Tenth Annual Meeting

PROGRAM

SOCIETY OF TOXICOLOGY

Shoreham Hotel
Washington, D. C.
March 7-11, 1971
INFORMATION

REGISTRATION

Pre-registration Forms Obtainable from Secretary:
Dr. Joseph F. Borzelleca
Department of Pharmacology
Medical College of Virginia
Richmond, Virginia 23219 (AC 703/770-4676)

Registration Desk—The Shoreham Hotel
Sunday, 7 March 1971 2:00 P.M.- 5:00 P.M.
7:30 P.M.-10:00 P.M.
Monday, 8 March 1971 8:30 A.M.- 5:00 P.M.
Tuesday, 9 March 1971 8:30 A.M.- 5:00 P.M.
Wednesday, 10 March 1971 8:30 A.M.- 5:00 P.M.

Fees—
Society of Toxicology members ......................... $10.00
Non-members .................................................. 15.00
Pre-doctoral full-time students .......................... 2.00

Abstracts—
Distributed without charge to all members of the Society of Toxicology and to all who register for the Meeting. Additional copies: $2.00—on sale at the Registration Desk.

MEETINGS

Scientific Sessions—

Locations (consult map—centerfold)
Ambassador Room
Diplomat Room
Empire Room
Forum Room
Palladian Room

Times
Monday, Tuesday, Wednesday, Thursday
8:50 A.M.-12:20 P.M.
Monday, Tuesday, Wednesday
1:30 P.M.-4:20 P.M.

Annual Business Meeting ......................... Palladian Room
Monday, 8 March 1971—4:00 P.M.

Committee Meetings ................................. Board Room
Times will be posted
SOCIAL EVENTS

Monday, 8 March 1971
  Cocktail Party—6:30 P.M.—Empire Room
    (Cash Bar)

Tuesday, 9 March 1971
  Banquet—7:00 P.M.—Regency Ballroom
    Tickets available at Registration Desk

Ladies Hospitality Room .................. Committee Room
  Monday, Tuesday, Wednesday, 8, 9, 10 March 1971
    8:00 A.M.-5:00 P.M.
  Thursday, 11 March 1971
    8:00 A.M.-Noon

SPECIAL SERVICES

Placement Bureau .......................... Cabinet Room
  George J. Levinskas, Director
    Sunday, 7 March 1971
    2:00 P.M.-10:00 P.M.
    Monday, Tuesday, Wednesday,
    8, 9, 10 March 1971
    9:00 A.M.-5:00 P.M.
    Thursday, 11 March 1971
    9:00 A.M.-12:00 Noon

Meeting Headquarters .................... Press Room
  Sunday, Monday, Tuesday, Wednesday,
    7, 8, 9, 10 March 1971
    9:00 A.M.-9:00 P.M.
    Thursday, 11 March 1971
    9:00 A.M.-12:00 Noon
OFFICERS

Robert L. Roudabush .................. President
Wayland J. Hayes, Jr. .................. President-Elect
Joseph F. Borzelleca .................. Secretary
Donald D. McCollister ................. Treasurer
Ted A. Loomis ........................ Past President

COUNCIL

(Consists of officers and four elected members)

Joseph C. Calandra .................. 1969-71
Fred H. Snyder ......................... 1969-71
Kenneth P. DuBois ..................... 1970-72
John P. Frawley ......................... 1970-72

ELECTED COMMITTEES

Educational Committee

Lawrence C. Weaver, Chairman ......... 1969-71
Bertram D. Dinman ...................... 1969-71
James R. Fouts ........................ 1970-72
Frederick Spelton ...................... 1970-72

Finance Committee

Donald D. McCollister, Chairman ....... 1969-71
Steven Carson .......................... 1969-71
Keith H. Jacobson ...................... 1969-71
Sheldon D. Murphy ..................... 1970-72
Ralph C. Wands ......................... 1970-72

Membership Committee

Robert L. Dixon, Chairman ............. 1968-71
Robert C. Anderson .................... 1969-72
Edward D. Palmes ...................... 1970-73
APPOINTED COMMITTEES

Awards Committee
TED A. LOOMIS, Chairman
JOSEPH C. CALANDRA
JOHN P. FRAWLEY

Board of Publications
LEON GOLBERG, Chairman (1969-72)
EARL H. DEARBORN, Managing Editor, T.A.P.
ROBERT L. ROUDABUSH, President
MAYNARD B. CHENOWETH (1968-71)
JULIUS M. COON (1970-73)
WAYLAND J. HAYES, JR., Auditor

