

News and Notes

International Ecology Colloquium

Robert W. Pennak

Biology Department, University of Colorado, Boulder

The Centre National de la Recherche Scientifique, with the cooperation of the Rockefeller Foundation, sponsored a colloquium titled "Ecologie des Groupements Animaux et Mixtes" in Paris, from February 20 to 25. This was one of a series of international scientific colloquia organized by the Centre, and all the 30 contributors were invited individually by the Centre.

Two half-day sessions were held each day. Ten such sessions assembled at the Curie Institute, one at the Trappes Meteorological Station, and the final session in the Cauchy Amphitheater, of the Sorbonne. The size of the audience ranged from 40 to 70 persons. Most of the correspondence and arrangements were handled by Professors Prenant and Pacaud of the Sorbonne.

Only two or three papers were presented at each half-day session; consequently there was ample time for discussion, which often proved lively and stimulating. Contributions covered widely varied phases of animal ecology and several associated aspects of plant and general ecology. Some of the papers were general summaries; others dealt with narrow phases of certain ecological investigations.

Among the terrestrial animal ecologists, Franz emphasized the inadequacy of our taxonomic knowledge of the soil microfauna, as well as the complex and poorly known biological interrelationships among various groups. Kuhnelt contended that soil biotic communities are not superorganisms but an accumulation of organisms with relatively stable composition, united by similar environmental requirements and interspecific relations. He maintained that there is a "regionale Stenozonie," which characterizes the different community relations of the same species under different climatic conditions. Agrell discussed the physiology of the diapause with special reference to the butterfly *Phalera bucephala*; he emphasized the enzymatic control of the diapause and the probable limiting influence of an unknown vitamin. De Backer outlined some of the technical difficulties to be overcome in designing recording instruments for microclimatology.

Marine papers included a summary of the composition

of bottom animal communities by Thorson. Wilson emphasized the fact that the larvae of many bottom-inhabiting species, especially polychaetes, swim or drift over the bottom until they come in contact with a specific type of substrate, where they settle and metamorphose to the adult stage. Drach discussed the use of self-contained diving equipment for the study of marine sublittoral areas; such apparatus is especially useful on rocky bottoms, where the usual sampling methods cannot be employed.

Petit and Schachter discussed the general animal ecology of brackish waters and the wide salinity- and temperature-variations in such environments. They emphasized the fact that brackish waters are characterized by few species and very few "indicator" species. Fauré-Fremiet summarized the ecology of interstitial Protozoa in marine and fresh-water sediments, stressing the diversity of food habits, ecological niches, and texture of substrate. Pennak compared interstitial sandy beach micro-metazoan faunas of lakes with those of intertidal marine beaches. The faunas of these two habitats are strikingly similar in the taxonomic groups represented, but fresh-water beaches contain many more species of rotifers, whereas marine beaches contain many more species of copepods. The chemical features of the interstitial capillary water vary widely, even in the course of each day.

Williams spoke on diversity as a measurable character of an animal or plant community; that is, a constant multiplication of the size of a sample produces a constant addition to the number of species represented in the sample. Some of the other general summarizing contributions included the dynamics of plant biotic communities (Gaussen), biocoenotics and social phenomena (Grassé), and biochemical roles played by anaerobic soil bacteria (Prevot).

Most of the papers were delivered in French or English, but a few were in German. An able interpreter implemented the discussion following each paper. All the contributions are scheduled for publication in a single volume.

The colloquium included official delegates from France, England, Austria, Denmark, Sweden, Switzerland, Belgium, and the United States. The general tenor of the colloquium and the many formal and informal discussions emphasized the fundamental importance and need for international cooperation in ecological research.

About People

Albert E. Dimond has been named chief of the Plant Pathology Department at the Connecticut Agricultural Experiment Station, succeeding **James G. Horsfall**, director of the station. Dr. Dimond has been assistant chief of his department since

April, 1949, and is co-director of the station's Atomic Energy Commission project, which was begun last year.

