

# TLC

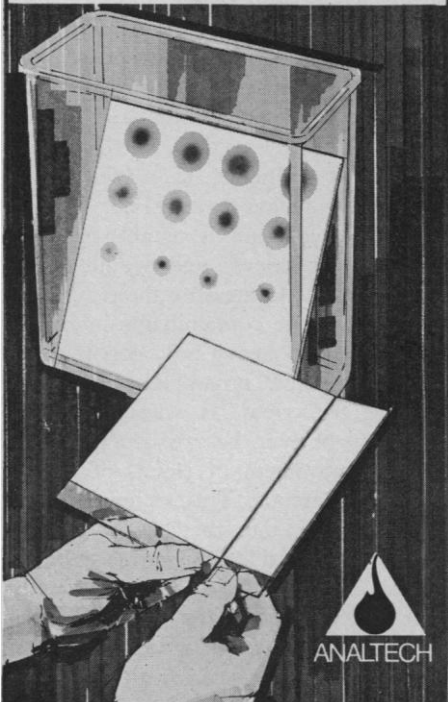
## PRE-COATED THIN LAYER CHROMATOGRAPHY PLATES (Ready-For-Use)

Analtech offers the widest range of pre-coated TLC plates available. Absolute uniformity assures reproducibility whether your application is in research, quality control, clinical TLC tests or drug screening.

■ Delivery is from stock on all coatings and sizes.

■ Low cost—write for catalog, prices.  
**ANALTECH, INC.**

75 BLUE HEN DRIVE,  
NEWARK, DELAWARE 19711  
(302) 737-6960



Seattle meeting confirmed an opinion that is held by certain astronomers that their data are a useful adjunct to routine air pollution monitoring activities. While there are limitations in astronomical data, these are usually smaller and better known than the errors in other types of data. Astronomers can provide (i) nighttime extinction data, (ii) a new set of remote locations as well as some new urban ones, (iii) a lengthy data record (beginning in 1902 in the case of Abbot's data), and (iv) a variety of new measuring techniques.

Some conclusions reached through astronomical research that are of special interest to atmospheric scientists are as follows:

1) No global trends in extinction that can be ascribed to human causes have been detected at remote locations so far.

2) Both volcanic activity and some apparently natural cycling of the biosphere affect astronomical extinction; the latter effect produces an annual pattern.

3) The transparency of the atmosphere near cities continues to deteriorate in most cases.

4) The anomalous wavelength dependence of extinction suggests a unique aerosol size distribution in background locations.

Also from the meteorological viewpoint, a number of gaps became apparent in available knowledge. Perhaps the most obvious one is the need for coordinating extinction measurements with local and synoptic meteorological data. Certain biases exist because of the lack of extinction data for cloudy periods. Also, effects have been discovered that are due to dust derived from upslope winds on mountaintops. Since regional effects of human activity will certainly be apparent before global effects, studies of the transport of air masses to and from observing sites may be possible.

Finally, another kind of pollution is of less concern to meteorologists but of vital concern to astronomers. Light pollution, caused by the rapid expansion of outdoor lighting in cities and even in open western countryside, has been of great concern in many observatories recently. Greater public awareness of the problem, research on more efficient lamps (from the point of view of increased ground illumination and reduced light loss to the sky), and political action through the introduction of city ordinances are among the

goals of astronomers in various research centers of the Southwest.

At the Seattle meeting astronomers emphasized their concern about the deterioration of the atmosphere, through which most of the information about the universe must pass. Progress in the application of certain kinds of astronomical data to research on atmospheric deterioration has begun. Much more must be done to understand fully the implications of the data and even more, of course, to turn the tide. Charles Abbot may not have expected that his data and methods would be used for these purposes, but his are the best optical data available over such a long time base and they have come to us only because of his painstaking care in gathering and recording all available information in his experiments.

P. W. HODGE  
NELS LAULAINEN  
R. J. CHARLSON

*Department of Astronomy, University of Washington, Seattle 98195*

### References

1. N. Laulainen and P. W. Hodge, Eds., *Project ASTRA Publication 15* (Univ. of Washington, Seattle, 1972).
2. C. G. Abbot, *The Sun and the Welfare of Man* (Smithsonian Institution, New York, 1929), p. 68.

### Forthcoming Events

#### January

9-12. American Astronomical Soc., Las Cruces, N.M. (H. M. Gurin, AAS, 211 FitzRandolph Rd., Princeton, N.J. 08540)

9-13. National Soc. of Professional Engineers, Salt Lake City, Utah. (P. H. Robbins, NSPE, 2029 K St., NW, Washington, D.C. 20006)

14-19. Protein Phosphorylation in Control Mechanisms, Miami, Fla. (W. J. Whelan, Dept. of Biochemistry, School of Medicine, Univ. of Miami, P.O. Box 875, Biscayne Annex, Miami 33152)

15-16. Regional Environmental Management Conf., San Diego, Calif. [L. E. Coate, REMC, County of San Diego, Environmental Development Agency, Integrated Regional Environmental Management (IREM) Project, 1600 Pacific Hwy., San Diego 92101]

15-17. Lunar Dynamics and Observational Coordinate Systems, Houston, Tex. (J. D. Mulholland, Lunar Science Inst., 3303 NASA Rd. 1, Houston 77058)


15-18. American Crystallographic Assoc., Gainesville, Fla. (Mrs. E. E. Snider, ACA, 335 E. 45 St., New York 10017)

15-19. Geophysics of the Earth and the Oceans, 2nd intern. conf., Australian Inst. of Physics and Australian Soc. of Exploration Geophysicists, Sydney. (B. D.

**GRIND  
EMULSIFY  
DISINTEGRATE  
HOMOGENIZE  
SHRED  
BLEND  
OR MIX  
IN SECONDS!**

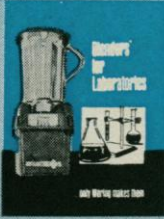


Waring's exclusive cloverleaf shape is hydrodynamically designed for perfect blending action . . . the solid one-piece cover with molded gasket assures a perfect seal . . . our 3-speed, 1725-watt motor furnishes power to spare. Container, cover, and blending assembly are stainless steel: easy to clean and trouble free. An ingenious adapter lets you use the smallest container on the one-gallon base. Like all Waring Laboratory Blenders, this model is warranted for one year of laboratory use.



Waring also makes a complete line of explosion-proof Blenders, one-quart Blenders for every use, and a complete line of accessories. Write for our catalog.

Waring Blenders® are unique . . .  
no wonder we registered the name!



**waring**

Waring Products Division, Dynamics Corporation of America  
New Hartford, Connecticut 06057  
Circle No. 41 on Readers' Service Card

Johnson, School of Earth Sciences, Macquarie Univ., North Ryde, New South Wales 2113, Australia)

15-22. International Symp. on **Taxonomy of Fungi**, Madras, India. (C. V. Subramanian, Centre for Advanced Studies in Botany, Univ. of Madras, Madras-5)

22-26. **Nuclear Power Plant Control and Instrumentation**, Intern. Atomic Energy Agency, Prague, Czechoslovakia. (J. H. Kane, Office of Information Services, U.S. Atomic Energy Commission, Washington, D.C. 20545)

24-28. American College of **Psychiatrists**, New Orleans, La. (P. A. Martin, 16300 N. Park Dr., Southfield, Mich. 48075)

25-29. American **Mathematical Soc.**, Dallas, Tex. (G. L. Walker, AMS, P.O. Box 6248, Providence, R.I. 02904)

26. **Bibliographical Soc. of America**, New York, N.Y. (Miss C. Hover, Box 397, Grand Central Sta., New York 10017)

27-29. **Mathematical Assoc. of America**, Dallas, Tex. (H. Alder, Dept. of Mathematics, Univ. of California, Davis 95616)

