Dr. Kety Chosen To Give Lecture Here May 18

Dr. Seymour S. Kety, Chief, Laboratory of Clinical Science, NIMH, will deliver the next in the series of NIH lectures on Wednesday, May 18, at 8:15 p.m. in the CC auditorium.

He is the second NIH scientist so honored since the lecture series was broadened to include NIH staff. Dr. Harry Eagle, Chief of the Laboratory of Cell Biology, NIAID, delivered one of the lecture series last February.

In his forthcoming lecture, "The Biologist Examines the Mind and Behavior," Dr. Kety will discuss achievements in the application of chemistry and physics to the definition, elucidation, and control of mechanisms which determine health and disease, and the relationship of mental and behavioral phenomena to these disciplines.

A native of Philadelphia, Dr. Kety received his medical degree (See Dr. KETY, Page 2).

Fletcher to Leave NIH; Will Be PR Director For Division of Merck

John E. Fletcher, Chief, Office of Research Information, OD, and staff assistant to Dr. Shannon, has accepted the position of Director of Public Relations for the Merck Sharp & Dohme Division of Merck & Co., Inc. He will assume his new duties on July 1 in West Point, Pa.

Mr. Fletcher came to NIH in April 1949 as staff consultant to the National Heart Institute. In 1950 he was named Assistant Chief of the Scientific Reports Branch and in 1953 he became chief of that branch. He served in that capacity until 1956 when he was appointed to his present position.

Dr. Shannon says of him, "Important contributions have been made by Mr. Fletcher to the development of better public understanding of medical research and to improved communications among the scientific professions, universities, voluntary health organizations (See FLETCHER, Page 2).

NIH Director's Office Reorganized; Staff Increased, Scope Broadened

A reorganization of the Office of the Director, NIH, has been approved by Surgeon General Leroy E. Burney.

The announcement explained that the reorganization is designed to provide the added staff capacity required for dealing effectively with the increasing number of complex problems associated with the administration of NIH program today and in the years immediately ahead.

Dr. Shannon cited six program developments as illustrative of those requiring increasing staff attention, both in the Office of the Director and at the Institute level.

These developments are: The broadening of NIH training programs, the increasing impact of grant activities on medical schools and universities, the advent of large-scale collaborative research undertakings, the initiation of programs designed to strengthen the Nation’s resources for medical research, the extension of NIH programs into international fields, and the continuing growth and change in intramural research.

New Setup Outlined

The new organizational plan will:

1. Establish a position of Deputy Director, NIH, with special responsibility for the coordination of policy for extramural programs.

2. Broaden the scope of the Associate Director for Intramural Research and change the title of that position to Director of Laboratories and Clinics.

3. Provide for five top-level staff positions with titles of “Associate Director”—four covering extramural activities (research grants, training, institutional relations, and collaborative research) and working primarily with the new Deputy Director; and one for the intramural area of clinical care administration and similarly linked with the Director of Laboratories and Clinics.

Under the reorganization plan, four present offices—Office of Administrative Management, Office of Program Planning, Office of Reorganization, and Office of Library Services—will be transferred to the new Deputy Director and reorganized to reflect his responsibilities. (See REORGANIZATION, Page 8).

NEW EMERGENCY EQUIPMENT, PROCEDURES RECOMMENDED

Following the electrical power failure in this area of Montgomery County on March 29, the NIH Disaster Control Group met to review emergency procedures and make recommendations for more efficient handling of possible future emergencies on the NIH reservation.

The Group, established by the NIH Director in 1956, has the responsibility of developing plans for managing extensive emergencies, including Civil Defense action, taking place at NIH. George P. Morse, Chief, Plant Safety Branch, OAM, is coordinator of the Group.

Although NIH is supplied with two relatively independent sources of PEPCO power, it was apparent on March 29 that they were not true emergency sources. A minor fault in an up-county power station put too much demand on the remainder of the complex network of power stations, and the alternate feeder lines to NIH were unable to supply the reservation with power.

As a result, critical power was cut off in the CC surgical suite, elevators were stopped between floors, and lights, fire pumps, chemical hood exhaust fans, and many other essential operations were inactivated throughout the reservation.

Although the emergency generator in Bldg. 11 was started immediately, 45 minutes to one hour is required for the necessary warming-up and switching before it becomes operative.

