of existence, the informatics area in the School of Nursing (2016) was ranked by U.S. News and World Report as 10th in the nation out of 250, and in 2017, the concentration was ranked 8th. Professor Abbott has contributed significantly to the teaching mission of the School of Nursing through her focus on teaching graduate-level courses in informatics. As the director of the Hillman Scholars Program, she is guiding the next generation of nurse scientists. She has served as a mentor/advisor to a number of other students in her role as director and international scholar. Professor Abbott has also mentored both post-doctoral research fellows (two) and junior faculty (one) since 2012. She is a strong advocate for Interprofessional Education and Team-based (IPE) training and knowledge exchange, particularly in a rapidly digitizing world and brings this perspective into her teaching and mentoring.

In addition to classroom teaching, Professor Abbott has demonstrated a progressively expanded level of invitations as a speaker for a variety of conferences to provide educational sessions regarding informatics, the evolution of the field and the expansion of this work to low-resource settings at local, regional, national and now international forums.

<u>Research:</u> Professor Abbott identifies three research foci: 1) integrated scholarship and informatics science, application, and inter-professional informatics education; 2) acceleration of United States and global advances in health Information and Communication Technologies (ICT) focusing on vulnerable populations; and 3) the development and rapid expansion of the nursing informatics professional specialty expertise.

Professor Abbott has published 15 peer-reviewed, databased manuscripts (with five as first-author) at the following rate: two in 2012, five in 2013, two in 2014, one in 2015, four in 2016, no publications in 2017, and one in 2018 with two under review. Out of these papers, Professor Abbott has published with eight students. She has five book chapters (three as first-author) and three monographs. Her publications are in a range of journals that include high-impact journals in her field such as *Nursing Informatics, Online Journal of Nursing Informatics*, and the *International Journal of Informatics*. A considerable number of her publications are conference proceedings (peer-reviewed). Of particular note, one of Professor Abbott's publications was commissioned by the WHO and used as a reference at the 2017 World Health Assembly. When not listed as a first-author, Professor Abbott is generally listed as a middle-author. Despite this, her publication rate and volume is somewhat low.

Since 2012, Professor Abbott has initiated new projects and developed new collaborations, and she has been a part of projects as an investigator or lead at the level of \$6.2 million. Professor Abbott has submitted four other external grants since 2012: a R01 as principal investigator (PI), a R25 as co-PI and a R18 as PI that were not funded, and a R21 as PI that was scored and is currently under council review. Professor Abbott has received a number of internal grants since 2012, as both PI and multiple PI, including funding from Council on East Asian Studies (CEAS), CRLT, and the UM Cardiovascular Center. She was also a lead on one of the original MCubed grants in 2013 with the UM College of Engineering and the UM College of Pharmacy. She has successfully transitioned her research focus to include health equity and access to informatics in low-resource settings and has initiated some funding for research in this arena. In 2015, Professor Abbott stepped into the role of director of the Hillman Scholars Program (which funds PhD students in nursing.

Professor Abbott is one of a handful of informatics researchers who have had a direct impact on policies advocated by state and federal agencies. Professor Abbott was recognized for her scholarship and contribution to the field of informatics with a Visionary Pioneer Award from the University of Maryland in 2015. She has been described as a pioneer in the emerging field of nursing informatics, which she joined in its infancy and has since been a leader in its development. She has served on a number of national committees, most notably within the American Medical Informatics Association, including leadership within the scientific program committee and more recently international committees. She is a well sought-after speaker with 13 national and 19 international competitive or invited presentations, as well as an author of 32 peer-reviewed presentations at the national and international levels. She is also a fellow of the American Academy of Nursing and American College of Medical Informatics.

