ELSA KEILES, formerly executive secretary of the metabolism and nutrition study section and the human embryology and development study section of the Division of Research Grants, National Institutes of Health, has recently joined the staff of the grants and training branch of the National Heart Institute.

CHARLES D. SHIELDS has been appointed associate dean of the Georgetown University School of Medicine (Washington, D.C.). Shields has been professor and chairman of the department of physical medicine and rehabilitation at the school since 1954. He will retain that post in addition to the deanship.

LAUREN B. HITCHCOCK has announced that he will resign as president and managing director of the Air Pollution Foundation, Los Angeles, Calif., on 15 Nov. to return to private practice as a management consultant in industrial research and development.

GEORGE S. CRAMPTON, ophthalmologist, teacher, and inventor, has received the 1956 gold medal award of the Illuminating Engineering Society. Although a physician, he is a past-president of the IES. He was accepted for membership 40 years ago because of the special lighting features he devised for each of his prismatic viewing instruments.

Crampton, who is 82, has been a surgeon at Wills Eye and Pennsylvania hospitals, Philadelphia, and is an emeritus professor of ophthalmology at the Graduate School of Medicine, University of Pennsylvania. He now owns and operates the Lenox Instrument Company in Philadelphia.

JOHN D. PORTERFIELD, a career officer of the Public Health Service since 1939 and at present director of the Ohio Department of Mental Hygiene and Correction, has been named assistant to the Surgeon General of the Public Health Service. He will have responsibility for planning and developing new programs, for providing a continuous appraisal and evaluation of existing activities, and for advising on proper balance among the various programs of the service. He will give particular attention to the fields of chronic diseases and aging, in which a variety of programs are developing.

PAUL J. FLORY, professor of chemistry at Cornell University, has been chosen to head the Mellon Institute's investigational activities as executive director of research. He will join the organization for a day a week during this fall, half time in February, and full time in the summer of 1957.

Recent Deaths

HOWARD W. BRUBAKER, Manhattan, Kan.; 79; professor emeritus of chemistry at Kansas State College; 25 Sept.

WILLIAM B. COLEMAN, Philadelphia, Pa.; 68; metallurgist; 30 Sept.

GEORGE A. DAVIS, Mountain Lakes, N.J.; 60; technical director of the Wilputte Coke Oven Division of the Allied Chemical and Dye Corporation; 9 Oct.

RALPH L. DOURMASHKIN, New York, N.Y.; 65; former senior surgeon with the U.S. Public Health Service; 10 Oct.

CAMILLE E. DREYFUS, New York, N.Y.; 78; chemist, chairman of the board of the Celanese Corporation of America; 27 Sept.

HENRY P. FAIRCHILD, New York, N.Y.; 76; professor emeritus of sociology at New York University; 2 Oct.

RICHARD FAIREY, London, England; 69; executive chairman of the Fairey Aviation Company; 30 Sept.

DONALD B. GILLIES, Cleveland, Ohio; 83; vice president of the Republic Steel Corporation until 1948; 29 Sept.

FREDERICK W. HODGE, Santa Fe, N.M.; 91; retired director of the Southwest Museum; 28 Sept.

GORDON F. HULL, Hanover, N.H.; 86; professor emeritus of physics at Dartmouth College; 7 Oct.

HANS S. JOACHIM, Boston, Mass.; 65; physicist at Watertown Arsenal; 7 Oct.

JUSTIN F. KIMBALL, Dallas, Tex.; 84; former vice president of Baylor University in charge of the College of Medicine, the School of Nursing, Baylor Hospital, and the College of Dentistry in Dallas; 7 Oct.

GEORGE M. ROSENBLUM, Merrick, N.Y.; 49; electronic engineer; 25 Sept.

ARCHIBALD SHARPE, London, England; 75; biologist; 4 Oct.