Following a survey made March 31 of conditions existing at the time of the emergency, an ad hoc committee of the group made the following recommendations:

1. To offset the effect of possible future electrical power shortages, new equipment should be provided in order to maintain the continuity of essential operations.

2. A 40 kilowatt generator with automatic starting facilities is needed to supply power to the present surgical suite in the CC for essential equipment such as suction, cautery, and extra-cor­

The contract for a separate electrical circuit with manual switchover to be installed in the new (See EMERGENCY, Page 2).
Pakistan Cholera Project Established With NIH Aid

Ten tons of supplies and equipment for a cholera research laboratory were shipped from NIH late in April. The recipient is the Institute of Hygiene at Dacca, in the Pakistan Cholera Project.

Establishment of this laboratory is one phase of the cholera research project undertaken by NIH with $400,000 voted by the SEATO Council for this purpose. The funds come from the President's Fund for Asian Economic Development, a part of Mutual Security Program Appropriations.

The laboratory supplies were selected by DBS personnel. They were crated here, with the equipment, and numbered for proper order of transhipments in Pakistan and installation there. The shipment left New York May 10 on the SS Explorer.

James E. Mayo, Jr., Office of the Director, NIH, will receive the shipment in Chittagong, East Pakistan, and supervise its transportation to Dacca. George R. Elmore, Jr., Sanitary Engineering Branch, DRG, will arrive in Dacca about the time the equipment reaches there and will remain for several months as resident engineer to supervise its installation.

Result of Recommendation

Establishment of this project was recommended by a cholera research advisory group headed by Dr. Joseph E. Smadel, NIH Associate Director for Intramural Research. The group, which included five other U. S. scientists, visited the Far East and South Asia last August to develop the project and determine the most effective location.

The project is designed to bring American research scientists into working cooperation in this field with their Asian counterparts. As a result of a series of studies carried out by U. S. scientists the whole concept of how cholera damages and kills has been revolutionized. (See Page 3.)

Dr. HUEBNER

(Continued from Page 1)

Consultant to the World Health Organization Expert Committee on Virus Research.

A graduate of St. Louis University, Dr. Huebner has been with the Public Health Service since 1942. In addition to his duties at NIH, he is Clinical Assistant Professor in Infectious Diseases in Pediatrics at the Georgetown University School of Medicine and a Visiting Lecturer in Microbiology at Harvard University.

Other NAS members now on the staff at NIH are Drs. Joseph E. Smadel, Charles Armstrong, and Kenneth S. Cole.
Behavior Changes Found Following Neonatal Asphyxia

Behavioral changes that may result from lack of oxygen at birth have been described for the first time in a controlled group of young rhesus monkeys. Psychological tests of monkeys partially asphyxiated at birth, and of control animals delivered in a similar manner, indicate that normal animals are more emotional and less responsive to their immediate environment than are asphyxial animals.

The studies were conducted by Miss Sue V. Saxton of the National Institute of Neurological Diseases and Blindness Laboratory of Neuroanatomical Sciences, and the Field Station of Perinatal Physiology, University of Puerto Rico School of Medicine, and reported at a recent meeting of the United Cerebral Palsy Association, San Juan.

Since asphyxiation of newborn monkeys has been shown to produce neurological deficits similar to those found in some human infants, the effects of partial asphyxia on behavior and learning is currently of great interest. Preliminary results have indicated that the amount of large molecules of plasma protein into the stool. Replacing protein is therefore not a necessary part of the treatment of cholera patients.

The results of the test also indicate that there is no extensive destruction of the intestinal lining in cholera. Dr. Gordon and associates are reporting their findings in the Journal of the Siamese Medical Society. Development of the test and its clinical application in conditions other than cholera were previously reported by Dr. Gordon in The Lancet.

Behavior Recorded

In the first series of experiments, animals were placed individually in a soundproof chamber for ten minute periods weekly for 15 weeks. Behavior was recorded at ten second intervals and scores were based on times of periods during which the animal displayed emotionality, locomotion, or contact with any of the five stimulus objects in the chamber. The emotional score was based on previously determined criteria of emotional behavior such as sucking, convulsive jerking, rocking, and crouching.

