NLM Dedicated; Speakers Include Hill and Ribicoff

The new National Library of Medicine Building, situated on its landscaped 11-acre site at the southeastern corner of the NIH reservation, was dedicated at ceremonies held last Thursday and Friday.

The two-day program, beginning at 3 p.m. Thursday and continuing at 10 o'clock the next morning, included an impressive array of speakers and participants.

Kennedy Coauthors Legislation

Principal speakers at the opening ceremonies were Senator Lister Hill of Alabama and Abraham Ribicoff, Secretary of Health, Education, and Welfare.

Senator Hill, who delivered the dedication address, was co-author with the then Senator John F. Kennedy, of the National Library of Medicine Act of 1956, which authorized construction of the new building.

Dr. Worth B. Daniels, Clinical Professor of Medicine at George (See DEDICATION, Page 5)

NHI Exhibit Wins APHA Award for Third Year

For the third year in a row the National Heart Institute has received a Certificate of Merit "in recognition of the excellence of its exhibit" at the Annual Meeting of the American Public Health Association. This year's award-winning exhibit is titled "Framingham Heart Study."

The scientific exhibit was one of nine selected from nearly 100 on display at the recent meeting in Detroit. It details the results of a 12-year study of 5,200 residents of Framingham, Mass., and shows those factors established by the study as strongly associated with the development of coronary heart disease. The exhibit also depicts a rapid procedure for performing electrocardiograms.

Dr. Thomas R. Dawber, Medical Director of the Framingham study, accepted the certificate on behalf of the NHL.

Many and Varied Festivities Brighten Christmas at NIH

It's looking a lot like Christmas at NIH. Trees in the Clinical Center lobby and solaria, greens on the front of the building, and door wreaths provided by the NIH Recreation and Welfare Association lend a festive atmosphere.

The familiar Nativity scene will appear again on Center Drive, and the 25-foot spruce tree growing between the A and B wings of Building 31 is to be brightly decorated for the first time.

Begins Tomorrow

Holiday activities for the CC patients begin with a Christmas program tomorrow evening (December 30) in the 14th floor assembly hall. A wide range of festivities will follow, ending with a New Year's Eve dance and entertainment on New Year's Day.

Following greetings from Dr. C. R. Hummelbach, CC Associate Director, and invocation by Father Francis Veith, Catholic Chaplain, the opening program will include music selections by the Bethesda Methodist Church choir under the direction of Wilmer Bartholomew, and entertainment by the American Guild of Variety Artists. Rev. William R. Andrew, Protestant Chaplain, will be the benediction.

Gifts from Santa

On Thursday two programs are scheduled. In the afternoon, Santa Claus will present gifts and favor to all children on the nursing units. Arrangements for his visit were made through Hugh Yarrington, manager of the Hecht Company's Silver Spring store.

That evening in the 14th floor assembly hall, the U. S. Air Force (See CHRISTMAS, Page 3)

R&W Welcomes Visitors To New Bldg. 31 Office

The Recreation and Welfare Association of NIH has moved from its former office in the Clinical Center to Room 1A18, Building 31.

Laurence E. Ring, R&W General Manager, invites all NIH employees to inspect the new office and become acquainted with the advantages of belonging to the Association.

Rollin Hotchkiss Is Dyer Lecturer Here Jan. 10

Dr. Rollin D. Hotchkiss, Professor at the Rockefeller Institute, will deliver the R. E. Dyer Lecture on Wednesday, January 10, at 8:15 p.m. in the Clinical Center auditorium. He will speak on "Messages in Macromolecules."

"The genetic chemist must still responsibly ask whether this extrapolation is valid, and whether he can still use certain points in the microstructure of nucleic acids in making generalizations about the genetic code and the proteins."

"Prevaling doctrines urge that all sites of related influence are side-by-side in the nucleic acids, in an arrangement collinear with the sites they influence in the poly-peptide chains of proteins. The genetic chemist must still responsibly ask whether this extrapolation is valid, and whether he can still use certain points in the microstructure of nucleic acids in making generalizations about the genetic code and the proteins."