Education

■ The U.S. Office of Education has announced approval of the first two contracts for cooperative educational research in its history. The contracts, with Indiana University and with Vanderbilt University, will be financed from a recent appropriation of $1,020,000 for research by colleges, universities, and state agencies in the problems of education. Several other projects are under active consideration.

Indiana University will undertake an 18-month investigation to determine why only one-fourth of the top 10 percent of the state's high-school graduates in 1954–55 entered college. Also, studies will be made to learn how many of the top 20 percent of the state's 1955–56 high-school graduates do not continue their educational programs into college, and why they do not.

Wendell W. Wright, Indiana's vice president, with Christian W. Jung, associate professor of education and director of the university's summer session, will direct the $15,900 program. About one-third of the cost will be provided by Indiana University.

Vanderbilt University will conduct, under the direction of Albert J. Reiss, Jr., professor and chairman of the department of sociology and anthropology, a 3-year study of causes of juvenile delinquency. The study will be made among children in grades 7 through 11 in Nashville and in Davidson County, Tenn., with the cooperation of public, private, and parochial schools and community agencies. Information will be solicited from teachers, parents, attendance officers, juvenile court officials, and other citizens. Federal funds totaling $49,060 are planned for the Vanderbilt project.

■ The first annual training institute of the American Group Psychotherapy Association will be held on 9 Jan. 1957 at the Henry Hudson Hotel, New York, N.Y. This will be a 1-day meeting consisting of morning, afternoon, and evening sessions. The institute will be open to AGPA members, psychologists, and social workers who meet the minimum requirements for AGPA associate membership. The fee for participants will be $15 for members and $20 for nonmembers. This includes registration, tuition fees, and also dinner in the evening. For further information write to: Director of Training Institute, Room 300, 345 E. 46 St., New York 17, N.Y.

■ The University of Pennsylvania has begun construction of its William H. Donner Center for Radiology. It expects to complete the project in 1957 or early in 1958. Physicians, chemists, and physicists will carry on cooperative research projects in the new three-story building, for which the Donner Foundation has allocated $750,000.

■ Rensselaer Polytechnic Institute is planning a program that would make possible an increase in its undergraduate enrollment of 80 percent and an increase in its classroom and laboratory buildings of 50 percent. The expansion, which will be under way in the near future, is scheduled for completion during the next 14 years.

The 80 percent jump in enrollment would mean about 2450 more undergraduate students than are now in attendance. This would bring R.P.I.'s undergraduate enrollment to more than

5200 students. Present undergraduate enrollment is about 3000. To carry out the program, the institute must acquire an additional $24.5 million in endowments and $8 million for the construction of new classroom and laboratory buildings. Also, it will be necessary to borrow, on a self-liquidating basis, several millions of dollars for the construction of living quarters for students.

In announcing the program, Livingston W. Houston, president of Rensselaer, defined the institution's stand on the question of expansion. This has been a controversial subject among educators, some of whom have held that accepting a much larger number of students would impair the quality of education. Houston said:

"The leading engineering schools cannot lower their standards. All of us are seeking quality. The real problem is not one of simply maintaining quality but of producing high-quality students in the quantity that industry must have. Bigness and quality are not mutually exclusive. If they were, many of our leading larger companies would have ceased growing long ago. . . . [However,] faculty and facilities—and funds to support them—will be of little avail unless there are adequate numbers of properly qualified high school graduates available to enter our engineering colleges."

Grants, Fellowships, and Awards

■ The National Science Foundation is inaugurating a program for the support of instrumentation for chemical research. The purpose of this program is to provide either a portion or all of the funds required to purchase certain equipment that is needed for research in chemistry departments of American colleges and universities and cannot be obtained from any other source.

Chemistry departments of institutions interested in applying for grants should submit proposals that provide the following information: (i) name and address of institution; (ii) description of desired equipment; (iii) description of research of staff members who will utilize the equipment; (iv) biographic data of staff members concerned; (v) arrangements to be made for care and maintenance of the equipment; (vi) related equipment on hand; (vii) budget (include statement of funds, if any, from other sources).