Results of this study indicated that the asphyxial subjects locomotion scores were more, tended to contact objects more, and were significantly less emotional than the normal subjects. However, near the end of the series, locomotion scores in normal monkeys increased, and contact scores in the normal group exceeded the experimental. According to the investigator, the greater emotional behavior in the asphyxial animals, tended to level off as normal monkeys became adapted to the observational situation.

Study Followed Up

A follow-up study of the same monkeys at ages 10 to 14 months partially confirmed these assumptions, since no statistically significant differences between groups in frequency of locomotion or in stimulus contact were found. Surprisingly, however, normal animals continued to be more emotional than were the asphyxial animals. In this study, each animal was observed for three minutes four times a day for eight days.

The use of four stimulus conditions, ranging from an empty chamber to a complex condition (a toy bug) did not influence behavior patterns. For all of the conditions, it was found that normal animals locomoted slightly less and contacted the stimulus more often. No one emotional behavior was characteristic of any one animal or group.

In general, Miss Saxton concluded (See ASPHYXIA, Page 11).
Intensive Cancer Detection Program in Progress Here

Early detection of cancer is of crucial and often vital importance, since the earlier treatment is begun, the greater is the opportunity for cure. The National Cancer Institute has in progress a program of intensive research in cancer diagnosis, with the objective of devising procedures that will reveal the presence of unsuspected early cancers.

On the basis of a combination of ideas and recommendations on this program from the scientific advisors and the staff, it was decided that the areas of research which hold the greatest potential for improvement in cancer diagnosis were clinical enzymology, clinical chemistry and biochemistry, clinical immunology, clinical pathology, endocrinology, steroid chemistry, fluorescent microscopy, protein chemistry, tissue culture, and clinical cytology particularly as it related to cellular blood elements.

Enzymes govern the activities of cells and under special circumstances, usually injury or disease, they escape from the cell into the bloodstream. In recent years investigators have shown that detection and measurement of characteristic enzymes in the blood may lead to diagnosis of cancer invading bone and of liver cancer. A broad program to identify and measure enzymes in the blood and to correlate the results with cancer growth within the body could form the basis for a useful diagnostic test. Studies are being encouraged along this line in the diagnostic program.

In a like manner the identification, measurement and study of blood proteins and hormone excretion patterns in cancerous and non-cancerous individuals may provide a basis for improved diagnostic methods. Here again additional research is being encouraged.

It is now becoming quite clear that cancer growth may be profoundly influenced by many factors within the body of the host. Does the body, as it does in bacterial and virus diseases, have natural defenses against cancer? Can these be used to identify and diagnose the disease? Antigen-antibody studies of cancer by means of tissue culture, fluorescent microscopy, and immunologic techniques may reveal whether or not cancer cells have a common antigen not shared by normal cells. If such a cancer specific antigen could be demonstrated the validity of an immunologic approach to cancer diagnosis would be established. More studies of this nature are needed.

Cancer cells can be found circulating in the blood in many cases of the disease. If the true significance of these cells can be determined and understood it may contribute a great deal to many facets of the cancer problem including diagnosis.

The exfoliative cytology technique, which is one of the best detection aids for early cancer in general, has been most widely applied to detection of cervical cancer. Its potential in regard to detection of cancer of other sites, for example, lung, gastric, prostatic, etc., has not been completely proved to date. It is now being investigated under the diagnostic research program.

One of the limiting factors to many of the investigations in these proposed areas of research is the time required by present techniques to carry out enzyme determinations, hormone assays, protein determinations, cytologic interpretations, etc. Techniques which will speed up such determinations through automation, electronic devices and computers are being developed and supported under the program in order to speed up the search for improved diagnostic methods and procedures.

Diagnostic test development research is complex and difficult and any significant results are likely to take many years to accomplish.


cellular Repolarization is Believed Caused by Electrical Discharges

Repetitive, self-sustained electrical discharges from brain cells, very similar to those taking place during human epileptic seizures. This is proved by new procedure of cellular repolarization, which occurs after the cell membranes have been excessively depolarized by repeated electrical stimulation.

In an experimental approach to the problem of epilepsy, Dr. Paul Gerin, former guest worker in the Electroencephalography Branch, National Institute of Neurological Diseases and Blindness, systematically analyzed spike patterns elicited by repeated electric stimulation of brain cells. An interpretation of the mechanisms which may cause afterdischarge, that is, self-sustained activity which follows repetitive electrical stimulation, has been published in the Arch. Ital. Biol. “Afterdischarge’ is very similar to spontaneous seizures recorded from the exposed brains of epileptic patients, and is often used as a tool for experimental study of epileptic activity.