Yule and New Year Issues Are Combined in This One

Continuing the custom inaugurated last year, the Record in this 8-page pre-Christmas issue combines the 4-page year-end and early New Year (Jan. 1) issues. Date of the next issue, therefore, is January 16. To each of our 9,200 readers, a Merry Christmas and a Happy New Year!
300 Officers Expected For April Meeting of PHS Clinical Society

More than 300 PHS officers are expected to attend the annual meeting of the United States Public Health Service Clinical Society to be held here next April 4-7.

The program of the meeting will consist of lectures, panel discussions and the presentation of papers on clinical and laboratory research studies, including many from NIH officers.

Chairs Committee

Dr. Edward J. Driscoll of the Clinical Investigations Branch, National Institute of Dental Research, is the Society's Vice President and Chairman of the Planning Committee for the meeting.

Chairman of the Scientific Committee is Dr. Alfred S. Ketcham of the Surgery Branch, National Cancer Institute.

Other members of the Planning Committee are Dr. Clifton K. Himmelbach, Associate Director, Clinical Center; Dr. Samuel Sessoms, Associate Director for Collaborative Research, NCI; Dr. Robert M. Farrier, Assistant Director (Professional Services Department), CC; and Dorothy Horlander, Chief of the Special Events Section, CC.

Serves as Stimulus

Founded in 1947, the Society represents all PHS units involved in clinical activities. It has served, Dr. Driscoll said, as a stimulus to the presentation of articles of clinical interest at its local monthly meetings and the annual meeting held at the various PHS installations.

The meeting in April will be the third to be held at NIH.

Dr. Driscoll urges that NIH-PHS officers planning to present papers at the meeting submit their abstracts not later than February 1 to the Program Committee, Rm. 102N226, Clinical Center.

CC Pharmacy Is Vital Support To Medical Research at NIH

By John M. Blamphin

The "corner pharmacy" at NIH doesn't sell newspapers or shaving cream, nor does it have a soda fountain. Its patrons, however, can select from a complete line of pharmaceuticals, investigational drugs, rubber gloves, syringes, calipers, band-aids, aspirin, and sterile instrument trays prepared for specific treatment and diagnostic procedures.

The Pharmacy Department of the Clinical Center, under the direction of Milton W. Skolaut, Chief, provides these and many other services to physicians and clinicians at NIH.

Its Pharmacy Service and Pharmaceutical Development Service are on the first floor of the CC, around the corner from the lobby, the Radiopharmaceutical Service is on the second floor, and the Central Sterile Supply Service is on the first basement level.

Combines Function

In most hospitals today, according to Mr. Skolaut, there is much overlap in responsibility between pharmacy and sterile supply services. For instance, the Sterile Supply Service dispenses many of the drugs that the Pharmacy packages, and it provides the needles, syringes and sets through which many drugs are administered.

The Clinical Center has combined the functions of the services into one unit, insuring complete cooperation and efficient use of manpower and materials. It is one of a small number of hospitals in the United States to do so.

Combining the two even saves on personnel. If they were separate, each would need its own purchasing personnel and salesmen contact.

The CC Pharmacy performs many special services not available from the pharmacy in most general hospitals, Mr. Skolaut said.

Drug containers sent to the wards are clearly labeled with average dosage information. This means that the nurses not only get the name of the drug in easy-to-read letters but the average dosage as well.

Provides Unusual Items

Sterile Supply Service, headed by Donald H. Hare, provides special packaging for sterile items such as cardiac catheters, an item not used in many general hospitals.

Many of the research clinicians want things "custom made." For instance, an NIH investigator with a particular type of injection in mind may want a needle with a bevel angle that is not available from a commercial manufacturer. The CC Pharmacy will adapt the needle for his purposes.

Eighty percent of the drugs available to physicians today were unknown 10 years ago, according to Mr. Skolaut. Unless a pharmacist has graduated within the last two or three years from pharmacy school, he probably is not familiar with many of these new drugs.

William H. Briner, Chief of the Radiopharmaceutical Service, transforms a sterile radiisotope diagnostic material into individual dosage containers under aseptic conditions. Note the quarter-inch thick lead shield that protects his hand from the radioactive material in the syringe.

