

Ridge National Laboratory, Oak Ridge Institute of Nuclear Studies, the University of Tennessee-Atomic Energy Commission Agricultural Research Program, and the AEC staff in Oak Ridge. Additional information and brochures on the ORNL-ORINS-sponsored program may be obtained by writing to the Chairman, University Relations Division, Oak Ridge Institute of Nuclear Studies, P. O. Box 117, Oak Ridge, Tenn.

Seven representatives of the Oak Ridge Traveling Science Demonstration Lecture Program are currently touring the country in an effort to "stimulate interest in science and science-teaching careers on the part of the nation's secondary-school students". The teachers expect to visit about 200 high schools, spending a week at each, and will give special lectures and demonstrations including the feasibility of making inexpensive apparatus for classroom use. The items, built by the teachers during their training period, include an x-ray machine costing \$2.50 and a home-made Geiger counter constructed for less than \$10. The program is sponsored by the Oak Ridge Institute of Nuclear Studies.

Hughes Aircraft Company, Culver City, California, has announced the awarding of 200 master of science fellowships to engineers and physicists from 36 states. The students will spend part-time as Hughes employees in research and development laboratory work closely associated with their fields of study. Courses will be taken at University of Southern California, University of California at Los Angeles, or California Institute of Technology, and for the first time additional fellowships have been established at Stanford, Purdue, and West Virginia Universities.

## Programs and Facilities

A 400 000-volt positive ion accelerator for production of large yields of 14-Mev neutrons by the  $H^3(d,n)He^4$  reaction is being installed by the Chemistry Department at the University of Arkansas. An underground room and control room are to be constructed adjacent to the chemistry building. Over-all cost of the accelerator and housing will be about \$100 000, supported by the Atomic Energy Commission and the University. The facility will be used to enhance present research and instruction in nuclear science at the University and will be under the direction of Richard W. Fink, assistant professor of chemistry. Studies will include fast neutron cross-section measurements by radioactivation techniques, investigations of decay schemes of short-lived nuclides produced by  $(n, p)$ ,  $(n, 2n)$ ,  $(n, \alpha)$ , etc. reactions, short-lived fission products, and various other problems which are susceptible to attack by radiochemical methods. It is anticipated that a natural uranium, light water subcritical assembly ("pickle-barrel reactor") will be used with the accelerator later. Present plans call for accelerator operation by August 1957.

A new Division of Sponsored Research has been established at the Massachusetts Institute of Tech-

*careers in the peaceful  
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nology, replacing the Division of Industrial Cooperation and the Division of Defense Laboratories, which now cease to exist. The purpose of the organizational change, according to an MIT announcement, is to establish unified administrative policies for all research work at MIT which includes privately supported and government sponsored projects. F. Leroy Foster, formerly director of the Division of Industrial Cooperation, and James M. West, formerly an assistant in the Division of Defense Laboratories, have been appointed the director and associate director, respectively, of the new Division.

Polytechnic Institute of Brooklyn has begun the conversion of a 320 000 square-foot industrial plant into classrooms, laboratories, and administrative offices which is expected to be completed by September 1957. At that time, the eight-story industrial structures and five-story administration buildings will house the Institute's 6000 students and \$2.1 million research program. The move will allow for an enrollment increase of one-third or more in day and evening sessions.

McDonnell Aircraft Corporation of St. Louis, Mo., has announced the establishment of a new Research Department which will conduct studies in electronics, supersonic and hypersonic aerodynamics, thermodynamics, advanced structures, certain aspects of nuclear physics, and new weapon systems as these fields relate to the development of advanced fighters, missiles, and helicopters. The department is under the direction of Albert E. Lombard, Jr., formerly Scientific Advisor to the US Air Force Directorate of Research and Development.

The Department of Defense has established a national center for research and development on electronic test equipment in the Research Division of New York University's College of Engineering. A team of NYU research engineers will serve as the staff for the Electronic Test Equipment Coordination Group, an agency of the Office of the Assistant Secretary of Defense for Research and Development. The NYU center will serve as a clearing house for information on test equipment research and development throughout the electronics industry and the armed services.

During the year June 1957–June 1958 the Office of Naval Research will continue its modest program in support of basic research in astronomy and astrophysics. As in past years, the National Research Council Committee on Astronomy advisory to ONR, with a membership of seven astronomers nominated by the Council of the American Astronomical Society, will aid ONR in evaluating proposals received. Applicants must submit proposals by December 15, 1956, for consideration at the next annual meeting of the committee early in 1957. Ten copies of each proposal, which should include a full description of the project and a cost breakdown, will be required and should be addressed to Chief of Naval Research, Department of the Navy, Washington 25, D. C., Attention: Code 430. Letters of recommendation will be helpful to members of the ad-



visory committee in making their appraisal and should be sent by the writer directly to the above address.

**The Polish Government** has announced the establishment of a state council for the peaceful utilization of nuclear energy. Headed by Wilhelm Billig, the purposes of the new council encompass study of plans and problems connected with the uses of nuclear energy, training of personnel, and cooperation with foreign countries. The council's membership comprises representatives of the Polish Academy of Sciences, Government agencies, and leading experts in the field. Long-range plans of the council include the construction of an atomic power plant.

**Arthur Lewis Clark**, former Dean of Science at Queen's University, Kingston, Ontario, died on September 19 at the age of 83. Born in Worcester, Massachusetts, Dr. Clark received his bachelor's degree from Worcester Polytechnic Institute and his doctorate from Clark University. He taught mathematics and science at Bridgton Academy in Maine and later taught physics for seven years at Bates College, Lewiston, Maine. In 1907 Dr. Clark joined Queen's University as head of the Physics Department and in 1919 was appointed dean of the Faculty of Applied Science, serving the University in that capacity until his retirement in 1943. Dr. Clark was also chairman of Queen's science-research committee.

**Gordon Ferrie Hull**, Professor Emeritus of Physics at Dartmouth College, died on October 7 at Hanover, New Hampshire. His age was 86. Born in Garnet, Ontario, Canada, Dr. Hull received his bachelor's degree from the University of Toronto and his doctorate from the University of Chicago. After teaching at the Universities of Toronto and Chicago, he joined the Physics Department at Dartmouth in 1899. Dr. Hull was known for his introductory course in physics which he taught continuously at Dartmouth until his retirement in 1940.

A prolific scientist with broad interest, Dr. Hull received international recognition for the series of experiments he performed with the late Ernest Fox Nichols, leading in 1901 to confirmation of the existence of radiation pressure, which had been theoretically postulated three decades earlier by Maxwell. In World War I, as a physicist with the ballistics staff of the Army Ordnance Department, he devised the "boat tail" streamlining of artillery shells, and in 1919, at General Electric's Edgewood Arsenal, Lynn, Mass., he experimented with air foil design at speeds greater than sound. He was also a specialist in microwave radio propagation and his work in this field was instrumental in the ultimate development of radar and electronic height-finding equipment.

Dr. Hull was a fellow of the American Physical Society and a member of the American Association of Physics Teachers.



*Laboratory chart from "The Moon" by H. P. Wilkins and Patrick Moore, Macmillan, 1956*

## NEXT QUESTION

What's on the other side of the moon?

The most fascinating question that has ever challenged the mind of man may yet be answered in our lifetime. At this very moment in Southern California a group of the country's most prominent scientists and engineers, incorporated under the name of Systems Laboratories, is exploring the ways and means of sending a manned missile to the moon and back within the next 15 years.

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