Cell Activity Recorded

Electrical stimulation of varying strength, frequency, and duration was applied to the cerebral cortex of adult cats with bipolar silver electrodes. The activity of single cells during and after stimulation was recorded by means of tungsten microelectrodes and by larger electrodes on the surface of the cortex. Of a total of 2,560 afterdischarges elicited, 600 were accompanied by visible spike activity and were recorded on film. Detailed analysis was made of activity in 80 different cortical cells.

Repeated stimulation, Dr. Gerin found, was usually accompanied by progressive and characteristic changes in the size and frequency of spike activity elicited by each electric pulse. When these changes did not occur, the phenomenon of afterdischarge was not developed. Changes included a tendency for units to discharge repetitively and progressive decreases in the amplitude of spikes until activity sometimes ceased entirely.

When the spike firing ceased entirely, self-sustained electrical activity (afterdischarge) usually occurred, characterized by small, high frequency spikes, which progressively increased in amplitude and decreased in their rate of firing. The self-sustained activity eventually ceased when the spikes returned to the pre-stimulation level of amplitude.

According to Dr. Gerin, spike

See REPOLARIZATION, Page 5)

Baby Mice Susceptible to Carcinogenic Stimuli

Increasing realization of the extraordinary susceptibility of baby mice to carcinogenic stimuli is afforded by recent work at the National Cancer Institute. Dr. Roger W. O’Gara, Laboratory of Pathology, and Dr. Margaret G. Kelly, General Medicine Branch, have reported microgranulation of carcinogenic hydrocarbons introduced subcutaneously into newborn randomly bred Swiss mice produce pulmonary tumors in all of them within 16 weeks.

Similar results have been obtained in two inbred strains of mice with low spontaneous incidence of pulmonary tumors. The number of pulmonary tumors obtained from exposure to the carcinogen on the first day of life is substantially greater than that from the same dose injected at 1, 3, or 6 weeks of age.

In addition to the pulmonary tumors, some mice develop subcutaneous fibrous tumors. Tumors of the sebaceus glands, adrenal cortex, and liver have appeared, as well as leukemias and lymphosarcomas.

The authors reported their findings to the recent meeting of the American Association for Cancer Research in Chicago.

(Continued from Page 5)
Decay Reduced by Mineral Phosphates

Convincing evidence that dental decay in experimental animals is drastically reduced by adding certain mineral phosphates to the diet has been accumulated in recent years. This evidence provided a firm foundation for current National Institute of Dental Research clinical studies to assess the inhibitory effects of dicalcium phosphate on human caries. Concurrent with these laboratory and field trials are studies by Dr. F. J. McClure, Chief, Laboratory of Biochemistry, in the greenhouse facility opened on the grounds at NIH in the spring of 1959.

Data reported by Dr. S. Harvey Mudd have established that in the biosynthesis of the alkaloids N-methyltyramine, horseradish, and gramine by cell-free extracts of barley or millet, the methyl group of these compounds is donated by S-adenosylmethionine. Several other compounds which have been suggested in the literature as possible methyl donors are inactive in this system.

These findings were extended in a series of experiments in which it was shown that barley can synthesize S-adenosylmethionine identical to that found in vertebrates, even to the extent of having the same stereocchemical configuration about the asymmetric sulfur and carbon atoms. Together, these facts indicate that the predominant pathway of plant transmethylation may lie through S-adenosylmethionine just as it does in vertebrates and microorganisms.

These findings illustrate once again the value of studying fundamental enzymatic mechanisms in whatever biological material is most convenient, with the assurance that the facts in a given form may well apply to widely divergent species. Although transmethylation is apparently very important for all forms of life, the enzymatic mechanisms at work here are imperfectly understood, and it is hoped that further work with botanical systems may clarify details of the process.

A matter which requires further exploration is suggested by the structural resemblance of two of the particular plant alkaloids studied to the adrenal hormones of mammals and of a third to mammalian serotonin. If the role, as yet unknown, of these compounds in plant metabolism can be elucidated, we may gain thereby an important lead to discovering the role of these neurohormones and of chemically related hallucinogenic materials.