Nominating Committee
CARROL S. WEIL, Chairman
CIPRIANO CUETO, JR.
MORENO L. KEPLINGER
JACK E. GRAY
RENE D. KIMBROUGH

Program Committee
WAYLAND J. HAYES, JR., Chairman
JOSEPH F. BORZELLECA
STEPHEN KROP
ELTON R. HOMAN
CAPTAIN JAC SIEGEL
JOHN G. KELLER
THOMAS W. TUSING

Technical Committee
J. WESLEY CLAYTON, JR., Chairman
HANS P. DROBECK
THOMAS GAINES
EDWARD J. FAIRCCHILD
C. J. TERHAAR
MYRON S. WEINBERG

ad hoc COMMITTEES

Representative to Division of Chemistry
and Chemical Technology,
National Research Council, National Academy of Sciences
V. K. ROWE (1968-71)

Epoxy Resins, K68 Committee
WILLIAM E. RINEHART RICHARD L. HOLLINGSWORTH

Panel on Toxicology Terminology
GABRIEL L. PLAA FREDERICK REIDERS
HENRY F. SMYTH, JR.

Placement
GEORGE J. LEVINSKAS

Z-37
HAROLD N. MACFARLAND NORMAN G. WHITE

(4)
MONDAY MORNING—DIPLOMAT ROOM

Chairman: Fred Sperling
Assisted by: George Cosmides, Donald Flick


10 MINUTE BREAK


11:00 7. Effect of Nicotine, Epinephrine and Norepinephrine on the Enzyme Thrombin and Substrate Fibrinogen. M. D. Singh and J. M. Singh, Department of Pharmacology, Xavier University of Louisiana, College of Pharmacy, New Orleans, Louisiana.


11:40 9. Metabolism of a New, Labeled Phenanthrene Methanol with Pronounced Antimalarial Activity. C. C. Smith and W. Weigl, Department of Environmental Health, University of Cincinnati, College of Medicine, Cincinnati, Ohio.

12:00 10. Biosynthesis of Nitrosopiperidine from Nitrite or Nitrate and Piperidine in the Small Intestine of the Rat. B. S. Alam, I. B. Saporoschetz, and S. S. Epstein, Children's Cancer Research Foundation, Inc., and Harvard Medical School, Boston, Massachusetts.
MONDAY MORNING—PALLADIAN ROOM

Chairman: JIRO KODAMA
Assisted by: D. CLIFFORD JESSUP, ARTHUR PALLOTTA


10 MINUTE BREAK

10:20  15. Inhibition of Rat Tissue Carboxylesterases and Cholinesterase by Abate (O,O,O', O'-tetramethyl O, O'-thiodi-p-phenylene phosphorothioate). S. D. Murphy and K. L. Cheever, Department of Physiology, Harvard School of Public Health, Boston, Massachusetts.

10:40  16. The Effects of Chronic Disulfoton Treatment on the Cholinesterase Activity in the Rat. A. Modak, L. Barley, S. Weintraub, and W. B. Stavignola, Department of Pharmacology, University of Texas Medical School at San Antonio, San Antonio, Texas.

11:00  17. Differences in the Stereospecificities of Cholinesterases and Cholinergic Receptors. B. V. Rama Sastry and H. C. Cheng, Department of Pharmacology, School of Medicine, Vanderbilt University, Nashville, Tennessee.

11:20  18. Sulphydryl Groups in the Vicinity of Mammalian Cholinergic Receptors and their Implication in the Toxicity of Mercurials. B. V. Rama Sastry, Department of Pharmacology, School of Medicine, Vanderbilt University, Nashville, Tennessee.


12:00  20. Metabolism of a New Carcinogen Related to Benzidine. S. Laham, Environmental Toxicology Programme, Occupational Health Division, Environmental Health Centre, Department of National Health and Welfare, Ottawa, Ontario, Canada.
MONDAY MORNING—FORUM ROOM

Chairman: Robert Dixon
Assisted by: Bernard Becker, Laurence C. K. Wong


9:10 22. Pre- and Postnatal Studies on 2,4,5-T, 2,4-D and Their Derivatives in Wistar Rats, K. S. Khera, B. L. Huston, and W. P. McKinley, Food and Drug Directorate, Research Laboratories, Ottawa, Ontario, Canada.


10 MINUTE BREAK

10:20 25. Drug Effects on Spermatogenesis Studied by Velocity Sedimentation Cell Separation, I. P. Lee and R. L. Dixon, Laboratory of Toxicology, National Cancer Institute, Bethesda, Maryland.


