
**Memorial Resolution of the Faculty of the University of Wisconsin-Madison
On the Death of Professor Emerita Hanna M. Sobkowicz**

Dr. Hanna Maria Sobkowicz (Sobkowicz-Rose), Professor Emerita of Neurology at the University of Wisconsin School of Medicine and Public Health, died on March 31, 2018 at age 87. She was an internationally recognized neuroscientist who studied the development and regeneration of the neural tissue in organotypic culture models.

Hanna Sobkowicz was born in 1931 in Warsaw, Poland. She received her M.D. degree in 1954 and her Ph.D in 1962 from the Warsaw Medical Academy. After a one year internship in Internal Medicine, she completed residency training in Neurology during 1955-1959 at the Department of Neurology, Warsaw Medical Academy, under Dr. Irena Hausmanowa-Petrusewicz, a celebrated Polish neurologist and internationally recognized expert and pioneer in the field of neuromuscular diseases and electromyography. After achieving board certification in Neurology in 1959, Dr. Sobkowicz served as an Assistant Professor of Neurology in the Department of Neurology of the Warsaw Medical Academy from 1959-63.

In 1963, she migrated to the US to obtain additional research training. She initially was a Research Fellow under the supervision of Murray B. Bornstein in the Laboratory of Cellular Neurophysiology at Mt. Sinai Hospital, New York, from 1963-1965. From 1963-1965 she worked with Margaret Murray as a Fellow of the National Multiple Sclerosis Society at the Laboratory of Cell Physiology, Columbia University, New York, where she was introduced to methods of organotypic neural tissue culture which were then in an early phase of technical development.

Dr. Sobkowicz was recruited by Francis Forster and Steven Kornguth to join the Department of Neurology, and in 1966 moved to the University of Wisconsin. She set up a tissue culture laboratory to study development and regeneration of the nervous system. She was promoted to Associate Professor in 1972, and to the rank of Professor of Neurology in 1979. She was the first woman professor in the Department of Neurology, and retired to Professor Emerita in 2006.

Dr. Sobkowicz was an internationally recognized neuroscientist in developmental neurobiology. She studied cellular growth, regeneration, and synaptogenesis in organotypic cultures which retained the structure of the nervous system in isolation from the intact organism. The techniques of organotypic tissue culture provide opportunities for experimental approaches which are difficult in the intact whole animal organism, and typically require elaborate and tedious efforts to successfully culture areas of the nervous tissue with retention of structure and intact circuitry. In the 1960s and 1970s only a few laboratories around the world were able to successfully conduct experiments using organotypic neural tissue culture. Dr. Sobkowicz mastered the nuances of the technique, and distinguished herself with a reputation for highly successful development of organotypic culture models of the spinal cord, the hypothalamus, and the mamillary bodies, which supported projects examining the development, organization, and regeneration of neuronal and glial cell populations in these areas. Her publications typically included light and electron microscopic photographs of outstanding quality and stunning, esthetic beauty, which captivated readers of her articles. In early 1970s she pioneered and developed the organotypic tissue culture of the organ of Corti which enabled study of defects of development of the auditory system and provided insights relating to the biology of auditory disorders in man. The successful development of organ of Corti organotypic cultures became the focus of many of her collaborative publications with her husband, Dr. Jerzy Rose, who made seminal discoveries in the field of the physiology of the auditory system, and predeceased her in 1992.

During her career, Dr. Sobkowitz's scholarly work included numerous research articles, book chapters, and abstracts, and she was a regular contributor at many national and international meetings. She served as a member of the Editorial Board for the International Journal of Developmental Neuroscience, and was a guest editor for several other scientific journals.

Dr. Hanna Sobkowitz was a significant contributor to interdisciplinary neuroscience on campus during the decade of 1960-1970 when the field was emerging as a major area of modern biology. During her 40 years of service at the University of Wisconsin she mentored undergraduate, graduate, and medical students, and introduced a significant number of neuroscientists to the techniques of organotypic culture who have contributed to a substantial body of knowledge about the structural features of neural circuits in health and disease.

She was a nature and animal lover, an avid gardener, and a passionate collector and cultivator of exotic plants and flowers. While her laboratory was notably lacking in windows and direct sunlight, she was remarkably successfully in growing plants under adverse conditions, perhaps part of the touch that contributed to successful growth of her tissue cultures. Her laboratory was frequently referred to by her collaborators and friends as a "botanic garden", a recognition which she cherished and which was a source of pride and satisfaction for her. Her sense of the natural beauty of the structures of living organisms strongly influenced her work.

Respectfully submitted by the Memorial Committee:

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