The formation of the alkaloids now being studied is known to be under not only genetic control but under other controls as well, so that the formation occurs in a dramatic outburst at a specific stage of ontogenesis and in restricted types of tissues.

It seems not unlikely that a study of the interplay of the control mechanisms which are at work here will give insight into the important question of how enzyme formation and activity is governed in higher organisms. The genetic, environmental, tissue-spe-

Greenhouse Provides Stage For Enzyme Action Studies

Utilization of plant materials to elucidate the biosynthetic pathways of various compounds has brought new information about transmethylation, a process which now appears to be important for all forms of life. The study from which this finding resulted is part of a program of research being conducted by National Institute of Mental Health's Laboratory of Cellular Pharmacology, in the greenhouse facility opened on the grounds at NIH in the spring of 1959.

Dr. Harvey Mudd (right), Chief, Section on Alkaloid Biosynthesis and Plant Metabolism, and Larry Brown, Biologist, both of NIH, inspect growth of cacti plants in the NIH greenhouse. The cacti are being raised for a future study.
Antibody Development Found Allied To Rare Form of Blood Platelets

From studies of a surgical patient of the National Heart Institute who developed a severe bleeding tendency one week after operation, hematologists of the National Institute of Arthritis and Metabolic Diseases have found that there are two distinctly different types of human blood platelets, a common type and a rarer, more abnormal type.

Individuals with the rarer form may develop antibodies against the common type following transfusion, and under certain circumstances as a result of this antibody a patient may destroy his own platelets. The study also provides a clear demonstration that different platelet types exist which are unrelated to family types. The significance of this finding with respect to the safety of blood transfusion is not yet fully known.

The discovery of the unusual type of antibody was made by Dr. Raphael Shulman and associates of NIAMD's Metabolic Diseases Branch, and stemmed from blood studies of a patient who developed uncontrollable internal and external bleeding one week after a successful heart surgery at the National Heart Institute.

Blood Platelets Gone

At the time she was bleeding, blood studies revealed that all her blood platelets were gone, and on further study it was found that her blood contained an extremely high level of a circulating antibody which reacted with normal platelets and had presumably destroyed all the platelets in her blood. Because her condition was critical an operation was carried out to remove the antiplatelet antibody. Within a 16 hour period, during which 99 percent of the patient's blood volume was replaced, all hemorrhage was stopped, and within several days thereafter her platelet count had returned to normal.

It was after the patient recovered, however, that Dr. Shulman made the peculiar finding which suggested that the woman might have an unusual type of platelet. He took a fresh sample of blood from the patient (a sample containing her newly formed platelets) and mixed it with some of the antibody-containing blood that had been flushed out during the exchange transfusion. Since the antibody was active against normal platelets, it was assumed that it would also be active against the patient's platelets, but no reaction took place.

This finding was corroborated in a second patient (hospitalized at Faulkner Hospital in Boston) with the same clinical history of hemorrhage one week after transfusion; that is, the platelets of both patients after recovery would not react with the antibody which was present in their blood at the time they were bleeding. This could have been due to some agent in the patients' blood which blocked the attachment of antibody or to the fact that the patients' platelets were different from usual normal platelets.

Genealogic Studies Made

Genealogic studies by the NIAMD investigators of platelet type in 35 members (covering 4 generations) of the family of one of the patients as well as a general population survey of platelets from 300 randomly selected individuals indicated that the patients' blood had an unusual form of platelets and that this form of platelet is inherited as a recessive trait. Platelet type was done using the original antibody from the patients.

The unusual form of platelet was not as rare as had been expected for two percent of the population studies proved to give it, indicating that the chances of the usual form of platelets being transfused into an individual with the unusual form is approximately 1 in 50. It is evident that reactions are not caused every time this is done, for it was found that a patient with the rare type could receive transfusions with the common type without provoking antibody. In addition, there are only two other cases in the medical literature which might have had the same complication.

Donor Also Unusual

The NIAMD hematologic studies suggest that in order to develop an antibody and have the antibody destroy an individual's own platelets, the donor of that person's own individual's own platelets may very rarely have some of the antigen substance from their platelets free in their blood. This free substance transferred into a patient with the common form of platelet may not only be necessary in order to pro-vok antibodies in the recipient but also may be necessary to cause antibody production. An attempt was made to permit antibody to react with these platelets of donors, and lymphoma of platelets and possible severe hemorrhage.