28-1. American Soc. of **Heating, Refrigeration, and Air-Conditioning Engineers**, Chicago, Ill. (A. T. G. Boggs III, ASHRAE, 345 E. 47 St., New York 10017)

28-2. **Power Engineering Soc.**, Inst. of Electrical and Electronics Engineers, New York, N.Y. (J. W. Bean, IEEE-PES, 345 E. 47 St., New York 10017)

28-3. American **Library Assoc.**, Washington, D.C. (R. Wedgeworth, ALA, 50 E. Huron St., Chicago, Ill. 60611)

28-6. North American Conf. on **Fertility and Sterility**, U.S. Intern. Foundation for Studies in Reproduction, Acapulco, Mexico. (Mrs. F. Royce, 112-44 69th Ave., Forest Hills, N.Y. 11375)

29-1. American Assoc. of **Physics Teachers**, Albany, N.Y. (W. V. Johnson, AAPT, 1785 Massachusetts Ave., NW, Washington, D.C. 20036)

31-2. Western **Spectroscopy Assoc.**, Pacific Grove, Calif. (G. R. Haugen, L-404, Univ. of California, Lawrence Livermore Lab., Livermore 94550)

#### February

7-8. **Organic Matter in Water Supplies: Occurrence, Significance, and Control**, 15th water quality conf., Champaign, Ill. (V. L. Snoeyink, Dept. of Civil Engineering, Univ. of Illinois at Urbana-Champaign, Urbana 61801)

8-9. **Geodesy/Solid Earth and Ocean Physics Research**, 2nd conf., American Geophysical Union, Columbus, Ohio. (A. F. Spilhaus, Jr., AGU, 1707 L St., NW, Washington, D.C. 20036)

8-9. Association for **Hospital Medical Education**, Chicago, Ill. (T. G. Kummer, AHME, 1911 Jefferson Davis Hwy., Arlington, Va. 22202)

9-16. American Soc. of **Clinical Pathologists**, Honolulu, Hawaii. (G. F. Stevenson, ASCP, 2100 W. Harrison St., Chicago, Ill. 60612)

10-11. **Medical Education**, 69th annual congr., American Medical Assoc., Chicago, Ill. (C. H. W. Ruhe, AMA Council on Medical Education, 535 N. Dearborn St., Chicago 60610)

10-14. American Acad. of **Allergy**,

Washington, D.C. (J. O. Kelley, AAA, 225 E. Michigan St., Milwaukee, Wis. 53202)

10-15. Society for Range Management, Boise, Idaho. (F. T. Colbert, SRM, 2120 S. Birch St., Denver, Colo. 80222)

12-13. Psychopharmacologic Treatment in Psychiatry, Gainesville, Fla. (Dr. H. C. B. Denber, Dept. of Psychiatry, College of Medicine, J. Hillis Miller Health Center, Gainesville 32601)

12-14. Energy: Demand, Conservation and Institutional Problems, National Science Foundation RANN Program and Massachusetts Inst. of Technology, Cambridge, Mass. (M. R. Bateman, Industrial Liaison Office, Massachusetts Inst. of Technology, Cambridge 02139)

14-16. Solid-State Circuits, intern. conf., Inst. of Electrical and Electronics Engineers, Inc., Philadelphia, Pa. (L. Winner, 152 W. 42 St., New York 10036)

14-18. American College of Cardiology, San Francisco, Calif. (W. D. Nelligan, ACC, 9650 Rockville Pike, Bethesda, Md. 20014)

16-17. Symposium on Immunopharmacology, New York Heart Assoc., New York, N.Y. (I. Saulpaugh, NYHA, 2 E. 64 St., New York 10021)

18-24. Effects of Low-Frequency Magnetic and Electric Fields on Biological Communication Processes, Natl. Science Foundation, Neuroelectric Soc., and Intern. Inst. for Medical Electronics and Biological Engineering, Snowmass-at-Aspen, Colo. (A. Sances, Jr., NS, 8700 W. Wisconsin Ave., Milwaukee, Wis. 53226)

19-22. International Symp. on Hydrometallurgy, Chicago, Ill. (D. J. I. Evans, Research and Development Div., Sherritt Gordon Mines Ltd., Fort Saskatchewan, Alta., Canada)

20. National Assoc. of Medical Examiners, Las Vegas, Nev. (P. Hudson, P.O. Box 2488, Chapel Hill, N.C. 27514)

20-23. American Acad. of Forensic Sciences, Las Vegas, Nev. (J. T. Weston, 44 Medical Dr., Salt Lake City, Utah, 84113)

21-22. Educational Technology Symp., Washington, D.C. (N. E. Rogers, NSIA, Suite 700, 740 15th St., N.W., Washington, D.C. 20005)

21-24. Society of Professors of Education, Chicago, Ill. (R. E. Bayles, School of Education, Atlanta Univ., Atlanta, Ga. 30314)

21-6. American Medical Assoc. and Weizmann Inst. of Science, Tel Aviv, Israel. (Israel Scientific Conf., Dept. of Intern. Medicine, AMA, 535 N. Dearborn St., Chicago, Ill. 60610)

24-27. American Assoc. of Pathologists and Bacteriologists, Washington, D.C. (A. J. French, Univ. of Michigan Medical Center, Ann Arbor 48104)

24-3. International Acad. of Pathology, U.S.-Canadian Div., Washington, D.C. (L. D. Stoddard, Dept. of Pathology, Medical College of Georgia, Augusta 30902)

25. Oregon Acad. of Science, Salem. (H. D. Reese, Dept. of Chemistry, Oregon State Univ., Corvallis 97331)

25-1. American Inst. of Mining, Metallurgical and Petroleum Engineers, Chicago, Ill. (J. B. Alford, AIMPE, 345 E. 47 St., New York 10017)

# CIRCULATE

constant temperature liquid

with this RUGGED  
RELIABLE  
ECONOMICAL  
General Purpose Circulator

\$265

- + 25°C to + 100°C
- Built-in Cooling Coil for accurate control near ambient
- $\pm 0.01^\circ\text{C}$  Control Accuracy
- Precision Contact Thermoregulator
- Pressure Pump circulates 1½ gals/min.



Quality construction and solid-state design of the popular Julabo/Rainin Model U-4 circulator provide very accurate and reliable constant temperature control for — spectrophotometers, chromatography columns, refractometers and other laboratory equipment. With dry-ice, this economical circulator can cool to  $-60^\circ\text{C}$ . Small samples may be immersed directly via the convenient opening in top of tank.

Other circulators for heating and cooling applications also available. Complete catalog of Constant Temperature control equipment sent on request. Write or call (617) 277-3335.

**RAININ**  
INSTRUMENT CO. INC.

1030 COMMONWEALTH AVE.  
BOSTON, MA 02215  
TEL., (617) 277-3335

Circle No. 66 on Readers' Service Card

## VERSATILE POWER SUPPLY

5 operating modes • stabilized power output

New, advanced DC power supply with silicon-controlled rectifier circuit makes automatic compensation for fluctuations in load resistance which protects samples and media from overheating. Size 16" x 9" x 7".

5 operating modes: constant-current; constant-voltage; constant-current with upper voltage limit; constant-voltage with upper current limit; and limited voltage and current. Adjustable output 0-500 volts and 0-150mA.



Operates completely unattended for unlimited periods of time.

Two pair of output sockets are provided, each fitted with a polarity reversal switch.

A large selection of other power supplies ranging up to 10,000 volts is available from Shandon Southern Instruments, Inc., 515 Broad Street, Sewickley, Pennsylvania 15143 (Pittsburgh District).