11:40 29. Comparative Studies on the Absorption of 3H-Thalidomide in Rabbits and Rats, G. R. Keller and D. A. Blake, Department of Pharmacology and Toxicology, School of Pharmacy, University of Maryland, Baltimore, Maryland.

12:00 30. A Comparison of the Teratogenic Properties of Sodium Salicylate, Sodium Benzoate, and Phenol, J. L. Minor and B. A. Becker, Oakdale Toxicology Center, Department of Pharmacology, College of Medicine, University of Iowa, Iowa City, Iowa.
March 8, 1971

MONDAY AFTERNOON—PALLADIAN ROOM

Symposium
Dose Response in the Appraisal of Toxicologic Effects

1:30 Introduction—Lloyd W. Hazleton, Chairman


"Scientific Method vs. Anecdote (Dose Response as a Principle Applicable to the Human)." Mitch Zavon, Kettering Laboratory, College of Medicine, University of Cincinnati, Cincinnati, Ohio.

Open Discussion

4:00 Annual Business Meeting. Members of the Society of Toxicology, Palladian Room.

6:30 Cocktail Party. Cash Bar. Empire Room
March 9, 1971

TUESDAY MORNING—DIPLOMAT ROOM

Chairman: Steven Krop
Assisted by: Kent Davis, Clara Williams


9:50 34. Toxicity of 1-Methylxanthine, Alone and in the Presence of Ethanol. R. L. Alstott and R. B. Forney, Department of Toxicology, Indiana University School of Medicine, Indianapolis, Indiana.

10 MINUTE BREAK

10:20 35. Toxicity of Caffeine, Ethanol, and Caffeine-Ethanol Combinations. R. L. Alstott and R. B. Forney, Department of Toxicology, Indiana University School of Medicine, Indianapolis, Indiana.

10:40 36. Ethanol-Induced Adrenocortical Response and Related Metabolism in the Rabbit. L. W. Masten and H. H. Cornish, Interdepartmental Program in Toxicology, University of Michigan, Ann Arbor, Michigan.

11:00 37. The Oral and Dermal Toxicity of Hexachlorophene in Rats. T. B. Gaines and R. D. Kimbrough, Atlanta Toxicology Branch, Food and Drug Administration, Public Health Service, Department of Health, Education, and Welfare, Chamblee, Georgia.


11:40 39. Effects of Barbiturates and Catecholamine Precursors on the Release of LH and Prolactin in the Proestrous Rat as Measured by Radioimmunoassay. J. Wedig and V. Gay, University of Michigan, Department of Pathology, Reproductive Endocrinology Program, Ann Arbor, Michigan. (Sponsor: H. H. Cornish.)
TUESDAY MORNING—PALLADIAN ROOM

Chairman: Dallas Nelson
Assisted by: Dorothy Hood, John Ward

8:50 40. Chronic Toxicity Studies with 2,2-Dichloro vinyl Dimethyl Phosphate (DDVP) in Dogs and Rats Including Observations on Rat Reproduction. S. Witherup, W. J. Jolley, K. Stemmer and E. A. Pfizer, Department of Environmental Health, College of Medicine, University of Cincinnati, Cincinnati, Ohio. (Sponsor: E. Homan.)

9:10 41. The Effect of Dietary Dichlorvos on Swine Reproduction and Viability of Their Offspring. J. A. Collins, M. A. Schooley, and V. K. Sing, Shell Development Company, Biological Sciences Research Center, Modesto, California; Shell Chemical Company, Agricultural Division, San Ramon, California; and Bio/Toxicological Research Laboratories, Inc., Spencerville, Ohio. (Sponsor: J. K. Kodama.)


9:50 43. Metabolic Fate of Ingested Dichlorvos in Swine. A. C. Page, D. M. DeVriess, R. Young, and J. E. Loeffler, Shell Development Company, Biological Sciences Research Center, Modesto, California. (Sponsor: E. Homan.)

10:20 44. Metabolic Fate of Inhaled Dichlorvos in Pigs. J. E. Loeffler, D. M. DeVriess, R. Young, and A. C. Page, Shell Development Company, Biological Sciences Research Center, Modesto, California. (Sponsor: J. F. Borzelleca.)


TUESDAY MORNING—FORUM ROOM

Chairman: Elton Homan
Assisted by: Mary Verrett, Robert J. Weir


9:30 51. Experimental Neoplasia in ChR-CD Rats with the Oral Administration of 3,3'-Dichlorobenzidine, 4,4'-Methylene-bis-(2-chloroaniline), and 4,4'-Methylene-bis (2-Methylaniline), E. F. Stula, H. Sherman, and J. A. Zapp, Jr., Haskell Laboratory for Toxicology and Industrial Medicine, E. I. DuPont de Nemours & Co., Wilmington, Delaware.


