filterable viruses, acute rheumatic fever and skin reactions to bacilli causing abortion diseases in cattle and on the effect of vitamin A-deficient diets, as compared with normal diets, in experimental schistosomiasis, or blood fluke disease.

The Division of Parasitology of the Agricultural Experiment Station, in cooperation with the department of medical zoology, has carried on the study of the tropical diseases of calves and horses, on fluke diseases of domestic pigeons, and has made a survey of the active parasites of the island from the standpoint of both human and animal diseases.

Fourteen gibbons and 439 rhesus monkeys were added during the year to the primate colonies on the island of Santiago in order to make available conditioned animals free from disease with known histories.

A program of weekly conferences and lectures for the medical profession has been successfully developed. Dr. Bachman recommends that plans be made for the creation and maintenance of a department of tropical physiology. The importance of this work in relation to the investigations that are now being conducted can not be overemphasized.

The school has collaborated during the past year with scientific men associated with the University of Chicago, the University of Wisconsin, Duke University, the Columbia School of Medicine, the University of Puerto Rico, the Presbyterian Hospital, the Agricultural Experiment Station at Rio Piedras, the Puerto Rico Reconstruction Administration, the American Leprosy Association and the National Committee on Maternal Health.

RESEARCH GRANTS OF THE VIRGINIA ACADEMY OF SCIENCE

THE Research Committee of the Virginia Academy of Science met on November 18 to make the regular awards for the encouragement of scientific research in Virginia. It had available for distribution \$650.15, which included the sum of \$125 from the American Association for the Advancement of Science. It had in hand eleven applications for grants amounting to \$960. After careful consideration of each request the following awards were made:

To Miss M. Katharine Cary, of the Medical College of Virginia, \$75 for a study of the relation of alkalemia and acidemia to resistance to infection.

To Dr. E. Ray Casto, of Emory and Henry College, \$50 for student assistance in the tabulation and graphing of data on the influence of climate on agriculture and manufacturing.

To F. F. Ferguson and Dr. E. R. Jones, Jr., of the College of William and Mary, Norfolk, \$25 for aid in the collection of Turbellaria in the Norfolk area.

To Professor F. H. Fish, of the Virginia Polytechnic Institute, \$50 for the purchase of a colorimeter for use in the study of organic analytical reagents. To C. C. Flora and W. C. Thacker, of the Virginia Polytechnic Institute, \$25 for aid in the construction of a thermostatically controlled water bath for use in a study of the digestibility of the fat in various forms of milk.

To Dr. Allan T. Gwathmey, of the University of Virginia, \$105 for the purchase of a special camera for the photomicrography of the various surfaces of single crystals of various metals.

To Dr. J. Frank Hall and Dr. R. L. Simpson, Jr., of the Medical College of Virginia, \$50 for the purchase of materials to be used in the construction of dental bridges in a study of the effects of such structures on the teeth and other tissues concerned.

To King A. Jamison, of the Virginia Polytechnic Institute, \$50 for the purchase of canaries to be used in a survey of the incidence of malarial parasites in the wild birds of Virginia.

To A. F. Meyer, Jr., of the Virginia Military Institute, \$35 for the purchase of supplies and materials for use in a study of the sterilization of dishes and equipment used in public eating places.

> E. C. L. MILLER, Secretary

THE CARNEGIE INSTITUTION OF WASHINGTON

THE annual meeting of the Board of Trustees of the Carnegie Institution of Washington was held on December 15, in the Administration Building of the institution at Sixteenth and P Streets. The Honorable W. Cameron Forbes, chairman of the board, presided. The following trustees were present: Thomas Barbour, James F. Bell, Robert Woods Bliss, Frederic A. Delano, Homer L. Ferguson, W. Cameron Forbes, Walter S. Gifford, Walter A. Jessup, Frank B. Jewett, Charles A. Lindbergh, Roswell Miller, Stewart Paton, Elihu Root, Jr., Henry R. Shepley, William Benson Storey, Richard P. Strong, Charles P. Taft, James W. Wadsworth, Lewis H. Weed.

The president of the institution, Dr. Vannevar Bush, submitted his annual report on the work of the institution during the past year, and the board authorized appropriations totaling \$1,316,500 for conduct of research activities of the institution for the year 1940.

Governor Forbes was reelected chairman of the board for the next three years. Walter S. Gifford was reelected vice-chairman and Frederic A. Delano secretary for the same period.

The Honorable Robert Woods Bliss, Dr. Walter A. Jessup and Dr. Lewis H. Weed were reelected as members of the executive committee for the ensuing three years.