Recent and Significant Publications:

- Abbott, P., Banerjee, T., Yujra, A., and Piette, J. (2018). "Exploring chronic disease in Bolivia: a cross-sectional study in LaPaz." *PLOS One*, 2018; February 7, 2018.
- Abbott, P., Omollo, K., Bell, S., Rana, G., Hammond, N., Mutumba, M., Jiang, Y., and Mwenesi, R. (2016). "An Exploration of National Policies and Effective Practices for Electronic and Mobile Learning for Nursing and Midwifery Education." WHO Commissioned, Peer-Reviewed Monograph, 2016; January 2016.
- Abbott, P., Foster, J., Marin, H., and Dykes, P. (2013). "Complexity and the science of implementation in health IT-knowledge gaps and future visions." *International Journal of Medical Informatics*, 2013; 83(7), pp. e12-e22.
- Mohan, V., Abbott, P., Acteson, S., Berner, E., Devlin, C., Hammond, W., Kukafka, R., and Hersh, W. (2013). "Design and evaluation of the ONC health information technology curriculum." JAMLA, 2013; 21, 509-516.
- Abbott, P. (2012). "Effectiveness and clinical usability of a handheld information appliance." Nursing Research and Practice, 2012; 1-8. Article ID 307258.

<u>Service:</u> Professor Abbott has demonstrated significant commitment to leadership in the field of nursing informatics. She is a member of the WHO's Technical Advisory Group for e-Health (e-Health TAG), a highly selective appointment that is limited to those who are seen as global leaders in their field. This is an indicator that Professor Abbott has a strong external international reputation as a leader in informatics. She is also on the Board of Directors of the Open Source Electronic Health Record Association (OSEHRA; Department of Veterans Affairs), and she has served on several task forces for the National Quality Forum (NQF) focused on issues of digital quality measures. In her role for NQF, Professor Abbott was able to contribute a clinician's perspective to the development of digital quality measures. She is routinely sought out as an international consultant to provide technical assistance on issues of data governance and informatics. She is a member of multiple professional societies, including Sigma Theta Tau and the American Medical Informatics Association.

Professor Abbott has provided service within the School of Nursing and broadly within the university, serving on several committees (e.g., Appreciative Inquiry Curriculum Revision, PhD and Master's candidate review committees, Curriculum Committee, etc.) and task forces (Dean's Teaching and Learning Task Force). She served on the Board of Directors for CRLT, where she served as a grant reviewer for funding initiatives and provided leadership for strategic campus-wide planning. She routinely reviews manuscripts for a number of journals (e.g., the *Journal of the American Medical Informatics Association (JAMIA)*, the *Journal of Biomedical Informatics*, etc.) and

serves on a number of National Institutes for Health (NIH) standing review sections and international grant reviews (Global Fund). She was a member of the cross-university Disruptive Innovations Group (DIG) in 2014-2015. The internal report that was produced by the DIG ("Care at Home") was used as a scaffold for the eventual partnership with IBM's Watson Health project at UM that is focused on predictive classifiers for readmission reduction.

External Reviewers:

Reviewer A: "[Professor] Abbott's research work is excellent. She has been one of the most well recognized individuals in the field of nursing informatics..."

Reviewer B: "[Professor] Abbott has been a pioneer in nursing informatics. She and her fellowpioneers have literally created the field of nursing informatics and she remains an instrumental participant in its evolution."

Reviewer C: "... [Professor] Abbott is a highly regarded expert and leader in the field of health and nursing informatics, nationally and internationally."

Reviewer D: "It is clear that [Professor] Abbott has a clear commitment to training the next generation, and is a regularly sought mentor."

Reviewer E: "Her impact as a mentor is evidenced by the success of her graduates who are now leaders and research scientists in the discipline of health care informatics."

<u>Summary of Recommendation:</u> Professor Abbott is recognized as a productive scientist who has made significant contributions to nursing informatics. She is successful as an independent researcher and as a key collaborator. Her work has achieved national and international notice. Professor Abbott has a solid record of academic, professional and community service. She is an excellent teacher and mentor. It is with the support of the School of Nursing Executive Committee that I recommend Patricia A. Abbott for the granting of tenure to be held with her title of associate professor of nursing, School of Nursing.

Patricia D. Hurn Dean and Professor School of Nursing

May 2019