Bill Briner (See PHARMACY, Page 6)
NIAMD Studies Contradict Theory Of Gout Cause

A gout-like response to injected sodium urate crystals in volunteer gout patients has been produced by scientists of the National Institute of Arthritis and Metabolic Diseases. Their findings are in sharp contrast to the accepted belief that urate salts are inert substances and have little or nothing to do with the acute painful attacks of this ancient debilitating disease.

Dr. R. Rodney Howell and J. E. Seegmiller of NIAMD's Arthritis and Rheumatism Branch have found that injection of needle-shaped microscopic sodium urate crystals will produce an inflammatory reaction when injected into the joints of gout patients.

**Reactions Described**

The reactions, which were produced in volunteer patients, were similar to those found in attacks of acute gouty arthritis. They were characterized by pain, warmth, tenderness, redness, fluid accumulation, and leukocyte (white cell) response in joint fluid. Inflammation was not produced, however, by injections of either sodium urate solution or a suspension of amorphous sodium urate.

The work of the NIAMD scientists holds promise for discovery of a long sought after link between the two main features of gout: the painful, recurring attacks which are the first indication that a patient has gout; and the inherited defect in body chemistry which leads to an accumulation of uric acid within the body.

**Produces Inflammation**

In addition to injecting the crystals into volunteer gout patients, the Institute scientists also injected them into the skin of normal people. Here too, they produced inflammatory reactions. In related studies in animals, preliminary results indicate that the injected needle-shaped crystals can bring about attacks of acute gout-like arthritis in normal joints.

From these observations, the NIAMD scientists concluded that certain forms of crystalline sodium urate may be directly involved in the cause of some aspects of acute gouty arthritis. This concept is in sharp contrast to the accepted belief that urate salts are inert substances and have little or nothing to do with the acute painful attacks of gout.

The work was reported at the Eighth Interim Scientific Session of the American Rheumatism Association.

**Blood Tests Aid in Diagnosis Of Rheumatoid Arthritis**

Blood testing methods for rheumatoid arthritis supply not only information which can aid in the diagnosis of the disease, but also indicate what course the disease may follow in future years.

Evidence was presented to the Eighth Interim Scientific Session of the American Rheumatism Association that blood tests for the rheumatoid factor, a protein substance found in a high percentage of patients with rheumatoid arthritis, can give the physician an outlook on the disease which can aid in determining the chances of remission and in selecting the best form of treatment.

**Follow-Up Made**

Findings of Prof. J. H. Kellgren of the Rheumatism Research Centre, Manchester Royal Infirmary, Manchester, England, and Dr. William M. O'Brien of the National Institute of Arthritis and Metabolic Diseases, indicated that presence of the factor is associated with higher mortality, internal organ and tissue destruction, and severe bone damage and crippling.

In contrast, patients in whom the factor could not be found showed no remission rates and few of the more serious manifestations associated with the disease.

The Kellgren-O'Brien paper covered a follow-up study done on 62 patients first examined in England's Manchester Royal Infirmary in 1950-51 shortly after introduction of the sheep cell agglutination testing method for the rheumatoid factor. Several more sensitive testing methods have been introduced since then. Sixty of the patients given careful clinical and X-ray examinations in 1950-51 were reexamined in 1960-61.

Of the 40 patients in the positive group, 11 died. Of 20 in the negative group, only three died. Death in at least six of the SCAT-positive patients was definitely related to rheumatoid arthritis. Only in one instance did corticosteroid drugs contribute to death. Many of the complications often attributed to corticosteroids were found in the non-steroid treated patients.

In addition to increased mortality, SCAT-positive patients had increased incidence of internal organ or tissue disease. Only two of 20 SCAT-negative patients had such lesions, while disease was seen in 17 of 40 positive patients.

X-ray studies also revealed striking differences. Severe bone erosions occurred mainly in the SCAT-positive group. Only three of 28 SCAT-positives escaped high levels of bone damage, while 10 of 17 SCAT-negative patients had no or little damage. Healed bone erosions were also less frequent in the positive group.