10 MINUTE BREAK


11:00 55. Toxicology of a New Pyrimidine Antimetabolite, 5-Azacytidine, in Mice, Hamsters and Dogs. P. E. Palm and C. J. Kensler, Toxicology Laboratories, Life Sciences Division, Arthur D. Little, Inc., Cambridge, Massachusetts.


11:40 57. Maximum Tolerated Doses of Antitumor Agents: Correlation Between Experimental Animals and Man. E. R. Homan, Laboratory of Toxicology, National Cancer Institute, Bethesda, Maryland.

12:00 58. Toxicity of 1,3-Bis(2-chloroethyl)-1-Nitrosourea in Newborn Mice. J. L. Gargus, L. E. Dudeck, G. F. Congleton, and R. W. Voelker, Jr., Oncology Department, Hazleton Laboratories, Inc., Falls Church, Virginia. (Sponsor: D. C. Jessup.)
TUESDAY AFTERNOON—PALLADIAN ROOM

Chairman: Florence Kingshita
Assisted by: Anthony Triolo, Maurice Weeks

1:30 59. Potentiation of Effects of Chloroform Inhalation on Barbiturate Narcosis and Metabolism by Phenobarbital Pretreatment. S. K. Puri, G. Fuller, and H. Lal, Department of Pharmacology and Toxicology, University of Rhode Island, Kingston, Rhode Island.


2:30 62. Relationship of Altered Hepatic Microsomal Enzymes to Potentiated Hepatotoxicity of Carbon Tetrachloride. G. P. Carlson, G. C. Fuller, K. A. Suarez, and A. R. Johnson, Department of Pharmacology and Toxicology, University of Rhode Island, Kingston, Rhode Island.

10 MINUTE BREAK


3:20 64. Hepatic Reticuloendothelial Stimulation and Microsomal Drug Metabolism. D. W. Barnes and G. W. Woole, Department of Pharmacology, Medical College of Virginia, Richmond, Virginia, and Division of Medical Sciences, East Carolina University, Greenville, North Carolina.

3:40 65. Inhibition of Hepatic Microsomal Enzymes by N-Substituted Ethanolamines. G. V. Foster, Jr., R. Hartung, and H. H. Cornish, Department of Environmental and Industrial Health, School of Public Health, University of Michigan, Ann Arbor, Michigan.


7:00 Society of Toxicology Banquet, Regency Ballroom. Speaker: William D. Ruckelshaus, Administrator, Environmental Protection Agency. Topic to be announced.
March 9, 1971

TUESDAY AFTERNOON—DIPLOMAT ROOM

Chairman: BENJAMIN R. ZEITLAN
Assisted by: HERBERT BLUMENTHAL, BERNARD FRANKO

1:30 67. Mycotoxicosis Induced in Mice by Cultures of Penicillium ochraceum, W. W. Carlton and J. F. Tuite, Department of Veterinary Physiology and Pharmacology, School of Veterinary Science and Medicine and Department of Botany and Plant Pathology, Purdue University, Lafayette, Indiana.

1:50 68. Acute Effects of Synthetic Aflatoxin M. R. S. Pong and G. N. Wogan, Department of Nutrition and Food Science, Massachusetts Institute of Technology, Cambridge, Massachusetts.


2:30 70. The Response of the Hypothalamus to High Doses of Monosodium Glutamate in Mice and Monkeys. R. Abraham, W. Dougherty, L. Golberg, and F. Coulston, Institute of Experimental Pathology and Toxicology, The Albany Medical College of Union University, Albany, New York.

10 MINUTE BREAK


3:20 72. Effects of Prolonged Monosodium Glutamate and Other High-Salt Diets on Arterial Pressure and Learning Ability in Rats. L. R. Weiss, J. F. Reilly, J. Williams, and S. Krop, Division of Drug Biology, Food and Drug Administration, Washington, D.C.

3:40 73. Household Toxicology: Appraising the Hazards and Communicating the Risks. J. R. Hickman, G. S. Wiberg, and J. W. Black, Division of Toxicology, Food and Drug Directorate, Department of National Health and Welfare, and Hazardous Products Division, Department of Consumer and Corporate Affairs, Ottawa, Canada.