# SHANDON

PITTSBURGH • LONDON • FRANKFURT

25-3. Continuing Education for **Excellence in Medicine and Surgery**, American Soc. of Contemporary Medicine and Surgery, Miami Beach, Fla. (Miss V. Kendall, Suite 1629, ASCMS, 30 N. Michigan Ave., Chicago, Ill. 60602)

26-1. **American Educational Research Assoc.**, New Orleans, La. (R. A. Der-shimer, AERA, 1126 16th St., NW, Wash-ington, D.C. 20036)

27-2. **Biophysical Soc.**, Columbus, Ohio. (M. O. Dayhoff, Natl. Biomedical Re-search Foundation, Georgetown Univ. Medical Center, 3900 Reservoir Rd., NW, Washington, D.C. 20007)

28-3. **American Assoc. of Petroleum Geologists**, Rocky Mountain Div., Salt Lake City, Utah. (Miss K. Watson, AAPG, 1444 S. Boulder, Tulsa, Okla. 74101)

28-4. **American Psychological Assoc.**, Div. of Psychotherapy, Freeport, Grand Bahama Island. (V. Rosenthal, 815 Indian Rd., Glenview, Ill. 60025)

### March

1-2. **Fracture and Flaws**, 13th annual symp., American Soc. of Mechanical En-gineers and American Soc. for Metals, Albuquerque, N.M. (D. Buchanan, Or-ganization 9310K, Sandia Labs., Albu-querque 87115)

2-3. **International Geobotany Conf.**, Knoxville, Tenn. (C. Amundsen, Graduate Program in Ecology, Univ. of Tennessee, Knoxville 37916)

3-9. **American Concrete Inst.**, annual, Atlantic City, N.J. (ACI, Box 4754 Red-ford Sta., Detroit, Mich. 48219)

5-7. **Particle Accelerator Conf.**, 5th, San Francisco, Calif. (E. J. Lofgren, Lawrence Radiation Lab., Univ. of Cali-fornia, Berkeley 94720)

5-7. **National Federation of Science Abstracting and Indexing Services**, Phila-delphia, Pa. (S. Kennan, NFSAIS, 2102 Arch St., Philadelphia 19103)

5-9. **Medical Data Processing Symp.**, Inst. for Research and Automation, Tou-louse, France. (E. E. Van Brunt, Perma-nente Medical Group, 3779 Piedmont Ave., Oakland, Calif. 94611)

6-10. **Lymphology**, 4th intern. congr., Tucson, Ariz. (C. L. Witte, Dept. of Surgery, Univ. of Arizona College of Medicine, Tucson 85721)

8-11. **Southern Anthropological Soc.** (9th annual) and **American Ethnological Soc.**, Wrightsville Beach, N.C. (T. Fitz-gerald, Dept. of Sociology and Anthro-pology, Univ. of North Carolina at Greensboro, Greensboro 27412)

9-10. **Pennsylvania Acad. of Science**, Carlisle. (G. C. Shoffstall, Jr., 214 Whit-more Lab., Pennsylvania State Univ., University Park 16802)

11-16. **Symposium on Membranes**, Squaw Valley, Calif. (W. Stoeckenius, Dept. of Bacteriology, Univ. of Cali-fornia, Los Angeles 90024)

11-16. **American Soc. of Photogram-metry**, Washington, D.C. (L. P. Jacobs, 105 N. Virginia Ave., Falls Church, Va. 22046)

12-13. **Drugs, Hormones and the Kid-ney**, 4th annual nephrology conf., Amer-ican Heart Assoc., Inc., Philadelphia, Pa. (Dept. of Councils, AHA, 44 E. 23 St., New York 10010)

12-15. **American Soc. for Neurochem-istry**, 4th, Columbus, Ohio. (L. A. Hor-rocks, Dept. of Physiological Chemistry, Ohio State Univ., 1645 Neil Ave., Co-lumbus 43210)

12-15. **Conference on Prevention and Control of Oil Spills**, American Petroleum Inst., Environmental Protection Agency, U.S. Coast Guard, Washington, D.C. (J. R. Gould, Suite 700, 1629 K St., NW, Washington, D.C. 20006)

12-16. **Symposium on Applications of Nuclear Data in Science and Technology**, Intern. Atomic Energy Agency, Paris, France. (J. H. Kane, Office of Information Services, U.S. Atomic Energy Commis-sion, Washington, D.C. 20545)

13-16. **Optical Soc. of America**, Denver, Colo. (M. E. Warga, OSA, 2100 Pennsyl-vania Ave., NW, Washington, D.C.)

14-16. **American Assoc. of Petroleum Geologists**, Southwest Div., Fort Worth, Tex. (K. Watson, AAPG, 1444 S. Boulder, Box 979, Tulsa, Okla. 74101)

15-16. **Advanced Analytical Concepts for the Clinical Laboratory**, 5th annual, Oak Ridge, Tenn. (C. D. Scott, Oak Ridge Natl. Lab., P.O. Box X, Oak Ridge 37830)

15-16. **Symposium on Drugs and the Unborn Child**, National Foundation—March of Dimes, New York, N.Y. (M. New, Dept. of Pediatrics, Div. of Pedi-atric Endocrinology, New York Hospital—Cornell Medical Center, 525 E. 68 St., New York 10021)

15-16. **Estuaries of the Pacific North-west**, 3rd technical conf., Corvallis, Ore. (L. S. Slotta, Ocean Engineering Programs, School of Engineering, Oregon State Univ., Corvallis 97331)

15-17. **Association for Children with Learning Disabilities**, 10th intern. conf., Detroit, Mich. (K. M. Tillotson, ACLD, 2200 Brownsville Rd., Pittsburgh, Pa. 15210)

15-17. **Symposium on Reproductive Biology, Mating Behavior and Captive Breeding of Felids**, World Wildlife Safari and Inst. for the Study and Conservation of Endangered Species, Winston, Ore. (R. L. Eaton, Box AL, Winston 97496)

16. **Mississippi Acad. of Sciences**, Biloxi. (D. L. Dodgen, University Medical Center, Jackson, Miss. 39216)

18-21. **Wildlife Management Inst.**, Washington, D.C. (L. R. Jahn, WMI, 709 Wire Bldg., Washington, D.C. 20005)

18-22. **Society of Toxicology**, New York, N.Y. (R. A. Scale, ST, Esso Research and Engineering Co., P.O. Box 45, Linden, N.J. 07036)

18-23. **Deafness**, 4th intern. conf., World Federation of the Deaf and Assoc. of the Deaf and Mute in Israel, Tel Aviv, Israel. (A. Reich, Organizing Committee, P.O. Box 16271, Tel Aviv)

18-23. **Symposium on Molecular Biol-ogy (Virus Research)**, Intern. Chemical and Nuclear Corp. and Molecular Biol-ogy Inst., Univ. of California, Squaw Valley. (C. F. Fox, Dept. of Bacteriology, Univ. of California, Los Angeles 90024)

19-23. **Characterization of Corrosion Products**, Natl. Assoc. of Corrosion Engi-neers, Anaheim, Calif. (W. D. France, Jr., General Motors Research Labs., General Motors Technical Center, Warren, Mich. 48090)

## PUBLIC ARCHEOLOGY

by CHARLES R. McGIMSEY III, Arkansas Archeological Survey, Uni-versity of Arkansas Museum, Fayetteville

A Volume in the STUDIES IN ARCHEOLOGY Series

"The book should be required read-ing for all students of archeology, professional and nonprofessional. It is an invaluable source of informa-tion for archeologists, legislators, and the public interested in learning what programs in archeology are provided in each state and what legislation is available for the preservation of archeological resources and support of archeological projects."—From a Review in Science: Carl H. Chapman, Department of Anthropology, Univ. of Missouri, Columbia

McGimsey's book, based on fifteen years of experience working with the University of Arkansas Museum and the Arkansas Archeological Survey, shows how private citizens can—in-deed, must—work together to pre-serve our archeological sites. His book demonstrates basic techniques for establishing public support for archeological programs and for get-ting legislation passed to protect the endangered sites. The author discusses and cites examples of pertinent local, state, and federal legislation and de-scribes in detail the public and finan-cial support, administrative arrange-ments, and legislative basis for arche-ology in each of the 50 states, as well as the federal agencies involved. He then outlines plans for designing state programs of archeological research and preservation, illustrating them with techniques and principles that have made Arkansas' program of archeological research one of the best publicly-supported programs in the country.