**Results Summarized**

These patients received essentially no long-term therapy, and no controlled drug trials were done. In general, the SCAT-negative group responded well to the more conservative therapies—bed rest, physiotherapy, gold, etc., while those in the positive group often failed to respond to any measure other than corticosteroids.

Eight severely ill SCAT-positive patients did receive steroid therapy for five or more years: four showed improvement; two continued to do poorly; one died of visceral disease; and one died in a state of chronic illness.

The scientists concluded that rheumatoid arthritis with positive SCAT reaction is associated with increased mortality, increased internal organ and tissue destruction, severe bone damage and crippling. In SCAT-negative rheumatoid arthritis they found no increased mortality, a high incidence of remission, few internal lesions, little bone damage, and the frequent development of secondary osteoarthritis.

**Dr. Bunin Participates In Writers Seminar**

Dr. Joseph J. Bunin, Clinical Director, National Institute of Arthritis and Metabolic Diseases, participated in a panel discussion on "Pathology of Rheumatoid Arthritis and Related Diseases" during the concluding session of a 2-day science writers seminar on arthritis December 6 at the Johns Hopkins Hospital auditorium in Baltimore.

Planned as a background workshop on arthritis, the seminar was sponsored by the National Foundation in cooperation with the Johns Hopkins Medical Institutions.
Gorman Appointment Recalls Crusade Against Mental Illness in U.S.

In its recent announcement of the appointment of Mike Gorman as a member of the National Advisory Mental Health Council, the National Institute of Mental Health calls attention to this distinguished journalist's crusading career against mental illness.

While a reporter on the Daily Oklahoman in 1946, Mr. Gorman wrote a series of articles on mental hospitals in Oklahoma, launching a 5-year, state-wide campaign in behalf of mental health.

During that time he wrote more than 400 news stories, 50 editorials, various pamphlets and a book, Oklahoma Attacks Its Snake Pits, which appeared in condensed form in the Reader's Digest in 1948.

Wins Lasker Award

In that same year he became the first newspaperman in the country to receive the Lasker Foundation Award, presented by the National Committee for Mental Hygiene for his distinguished newspaper reporting in the field of medicine.

The following year his work in the field of mental health was recognized by the Oklahoma Chamber of Commerce which named him as one of the Nation's 10 outstanding young men.

In 1952 he served as Director and chief writer for the President's Commission on Health Needs of the Nation, and since 1953 has served as Executive Director of the National Committee Against Mental Illness, formerly the National Mental Health Committee.

In 1956 his book, Every Other Bed, focused attention on the need for more support for research in the causes, treatment, and prevention of mental disease.

NIDR Group Gets Award For Dedication Planning

A superior performance award was presented recently to an NIDR group headed by Information Officer Robert R. Hirt for its role in the planning and dedication of the new dental research laboratories last May.

Dr. Francis A. Arnold, Jr., Institute Director, in presenting the award, cited the group for individual and collective achievement in receiving and carrying out the dedication program in a highly efficient manner.

Other recipients were Robert B. Calahan, Associate Information Officer; Marie T. Norris, Information Specialist; Gerry M. Walsh, Secretary; and Edna G. Ketchum, Secretary to Dr. Arnold.

Isolated New Guineans May Yield Clues To Goiter, Mental Deficiency Causes

A primitive New Guinea community where virtually all births are probably damaged infants and where goiter is a widespread disease and where goiter the size of footballs are seen, promises to provide medical science with crucial clues regarding the underlying causes of and interactions between these debilitating afflictions.

The National Institute of Neurological Diseases and Blindness has begun a many-faceted study of this stone age population, hoping to reveal these clues.

Dr. D. Carlton Gajdusek, who heads the NINDS study, reports that these people, isolated from their neighbors in the highlands of Netherlands New Guinea, had no contact with the civilized world until three years ago.

Many Affected

The NINDS scientist estimates that perhaps all of the 2,000 to 5,000 inhabitants of this region, the Mulia region, suffer from varying degrees of inborn nervous system defects, ranging from simple mental retardation to serious crippling disorders.

Clearly evident are the effects of both congenital and neuro muscular diseases in large numbers of infants. In addition, about one-fourth of the males and two-thirds of the females have goiter, and in some villages of the region all of the women are so afflicted.