4:00 74. Toxicity Coding Scheme. J. V. Marhold, Research Institute for Organic Synthesis, Pardubic-Rybitvi, Czechoslovakia.

7:00 Society of Toxicology Banquet. Regency Ballroom. Speaker: William D. Ruckelshaus, Administrator, Environmental Protection Agency. Topic to be announced.
ROOMS in which the Society of Toxicology will hold their meetings are designated by a gray tint.
TUESDAY AFTERNOON—FORUM ROOM

Chairman: Ralph C. Wands
Assisted by: Emil Christofano, Andrew Reeves

1:30 75. Electrocardiographic Telemetry with Arrhythmia Recording on Dogs Chronically Exposed to Air Pollutants. W. N. Bloch, Jr., W. C. Crocker, T. K. Wessendarp, and T. R. Lewis, Biological Research Branch, National Air Pollution Control Administration, USPHS, Cincinnati, Ohio. (Sponsor: J. F. Borzelleca.)

1:50 76. Effects of Adrenalectomy and Phenobarbital Pretreatment on the Toxicity and Biochemical Effects of 1,1-Dichloroethylene. L. J. Jenkins, Jr., J. Trabulus, and S. D. Murphy, Department of Physiology, Harvard School of Public Health, Boston, Massachusetts.

2:10 77. Effects of Halocarbon Compounds on Rat and Mouse Mitochondria Following Exposure in vitro and in vivo. E. Bachmann and L. Golberg, Institute of Experimental Pathology and Toxicology, The Albany Medical College of Union University, Albany New York.

2:30 78. Chronic Pulmonary Pathology in Rats After the Intratracheal Injection of 0.4, 4, and 40 mg of Beryllium as Beryllium Hydroxide. D. H. Groth and G. R. Mackay, Laboratory of Toxicology and Pathology, Bureau of Occupational Safety and Health, PHS, Cincinnati, Ohio. (Sponsor: H. E. Stokinger.)

10 MINUTE BREAK

3:00 79. Ultrastructural Observations of the Pulmonary Epithelial Response to Beryllium Hydroxide in the Rat. D. H. Groth, G. R. Mackay, and M. L. Mead, Laboratory of Toxicology and Pathology, Bureau of Occupational Safety and Health, PHS, Cincinnati, Ohio. (Sponsor: H. E. Stokinger.)


4:00 82. Pharmacological Lexicography; or My Definition is Better than Your Definition. F. Sperling, Department of Pharmacology, Howard University Medical School, Washington, D.C.

7:00 Society of Toxicology Banquet. Regency Ballroom. Speaker: William D. Ruckelshaus, Administrator, Environmental Protection Agency. Topic to be announced.
March 9, 1971

TUESDAY EVENING

7:00 P.M.

BANQUET

Regency Ballroom

Menu

Sliced Oranges and Grapefruit
topped with Fresh Strawberries
and Imported Kirsch

Cornish Game Hen with Wild Rice,
Half Peach and Currant Jelly

Grilled Tomato

Jumbo Asparagus Tips Hollandaise

Hearts of Lettuce

Rolls and Butter

Glace Parisienne with Cointreau

Coffee

Wine: Chablis
(Courtesy of the Charles River Companies)

Welcome  Robert L. Roudabush, President
Society of Toxicology

Guest Speaker: William D. Ruckelshaus
Administrator
Environmental Protection Agency
March 10, 1971

WEDNESDAY MORNING—DIPLOMAT ROOM

Chairman: Seymour L. Friess
Assisted by: W. Homer Lawrence, Jane Robens

8:50 83. Effects of Starvation on the Mobilization and Redistribution of Pesticides and on Hepatic Microsomal Enzyme Activity in Weaning, Adult, and Old Rats. W. B. Deichmann, W. E. MacDonald, and D. A. Cubit, Department of Pharmacology and the Research and Teaching Center of Toxicology, University of Miami School of Medicine, Miami, Florida.

9:10 84. Increased Microsomal Enzyme Activity Due to Pyrethrum Administration. A. C. Springfield, G. P. Carlson, and J. J. DeFeo, Department of Pharmacology and Toxicology, University of Rhode Island, Kingston, Rhode Island. (Sponsor: G. C. Fuller.)

9:30 85. Induction of Hepatic Microsomal Hydroxylative Enzymes by Technical Piperonyl Butoxide and Some Related Compounds. D. J. Wagstaff and C. R. Short, Department of Veterinary Physiology and Pharmacology, University of Missouri, Columbia, Missouri. (Sponsor: J. C. Shupe.)