1972, 282 pp., \$9.50

## AN ARCHAEOLOGICAL PERSPECTIVE

by LEWIS R. BINFORD, Depart-ment of Anthropology, Univ. of New Mexico, Albuquerque

A Volume in the STUDIES IN ARCHEOLOGY Series

This book brings together for the first time the articles of Lewis R. Binford—one of the most controversial and influential figures in modern archeol-ogy. These papers—four of them pre-viously unpublished—were all written during the past ten years and reflect Binford's development of an explicit scientific approach to archaeological research. His introduction to AN ARCHAEOLOGICAL PERSPEC-TIVE is a highly personal account of his experiences as a rebel anthropolo-gist whose concepts have only re-cently been accepted by traditional archaeologists. With candor reminis-cent of Watson's THE DOUBLE HELIX he describes the intense con-flicts and passions that arise when man studies man. The rest of the book is divided into four sections—Archaeological Method and Reason-ing; Data Collection; Theory and Assumption; and Analysis—each of them introduced in a short essay by Professor Binford.

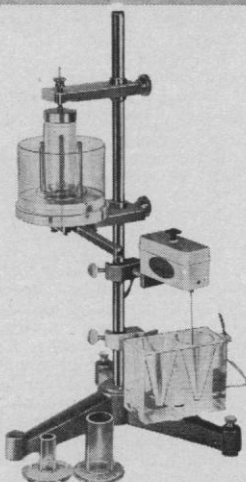
1972, 480 pp., \$11.95

## SEMINAR PRESS

New York and London  
111 5TH AVE., NEW YORK 10003

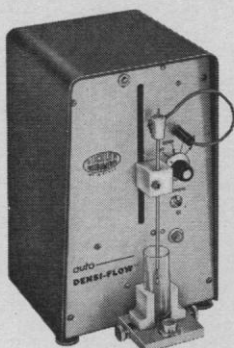
# DENSITY GRADIENT INSTRUMENTS FROM BUCHLER

to pierce  
or not to pierce...  
that is the option!



## UNIVERSAL MIXER

forms gradients from  
5 to 50 ml in same mixer



## AUTO DENSI-FLOW™

removes gradients  
without piercing

Look to Buchler for a density gradient system to meet your specific needs. Whether it's a mixer (available with or without piercing unit) or the exclusive Densi-Flow which deposits and withdraws samples, you can depend on Buchler.

**BUCHLER INSTRUMENTS DIV.**  
**NUCLEAR-CHICAGO CORP.**

A SUBSIDIARY OF G.D. SEARLE & CO  
1327 SIXTEENTH ST. FORT LEE, N.J. 07024

20-23. American Astronomical Union (Planetary Sciences Div.), Tucson, Ariz. (B. Smith, Dept. of Astronomy, New Mexico State Univ., Las Cruces 88001)

22-23. Information Sciences and Systems, 7th conf., Princeton, N.J. (T. Pavlidis, Dept. of Electrical Engineering, School of Engineering/Applied Science, Engineering Quadrangle, Princeton 08540)

23-25. Future Status of Earth Resources in Society, Natl. Assoc. of Geology Teachers, Central Section, Chicago, Ill. (M. K. Sood, Dept. of Earth Sciences, Northeastern Illinois Univ., Bryn Mawr at St. Louis Ave., Chicago 60625)

26-28. Engineering Aspects of Magneto-hydrodynamics, Stanford, Calif. (M. Mitchner, Dept. of Mechanical Engineering, Stanford Univ., Stanford 94305)

26-29. Institute of Electrical and Electronics Engineers, New York, N.Y. (D. G. Fink, IEEE, 345 E. 47 St., New York 10017)

26-30. Symposium on New Developments in Radiopharmaceuticals and Labeled Compounds, Intern. Atomic Energy Agency, Copenhagen, Denmark. (J. H. Kane, Office of Information Services, U.S. Atomic Energy Commission, Washington, D.C. 20545)

27-29. Reduction of Pollutants in Heterogeneous Combustion Processes, Combustion Inst., Central States Section, Champaign, Ill. (R. A. Strehlow, 105 Transportation Bldg., Univ. of Illinois, Urbana 61801)

27-29. National Assoc. for Research in Science Teaching, Detroit, Mich. (R. W. Lefler, Dept. of Physics, Purdue Univ., Lafayette, Ind. 47907)

28-30. Conference on Nuclear Structure and High Energy Physics (Nuclear Physics Sub-Committee), Inst. of Physics, Liverpool, England. (Meetings Officer, IP, 47 Belgrave Sq., London SW1X 8QX, England)

29-30. Rural Health, American Medical Assoc., Dallas, Tex. (B. L. Bible, AMA, 535 N. Dearborn St., Chicago 60610)

29-31. American Philosophical Assoc., Pacific Div., Seattle, Wash. (N. E. Bowie, Hamilton College, Clinton, N.Y. 13323)

29-31. Northwest Scientific Assoc., Walla Walla, Wash. (G. H. Deitschman, U.S. Forest Service, P.O. Box 469, Moscow, Idaho 83843)

29-1. Society for Research in Child Development, Philadelphia, Pa. (M. K. Harlow, 22 N. Charter St., Madison, Wis. 53706)

30-3. National Science Teachers Assoc., Detroit, Mich. (R. H. Carleton, NSTA, 1201 16th St., NW, Washington, D.C. 20036)

31. New Jersey Acad. of Science, West Long Branch (M. L. Branin, Box 61, Cranbury, N.J. 08512)

31-6. American Pharmaceutical Assoc., Chicago, Ill. (W. S. Apple, APA, 2215 Constitution Ave., NW, Washington, D.C. 20037)

### April

2-7. American College of Radiology, San Francisco, Calif. (W. C. Stronach, ACR, 20 N. Wacker Dr., Chicago, Ill. 60606)

3-5. Reliability Physics Symp., Inst. of Electrical and Electronics Engineers, Las

Vegas, Nev. (H. Lauffenburger, IIT Research Inst., 10 W. 35 St., Chicago, Ill. 60616)

3-13. Education of Teachers for Integrated Science, Committee on Teaching of Science, International Council of Scientific Unions, College Park, Md. (M. Dietz, Science Teaching Center, Univ. of Maryland, College Park 20742)

4-7. American Fertility Soc., San Francisco, Calif. (W. C. Stronach, AFS, 1801 Ninth Ave. S., Birmingham, Ala. 35205)

5-7. Alabama Acad. of Science, Huntsville. (T. Denton, Biology Dept., Samford Univ., Birmingham, Ala. 35209)

5-7. Michigan Acad. of Science, Arts and Letters, Ann Arbor. (T. G. Overmire, MASAL, 2117 Washtenaw Ave., Ann Arbor 48104)

5-7. West Virginia Acad. of Science, Fairmont. (E. A. Bartholomew, West Virginia Univ., Morgantown 26506)

5-7. National Council of Teachers of Mathematics, Charleston, S.C. (F. A. Kirby, Union County Public Schools, P.O. Box 629, Union, S.C.)