In all goiter regions of the world the enlargement of the thyroid gland is said by scientists to be caused by a failure of the gland to retain a supply of iodine which is necessary for the production of an adequate amount of hormone. In the absence of sufficient iodine, the thyroid gland often undergoes drastic enlargement in an attempt to produce the hormones.

Iodine Not Deficient

Preliminary studies of the water and soil of the Mulia region, however, do not reveal any noticeable deficiency of iodine. Dr. Gajdusek explains that even if enough iodine is available in the diet, other factors may prevent the thyroid gland from retaining the iodine present. These may be a variety of biochemical defects or the presence of toxic substances in the diet which prevent the incorporation of iodine into the hormone-producing mechanism of the gland.

Hereditary factors, as well as environmental, are strongly suspected by Dr. Gajdusek because of the small number and extreme isolation of the natives he studied. Such conditions are further complicated by inbreeding which is turn often brings to light hereditary defects that would normally be masked.

In the Mulia region, family patterns of occurrence of goiter and central nervous defects strongly indicate genetic influences, the NINDS scientist says.

The poor soil is a primary environmental factor. Dr. Gajdusek noted that sweet potatoes grown in the Mulia region are of a quality unfit for human consumption in other parts of the highlands.

The Mulia situation is also unique in that the potato greens have become a major staple of the diet, supplemented by the swammy potatoes of markedly inferior quality. He is investigating the possibility of this unusual staple food in an already nutritionally poor community may play a critical role in the cause of goiter and the resulting disorders.

Dr. Lutwak Addresses Symposium on Bone

Speaking on "Metabolism of Bone in Paget's Disease," Dr. Leo L. Lutwak of the Metabolic Diseases Branch, National Institute of Arthritis and Metabolic Diseases, addressed the International Symposium on Bone held recently in San Francisco. The symposium was sponsored by the San Francisco Medical Center of the University of California and its Continuing Education in Medicine and the Health Sciences program.

Dr. Lutwak reported the results of studies of metabolic balance and calcium distribution in several patients with osteitis deformans (Paget's disease) made under differing dietary calcium intakes and under corticosteroid or androgen therapy.

Research Advances Cited

The symposium focused attention on the clinical application of recent advances in research on bone and the changing concepts of the metabolism of bone and teeth in health and disease. It included a discussion of various points of view on controversial subjects such as the cause of and treatment for osteoporosis.

Dr. Lutwak also participated in this discussion, presenting a paper on "Relations of Calcium and Phosphorus Balance to Changes in Bone," which described isotope and metabolic balance data obtained in studies of patients with osteoporosis.
DEDICATION
(Continued from Page 1)

New Publication Summarizes Programs Supported by NIH for FY '59 and '60

The publication of a new booklet summarizing all the medical support programs administered by the National Institutes of Health during Fiscal Years 1959 and 1960 was announced recently by the Public Health Service.

In response to numerous requests for such information, the booklet, entitled "NIH, A Review of FY '59 and '60," was prepared by the National Institutes of Health, Summary Tables for the Total Extranatural Program, fiscal years 1959 and 1960.

Single copies are available from the DRG Information Office. Additional copies may be obtained from the Superintendent of Documents, Government Printing Office, Washington, D.C., at $1 per copy.

With the aid of FSIC contributions, some 25,000 of the poorest children of the Lucknow district of India are receiving a daily meal of rice, milk and a freshly baked bun. For many of these youngsters this is the only substantial meal of the day. Your continued CARE support through FSIC makes similar mass feeding programs possible wherever the need exists.

Fellowship Withdrawals Show Slight Drop in '61

In Fiscal Year 1961, 327 or about 8.5 percent of the 3,845 applicants for postdoctoral, postdoctoral fellowships and special fellowships either withdrew their applications or cancelled their awards, according to a recent DRG survey.

The 1961 overall figures show a slightly lower proportion of withdrawals and cancellations than in FY 1960. The percentage for that year was 10.1 percent.