The studies were reported to the American Society for Clinical Investigation at Atlantic City by Drs. N. R. Shulman, R. Astor, A. Loitner, and M. Miller.

Triglyceride Synthesis

Mechanisms Similar In Adipose Tissue, Liver

Recent studies by the Section on Metabolism of the Laboratory of Cellular Physiology and Metabolism, National Heart Institute, have explored the mechanisms of triglyceride synthesis in adipose tissue, and this has resulted in a finding that the metabolic pathway for triglyceride synthesis in adipose tissue is similar to that previously reported for triglyceride synthesis in liver. The studies also suggested that UFA release was a major factor in triglyceride synthesis, and that hormonal control of UFA release may be exerted over some of the steps of esterification process.

Palmitic Acid Used

In these studies, Drs. Daniel Steinberg, Martha Vaughan, and Simeon Margolis, of the Laboratory of Cellular Physiology and Metabolism, and Dr. Arthur Kar- men, of the Laboratory of Technical Development, used palmitic acid tagged with radioactive carbon to measure the incorporation of this fatty acid into triglycerides. The chemical conditions of the body, particularly the presence of triglycerides, and hormones are both necessary for the formation of triglycerides, and hormonal control of UFA release may be exerted over some of the steps of esterification process.

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FROM '35 TO '38
How "The Reservation" Came to Be

Part II of Two Parts

The initial installment of this two-part feature appeared in the preceding (April 26) issue. Chief source of information was a copy of the authentic report written in May of 1938 by Dr. L. R. Thompson, who was Director of NIH when it transferred to its present location. Dr. Thompson's historical narrative is among the documents sealed in the cornerstone of the NIH Administration Building.

Dr. Thompson notes that, "After Mr. Wilson made his decision to give the property to the National Institute of Health, he and Mrs. Wilson, and their son Luke became intensely interested in the project and the general scientific work of the Institute.

It was then, as news of the proposed gift became known, that local opposition developed. "The Bethesda Chamber of Commerce passed resolutions against it, the County Commissioners did the same, and finally the Maryland Park and Planning Commission voiced its disapproval."

Residents Opposed

A number of residents and a few business men were also opposed, but "a few influential men were friends of the project." Among these were "Canon Peter who lived directly to the south of the land, and Mr. Gilbert Grosvenor, the editor of the National Geographic Magazine," whose property lay to the north.

At this juncture the Social Security Act was passed by Congress, providing a sudden increase in funds for research. As a result, Dr. Thompson "conceived the idea of rebuilding the National Institute of Health at Bethesda." He observes that, "The idea came at a fortunate time as the Navy Hospital was considering a great expansion of their hospital and Medical Center, and our new buildings at 25th and E Streets fitted nicely into their plans."

Appropriation Authorized

This proposal was quickly approved by the President and other Administration officials, and an appropriation was authorized for "the construction of three new buildings which were to house the new work of the National Institute of Health."

But the sailing was not yet smooth. "Although the authorization had been obtained, there seemed little chance of obtaining the funds," as Dr. Cumming, the Surgeon General, considered other building programs of the Service of more importance."

Soon afterward, however, Dr. Cumming retired. Fortunately for the success of the project he was succeeded by Dr. Thomas Parran. Dr. Thompson's narrative continues:

"Dr. Parran was greatly interested in the research work of the Service and immediately placed the building program of the National Institute of Health at the head of the Service construction program. As he was a personal friend of the President and of the Secretary of the Treasury, he prevailed on them to have funds made available in the sum of $1,363,000 to begin construction. On January 1, 1938, he dug the first shovel-full of earth for the three authorized buildings.

This marked the beginning of construction for the new home of NIH. Even then, however, events moved swiftly, pointing toward the tremendous expansion yet to come.

Cancer Program Studied

Dr. Thompson reports that Congress meanwhile had become interested in the possibility of a national program looking toward the control of cancer and had made inquiries of the Surgeon General concerning the essentials of such a program.

Following a series of conferences with outstanding authorities in this field, a program was formulated and presented to Congress by the Surgeon General.