Standing committees of the Board of Trustees were appointed by the chairman for the year 1940 as follows:

Committee on Astronomy: Herbert Hoover, *chairman*, Walter S. Gifford, Roswell Miller, Elihu Root, Jr., William Benson Storey. Committee on Terrestrial Sciences: Frank B. Jewett, chairman, Frederic A. Delano, Homer L. Ferguson, Henry S. Morgan, James W. Wadsworth.

Committee on Biological Sciences: Lewis H. Weed, chairman, Thomas Barbour, James F. Bell, Alfred L. Loomis, Stewart Paton.

Committee on Historical Research: Henry R. Shepley, chairman, Robert Woods Bliss, Charles A. Lindbergh, Richard P. Strong, Charles P. Taft.

GRANTS OF THE CARNEGIE CORPORATION OF NEW YORK

THE annual report of Dr. Frederick P. Keppel, president of the Carnegie Corporation of New York, has been issued. Grants amounting to \$4,846,126 were made during the fiscal year 1938-39 by the corporation to organizations and individuals in the United States and in the British Dominions and Colonies. Of this sum, \$697,200 was given for library interests, \$1,157,325 for the arts, \$1,253,650 for research, studies and publications, \$204,921 for adult education and \$1,533,030 for the general program of the corporation. The largest grant made during the year was \$250,000, given to complete the sum necessary to establish joint academic library services for Vanderbilt University, Peabody College and Scarritt College at Nashville, Tennessee.

Grants for scientific research amounted to \$137,500, and those for educational investigation, \$233,550. Grants were made to the amount of \$432,500 for the purpose of carrying forward the work of the Institute of International Education, with headquarters in New York, and of the New Zealand Council for Educational Research. The American Association for Adult Education, the National Occupational Conference, the Committee on Scientific Aids to Learning and the American Law Institute received the sum of \$295,400 for work in their respective fields; \$177,-000 was voted to the Association of American Colleges, the American Council of Learned Societies and the National Bureau of Economic Research.

Grants of \$500,436 were made for the British Dominions and Colonies. In South Africa these funds have been used chiefly for scientific inquiry; in New Zealand and Australia emphasis has been on educational research, libraries and social services. In Canada grants have been made primarily to continue research programs in colleges and universities and to forward library extension.

Appropriations for scientific work authorized and payable during the fiscal year 1938–1939 included:

- University of Puerto Rico, School of Tropical Medicine, development of library. \$13,500.
- University of Michigan, experiments in microphotography. \$8,000.
- New York Museum of Science and Industry. \$52,625.
- American Museum of Health, studies in field of health education. \$30,000.
- American Museum of Natural History. \$25,000.
- American Association of Museums. \$12,000.
- Research in genetics as it relates to intelligence, University of Iowa. \$2,000.
- The Carnegie Institution of Washington. \$79,000.
- School of Medicine, Yale University clinic of child development. \$30,000.
- Harvard University. \$57,500.
- National Research Council. \$106,300.
- American Mathematical Society, to establish in the United States an international journal of mathematics. \$60,000.
- Research Council on the Problems of Alcohol, preliminary survey. \$25,000.
- Marine Biological Laboratory, Woods Hole, Mass., emergency support. \$20,000.
- National Academy of Sciences, survey regarding a national science fund. \$15,000.
- Zoological Society of London, publication of Nomenclator Zoologicus. \$6,000.
- American Neurological Association, research on heredity of mental diseases. \$3,000.
- Long Island Biological Association. \$3,000.
- Dental research, various institutions. \$53,500.
- In aid for research on insulin. \$5,000.
- Comprehensive study of the Negro in America. \$55,000.
- Brown University, development of work in mathematics.
- \$6,000. American Mathematical Society, support of International Congress of Mathematics, 1940. \$4,500.
- American Association for the Advancement of Science, support of educational program. \$4,000.
- American Geophysical Union, Seventh Triennial Assembly of International Union of Geodesy and Geophysics, 1939. \$3,000.

SCIENTIFIC NOTES AND NEWS

DR. HENRY NORRIS RUSSELL, director of the observatory at Princeton University, was elected to honorary membership in the New York Academy of Sciences at the recent annual meeting.

THE decoration of "Officer of the Order of Leopold" has been conferred by the King of the Belgians on Dr. James B. Murphy, member of the Rockefeller Institute, New York, in recognition of his work in the field of cancer research.

THE President of the Republic of Cuba has awarded decorations of the Order of Carlos J. Finlay to several public health workers from the United States and Mexico. The recipients, who were decorated at a recent meeting of the Florida Public Health Association