

# *Building for the Future: Toxicology Training Centers*



*Celebrating 50 Years  
of Service in Science*

## Building for the Future: Toxicology Training Centers

Society of Toxicology  
1821 Michael Faraday Drive  
Suite 300  
Reston, VA 20190

Tel: 703.438.3115

Fax: 703.438.3113

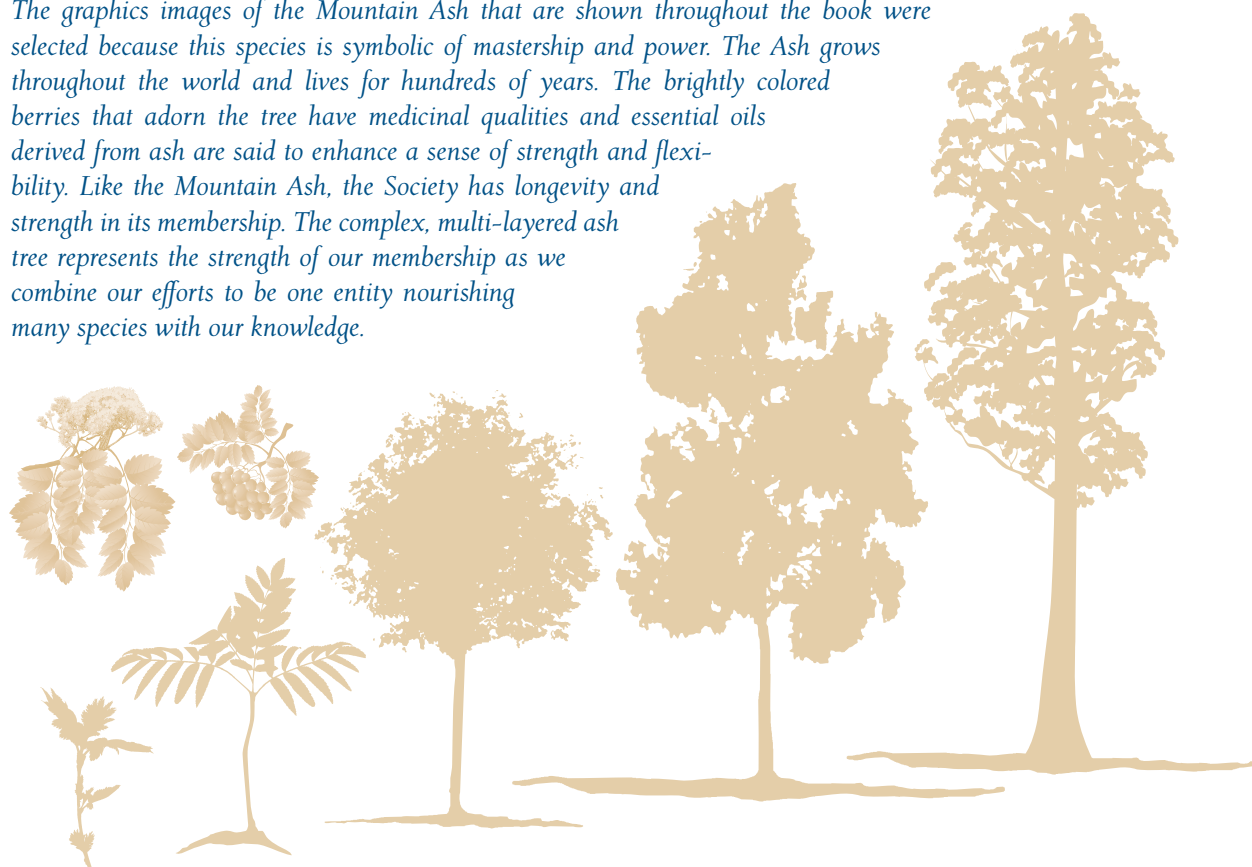
E-mail: [sothq@toxicology.org](mailto:sothq@toxicology.org)

Web Site: [www.toxicology.org](http://www.toxicology.org)

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*The graphics images of the Mountain Ash that are shown throughout the book were selected because this species is symbolic of mastership and power. The Ash grows throughout the world and lives for hundreds of years. The brightly colored berries that adorn the tree have medicinal qualities and essential oils derived from ash are said to enhance a sense of strength and flexibility. Like the Mountain Ash, the Society has longevity and strength in its membership. The complex, multi-layered ash tree represents the strength of our membership as we combine our efforts to be one entity nourishing many species with our knowledge.*