5-9. Combustion Engines, 10th intern. congr., American Soc. of Mechanical Engineers, Washington, D.C. (Meetings Officer, ASME, United Engineering Center, 345 E. 47 St., New York 10017)

6-8. American Psychosomatic Soc., 30th annual, Denver, Colo. (M. T. Singer, 265 Nassau Rd., Roosevelt, N.Y. 11575)

7-12. American College of Allergists, Atlanta, Ga. (E. Bauers, 2100 Dain Tower, Minneapolis, Minn. 55402)

8-11. American Assoc. of Dental Schools, Washington, D.C. (B. F. Miller, III, AADS, 211 E. Chicago Ave., Chicago, Ill. 60611)

8-13. American Chemical Soc., 165th natl., Dallas, Tex. (Meetings Manager, ACS, 1155 16th St., NW, Washington, D.C. 20036)

8-14. Turbulent Diffusion in Environmental Pollution, 2nd symp., American Geophysical Union, Charlottesville, Va. (A. F. Spilhaus, Jr., American Geophysical Union, 1707 L St., NW, Washington, D.C. 20036)

9-11. Frontiers in Education, Education Group of the Inst. of Electrical and Electronics Engineers, West Lafayette, Ind. (Meetings Officer, IEEE, 345 E. 47 St., New York 10017)

9-11. Interaction of Particle Beams with Surfaces, Lancaster, England. (Meetings Officer, Inst. of Physics, 47 Belgrave Sq., London SW1X 8QX, England)

9-11. American Vacuum Soc., New Mexico chapter, Albuquerque. (R. L. Gerlach, Sandia Labs., Albuquerque)

9-12. American Assoc. of Anatomists, New York, N.Y. (J. E. Pauly, Dept. of Anatomy, Univ. of Arkansas School of Medicine, Little Rock 72201)

9-12. Cancer Detection and Prevention, 2nd intern. symp., Intern. Union against Cancer and Intern. Agency for Research on Cancer of the World Health Organization, Bologna, Italy. (2nd Intern. Symp. on CDP, Istituto di Oncologia "F. Ad-darii," Viale Ercolani 4/2, 40138 Bologna)

9-12. American Acad. of Pediatrics, Boston, Mass. (R. G. Frazier, AAP, 1801 Hinman Ave., Evanston, Ill. 60201)

10-12. Vibration Problems in Industry,

intern. symp., United Kingdom Atomic Energy Authority, Keswick in Cumberland, England. (J. R. Wakefield, UKAEA, Windscale, Seascale, Cumberland, England, CA20 1PF)

10-13. Acoustical Soc. of America, Boston, Mass. (B. H. Goodfriend, ASA, 335 E. 45 St., New York 10017)

11-13. American Assoc. for Cancer Research, Inc., 64th annual, Atlantic City, N.J. (H. J. Creech, AACR, Inst. for Cancer Research, Fox Chase, Philadelphia, Pa. 19111)

11-14. Symposium on Physiological Ecology of Estuarine Organisms, Georgetown, S.C. (F. J. Vernberg, Belle W. Baruch Coastal Research Inst., Univ. of South Carolina, Columbia 29208)

12-14. Society for Applied Anthropology, 33rd annual, Tucson, Ariz. (T. E. Downing, Bureau of Ethnic Research, Univ. of Arizona, Tucson 85721)

12-14. American Assoc. of Physical Anthropologists, Dallas, Tex. (E. I. Fry, Dept. of Anthropology, Box 339, Southern Methodist Univ., Dallas 75222)

12-14. Association of Southeastern Biologists, Bowling Green, Ky. (M. L. Gilbert, Biology Dept., Florida Southern College, Lakeland 33802)

12-15. International Assoc. for Dental Research, North American Div., Washington, D.C. (A. R. Frechette, IADR, 211 E. Chicago Ave., Chicago, Ill. 60611)

13. Utah Acad. of Sciences, Arts and Letters, Logan. (H. Buehnan, Dept. of Botany, Weber State College, Ogden 84403)

13-14. Socio-Economics of Health Care, American Medical Assoc., Chicago, Ill. (J. Rowland, Div. of Medical Practice, AMA, 535 N. Dearborn St., Chicago 60610)

15-18. Association of American Geographers, Atlanta, Ga. (J. W. Nystrom, AAG, 1710 16th St., NW, Washington, D.C. 20009)

15-19. Industrial Aspects of Biochemistry, Federation of European Biochemical Soc., Dublin, Ireland. (B. Masterson, FEBS Meeting Secretariat, IMA Conf. Centre, 10, Fitzwilliam Pl., Dublin 2)

15-20. American Soc. of Biological Chemists, Atlantic City, N.J. (R. A. Harte, ASBC, 9650 Rockville Pike, Bethesda, Md. 20014)

15-20. Federation of American Soc. for Experimental Biology, Atlantic City, N.J. (A. Nixon, FASEB, 9650 Rockville Pike, Bethesda, Md. 20014)

15-20. American Physiological Soc., Atlantic City, N.J. (R. G. Daggs, APS, 9650 Rockville Pike, Bethesda, Md. 20014)

16-18. Liquid State—Van der Waals Centenary, Kent, England. (Meetings Officer, Inst. of Physics, 47 Belgrave Sq., London SW1X 8QX England)

16-18. Nonlinear Elasticity, Madison, Wis. (G. G. Moran, Mathematics Research Center, Univ. of Wisconsin, 610 Walnut St., Madison 53706)

16-20. American Soc. for Experimental Pathology, Atlantic City, N.J. (G. B. Mider, ASEP, 9650 Rockville Pike, Bethesda, Md. 20014)

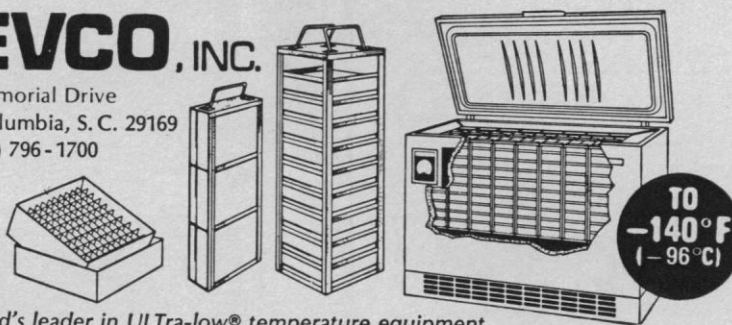
16-20. American Geophysical Union, 54th annual, Washington, D.C. (A. F. Spilhaus, Jr., AGU, 1707 L St., NW, Washington, D.C. 20036)

## Revco offers TOTAL ULT Freezer Efficiency with Inventory Control Systems.

For years a pioneer in ULTra-Low® temperature freezers, Revco offers an Inventory Control System that is adaptable to your needs. Revco can provide TOTAL freezer efficiency in sizes from 1½ to 25 cubic feet, including popular 6.5, 9, 12 and 17 cubic-foot sizes, chest and upright.

### REVCO, INC.

1148 Memorial Drive  
West Columbia, S. C. 29169  
Tel. (803) 796-1700



The world's leader in ULTra-low® temperature equipment.

Circle No. 60 on Readers' Service Card

## The interference microscope for transmitted light, accurate to 1/500th wavelength

The AMPLIVAL  
INTERPHAKO by  
aus JENA—a

sophisticated interference phase-contrast instrument to contrast and measure the thickness and/or refractive index of the most minute, most transparent microscopic subjects in your laboratory. The precision unit affords 4 investigative methods in addition to normal bright-field investigation: Shearing, with differential and total image splitting in interference contrast; Interphako, without image splitting by use of axially symmetrical illumination; positive, negative, central dark-field and colored phased contrast; and the interference fringe method.