However, 1961 showed a higher proportion of withdrawals and cancellations for postdoctoral fellowships than the 1960 figures. In both years, over half of these were postdoctoral.

The survey was conducted by the Analysis and Evaluation Section, Career Development Review Branch, Division of Research Grants. Its purpose is to explore and explain the reasons for withdrawal of applications and cancellation of awards in the fellow-
familiar with radiopharmaceuticals. He may not even learn about their use in patient diagnostic and treatment procedures.

Yet radiopharmaceuticals are becoming more important in patient therapy, and new techniques for preparation, handling, and packaging must be developed.

The Pharmacy's Radiopharmaceutical Service, headed by William H. Briner, makes up these drugs on special order for NIH clinicians. It also experiments with new ways of preparation and storage and generally tries to improve the quality and usefulness of the drug.

In a year the GC Pharmacy dispenses about 30,000 items in drugs and sterile items. About 28,000 of this number are drug items and the balance are from the Sterile Supply Service.


case of [Image 0x0 to 650x835]

The suggestion is being considered for DHEW-wide use.

Miller, Hemphill Elected APHA Section Chairmen

Two NIH scientists were elected section chairmen of the American Public Health Association at its recent annual meeting in Detroit. They are Dr. Alan D. Miller, Special Assistant for Field Operations, Extramural Programs, NIMH, elected Chairman of the Association's Mental Health Section, and Dr. F. H. Hemphill, Assistant Chief, DRG, elected Chairman of the Statistics Section.

Dr. Miller has been at NIH since June of this year. Prior to his present position he was USPHS Mental Health Consultant in Psychiatry at Region 8 in Denver.

Dr. Hemphill joined DRG in 1958 and has been Assistant Chief since April of last year. Prior to his Government service he was Professor of Public Health Statistics at the School of Public Health, University of Michigan.

Handling Care Advised For Office Machines

Supply Management Branch, DRS, calls attention of employees to the need for care in handling office machines using expensive office machines, pointing out that employees may be held financially responsible for damage to Federal property caused by negligence.

SMB cites as an example a recent case in which a costly calculator fell to the floor while being wheeled down a corridor on a light stand.

Repairs to the machine cost $197.05, according to SMB, in addition to the loss of its use for one month and valuable time spent in explaining the incident to a Board of Survey.

To reduce the possibility of damage to office machines, SMB suggests that:

• Stands be adequate to the size and weight of the machine.
• Machines be bolted to stands when possible.
• The transportation of office machines on light stands or chairs is prohibited.

Additional information on the care of office machines may be obtained from the Central Repair Service, Ext. 4615.

NIAID Lab Experiment To Facilitate Study of Egyptian Splenomegaly

An experiment performed in the Laboratory of Parasitic Diseases, National Institute of Allergy and Infectious Diseases, is expected to greatly facilitate laboratory study of one of the most dangerous complications of schistosomiasis, a parasitic disease suffered by approximately 150 million people in various parts of the world.

A report on the experiment was presented at the recent Annual Meeting of the American Society of Tropical Medicine and Hygiene by an NIAID scientist, Dr. Kenneth S. Warren.

SMB Is Colorful

Dr. Warren said that the complication of schistosomiasis with Schistosoma mansoni (one of the worm parasites causing schistosomiasis) has received the colorful appellation, Egyptian splenomegaly. The spleen is so grossly enlarged in this disease that for many years it drew attention away from the liver which is the primary seat of the disease. Severe hepatic fibrosis impedes blood flow from the spleen and so-called congestive splenomegaly occurs.

In spite of much human and animal experimentation, the exact way in which the worm S. mansoni causes this disease has remained in doubt. Recently a syndrome in mice resembling Egyptian splenomegaly in humans has been reported by LFD, and Dr. Warren, on the etiology of this syndrome, has therefore been facilitated.