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# CONTENTS

History of the Toxicology Training Program at the University of Arizona.....	1
A Short History of Toxicology Training at The University Arkansas for Medical Sciences.....	3
Toxicology at Boston University School of Public Health, Department Environmental Health.....	4
History of the NIEHS T32 Training Program in Environmental Pathology at Brown University.....	6
University at Buffalo, Department of Pharmacology and Toxicology.....	9
Training in Toxicology: Egyptian Vision.....	11
Toxicology Training at University of California, Berkeley.....	21
Environmental Toxicology at the University of California, Davis.....	25
Molecular Toxicology IDP.....	27
Toxicology Training Program in Japan.....	31
The University of Chicago and the Tox Lab.....	36
Environmental Health and Toxicology at the University of Cincinnati: An Interdisciplinary Approach.....	38
Clemson University Graduate Program in Environmental Toxicology History of the Program.....	44
Toxicology Training: Department of Environmental Health Sciences, Mailman School of Public Health, Columbia University.....	45
Toxicology at the University of Connecticut.....	47
The Department of Pharmacology and Toxicology at East Carolina University, Greenville, North Carolina.....	53
University of Florida Center for Environmental & Human Toxicology.....	55
Toxicology Training Activities at Howard University.....	56
Toxicology Program at Indiana University.....	57
Interdepartmental Toxicology Graduate Program at Iowa State University.....	58
A Rich History of Toxicology Research and Training at the University of Kansas Medical Center.....	61
Toxicology Training at Karolinska Institutet.....	64
Toxicology History at Louisiana State University Health Sciences Center in Shreveport.....	67
Toxicology Milestones at the Department of Pharmacology and Toxicology, University of Louisville.....	70

The Lovelace Organization and 50 Years of Progress in Inhalation Toxicology.....	74
University of Maryland System—Wide Program in Toxicology .....	81
History of Toxicology Research and Training at the Massachusetts Institute of Technology.....	84
University of Michigan .....	90
Michigan State University Multidisciplinary Graduate Program in Environmental and Integrative Toxicological Sciences.....	91
University of Minnesota Toxicology Graduate Program .....	93
The University of Nebraska Center for Environmental Health and Toxicology .....	94
Curriculum in Toxicology, University of North Carolina at Chapel Hill.....	95
Toxicology at North Carolina State University .....	96
The Toxicology Program at Oregon State University .....	98
Environmental Health Sciences Training at the University of Pennsylvania.....	102
Training Program and Grants at the University of Pittsburgh.....	104
Toxicology Training Centers Purdue University.....	105
Toxicology at the University of Rochester: From the Manhattan Project to the Environmental Basis of Human Diseases .....	106
San Diego State University .....	114
Toxicology Training Center at the School of Pharmaceutical Sciences University of São Paulo, São Paulo, Brasil .....	116
History of the Baccalaureate Toxicology Program at St. John's University, College of Pharmacy & Allied Health Professions.....	117
History of the Toxicology Training Program at The University of Texas at Austin and the University of Texas MD Anderson Cancer Center-Science Park Research Division.....	119
Toxicology on the Border: University of Texas at El Paso's Toxicology Program .....	124
Toxicologists Training Center—Texas Tech University .....	126
Forty Years of Toxicology at the University of Utah.....	129
McHarry Medical College-Vanderbilt University Advanced Research Cooperation in Environmental Health (ARCH) Consortium .....	130
Toxicology Training at the University of Washington, 1979 to Present .....	132
Wayne State University .....	136
Toxicology at West Virginia University .....	139
The Molecular and Environmental Toxicology Center and Graduate Program at the University of Wisconsin-Madison.....	140



# Toxicology Milestones at the Department of Pharmacology and Toxicology, University of Louisville

by David W. Hein, Ph.D.; Leonard C. Waite; and William J. Waddell, M.D., ATS

Pharmacology and toxicology have been taught at the University of Louisville School of Medicine since its inception in 1837. Originally, pharmacology and toxicology were taught in the curriculum as “materia medica” or “medical chemistry” by professors who held the title of professor and/or chair of these disciplines.

Departmental organization occurred in 1909 via formation of the Department of Physiology and Pharmacology. A separate Department of Pharmacology was initiated in 1941, and its name was officially changed to the Department of Pharmacology and Toxicology in 1978. The Department’s graduate training program was first approved in 1954, and James W. Fisher (later chair of the Department of Pharmacology at Tulane University School of Medicine) was the department’s first graduate in 1958. Over 200 advanced degrees have subsequently been awarded. The Department’s initial NIH training grant was funded in 2004 and it was renewed and expanded in 2009. The pharmacology and toxicology “chairs” at the University of Louisville from 1837 to date are listed in Table 1. We will comment briefly on the longest serving chairs.