Fifteen copies of the proposal should be submitted to the National Science Foundation, Washington 25, D.C., attention Mathematical, Physical and Engineering Sciences Division. One copy should be signed by the chairman of the department and by an official authorized to sign for the institution. All copies should indicate the persons, with titles, who have signed the single copy. Proposals received *by 1 Dec.* will be considered for grants to be awarded by about 1 Mar. 1957.

■ The U.S. Atomic Energy Commission has announced the award of 50 unclassified life science research contracts in medicine, biology, biophysics, and radiation instrumentation. Ten of the awards, each of which covers a period of 1 year, are new projects; three are in medicine, six in biology, and one in radiation instrumentation. Forty contract renewals have been negotiated to allow for continuation of research already in progress; 19 of these are in the medical sciences, 16 in biology, three in biophysics, and two in radiation instrumentation.

■ Expanded aid to outstanding high-school physics, chemistry, and mathematics teachers has been announced by Shell Companies Foundation, Inc., New York. The foundation this year provided Shell Merit Fellowships for 60 high-school teachers at seminars conducted by Stanford and Cornell universities this past summer. This program was so successful that Shell plans to provide a significantly greater number of fellowships for 1957.

More than 2000 teachers from all parts of the United States applied for the fellowships available in 1956. Fellowship teachers received allowances for travel costs to Stanford or Cornell, tuition fees, living expenses, and $500 in cash to offset loss of potential summer earnings. Teachers attended lecture and laboratory sessions, had group discussions with leading specialists in their various fields, and visited nearby scientific installations.

Requests for fellowship applications should be sent directly to the two universities. Mathematics, physics, or chemistry teachers with 5 years of experience and known leadership ability are eligible. Teachers living west of the Mississippi should write the School of Education, Stanford University, Stanford, Calif. Teachers east of the Mississippi should write the Department of Education, Cornell University, Ithaca, N.Y.

■ During the years 1957–58 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 15 Dec.* Ten copies of each proposal, which should include a full description of the project and a cost breakdown, 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 advisory committee in making their appraisal and should be sent by the writer directly to the above address.

It is expected that the advisory committee will again recommend a maximum overhead charge of 15 percent of the total budget. The cooperation of universities in approving overhead rates of this order will in no way prejudice negotiations of overhead for other contracts.

■ The Exploration Fund of the Explorers Club, New York, made its first grant to a nonmember of the club under its new unrestricted award policy when it recently voted to support the anthropological researches of Neville Dyson-Hudson and V. R. D. Dyson-Hudson in East Africa. The $1231 grant is to cover study of the hill tribes fringing the Karamoja plateau. The Exploration Fund was established by C. R. Vose and was open only to members of the club until this year.

■ The U.S. Public Health Service has reported that almost $1 million has been awarded to schools and individuals through a new public health training program. Under the program, which was authorized by Congress on 23 July, 261 public health workers are now enrolled for graduate training in 41 schools. Upon completion of their studies, most of the trainees will be employed in state and local health departments, thus helping to relieve the acute personnel shortage.

In the Laboratories

■ Last month the Westinghouse Electric Corporation dedicated the new Westinghouse Research Laboratories, which are located on a 72-acre site in Churchill Borough, Pa., 10 miles east of Pittsburgh. The three-story, L-shaped building houses the laboratories, offices, shops, and other requirements for a staff of more than 700 people. Included in these facilities are a technical library containing 30,000 volumes and subscribing to more than 500 periodicals; a complete metals processing laboratory for melting, annealing, rolling, and otherwise processing metals and alloys; an instruments laboratory; several machine shops; a glass blowing laboratory; a photographic and reproduction department; drafting facilities, and so forth.

Although the structure has just been completed, work has already begun on an additional wing that will increase its size by nearly 50 percent and will provide accommodations for the materials engineering department. In addition,