John C. Duncan, professor of astronomy at Wellesley College and director of the Whitin Observatory, Wellesley, Massachusetts, for the

past 40 years, retired June 30. He will be visiting professor of astronomy at the University of Arizona and visiting astronomer at the Steward Observatory, Arizona, during the ensuing year.

Richard A. Feynman will join the staff of the California Institute of

Technology this month as professor of theoretical physics. Dr. Feynman comes to Caltech from Cornell University, where he has been a member of the Laboratory of Nuclear Studies since 1945.

Max T. Goebel, assistant technical director of the Du Pont Company's Grasselli Chemicals Department, has been appointed technical director, succeeding **John C. Woodhouse**, who has undertaken a special assignment with the company.

Paul L. Munson, research associate, Department of Pharmacology, Yale School of Medicine, has been appointed assistant professor of dental science, Harvard School of Dental Medicine.

Vincent E. Parker, professor of physics and chairman of the Physics Department at the University of Delaware, will succeed **D. V. Guthrie** as professor and chairman of the Physics Department at Louisiana State University. Dr. Guthrie, a faculty member at LSU for the past 40 years, has resigned in order to do full-time teaching and research in astronomy.

Robley Williams, professor of physics at the University of Michigan, has been appointed professor of biophysics of the Virus Laboratory and Department of Biochemistry, University of California at Berkeley.

Visitors

George M. Volkoff, Canadian atomic scientist, is visiting professor this summer at the University of California, Los Angeles. Dr. Volkoff has been associated with the Chalk River, Ontario, atomic plant for several years. At present he is professor of physics at the University of British Columbia, Vancouver.

The National Bureau of Standards recently had the following visitors: **John James Dale**, head, Electrodeposition Group, Defense Research Laboratories, Marihyonong, Victoria, Australia; **Claude Decroley**, professor of metallurgy and electrochemistry, Université de Bruxelles, Belgium; **Heihashiro Fuku-**

zawa, technical manager, Soda Department, and **Bumpei Yoshiki**, director, Research Laboratory, Asahi Glass Company, Ltd., Tokyo; **Francisco Mira**, Fundición Mira, Cordoba, Argentina; and **B. I. H. Scott**, lecturer in physics, University of Tasmania, Australia.

Recent visitors at the Communicable Disease Center, U. S. Public Health Service, Atlanta, were: **H. S. Sastry**, district health officer, Mysore State Department of Public Health, Bangalore, India; **Mohamed Iliyas**, assistant to director general of health services, Karachi, Pakistan; **Mohammad Safdar**, assistant medical officer, West Punjab Public Health Department, Pakistan; **Angel M. Ayala**, district health officer, Manatí, Puerto Rico; **Arvid Evjen**, health officer, Norway Public Health Service, Oslo; **Ruperto Angodung**, district health officer, Manila; **Hamdi Acan**, director, Malaria Control Service of Kocaeli Province, Izmit, Turkey; **Benjamin D. Cabrera**, instructor, University of the Philippines College of Medicine, Manila; **Conrado E. Batenga**, health officer, Bureau of Health, Philippines; **José A. Hernandez-Matos**, public health officer, Santurce, Puerto Rico; **Luis Flores Barroeta**, Lab-Parasitology, National Polytechnic Institute, Mexico; **Hans Doerner**, assistant to health officer, Karlsruhe, Germany; **Klaus Th. Von Brickern**, health officer, Rosenheim County, Bavaria, Germany; **A. Alfredo Serano M.**, senior engineer, Servicio Cooperativo Interamericano, Cochabamba, Bolivia; and **Yuan-I Li**, sanitary engineer, National Institute of Health of China, Chungking.

Grants and Awards

Ohio State University has received a grant of \$10,000 from **E. I. du Pont de Nemours and Company**, for fundamental research in the Department of Chemistry, under direction of Edward Mack, Jr., chairman of the department.

