22 at the age of sixty years. At the time of his death he was president of the Botanical Society of Pennsylvania.

FRANKLIN DERONDE FURMAN, who retired in 1941 as professor of mechanism and machine design and dean emeritus of Stevens Institute of Technology, died on November 21. He was seventy-three years old. He served for forty-eight years as a member of the faculty, thirteen years of which he was dean of the college.

MRS. ADELINE DESALE LINK, assistant professor of chemistry at the University of Chicago, died on November 21. She was fifty-one years old.

LIEUTENANT LEONARD A. KEYES, JR., civil engineer, instructor in navigation at Mather Field, California, has been missing since July. Search for the airplane of which he was one of the officers has been abandoned. He was twenty-seven years old and was one of a group studying the latest use of radar in navigation. Colonel John W. Egan wrote to his parents: "Leonard had been on duty with this school for approximately fourteen months, and graduated with the highest honors ever made in the school. The loss of his services will be distinctly felt by the war effort, and extremely difficult to replace." Lieutenant Julian Taylor wrote: "I will say, as any member of the navigation school will say, that, if your son is lost, the navigation school has lost its most brilliant mind. The navigation manual which was to become a permanent navigation text lies half finished for lack of the driving force that was your son."

# SCIENTIFIC EVENTS

## ENLARGEMENT OF THE LABORATORY STAFF OF THE U. S. FOREST PRODUCTS LABORATORY

THE requirements of the Army and Navy for wood and other forest products and the need for precise study of their properties and uses have been reflected in the quadrupling of the staff of the U. S. Forest Products Laboratory at Madison, Wis., in the past two years. This institution, maintained by the Forest Service of the U. S. Department of Agriculture in cooperation with the University of Wisconsin, is the largest and oldest research organization of its kind in the world. With a background of thirty-three years of experience in wood utilization problems ranging from strength and other analyses of wood properties to the chemical synthesis of wood into new substances of potential value, the Forest Products Laboratory has become established as the nation's center of such knowledge. Since the Pearl Harbor attack, all its resources have been directed toward research and investigations tied directly to the war effort.

Professional personnel was expanded from 91 on July 1, 1941, to 419 on September 30, 1943. The staff on the latter date consisted of forty-two chemists, six chemical engineers, a hundred engineers of other classifications—largely civil, aeronautical and structural—fifty-three technologists, forty-three industrial specialists, seven technical writers, two mathematicians, two physicists and 164 laboratory, engineering and physical science aids. In addition, 249 other employees—administrative, clerical, maintenance and craftsmen—brought the grand total number to 668. Noteworthy in this expansion has been the number of women employees, which increased from thirty-four to 191, including chemists, laboratory aids and other technical workers.

These employees are engaged in a variety of research, test work and consultation for various war agencies. Two entirely new divisions were created and staffed—the Division of Matériel Containers, concerned primarily with testing and designing of better wood and fiber-board containers for the Army Ordnance Department, Army Air Forces, Navy, War Food Administration and similar agencies charged with the packaging and shipment of war matériel of all kinds to overseas fighting fronts; and the Division of Technical Service Training, organized to conduct short specialized courses for Army, Navy and civilian personnel engaged in packaging work, aircraft wood inspection and maintenance of wood aircraft. Major aircraft research programs are being carried out in cooperation with the Army and Navy to develop design data for aircraft parts and set up specifications for wood, plywood, plastics, glues and finishes used in aircraft. The Navy Bureau of Ships is cooperating in a program of research designed to solve many problems of wood use with which it is concerned. Various projects are under way for the War Production Board to find new methods of getting improved service with wood or developing substitutes for other critical materials. Requests for information and testing work are daily received from other Government agencies as well as from many manufacturers confronted with difficult problems of conversion to wood use, ranging from producers of aircraft parts to makers of farm machinery, refrigerators and storage batteries.

## THE PACIFIC MAP OF THE NATIONAL GEOGRAPHIC SOCIETY

THE National Geographic Society has issued a new ten-color map of the Pacific Ocean and the Bay of