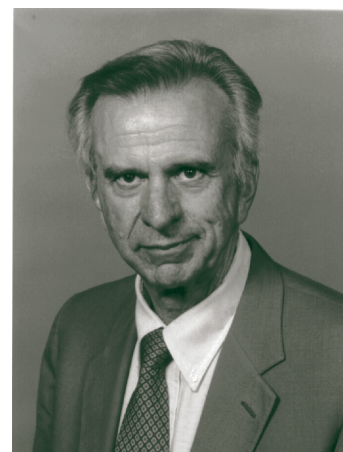


**Peter K. Knoefel, M.D.,**  
Department of Pharmacology  
Chair 1941–1966

Peter K. Knoefel, M.D. was the founding chair of the separate department of Pharmacology. He was born across the river from Louisville and received his Bachelor of Arts and Master of Arts from the University of Wisconsin, and his M.D. with special honors in physiology from Harvard Medical School. He served on the faculty in the Department of Pharmacology at the University of Wisconsin and subsequently at

Vanderbilt University prior to joining the Department of Pharmacology at the University of Louisville in 1935. He led the department with distinction over the 25-year period 1941 to 1966. The current department chair (David Hein) holds appointment as the Peter K. Knoefel Endowed Chair of Pharmacology and Toxicology. Dr. Knoefel was appointed professor and chair emeritus until his death in 1999.

William J. Waddell, M.D. led the department with distinction from 1977 to 1997, and the departmental faculty and graduate programs experienced significant growth during these two decades. Dr. Waddell received both his A.B (chemistry) and his M.D. from the University of North Carolina. He held faculty appointments at the University of North Carolina and the University of Kentucky prior to his recruitment



**William J. Waddell, M.D.,**  
Department of Pharmacology  
and Toxicology Chair  
1977–1997

to the University of Louisville as professor and chair. Soon after his arrival, he initiated the change in Department name to Pharmacology and Toxicology in 1978. He led the Department of Pharmacology and Toxicology’s hosting of the first joint meeting between the Society of Toxicology (SOT) and the American Society for Pharmacology and Experimental Therapeutics (ASPET) held in Louisville August 1982.

Dr. Waddell was a major organizer and the founding president of the Ohio Valley Society of Toxicology (OVSOT), an SOT regional affiliate. In 1982 at the joint meeting of SOT and ASPET held in Louisville, Dr. Robert A. D’Amato, manager of



Worldwide Product Safety at the Procter and Gamble Company in Cincinnati, Ohio, suggested that a regional chapter of SOT be organized that would include Ohio, Indiana, and Kentucky. West Virginia was added to the chapter later. On May 11, 1983, Drs. D'Amato and Waddell attended the SOT Council meeting in Chicago to seek approval and begin planning of the OVSOT. An organizational meeting was held July 15–16, 1983, in Cincinnati Ohio, and the first annual OVSOT scientific meeting was hosted by the Department of Pharmacology and Toxicology on October 15, 1983. Numerous other faculty members from the Department of Pharmacology and Toxicology have served as president (Harrell Hurst, Carlo Tamburro, Theresa Chen, David Hein, Steven Myers, and James Kang) and/or in other leadership positions in OVSOT.

Dr. Waddell was appointed professor and chair emeritus in 1997 at the time of his retirement at the University of Louisville. A distinguished seminar

series in honor of Dr. Waddell was established by the Department faculty. Dr. Waddell remains quite active as a member of scientific advisory groups and as a toxicology consultant.

David W. Hein, Ph.D. received his B.S. in Chemistry from the University of Wisconsin-Eau Claire and his Ph.D. in Pharmacology from the University of Michigan. He served as chair of the Departments of Pharmacology and Toxicology at Morehouse School of Medicine and the University of North Dakota School of Medicine and Health Sciences prior to his recruitment to the



**David W. Hein, Ph.D.,**  
Department of Pharmacology  
and Toxicology Chair  
1997–present

**Table 1: Pharmacology and Toxicology Chairs at the University of Louisville School of Medicine**

Chair	Years	Title
Lunsford P. Yandell, Sr., M.D.	1837–1849	Professor/Chair of Chemistry
Charles W. Short, M.D.	1838–1849	Professor of Materia Medica
Benjamin Silliman Jr., M.D.	1849–1854	Professor/Chair of Medicinal Chemistry & Toxicology
Lewis Rogers, M.D.	1852–1869	Professor of Materia Medica & Therapeutics
J. Lawrence Smith, M.D.	1854–1866	Professor/Chair of Chemical Physiology
C. W. Wright, M.D.	1866–1869	Professor/Chair of Medical & Physiological Chemistry
James W. Holland, M.D.	1869–1882	Professor/Chair of Medical Chemistry, Toxicology, & Materia Medica
Henry A. Cottell, M.D.	1884–1896	Professor/Chair of Medical Chemistry
H. M. Goodman, M.D.	1896–1909	Professor/Chair of Medical Chemistry
Henry A. Cottell, M.D.	1906–1914	Professor and Chair Department of Physiology & Pharmacology
Virgil E. Simpson, M.D.	1914–1921	Professor of Materia Medica, Therapeutics, & Pharmacology
Henry G. Barbour, M.D.	1923–1932	Professor and Chair Department of Physiology & Pharmacology
George E. Wakerlin, M.D., Ph.D.	1933–1939	Professor and Chair Department of Physiology & Pharmacology
Peter K. Knoefel, M.D.	1941–1966	Professor and Chair Department of Pharmacology
Thomas C. Darby, Ph.D.	1969–1973	Professor and Chair Department of Pharmacology
Edward A. Carr, M.D.	1974–1976	Professor and Chair Department of Pharmacology
William J. Waddell, M.D.	1977–1997	Professor and Chair Department of Pharmacology & Toxicology
David W. Hein, Ph.D.	1997–	Peter K. Knoefel Professor and Chair Department of Pharmacology & Toxicology