Rockefeller Foundation Grants for scientific work in the second quarter of 1950 have been made to the following: *Inter-American Institute*

of Agricultural Sciences, Turrialba, Costa Rica—\$11,100 for its Division of Animal Industry; *Yerkes Laboratories of Primate Biology, Inc., Orange Park, Florida*—\$90,000 for studies directed toward experimental analysis of the primate nervous system, under the direction of Karl S. Lashley, research professor of neuropsychology, Harvard University; *Laboratory of Human Development, Harvard University*—\$41,100 for studies of social and cultural factors in child development under the direction of Robert R. Sears; *University of Wisconsin*—\$20,000 for research in enzyme chemistry under the direction of Philip P. Cohen; *Columbia University*—\$12,000 for biological research by John V. Taggart; *Massachusetts General Hospital, Boston*—\$55,000 for the work of Fritz Lipmann, director of the Biochemical Research Laboratories; *United Nations Economic Commission for Europe*—\$12,000 to train European students in the social sciences; *Association of American Medical Colleges*—\$21,350 for its Medical Film Institute for production of a critical catalogue of medical motion picture films, under the supervision of David S. Ruhe, director of the institute.

In the medical sciences grants were made to: *Child Research Council of Denver*—\$25,000 for studies in child growth and development under the direction of Alfred H. Washburn; *Institute of the History of Medicine, Johns Hopkins University*—\$30,000; *Duke University*—\$30,000 for research in parapsychology directed by Joseph B. Rhine; *New England Medical Center, Boston*—\$30,000 for research in endocrinology directed by Edwin B. Astwood.

Grants in the natural sciences were made to: *Polytechnic Institute, Brooklyn*—\$136,115 for research on the structure of proteins; *Theodor Kocher Institute, University of Bern*—\$25,000 to aid foreign guests working at the institute; *Institute of Botany, University of Bern*—\$10,000 for plant physiology research equipment; *University of Geneva*—60,000 Swiss francs for research in organic chemistry; *Centre National de la Recherche Scientifique*—\$54,000 for scientific equipment for the Institute of Genetics at Gif, France; *Uni-*

versity of London—\$37,000 for research in biophysics at King's College under the direction of J. T. Randall; *University of Manchester*—\$15,000 for research equipment in the Department of Organic Chemistry; *Montreal General Hospital, Canada*—\$30,000 for biochemical research directed by Juda H. Quastel; *National University of Colombia*—\$9,000 for fellowships for graduate students chosen from Faculty of Agronomy, Palmira, Colombia, to study under direction of the foundation's agricultural staff in Mexico; *Escola Superior de Agricultura "Luiz de Queiroz," Piracicaba, Brazil*—\$7,375 for equipment and supplies for the Departments of Agricultural Chemistry and Genetics; *Columbia University*—\$14,400 for research in biochemistry under David Shemin; *Long Island Biological Association*—\$45,000 for modernizing the Biological Laboratory physical plant at Cold Spring Harbor; *University of Wisconsin*—\$15,000 for research on the physical chemistry of proteins under direction of J. W. Williams, and \$30,000 for research in cytogenetics under direction of C. Leonard Huskins; *Smith College*—\$8,000 for research in genetics under direction of A. F. Blakeslee; *Genetics Society of America*—\$15,000, primarily for expenses of European scientists attending the society's Golden Jubilee meeting at Columbus, Ohio, in September; *Washington University, St. Louis*—\$31,200 for research in experimental embryology; *National Research Council*—\$60,000 for fellowships in the natural sciences.

Rockefeller Foundation grants for the second quarter of 1950 total \$2,143,633. This sum includes many small grants-in-aid, a few grants in the humanities, and other small grants not mentioned here.