Versatility and ease of operation complement excellent image quality through the low-, high- and highest-power objectives of the AMPLIVAL INTERPHAKO. The instrument may also be used with normal bright-field objectives of any type correction.



For free brochure and details on the complete line  
of aus JENA biological science instruments  
write or call:

International Micro-Optics

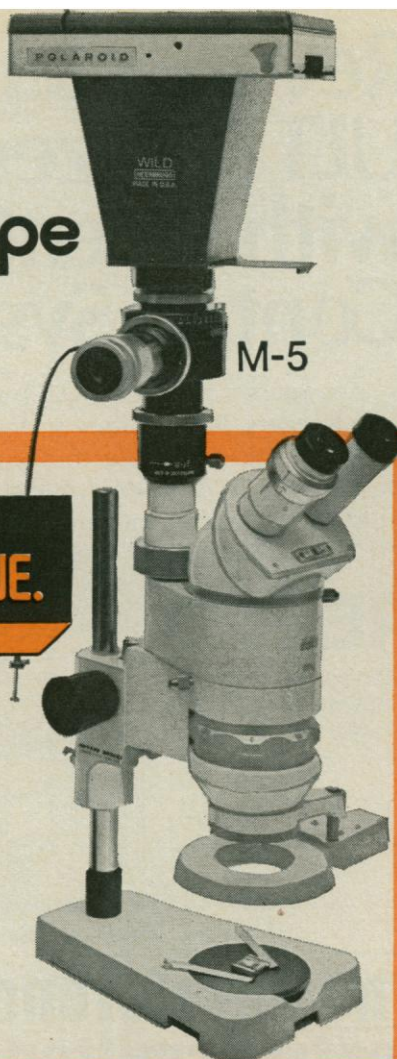
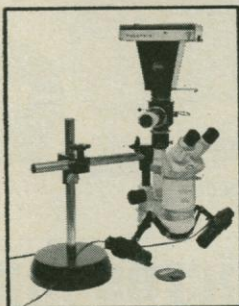
50 Daniel Road, Fairfield, N. J. 07006 (201) 227-6500  
(West Coast)—2560 Caminito La Paz, La Jolla, Calif. 92037  
Exclusive U. S. Distributors aus JENA Jenoptik Jena G.m.b.H.  
GDR-69 JENA, Carl-Zeiss Strasse 1

Circle No. 61 on Readers' Service Card

# our trinocular\*\* Stereomicroscope

the  
**VERSATILE ONE.**

**WILD**



The bio-lab would like to steal this one from the industrial lab and vice-versa. Keep your eye on the Wild M-5.

Example 1. Dissection. The double iris diaphragm gives the increased depth of focus you need to keep specimen, scalpel or forceps in clear focus with optimum resolution.

Example 2. Inspection. Mount the M-5 on the Universal Swing Arm Stand. Perfect for inspecting wide surfaces and large objects.

Example 3. All day viewing. No eyestrain. The advanced optical path correction assures fatigue-free observation.

Example 4. Features and Accessories. Standard or available... for magnifications from 2x to 200x... four sequential power steps... flatfield optics for large field diameters... Camera Lucida... photomicrography... CCTV and cine-micrography.

Examples 5, 6, 7, 8, 9. Please ask for the Wild Brochure M-5, or for a demonstration.

**\*\*CONVERT ANY BINOCULAR INTO TRINOCULAR M-5 BY SIMPLY INSERTING THE 75:25 BEAMSPLITTER PHOTOTUBE. YOU CAN BUY IT SEPARATELY.**

**WILD®**  
HEERBRUGG

**WILD HEERBRUGG INSTRUMENTS, INC.**  
FARMINGDALE, NEW YORK 11735 • 516-293-7400  
**WILD OF CANADA**, 881 LADY ELLEN PLACE, OTTAWA 3, CAN.  
**WILD OF MEXICO, S. A.** LONDRES 256, MEXICO 6, D. F.

16-20. American Assoc. of **Immunologists**, Atlantic City, N.J. (H. Metzger, AAI, 9650 Rockville Pike, Bethesda, Md. 20014)

16-20. American Inst. of **Nutrition**, Atlantic City, N.J. (AIN, 9650 Rockville Pike, Bethesda, Md. 20014)

16-20. American Soc. for **Pharmacology and Experimental Therapeutics**, Atlantic City, N.J. (E. B. Cook, ASPET, 9650 Rockville Pike, Bethesda, Md. 20014)

18-20. **Great Lakes Research**, 16th conf., Intern. Assoc. for Great Lakes Research, Columbus, Ohio 43210. (C. E. Herdendorf, Center for Lake Erie Area Research, College of Biological Sciences, Ohio State Univ., 484 W. 12 Ave., Columbus 43210)

19-20. Symposium on **Controlled Release of Biologically Active Agents**, Birmingham, Ala. (A. C. Tanquary, Southern Research Inst., 2000 Ninth Ave. S., Birmingham 35205)

19-21. Louisiana Acad. of **Sciences**, Monroe. (B. F. Dowden, Dept. of Biological Sciences, Louisiana State Univ., Shreveport 71105)

19-21. Southern Soc. for **Philosophy and Psychology**, Knoxville, Tenn. (M. Loeb, Dept. of Psychology, Univ. of Louisville, Louisville, Ky.)

20-21. Illinois State Acad. of **Science**, Urbana. (N. R. Brewer, ISAS, 5757 S. Drexel Ave., Chicago)

22-26. American **Radium Soc.**, Colorado Springs, Colo. (F. N. Rutledge, 4828 Caroline St., Houston, Tex. 77004)

22-27. Council for **Exceptional Children**, 51st annual intern. conv., Dallas, Tex. (P. W. Stavros, CEC, 1411 S. Jefferson Davis Hwy., Arlington, Va. 22202)

23-25. **Instrument Soc. of America**, 19th analysis instrumentation symp., 14th chemical and petroleum instrumentation symp., Process Measurement and Control Div. symp., St. Louis, Mo. (J. L. Kern, Monsanto Co., 800 N. Lindbergh St., St. Louis 63166)

23-28. American Acad. of **Neurology**, Boston, Mass. (S. A. Nelson, AAN, 4005 W. 65 St., Minneapolis, Minn. 55435)

23-30. American Soc. for **Clinical Investigation**, Atlantic City, N.J. (P. Calabresi, Roger Williams General Hospital, Providence, R.I. 02908)

24-27. International **Magnetics Conf.**, Magnetic Soc. of the Inst. of Electrical and Electronics Engineers, Washington, D.C. (D. H. Looney, Bell Labs., Whippany Rd., Whippany, N.J. 07981)

25-26. American **Geriatrics Soc.**, Beverly Hills, Calif. (E. Henderson, 10 Columbus Circle, New York 10019)

25-27. The **Ocean, Nuclear Energy, and Man**, American Nuclear Soc. and Marine Technology Soc., Palm Beach Shores (Singer Island), Fla. (M. J. Ohanian, Dept. of Nuclear Engineering, Univ. of Florida, Gainesville 32601)

25-28. International **Communication Assoc.**, Montreal, P.Q., Canada. (M. Z. Sincoff, Center for Communication Studies, Ohio Univ., Athens 45201)

25-28. National Council of **Teachers of Mathematics**, Houston, Tex. (J. D. Gates, NCTM, 1201 16th St., NW, Washington, D.C. 20005)

26. **Sigma Pi Sigma**, Washington, D.C.