University of Louisville in 1997. Major expansions in research and the graduate program, including the procurement of NIH training grants, have occurred during his tenure as chair. Dr. Hein chaired the search committee that subsequently recruited Dr. Kenneth Ramos (recent SOT President) as chair of the Department of Biochemistry and Molecular Biology.

The Department of Pharmacology and Toxicology at the University of Louisville has 22 faculty members with primary appointments and over 30

with secondary appointments. Details regarding the Department's faculty, students, graduate programs, and graduates are available at the Department's Web site ([www.louisville.edu/medschool/pharmacology](http://www.louisville.edu/medschool/pharmacology)). Growth in the Department is illustrated by Departmental photos at 70, 80, 90, and 100 years since the Department formed in 1909.

We congratulate SOT on 50 years of distinguished service to toxicology.

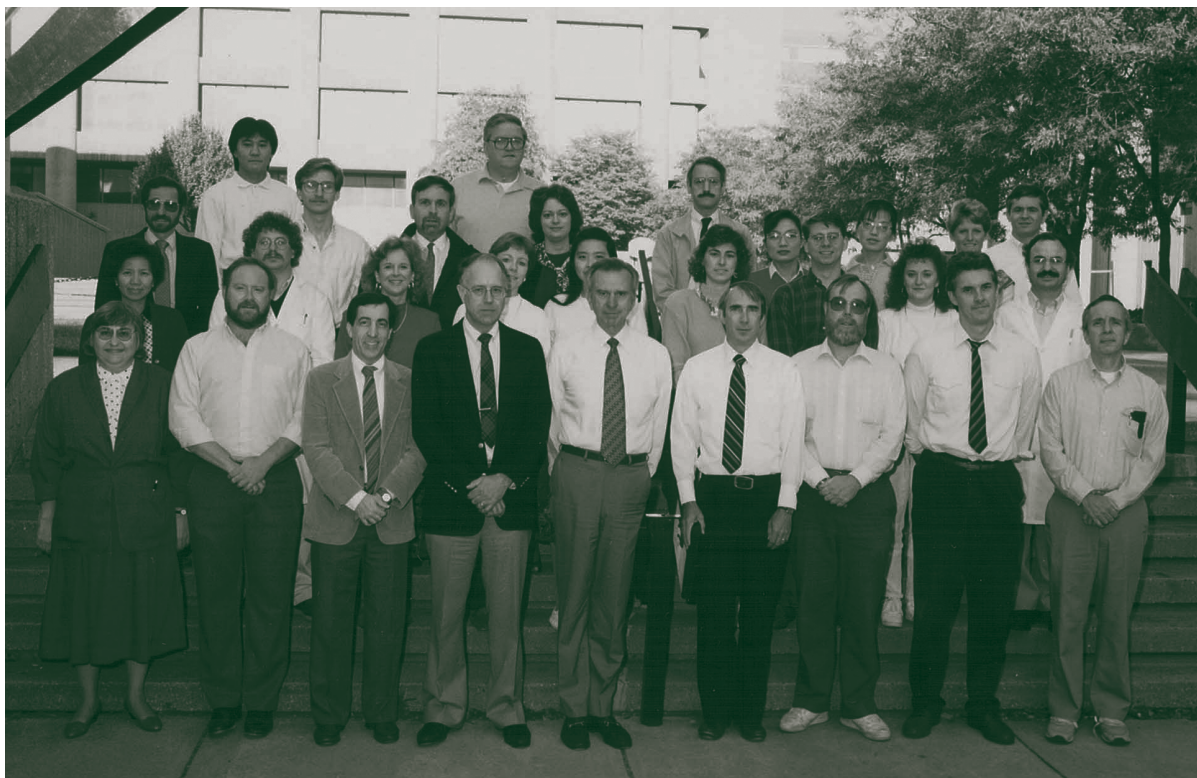


*Department of Pharmacology and Toxicology, 1979*



*Department of Pharmacology and Toxicology, 2009*





Department of Pharmacology and Toxicology, 1989



Department of Pharmacology and Toxicology, 1999