Fellowships

The American Heart Association is accepting applications for research fellowships and fellowships for established investigators up to September 15. Applications for research grants-in-aid, including grants to basic sciences, may be filed up to December 15. The fellowships for established investigators are avail-

able to persons with M.D., Ph.D., or M.S. degrees who intend to make a career of research, and may be granted for a five-year period at a minimum stipend of \$5,000, with an annual increase of \$500. Research fellowships will be granted for a one-year period, with a stipend ranging from \$3,000 to \$4,300, and are open to graduates of medical and graduate schools who are interested in research. Grants-in-aid for a specified program of research are available to nonprofit institutions possessing adequate research facilities and experienced staff investigators. Information and application forms may be obtained from Dr. Charles A. R. Connor, Medical Director, American Heart Association, 1775 Broadway, New York City.

An annual lectureship covering the most significant single advance in the field of cancer research for the previous year has been established by the Bertner Foundation, of Houston, Texas, for the symposium on fundamental cancer research sponsored each year by the University of Texas M. D. Anderson Hospital for Cancer Research (*Science*, March 31, p. 347). A reciprocal exchange senior fellowship program has been established with the Memorial Hospital Center for Cancer and Allied Diseases, New York City. Each \$5,000 fellowship will be known as "The Jesse H. Jones Fellowship in Cancer Education Honoring Dr. E. W. Bertner." Further information regarding the lectureship and fellowship may be obtained from William O. Russell, Chairman, Education Committee, University of Texas, 2310 Baldwin Street, Houston.

Colleges and Universities

The University of Pennsylvania has established a school of auxiliary medical services, offering programs of study in physical and occupational therapy. The School of Physical Therapy of the Graduate Hospital of the university and the Philadelphia School of Occupational Therapy will be merged with the new units. Two courses of study are offered in each division—an undergraduate program leading to the Bachelor of

Science degree, and a certificate course for postgraduate students. Students will have a period of practical experience in hospitals and special institutions having therapy departments for clinical training, after completion of the course. Wesley G. Hutchinson, associate professor of microbiology at the university, has been appointed dean of the new school. Applications are now being accepted for admission, and the school will begin operation in September, with the opening of the 1950-51 academic year.

The University of Michigan will use funds from its Michigan Memorial-Phoenix Project, a \$6,500,000 alumni-sponsored program to establish an atomic research center at the university, to investigate the design and construction of an atomic engine. The research, headed by Paul F. Cenea, professor of engineering mechanics, will be entirely unclassified, but liaison on a secret level will be maintained with the Atomic Energy Commission, to prevent duplication of effort.

Meetings and Elections

The summer meeting of the American Crystallographic Association will be held August 21-25, at the New Hampton School, New Hampton, New Hampshire.

The Biological Photographic Association will hold its 20th anniversary meeting at the Hotel Sheraton in Chicago, September 6-8. Papers will be presented on surgical motion picture photography, photomicrography, photography of surgical specimens, copying of x-ray films, stereophotography, legal aspects of patient photography, and preparation of prints for publication. A special feature of the meeting will be demonstration periods on photographic techniques. For further information, write Ralph Creer, American Medical Association, 535 North Dearborn Street, Chicago.

The International Congress of Psychiatry, meeting in Paris, September 18-27, will include in its program many aspects of psychiatry, psychosomatic medicine, and psychol-

ogy. Seven plenary sessions will be held, followed by discussion-debates and informal symposia. In addition to these, exhibits of psychopathological art and of the history and progress of psychiatry will be shown.

American psychiatrists who will present papers are: Walter Freeman, professor of neurology and neurosurgery, George Washington University, Washington, D. C.; Manfred Sakel, New York City; L. J. Meduna, associate professor, University of Illinois College of Medicine; Franz Alexander, director, Institute for Psychoanalysis, Chicago, and clinical director of psychiatry, University of Illinois College of Medicine; Maurice Levine, professor of psychiatry, University of Cincinnati College of Medicine; Raymond de Saussure, New York City; Franz Kallman, associate research medical geneticist, New York State Psychiatric Institute, Columbia University; and David Rapaport, Austen Riggs Foundation, Stockbridge, Massachusetts. Further information about the congress may be obtained from the Director of Publicity in the U. S., 200 Retreat Avenue, Hartford, Connecticut, or from Congrès International de Psychiatrie, 1 Rue Cabanis, Paris 14, France.