(D. W. J. Shea, State Univ. of New York, Stony Brook 11790)

26-27. **Scanning Electron Microscope Symp.**, 6th annual, Chicago, Ill. (O. Johari, IIT Research Inst., 10 W. 35 St., Chicago 60616)

26-28. **Louisiana Acad. of Sciences**, Monroe. (B. F. Dowden, Dept. of Biological Sciences, Louisiana State Univ., Shreveport 71105)

26-28. **Ohio Acad. of Science**, Cleveland. (J. H. Melvin, OAS, 445 King Ave., Columbus 43201)

26-28. **American Philosophical Assoc.**, Western Div., Chicago, Ill. (N. E. Bowie, Hamilton College, Clinton, N.Y. 13323)

26-28. **Population Assoc. of America**, New Orleans, La. (J. W. Brackett, PAA, P.O. Box 14182, Benjamin Franklin Sta., Washington, D.C. 20044)

27-28. **Georgia Acad. of Science**, Atlanta. (E. A. Stanley, Dept. of Geology, Univ. of Georgia, Athens 30601)

27-28. **Iowa Acad. of Science**, Grinnell. (R. W. Hanson, Dept. of Chemistry, Univ. of Northern Iowa, Cedar Falls 50613)

27-28. **Missouri Acad. of Science**, Columbia. (R. G. Combs, 206 Electrical Engineering Bldg., Univ. of Missouri, Columbia 65201)

27-28. **North Carolina Acad. of Science**, Charlotte. (J. A. Yarbrough, Dept. of Biology, Meredith College, Raleigh 27602)

27-28. **American Assoc. of University Professors**, St. Louis, Mo. (B. H. Davis, AAUP, Suite 500, 1 Dupont Circle, NW, Washington, D.C. 20036)

27-29. **Wisconsin Acad. of Sciences, Arts and Letters**, Prairie du Chien. (J. R. Batt, WASAL, 5001 University Ave., Madison 53705)

28. **Society for Investigative Dermatology**, Atlantic City, N.J. (J. S. Strauss, Boston Univ. Medical Center, 80 E. Concord St., Boston, Mass. 02118)

28. **Societal Problems of Water Resources**, 2nd annual symp., Illinois Earth Science Assoc., Chicago. (M. Qutub, Northeastern Illinois Univ., Bryn Mawr at St. Louis Ave., Chicago 60625)

28-29. **Montana Acad. of Sciences**, Dillon. (R. E. Juday, Dept. of Chemistry, Univ. of Montana, Missoula 59801)

29-1. **Classification Soc.**, North American Branch, 4th annual, Atlanta, Ga. (F. J. Rohlf, Dept. of Biology, State Univ. of New York, Stony Brook 11790)

29-2. **Off-Shore Technology**, Inst. of Electrical and Electronics Engineers, Houston, Tex. (Technical Activities Bd., 345 E. 47 St., New York 10017)

29-3. **American Ceramic Soc., Inc.**, Cincinnati, Ohio. (F. P. Reid, ACSI, 65 Ceramic Dr., Columbus 43214)

29-3. **American Oil Chemists Soc.**, New Orleans, La. (J. Lyon, AOCS, 508 S. 6 St., Champaign, Ill. 61820)

30-12. **Lindau Psychotherapy Weeks**, Assoc. for Psychotherapeutic Training, Lindau, Germany. (H. Stolze, D-8 München 81, Adalbert-Stifter-Strasse 31)

May

1-2. **Electron Device Techniques Conf.**, Inst. of Electrical and Electronics Engineers, New York, N.Y. (D. Slater, Advisory Group on Electron Devices, 9th Floor, 201 Varick St., New York 10014)

8 DECEMBER 1972

## continuously adjustable digital microliter pipettes

### PIPETMAN™

■ excellent reproducibility

■ precise compensation for variation in fluid viscosity

■ two-step pushbutton operation

■ disposable pipette tips eliminate cross contamination

A SINGLE PIPETMAN™ DOES THE JOB OF AS MANY AS 25 FIXED-VOLUME PIPETTES

Model	Capacity	Price
P 20	0 - 20 $\mu$ l	\$98.00
P 200	0 - 200 $\mu$ l	\$98.00
P 1000	0 - 1000 $\mu$ l	\$98.00

All models supplied with 100 disposable tips.

**RAININ**  
INSTRUMENT CO. INC.

1030 COMMONWEALTH AVE.  
BOSTON, MA 02215  
TEL. (617) 277-3335

Circle No. 65 on Readers' Service Card

## FOR YOUR PROFESSIONAL LIBRARY

**PIERRE TEILHARD DE CHARDIN'S PHILOSOPHY OF EVOLUTION** by H. James Birx, *Canisius College, Buffalo, New York*. '72, 192 pp., \$9.75

**THE CLINICAL SIGNIFICANCE OF THE ESSENTIAL BIOLOGICAL METALS** by I. J. T. Davies, *The Univ. Hospital of Wales. Foreword by Robert Mahler*. '72, 140 pp. (5 1/2 x 8 1/2), \$9.75

**MALNUTRITION AND RETARDED HUMAN DEVELOPMENT** by Sohan L. Manocha, *Emory Univ., Atlanta, Georgia. Foreword by G. H. Bourne*. '72, 400 pp., 20 il., 8 tables, \$19.75

**HUMAN NUTRITION: Its Physiological, Medical and Social Aspects. A Series of Eighty-Two Essays** by Jean Mayer, *Harvard Univ., Boston*. '72, about 808 pp., 5 il.

**HUMAN ECOLOGY AND SUSCEPTIBILITY TO THE CHEMICAL ENVIRONMENT (4th Ptg.)** by Theron G. Randolph, *The Swedish Covenant Hospital, Chicago*. '72, 160 pp., 1 il., \$7.50

**HUMAN STERILIZATION: A Conference** Sponsored by International Institute for the Study of Human Reproduction, College of Physicians and Surgeons of Columbia University, and Center for Population Research, National Institute of Child Health and Human Development edited by Ralph M. Richart and Denis J. Prager. Forewords by Philip A. Corfman and Raymond L. Vande Wiele. (33 Contributors) '72, 424 pp., 140 il., 55 tables, \$21.00

**THE TROPHIC FUNCTION OF LYMPHOID ELEMENTS** by Jack W. Shields, *Santa Barbara Medical Clinic and the Cottage Hospital, California. Foreword by J. M. Yoffey*. '72, about 396 pp., 61 il. (14 in full color), 8 tables

**TOLERANCE, AUTOIMMUNITY AND AGING** compiled and edited by M. Michael Sigel, *Univ. of Miami School of Medicine*, and Robert A. Good. Introduction by Morris Rockstein. (9 Contributors) '72, 196 pp., 76 il., 49 tables, \$18.75

CHARLES C THOMAS • PUBLISHER • SPRINGFIELD • ILLINOIS • 62717  
301-327 East Lawrence Avenue

Circle No. 68 on Readers' Service Card

1133

1-4. Virginia Acad. of Science, Williamsburg. (R. C. Berry, 5907 Brookfield Rd., Richmond, Va. 23227)

2-4. International Conf. on **Surgical Care**, Royal College of Surgeons, Dublin, Ireland. (H. O'Flanagan, Irish Medical Assoc., 10 Fitzwilliam Pl., Dublin 2)

2-6. **Protides of Biological Fluids**, 21st colloquium, Brugge, Belgium. (Colloquium on Protides of the Biological Fluids, Simon Stevin Instituut, Jerusalemstraat 34, B-8000 Brugge)

3-5. Society for American **Archaeology**, San Francisco, Calif. (R. E. W. Adams, Univ. of Texas, Suite 250, 4242 Piedras Dr., San Antonio 78228)

3-5. American Assoc. for the **History of Medicine**, Cincinnati, Ohio. (G. Miller, Howard Dittrick Museum of Historical Medicine, 11,000 Euclid Ave., Cleveland, Ohio 44106)

