to immunize a second rabbit. In most cases the second rabbit responded by forming precipitating antibodies against the serum of the first rabbit and against the serums of some, but not all, normal rabbits. The quantity of precipitate formed with antigens of normal rabbit serums is typical of antigen-antibody reactions amounting to 350 micrograms of nitrogen per milliliter of antiserum.

Study of the precipitin reaction by Oudin's gel-diffusion technique revealed that often a single antigen and rarely more than two antigens were involved in a reacting system. However, the studies so far completed indicate a considerable diversity in antigenic patterns in different rabbits. In testing the serums of 45 normal rabbits with antibodies from six immunized rabbits, Oudin was able to distinguish nine distinct patterns of reaction.

These experiments suggest that the serum protein antigens of individuals within a species may be as distinctive as the blood group antigens. That these specific antigens are serum proteins is indicated by the fact that in the serum of immunized rabbits they can function also as antibodies. The genetic control of these serum antigens has not yet been investigated but should be of considerable interest. Also of interest is the possible extension of these observations to other species of animals. Oudin has proposed the name *allotypy* for this phenomenon.— M. H. A.

## Theobald Smith Award Judges

The president of the AAAS, Paul B. Sears, with the unanimous approval of the executive committee, has appointed the following judges for this year's Theobald Smith award: Edward A. Doisy, Sr., professor of biological chemistry, St. Louis University School of Medicine; Charles B. Huggins, professor of surgery and physiology, University of Chicago; Ancel Keys, professor of physiological hygiene, University of Minnesota; and Cecil J. Watson, professor of medicine, University of Minnesota.

Irvine H. Page, director of research of the Cleveland Clinic and vice president of AAAS Section N-Medical Sciences, serves ex officio as chairman of this committee, and Allan D. Bass, professor of pharmacology at Vanderbilt University School of Medicine and secretary of Section N, will serve as committee secretary.

## **News Briefs**

■ A paper delivered at the recent National Cancer conference reported that about one-third of those who develop cancer in the United States today would

survive for 5 years. This represents a gradual improvement over the last 10 years, since the 5-year survival rate in 1948 was about 1 in four. The difference between the rate of one-quarter and the rate of one-third, when it is applied to current cancer incidence, amounts to roughly 30,000 more patients a year that pass the 5-year survival point.

The figures are based on statistics compiled at central registries in Connecticut, Massachusetts, and California and at seven unnamed hospitals. The report was read by E. Cuyler Hammond, director of statistical research for the American Cancer Society.

■ British geologists are investigating a newly unearthed fossil reptile bed at Shipston- on - Stour in Warwickshire, about 10 miles south of Stratford-on-Avon. Excavations have already disclosed the remains of an ophthalmosaur and the vertebrae of an unidentified terrestrial dinosaur.

Since Warwickshire was submerged under one of the Jurassic seas of some 140 million years ago, it is thought that some of the bones were washed from neighboring land regions, probably toward the Welsh border area. The specimens will be examined at the city museum in Birmingham.

- The Justice Department has dropped a contempt indictment against Wendell H. Furry, associate professor of physics at Harvard University who acknowledged his own former Communist party membership but refused to answer questions about others [Science 121, 232 (1955)]. United States Attorney Anthony Julian moved for dismissal on the ground that the acquittal in a similar case of Leon J. Kamin, a former research psychologist at Harvard [Science 123, 135 (27 Jan.)], left the Government with evidence "deemed insufficient to warrant further prosecution."
- The Air Force Office of Scientific Research will be established in its new quarters in Washington, D.C, on 1 July. The move is not related to the recent decision to move the Air Research and Development Command Headquarters from Baltimore to Andrews Air Force Base, Md. The AFOSR was originally formed in 1951 as a part of the ARDC Headquarters, but in August 1955 the office was separated organizationally from ARDC Headquarters.

The office sponsors research in the physical science and bioscience areas through contracts with universities, research foundations, industry, and other government agencies. It also maintains close liaison with the scientific community to insure the integration of significant advances into Air Force systems.

- United States industry spent \$3,700,000,000 for research and development in 1953, of which 4 percent was for basic research.
- The Department of Defense has announced that a team of four specialists has gone to Korea to conduct a survey of the nutritional status and food services of the Korean military forces. The team will be headed by R. R. Williams, formerly of the Bell Telephone Research Laboratories and recently retired president of the Williams-Waterman Fund for the Combat of Dietary Diseases.

Others participating in the survey are Gerald F. Combs of the University of Maryland, W. J. McGanity of the Vanderbilt University School of Medicine, and Z. I. Kertesz of the New York State Agricultural Experiment Station, Cornell University (Geneva, N.Y.). The survey will be conducted under the auspices of the U.S. Interdepartmental Committee on Nutrition for National Defense, of which Frank B. Berry, Assistant Secretary of Defense for Health and Medicine, is chairman.

■ Theodore E. Bond, an agricultural engineer at the University of California, cooled seven Hereford steers with a 42-inch electric fan during hot weather. Each gained 1.03 more pounds in a day than did any of seven steers that were not being cooled.

The fans kept the airflow at 4 miles an hour. Not only did the fanned cattle gain weight rapidly but they needed 400 pounds less feed to put on 100 pounds of meat. Water sprays, air-cooled buildings, and cooled drinking water were not nearly so effective as the fan.

## Scientists in the News

JOHN G. FOX has been named head of the department of physics at Carnegie Institute of Technology and ROGER B. SUTTON is the new director of the institute's Nuclear Research Center at Saxonburg. Both positions were formerly held by E. C. CREUTZ, who resigned in November to join the General Dynamics Corporation.

MILTON D. BURDICK has been named to head the new Engineering Ceramics Section in the Mineral Products Division of the National Bureau of Standards. The section was organized from the Porcelain and Pottery Section, which was under the direction of R. F. Geller until his retirement last October.

WILLIAM C. H. PRENTICE, chairman of the department of psychology of Swarthmore College, has been named dean of the college.