The Medical Library Association held its 49th annual meeting in Boston, June 19-22. Officers for 1950-51 are: president, Marjorie J. Darrach; past president, Sanford V. Larky; vice president (president-elect), Margueriete Prime; honorary vice president, Henry R. Viets; secretary, Caroline W. Riechers; and treasurer, Frederick G. Kilgour.

Industrial Laboratories

Hyland Laboratories, Los Angeles, announces the availability of a specially processed dried plasma which retains the antihemophilic properties of whole blood. The plasma is not curative but will impart normal clotting characteristics to hemophilic blood. A single dose will maintain normal clotting time for a period of several hours, and through repeated doses, clotting may be maintained indefinitely.

The Atlantic Refining Company is conducting a program of advanced petroleum research at its Philadelphia laboratories. Working with radioactivated engine parts, the effect of motor oils on wear in automotive engines can be measured with more accuracy than has been possible before. The amount of radioactive iron particles worn from the engine can be measured by determining the radioactivity of the used oil, and the wear caused by the oil can be calculated. The use of atomic radiation is being extended to experimentation with other petroleum products and processes.

McNeil Laboratories, in Philadelphia, has appointed Cornelius K. Cain, assistant professor of organic chemistry, Cornell University, as manager of the Department of Organic Chemistry, Division of Medical Sciences. He will direct the synthetic organic research activities of the company. Dr. Cain spent two years at the University of Illinois as a post-doctorate fellow, working with Roger Adams, head of the Chemistry Department, University of Illinois, on the chemistry of marihuana.

A model pathology laboratory is being established in Atlanta, Georgia, by the Public Health Service Communicable Disease Center, the Grady Memorial Hospital, and the Emory University School of Medicine. The new laboratory plans to develop, through research, more reliable methods for clinical laboratories throughout the U. S. and to educate and train laboratory personnel. F. William Sunderman, who has been in charge of the Clinical Pathology Section's laboratory services at the Communicable Disease Center since early March, has been named director of the new research center.

Detection and control of cancer-causing materials in everyday life is the purpose of a research program being conducted by The Cancer Prevention Committee at the Institute of Industrial Medicine, New York University-Bellevue Medical Center, New York City. Announce-

ment of the program was made on July 18 at a meeting of the Fifth International Cancer Congress in Paris. William E. Smith, staff member of the institute, is chairman of the committee, which includes laboratory workers, representatives of university research programs, manufacturers, industrial physicians, engineers, industrial and governmental hygienists, and statisticians, from various parts of the world. Valuable data concerning certain types of cancer-producing materials have already been developed by the committee and passed on to the industries directly concerned.

A Sourcebook on Atomic Energy, by Samuel Glasstone, will be published by D. Van Nostrand Company, under contract to the Atomic Energy Commission. The book presents the nonsecret scientific and technical aspects of atomic energy, and is particularly suitable for college students, teachers, textbook authors, and publishers. Its preparation was undertaken by the AEC as the result of a recommendation made by a committee of the American Textbook Publishers Institute, in 1947. The book will be available about December 1, at a retail price of \$2.90.

Recently Received

Directory to Marine Laboratories of the United States and Canada. Robert W. Hiatt. Contribution No. 4, Hawaii Marine Laboratory, Honolulu, T. H.

Transactions of the Astronomical Observatory, Yale University. Vol. 20. Catalogue of 7996 Stars +1° to +5°. Ida Barney. Published by the Observatory, New Haven, Conn.

Graphical Symbols for Heat-Power Apparatus. American Standards Association, 70 E. 45th Street, New York City. 35 cents.

On the Accuracy of Economic Observations. Oskar Morgenstern. Princeton University Press, Princeton, N. J. \$2.00.

Conference on Problems of Aging. Trans. 10th and 11th Conferences, 1949. Josiah Macy Jr. Foundation, 565 Park Avenue, New York City.