10:20 87. Acute and Chronic Administration of Acetylsalicylic Acid on the Development of Tolerance to Pentobarbital in Male and Female Rats. J. M. Singh, Department of Pharmacology, Xavier University of Louisiana, College of Pharmacy, New Orleans, Louisiana.

10:40 88. Biochemical and Physiological Correlates of Altered Drug Sensitivity in Chronically Isolated Animals. I. Baumel, J. J. DeFeo, and H. Lal, Department of Neurology, Yale University, New Haven, Connecticut and Department of Pharmacology and Toxicology, University of Rhode Island, Kingston, Rhode Island.

11:00 89. The Reversibility of Increased Rat Liver Weights and Microsomal Processing Enzymes after Feeding High Levels of 2,2,4-Trimethyl-1,3-Pentanediol Diolbutyrate (Kodak® TXIB). W. J. Krasavage, K. S. Tischer, and R. L. Roudabush, Laboratory of Industrial Medicine, Eastman Kodak Company, Rochester, New York.

11:20 90. The Role of Intestinal β-Glucuronidase in the Absorption of Diethylstilbestrol Glucuronide in Immature Rats. L. J. Fischer, J. L. Weissinger, and T. H. Kent, University of Iowa College of Medicine, Iowa City, Iowa. (Sponsor: B. A. Becker.)

11:40 91. The Relationship of Cyclophosphamide Activation to its Perinatal Toxicity in Mice. R. D. Short and J. E. Gibson, Department of Pharmacology, Michigan State University, East Lansing, Michigan. (Sponsor: T. M. Brody.)

(18)
WEDNESDAY MORNING—PALLADIAN ROOM

Chairman: ROBERT SCALA
Assisted by: PAUL MATTIS, ROY MUNDY

8:50 92. Direct Effect of Paraoxon on Erythrocyte Metabolism as Measured by O2 Uptake. J. A. Santolucito and E. R. Whitcomb, Perrine Primate Research Branch, USPHS, Perrine, Florida. (Sponsor: W. F. Durham.)


9:30 94. In Vivo Detoxication Potential and Selective Insecticidal Activity of Carbamate and Organophosphorus Compounds. B. R. Smith and W. A. Brindley, Zoology Department and Interdepartmental Curriculum in Toxicology, Utah State University, Logan, Utah. (Sponsor: R. P. Sharma.)

9:50 95. Rabbit Whole Blood Cholinesterase Inhibition and Reactivation Following Intravenous Infusion of Azodrin®. B. J. Gough and T. E. Shellenberger, Gulf South Research Institute, New Iberia, Louisiana.

10 MINUTE BREAK

10:20 96. The Effect of 2,4-Dichlorophenoxyacetic Acid (2,4-D) and Esters of 2,4-D on Rat Fetal and Neonatal Growth and Development. B. A. Schwetz, G. L. Sparschu, and V. K. Rowe, The Dow Chemical Company, Midland, Michigan.


11:00 98. Alterations in Liver Microsomal Metabolism of Parathion Caused by Chronic Administration of Dilantin, Chloroquine, and DDE. J. E. Davis, M. F. Cranmer and A. Peoples, USPHS, Perrine Primate Research Branch, Perrine, Florida. (Sponsor: W. F. Durham.)


11:40 100. A Toxicologic Evaluation of 5-ethoxy-3-trichloromethyl 1-1,2,4-thiadiazole (TERRAZOLE®). J. F. Borzelleca, P. S. Larson, Gordon R. Hennigar, and E. J. Kuha, Department of Pharmacology, Medical College of Virginia, Health Sciences Division, Virginia Commonwealth University, Richmond Virginia; Department of Pathology, Medical University of South Carolina Charleston, South Carolina; Olin Corporation, New Haven, Connecticut.
WEDNESDAY MORNING—FORUM ROOM

Chairman: Sorrell Schwartz
Assisted by: Herman Birnbaum, Harold Blumberg


9:30 103. Systemic Absorption of Copper from Copper Sulfate Emetic. W. J. Decker, W. A. Goldsmith, R. C. Mills, and R. J. Baner, Department of Medical Research and Development, William Beaumont General Hospital, El Paso, Texas.


10 MINUTE BREAK


10:40 106. Toxicology and Fate of 2,2,4-Trimethyl-1,3-Pentanediol Diisobutyrate (Kodaflex® TXIB) in the Rat. B. D. Astill, C. J. Terhaar, and D. W. Fassett, Laboratory of Industrial Medicine, Eastman Kodak Company, Rochester, New York.