Mice Are Infected

Previous experimentation in mice had utilized fairly heavy worm infections, comparable to approximately 70,000 worms per adult mouse. The purpose of the NIAID study was to determine whether smaller worm burdens would also produce Egyptian splenomegaly in mice. Accordingly, mice were infected with 161, 122, 73, and 28 cercariae of a Puerto Rican strain of S. mansoni. The results revealed that mice can develop this syndrome with as few as one pair of worms reaching the liver. Therefore the development of Egyptian splenomegaly is greatly delayed in these animals, beginning at 20-25 weeks rather than at 10 weeks as occurs in mice with greater worm burdens. These findings, Dr. Warren said, add confirmation to the belief that experiments in this animal model may be of value in understanding of the human disease.
Dr. Willard H. Eyestone Elected President of Veterinary Pathologists

Dr. Willard H. Eyestone, Assistant Chief for Primate and Veterinary Grant Programs of the National Heart Institute, was elected President of the American College of Veterinary Pathologists at the ACVP's Annual Meeting at the University of Chicago, November 25.

The ACVP has a membership of 116. These include veterinary pathologists in private practice, meat inspectors, teachers, research workers, and officers of the Veterinary Corps of the Army and Air Force. The College was established in 1949 to encourage veterinarians to enter and acquire specialized training in the field of veterinary pathology: 1) by establishing standards of training and experience leading to the qualification of specialists in this field, and 2) by suitable certification of such specialists following extensive oral and written examinations.

Performs Vital Role

"By enhancing the teaching, research, and practice of veterinary pathology," Dr. Eyestone commented, "the College is performing a vital role in veterinary medicine and in other biomedical sciences as well."

Dr. Eyestone will serve as President of the ACVP for a term of one year. He was certified by the ACVP Examination Board in 1954 and subsequently served as a counselor on this board. Last year he held the office of Vice-President of this organization.

Dr. Eyestone received his B.S. and D.V.M. degrees from Kansas State College, his M.P.H. from Harvard University, and his Ph.D. (in pathology) from the University of Wisconsin.

Since coming to NIH in 1949 Dr. Eyestone has filled a number of positions and assignments: veterinary pathologist, NCI; Head of the NCI and DRS Comparative Pathology Section; Consultant Pathologist to the National Zoological Park; International Consultant for the Pan American Sanitary Bureau in Ecuador (1952) and Brazil (1955); Chief of the DRS Laboratory Aids Branch; and member of the National Advisory Council for Rhinovirus Monkeys Procurement, and the Primate Research Study Section.

NIH Research, Building Grants for FY 1961 Exceed $311 Million

The annual Public Health Service publication of research and construction grants awarded by NIH during Fiscal Year 1961 has just been published by the Division of Research Grants.

The 469-page booklet, entitled Public Health Service Grants and Awards by the National Institutes of Health, Fiscal Year 1961, lists 13,683 grants totaling $311,930,632 for research and for construction of research facilities.

Approximately 86 percent of the total—$273,941,050—was devoted to the support of 33,343 research projects. These grants were made to 4,007 institutions in the United States and to 271 institutions in 47 other countries.

Grants to help build, equip or expand 142 research facilities totaling $35,989,582 were awarded on a matching basis to 111 institutions. Seven additional research facilities construction grants totaling $8 million were awarded on a non-matching basis by the National Cancer Institute.

The booklet is Part I of PHS Publication No. 883. Part II, covering research fellowships, training grants and workships, will be available shortly.

One indication of Radio Free Europe's effectiveness is the fact that the Communist propaganda machine has attacked the network more than 8,000 times in the last six years.

Negative Charge Indicated

These basic studies, still undereway, strongly suggest that the surface membrane of a normal squid axon has a fixed negative charge, exerting repulsive force upon negatively charged particles and permitting positively charged particles to jump from one negative site to the next.

The existence of such a negative charge in the membrane had been previously suggested by a few investigators but without any supporting experiments. The NIMH investigations provide a consistent theory which explains how excitation progresses in such a membrane.

Dr. D. Tsakir and C. S. Spyropoulos, NIMH, and Dr. T. Teorell, Visiting Scientist, University of Uppsala, Sweden, reported these permeability studies in the American Journal of Physiology.

Dr. Stetten is Speaker at Diabetes Symposium

Dr. DeWitt Stetten, Jr., Associate Director in Charge of Research, National Institute of Arthritis and Metabolic Diseases, is one of the principal speakers at the Annual Symposium of the Clinical Society of the New York Diabetes Association in New York City, December 1.