3-5. Eastern **Psychological** Assoc., Washington, D.C. (M. Benimoff, Dept. of Psychology, Glassboro State College, Glassboro, N.J. 08028)

3-6. **Christian Medical Soc.**, Dallas, Tex. (H. W. Robinson, 3909 Swiss Ave., Dallas 75214)

3-6. Association of **Clinical Scientists**, Tampa, Fla. (F. W. Sunderman, Jr., Univ. of Connecticut, School of Medicine, Box G, Farmington 06032)

3-7. American **Psychoanalytic** Assoc., Honolulu, Hawaii. (S. Goodman, 3021 Telegraph Ave., Berkeley, Calif. 94705)

3-7. Association for Research in **Vision and Ophthalmology**, Sarasota, Fla. (R. D. Reinecke, Albany Medical College, Albany, N.Y. 12208)

4-5. Minnesota Acad. of Science, Northfield. (M. I. Harrigan, MAS, 3100 38th Ave., S., Minneapolis, Minn. 55406)

4-5. North Dakota Acad. of Science, Grand Forks. (B. G. Gustafson, Div. of Continuing Education, Univ. of North Dakota, Grand Forks 58201)

4-6. American College of **Apothecaries**, St. Louis, Mo. (D. C. Huffman, Jr., 5291 Rock Ridge Rd., Memphis, Tenn. 38128)

4-6. American Acad. of **Psychoanalysis**, Honolulu, Hawaii. (J. Barnett, AAP, 40 Gramercy Park N., New York 10024)

6-11. American Soc. for **Microbiology**, Miami Beach, Fla. (R. W. Sarber, ASM, 1913 I St., NW, Washington, D.C. 20006)

7-9. Rocky Mountain **Bioengineering** Symp., 10th annual, Boulder, Colo. (N. B. Kindig, Dept. of Electrical Engineering, Univ. of Colorado, Boulder 80302)

7-9. Society of **Economic Paleontologists and Mineralogists**, Anaheim, Calif. (Mrs. R. Tener, SEPM, Box 979, Tulsa, Okla. 74101)

7-10. **Aerospace Medical** Assoc., Las Vegas, Nev. (M. H. Goodwin, AMA, Washington National Airport, Washington, D.C. 20001)

7-11. Society of **Manufacturing Engineers**, Detroit, Mich. (R. W. Taylor, SME, 20501 Ford Rd., Dearborn, Mich. 48128)

7-11. Society of **Plastics Engineers**, Montreal, P.Q., Canada. (C. C. Campbell, SPE, 656 W. Putnam Ave., Greenwich, Conn. 06830)

8-9. **Fluvial Processes and Sedimentation**, 9th Canadian **Hydrology** Symp., Edmonton, Alta., Canada. (C. R. Neill, Research Council of Alberta, 303 Civil-

Electrical Engineering Bldg., Univ. of Alberta, Edmonton T6G 2E1)

9-11. **Operations Research** Soc. of America, Milwaukee, Wis. (J. R. Borsting, Dept. of Operations Research and Administrative Science, Naval Postgraduate School, Monterey, Calif. 93940)

9-11. **Midwestern Psychological** Assoc., Chicago, Ill. (W. F. Hill, Dept. of Psychology, Northwestern Univ., Evanston, Ill. 60201)

9-11. International Symp. on **Thrombosis and the Molecular Biology of the Platelet and Other Interacting Cells**, Chicago, Ill. (F. M. Booyse, Dept. of Biochemistry, Rush Medical College, 1753 W. Congress Pkwy., Chicago 60612)

9-12. Society for **Technical Communication**, Houston, Tex. (C. T. Youngblood, STC, Suite 421, 1010 Vermont Ave., NW, Washington, D.C. 20005)

11-12. American Assoc. of **Clinical Urologists**, New York, N.Y. (R. B. Carson, AACU, 708 E. Broward Blvd., Fort Lauderdale, Fla. 33301)

13-17. **Radiation Research** Soc., St. Louis, Mo. (R. J. Burk, Jr., RRS, 4211 39th St., NW, Washington, D.C. 20016)

13-18. **Electrochemical** Soc., Chicago, Ill. (E. G. Enck, ES, P. O. Box 2071, Princeton, N.J. 08540)

13-18. Electronics Div., **Electrochemical** Soc., Chicago, Ill. (H. R. Huff, Texas Instruments, Inc., Mail Station 202, Dallas, Tex. 75222)

13-18. Society for **Experimental Stress Analysis**, Los Angeles, Calif. (B. E. Rossi, SESA, 21 Bridge Sq., Westport, Conn. 06880)

14-16. American Assoc. of **Petroleum Geologists**, Anaheim, Calif. (T. L. Bear, Bear & Kistler, 1052 W. 6 St., Los Angeles, Calif. 90017)

14-17. **Irregularities in the Equatorial Ionosphere**, American Geophysical Union, Dallas, Tex. (A. F. Spilhaus, Jr., AGU, 1717 L St., NW, Washington, D.C. 20036)

14-18. Symposium on **Environmental Behaviour of Radionuclides Released in the Nuclear Industry**, Intern. Atomic Energy Agency, Aix-en-Provence, France. (J. H. Kane, Office of Information Services, U.S. Atomic Energy Commission, Washington, D.C. 20545)

14-18. American **Psychiatric** Assoc., Montreal, P.Q., Canada. (B. W. Hogan, APA, 1700 18th St., NW, Washington, D.C. 20009)

15-17. American Inst. of **Chemists**, Houston, Tex. (P. B. Slawter, Jr., AIC, 79 Madison Ave., New York 10016)

15-17. **Electrical and Electronic Measurement and Test Instrument** Conf., Ottawa, Ont., Canada. (G. R. Symonds, 4-261 Fifth Ave., Ottawa K1S 2N4)

15-20. American **Physiological** Soc., Atlantic City, N.J. (R. G. Daggs, APS, 9650 Rockville Pike, Bethesda, Md. 20014)

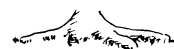
16-18. National Soc. for the **Prevention of Blindness**, New York, N.Y. (W. D. David, NSPB, 79 Madison Ave., New York 10016)

16-19. Society of **Technical Writers and Publishers**, Houston, Tex. (C. T. Youngblood, STWP, Suite 421, 1010 Vermont Ave., NW, Washington, D.C. 20005)

16-20. American **Pediatric** Soc., San Francisco, Calif. (C. D. Cook, 333 Cedar St., New Haven, Conn. 06510)



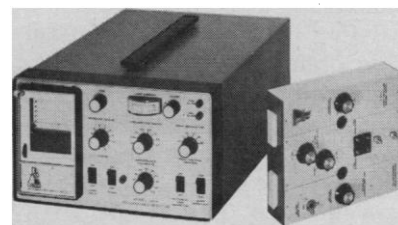
Six absorbance ranges  
five optical systems  
four controller models  
three flow cells  
two monitoring channels  
one Peak Separator  
And a partridge in a pear tree



ISCO UV absorbance monitors offer you all this (except the partridge, etc.) and more. Linear absorbance recording. Stable circuitry. Built in recorder. Narrow bandwidth. And by far the lowest cost of all high performance monitors.

These instruments can monitor two columns at once (or one column at two wavelengths). They operate at 254 nm, 280 nm, or other wavelengths to 950 nm. The ISCO Peak Separator will put each peak in a different test tube, and an ISCO integrator will print out peak areas.

These are some of the reasons ISCO UV absorbance monitors have been so popular for years. Thousands are in use throughout the world. Write or call for our catalog describing these monitors, as well as ISCO fraction collectors and many other instruments for biochemical research.



ISCO

BOX 5347 LINCOLN, NEBRASKA 68505  
PHONE (402) 434-0231 TELEX 48-6453

Circle No. 70 on Readers' Service Card