11:20 108. Cataracts in Parachlorophenylalanine-Treated Rats: Development, Clinical Appearance and Antagonistic Effect of Phenylalanine. E. J. Gralla and L. D. Rubin, Yale University School of Medicine, New Haven, Conn. and University of Pennsylvania School of Veterinary Medicine, Philadelphia, Pa.

11:40 109. Studies on the Mechanism of the Cataractogenic Activity of 2,4-Dinitrophenol. J. E. LeBeau and P. J. Gehring, Department of Pharmacology, College of Veterinary Medicine, Michigan State University, East Lansing, Michigan.
March 10, 1971

WEDNESDAY AFTERNOON—PALLADIAN ROOM

Chairman: Moreno Keplinger

Assisted by: Jerome Glassman, Richard Henderson

1:30 110. Storage, Metabolism and Urinary Excretion of DDT and DDT Metabolites in Human Subjects. D. P. Morgan and C. C. Roan, Community Studies Pesticide Program, Department of Entomology, University of Arizona, Tucson, Arizona. (Sponsor: G. W. Ware.)

1:50 111. Fate of $^{14}$C Labeled o,p'-DDT in the Rat. M. Cranmer, W. Oller, J. Carroll, and F. Copeland, Perrine Primate Research Branch, USPHS, Perrine, Florida. (Sponsor: W. F. Durham.)

2:10 112. Metabolic Alterations in the Squirrel Monkey Induced by DDT Administration and Ascorbic Acid Deficiency. R. Chadwick, M. Cranmer, and A. Peoples, Perrine Primate Research Branch, USPHS, Perrine, Florida. (Sponsor: W. F. Durham.)


10 MINUTE BREAK

3:00 114. Distribution and Metabolism of Paraquat in the Rat. G. Molnar and W. J. Hayes, Jr., Department of Biochemistry, Vanderbilt University School of Medicine, Nashville, Tennessee.

3:20 115. Lethality and Pharmacokinetics of Paraquat in Rats. R. E. Murray and J. E. Gibson, Center for Laboratory Animal Resources and Department of Pharmacology, Michigan State University, East Lansing, Michigan. (Sponsor: T. M. Brody.)


4:00 117. Inhibition of Diglycerridase and Cholinesterase Activity in Rats by Organophosphorus and Carbamate Esters. R. Lauwerys and J. P. Buchet, Industrial Toxicology Unit, Louvain University, Brussels, Belgium. (Sponsor: S. D. Murphy.)
WEDNESDAY AFTERNOON—DIPLOMAT ROOM

Chairman: ROBERT ZWICKEY
Assisted by: HENRY SHERMAN, RICHARD STEELMAN

1:30  118. Reduced anaphylaxis in DDT-treated guinea pigs. J. Gabliks and E. M. Askari, Department of Biology, Northeastern University, Boston, Mass. (Sponsor: J. F. Borzelleca.)


2:10  120. Apparent Hydronephrosis as a Stage of Renal Papillary Growth in Fetal Rats. R. M. Hoar and D. C. Woo, Hoffmann-LaRoche, Inc., Nutley, New Jersey. (Sponsor: S. E. Sadek.)


10 MINUTE BREAK


3:20  123. Toxicity Testing of Biomaterials and Ingredients by a Special Tissue Culture Technique. E. O. Dillingham, W.H. Lawrence, and J. Autian, Materials Science Toxicology Laboratories, College of Dentistry and College of Pharmacy, University of Tennessee Medical Units, Memphis, Tennessee.

March 10, 1971

WEDNESDAY AFTERNOON—FORUM ROOM

Chairman: J. Wesley Clayton
Assisted by: Walter J. Decker, Roger Smith

1:30 125. The Absorption of Different Chemical Compounds of Mercury from the Gastrointestinal Tract. T. W. Clarkson, Department of Radiation Biology and Biophysics and the Department of Pharmacology, The University of Rochester, Rochester, New York.

1:50 126. Methyl Mercury-(\(^{203}\)Hg) Excretion by Lactation in Guinea Pigs. H. L. Trenholm, C. J. Paul, H. Baer, and F. Iverson, Food and Drug Directorate, Department of National Health and Welfare, Ottawa, Canada. (Sponsor: W. J. Hayes, Jr.)


10 MINUTE BREAK

3:00 129. Continuous Exposures of Human Subjects to SO\(_2\). F. W. Weir, C. Ross, P. Bromberg and J. H. Shulte, Department of Preventive Medicine, The Ohio State University, Columbus, Ohio. (Sponsor: C. H. Hine.)