Speaking on "Certain Aspects of the Metabolism of Insulin," Dr. Stetten recalled that the destruction of insulin in the animal body by the enzymes and presented studies defining the symptoms and the reaction causing its partial destruction in the liver.

The Symposium coincided with the 40th anniversary of the discovery of insulin and the 20th anniversary of the Clinical Society.
Dr. Burton Addresses Gerontology Seminar At Duke University

Dr. Benjamin T. Burton, Special Assistant to the Director, National Institute of Arthritis and Metabolic Diseases, presented a talk on "Human Nutrition and the Aging Process" before the Open Seminar of the Duke University Council on Gerontology at Durham, N. C., recently.

Participants in this Seminar, held jointly with a meeting of the new North Carolina Council on Food and Nutrition, included representatives of the State and County Departments of Health and Welfare, and the State Medical Society.

Outlines Nutrition Status

"The trouble with aging and nutrition is that so many people are engaged in the former and so few know about the latter," Dr. Burton said in his opening remarks in which he outlined the status of nutrition in the elderly population.

Describing some of the present developments in studies on experimental and clinical nutrition, he said, "Experimental evidence has accumulated rapidly in recent years that, in laboratory animals, the feeding, spacing, and rate of ingestion of food—more specifically 'nibbling' vs. 'meal eating'—may produce profound differences in intermediary metabolism and eventual body composition."

In conclusion, Dr. Burton pointed out that the life span and morbidity of contemporary man may possibly not be optimal because of today's dietary habits. He recounted that in the case of laboratory animals favorable adjustments had been possible through qualitative and quantitative changes in diet and eating patterns, adding, "Only future research, involving humans, can show whether this holds true for man as well."

2 Appointments Made To Training Committee

Richard L. Seggel, Executive Officer of NIH, has announced the appointment of two new members to the NIH Administrative Training Committee as replacements for two members whose terms will end December 31.

The new appointees are Robert E. Learmonth, Executive Officer of the National Cancer Institute, and James A. King, Chief of the Division of Research Services. The appointments are for 3-year terms.

The retiring members of the Committee are James E. Davis, Chief of the Supply Management Branch, OD, and Richard H. Han

Blood-brain barrier is nonexistent in regions of brain, NIH reports

The blood-brain barrier which restricts passage of substances into the brain and cerebrospinal fluid does not exist in special regions of the brain, National Institute of Neurological and Communicative Diseases and Stroke, concludes.

Earlier studies by investigators elsewhere had shown that dyes injected intravenously will stain certain special regions of the brain—the neurohypophysis, the adenohypophysis, the area postrema, and the intercolumnar tubercle—but not the rest of the brain. However, these investigators did not determine whether this reaction was due to an affinity between dye and tissue or to an absence of blood-brain barrier.

Reaction Studied

This reaction has now been studied by Dr. Cedric W. M. Wilson, formerly with the Department of Pharmacology and General Therapeutics, University of Liverpool, England; and Dr. Bernard B. Brodie, NIH Laboratory of Chemical Pharmacology, who report their findings in the Journal of Pharmacology and Experimental Therapeutics.

Dr. Wilson and Brodie injected into the veins of cats N-acetyl-4-amino-antipyrine (NAAP) and sulfaguanidine, substances known to mix easily and evenly with the water of tissues without being bound to cellular constituents. They then measured the penetration of these substances into the water spaces of the special brain regions and the rest of the brain.

Concentration High

Shortly after injection, the concentration of the substances was almost as high in the special regions as in the peripheral tissues. It was several hours before the concentration of NAAP or sulfaguanidine in the cerebrospinal fluid or the other regions of the brain approached this level. From these results, it is apparent that these special regions of the brain have little or no barrier to the entrance of these substances.

There are other differences between the special regions and the rest of the brain: the small number of neural cells; a different vascular pattern; and some evidence of a neuroendocrine function.

An X-ray is the simplest way of telling whether you have tuberculosis. Public Health authorities usually recommend a chest X-ray with their regular physical check-up for older persons. A tuberculin test is suggested first for younger people.