A bill authorizing $750,000 for the construction of the National Cancer Institute and $700,000 annually for the work of the Institute was then introduced in both the House and the Senate.

Dr. Thompson comments: "It was my privilege, under the direction of the Surgeon General, to have written the bill and also the report of the House committee on the bill."

He also calls attention to the interesting fact that, "The Senate bill when introduced had the names of every one of the 96 Senators as co-authors," and adds, "So far as I know, this is the only bill up to this date that has had such an honor."

The bill was passed in both Houses of Congress by unanimous vote. As soon as it had been signed into law, Dr. Parran called on the President "and by reprinting the building program the Service secured the necessary funds for the building of the Cancer Institute."

This development was eminently appropriate and most gratifying to Mr. Wilson and the members of his family, for, "Early in 1937," the Thompson narrative states, "Mr. Wilson was found to be suffering from cancer of the bladder, and he died in June of that year, just three days before the Cancer Institute bill was passed by Congress. Knowing his condition, he was greatly interested in my reports to him on the progress of the bill."

Dr. Thompson records that on the Sunday following Mr. Wilson's death, "Mrs. Wilson and Luke W. Wilson, his son, offered me, as the Director of the National Institute of Health, additional ground on their property at Bethesda as a site for the Cancer Institute, with other land which could eventually be used as quarters for officers stationed at the Institute. The deed for this land is being signed by Mrs. Wilson during this month of May 1938."—E. K. S.

On June 30, 1938, Secretary of the Treasury Henry Morgenthau laid the cornerstone of Building 1. Looking on were Mrs. Luke I. Wilson and PHS Surgeon General Thomas Parran.
REORGANIZATION

(Continued from Page 1)

search Information, and Office of International Medical Research Activities—will continue as component parts of the Office of the Director, NIH.

The new positions, titles, and relationships are indicated in the accompanying chart.

The Deputy Director will serve as the NIH Director's principal policy assistant and advisor for the extramural programs of NIH. These programs are of major policy concern to the Surgeon General, the Secretary, and the Congress, representing some 80 percent of NIH's total annual appropriations. The Deputy Director will also act for the Director, NIH, in the Director's absence.

To Advise on Policy

The Director of Laboratories and Clinics will be the NIH Director's principal policy assistant and advisor on all intramural programs, including certain direct operations in field installations not previously receiving policy and program review by the Associate Director for Intramural Research.

With regard to these two positions, Dr. Shannon points out that although Directors of Institutes and Divisions will normally consult with and work through the Deputy Directors toward the Director of Laboratories and Clinics, they will continue to have direct access to the NIH Director on questions of over-all or basic policy.

Each of the five Associate Directors will have staff responsibility for discrete functional areas as indicated by their titles.

Assume New Titles

In the case of two of these—the Associate Director for Research Grants and the Associate Director for Clinical Care Administration—the present positions of Chief, DRG (Dr. Ernest M. Allen), and Clinical Center Director (Dr. Jack Masur), will succeed to the new titles.

Both Dr. Allen and Dr. Masur will continue to have operating responsibility for the divisions they head, as well as staff responsibility within the Office of the Director, NIH.

The three other Associate Director positions will involve new appointments.

The Associate Director for Training will have staff responsibilities for a segment of the NIH extramural programs which this year reached a level of $90 million and, in Dr. Shannon's words, "represents, from a policy point of view, one of the most significant aspects of the future capacity of the United States to broaden and intensify its medical research efforts."

The Associate Director for Institutional Relations will assist in the evolution of policy in NIH's relationships with educational and research institutions as such (as distinguished from individual investigators or departments) and recognizes the impact of the extensive development of NIH programs on such institutions.

The Associate Director for Collaborative Research will serve in the program areas represented by the cancer chemotherapy, psychopharmacology, and perinatal studies—fields which constitute a major segment of the total NIH research effort and represent some of NIH's most sensitive problems in outside relationships. Commenting to a reporter on the new plan of organization for his immediate office, Dr. Shannon said, "We are indeed fortunate to have Dr. David E. Price return to us after an absence of eight years, during which time he has served as Assistant Surgeon General in the Office of the Surgeon General and, more recently, as Chief of the Bureau of State Services.

"Dr. Price, as Deputy Director, will be a tremendous asset to my office. I am delighted, too, to recognize the contributions of Dr. Masur and Dr. Allen by accord-