3:20 130. The Hyperbaric Toxicity of Sulfur Dioxide. T. A. Hill, L. Kurlansik and J. Seigel, U.S. Navy Toxicology Unit, NNMC, Bethesda, Maryland.

3:40 131. Protection Against Toxicity of Oxygen Under High Pressure by Pargyline as Related to Alteration in Brain GABA Metabolism. R. Schatz and H. Lal, Department of Pharmacology and Toxicology, University of Rhode Island, Kingston, Rhode Island.
THURSDAY MORNING—AMBASSADOR ROOM

Chairman: David P. Rall
Assisted by: Walter Hansen, Francis N. Marzulli


9:30  134. Comparative Toxicity of o-Phenylphenol and an o-Phenolphenol-Containing Disinfectant. F. W. Oehme, Comparative Toxicology Laboratory, Kansas State University, Manhattan, Kansas.


10 MINUTE BREAK


10:40  137. Maternal Distribution and Placental Transfer of $^{14}C$-$\Delta^9$-Tetrahydrocannabinol in Pregnant Mice. R. D. Harbison, Department of Pharmacology, Tulane University, School of Medicine, New Orleans, Louisiana. (Sponsor: K. H. Jacobson.)


11:20  139. Subacute Toxicity of Water-Suspended $\Delta^9$-Tetrahydrocannabinol in Rats. R. N. Phillips, D. J. Brown, R. C. Martz, J. D. Hubbard, and R. B. Forney, Department of Toxicology, Indiana University, School of Medicine, Indianapolis, Indiana.

11:40  140. Metabolism of $\gamma$-Dimethylaminopropylidiphosphinylphosphine by Rat Liver Homogenates. R. A. Wiley, H. A. Sasame, and J. R. Gillette, Department of Medicinal Chemistry, University of Kansas, Lawrence, Kansas and Laboratory of Chemical Pharmacology, National Heart and Lung Institute, Bethesda, Maryland. (Sponsor: M. D. Faiman.)

THURSDAY MORNING—EMPIRE ROOM

Chairman: Yves Alarie
Assisted by: E. William Ligon, John J. Pollock

9:30 142. Morphological Skin Reactions to 2-Chloroethanol. J. V. Bruckner and W. L. Guess, College of Pharmacy, University of Texas, Austin, Texas.


10 MINUTE BREAK

10:20 144. The Effects of Acrolein Inhalation on the Tracheal Mucosa of the Chicken. E. P. Denine, S. L. Robbins, and C. J. Kessler, Life Sciences Division, Arthur D. Little, Inc., Acorn Park, Cambridge, Massachusetts and Department of Pathology, Boston University School of Medicine, Boston, Massachusetts.


March 11, 1971
THURSDAY MORNING—DIPLOMAT ROOM

Chairman: G. J. Terhaar
Assisted by David A. Blake, Anne Wolven

8:50 149. The Comparative Toxicity of Natural and Synthetic Nordihydroguaretic Acid (NDGA) in Rats. S. E. Sadek and R. Banziger, Department of Experimental Pathology and Toxicology, Biological Research Division, Hoffmann-LaRoche, Inc., Nutley, New Jersey.


9:30 151. Toxicity of Formose Sugars. A. Forst, H. B. Chemside, and J. Shapiro, Institute of Chemical Biology, University of San Francisco and Biotechnology Division, NASA-Ames Research Center, Moffett Field, California.

9:50 152. Relation of Pesticides to Abortion in Dairy Cattle. W. E. Ribelin and A. W. Macklin, Department of Veterinary Science, University of Wisconsin, Madison, Wisconsin.

10 MINUTE BREAK

10:20 153. Comparison Between Ibogaine and Serotonin Metabolism in Rats. H. I. Dhahir, A. B. Richards, N. C. Jain, and R. B. Forney, Department of Toxicology, Indiana University Medical Center, Indianapolis, Indiana.

10:40 154. Tissue Distribution of Ibogaine Hydrochloride in Rats. H. I. Dhahir, A. B. Richards, N. C. Jain, and R. B. Forney, Department of Toxicology, Indiana University School of Medicine, Indianapolis, Indiana.


11:20 156. Effect of Fluoride on Urine Flow Rate and Renal Sodium Concentration Gradients in the Rat. G. M. Whitford and D. R. Taves, Department of Radiation Biology and Biophysics, and Department of Pharmacology and Toxicology, University of Rochester, Rochester, New York.


NOTES

1972 - Williamsburg
1973 - N.Y.
1974 - Wash.
1975 -