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of
Health

Patricia Harris Is New HEW Sec'y



The nomination of Mrs. Harris as Secretary of HEW was confirmed by the Senate on July 27, 1979.

The nomination of Patricia Roberts Harris as HEW Secretary was confirmed by the Senate in almost record time.

Secretary of Housing and Urban Development since Jan. 23, 1977, Mrs. Harris is a former Ambassador to Luxembourg, serving in that diplomatic post from 1965 to 1967.

She served as Alternate Delegate to the 21st-22nd General Assemblies of the United Nations, and was a member of the Commission on Causes and Prevention of Violence and also the Advisory Committee on Reform of Federal Criminal Law.

Mrs. Harris was a partner in a Washington, D.C. law firm and a director of the Chase Manhattan Bank, Scott Paper Company, National Bank of Washington, and IBM. She is a trustee of the 20th Century Fund, and of the American Bar Foundation.

She received her A.B. degree from Howard University, and a juris doctor degree from George Washington University in 1960, and has been elected to the American Academy of Arts and Sciences.

Mrs. Harris was admitted to the D.C. Bar in 1960. She served as a trial attorney in the Department of Justice from 1960 to 1961, and joined the Howard University staff as associate dean of students and lecturer in law, and later became a professor of law and dean of the School of Law.

Geriatric Medicine Academic Award Established

To support the development of programs aimed at improving the quality of education in geriatrics and encouraging research on aging, the National Institute on Aging recently established the Geriatric Medicine Academic Award.

The first of these awards, which seeks to enable doctors to better understand the special health problems and needs of the elderly—have been made to seven medical schools. These are: the University of Massachusetts Medical School, UCLA School of Medicine, University of Virginia School of Medicine, Harvard Medical School, Boston University Medicaid Center, University of Vermont College of Medicine, and University of Oregon Health Sciences Center.

(See GERIATRIC, Page 7)

Dr. Pickett Becomes NICHD Deputy Director

Dr. Betty H. Pickett has been named deputy director of the National Institute of Child Health and Human Development, the first woman to hold the post of an Institute deputy director at NIH.

Dr. Pickett, whose research interests have focused on experimental psychology and research administration, comes to the NICHD from the National Institute on Aging, where she served as NIA's first associate director for Extramural and Collaborative Research.

Prior to joining NIA, Dr. Pickett held several positions in extramural research at the NIMH. These posts include executive secretary of the Research Career Program and chief of the Cognition and Learning Section, Division of Extramural Research Programs. Later, Dr.

(See DR. PICKETT, Page 9)

Drs. Wachslicht-Rodbard, Roth Win Award for Assay Method

Drs. Helena Wachslicht-Rodbard and Jesse Roth, National Institute of Arthritis, Metabolism, and Digestive Diseases, are the 1979 recipients of the third annual Berson-Yalow Award for the development of new assay methodology. The award was conferred by the Society of Nuclear Medicine at its recent annual meeting in Atlanta.

The investigators were cited for developing a method to study whole body insulin receptors in man. The new approach to the measurement of insulin binding to its receptors permits study of tissues in the intact organism; previously, insulin binding could be observed only in isolated samples such as fat cells or fibroblasts.

NCI Scientists Collaborate

The procedure, developed in collaboration with Drs. Mones Berman and Elizabeth McGuire of the National Cancer Institute, makes it possible to measure the total number of insulin receptors in the body by depicting exactly how much insulin is bound to target cells.

Pairs of closely related insulins—one with high and the other with low affinity for receptors—were labeled radioactively and injected simultaneously into the body. Because of its



Dr. Wachslicht-Rodbard Dr. Roth

binding to cell receptors, the level of the high-affinity insulin in the bloodstream fell more rapidly after injection than that of the insulin that reacted poorly with receptors. By comparing the two levels, estimates of whole body receptors were made.

Results with this technique correlated closely with estimates made by extrapolation from test tube studies.

The new procedure holds promise for two principal applications: it will facilitate the study of diabetes and other disorders of glucose metabolism, and it will expand

(See ASSAY AWARD, Page 10)

The NIH Record

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NIH Record Office
Bldg. 31, Room 2B-03, Phone 496-2125

Editor
Frances W. Davis

Staff Writers
William B. Reinckens
Susan Johnson

Staff Correspondents
ADA, Judy Fouche; CC, Susan Gerhold; DCRT, Mary Hodges; DRG, Sue Meadows; DRR, Barbara Menick; DRS, Arthur F. Moore; FIC, Toby P. Levin; NCI, Dr. Robert M. Hadsell; NEI, Marsha Corbett; NHLBI, Bill Sanders; NIA, Ann Diefenbach; NIAID, Jeanne Winnick; NIAMDD, Diane Naedel; NICHD, Tina McIntosh; NIDR, Sally Wilberding; NIEHS, Hugh J. Lee; NIGMS, Wanda Wardell; NIMH, Betty Zubovic; NINCDS, Doris Parker; NLM, Roger L. Gilkeson.

Telephone Tapes On Personnel Topics

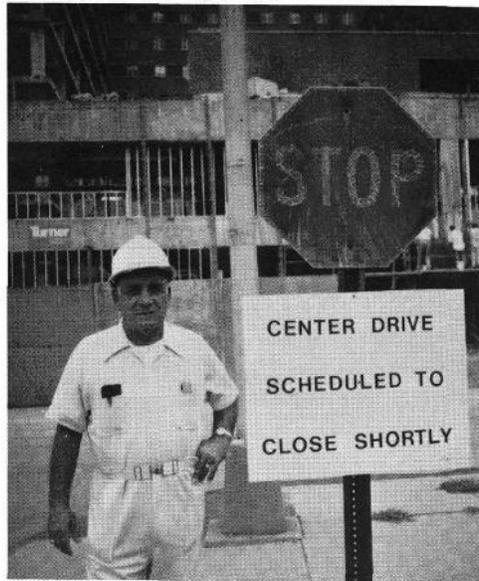
To hear recorded telephone tapes on personnel topics, call 496-4608 on the dates indicated:

Topic	Date
Health and Life Insurance Benefits When You Leave Federal Government	Aug. 6-10
Looking and Applying for Another Government Job	Aug. 13-17
Preparing an Effective 171	Aug. 20-24
Interviewing for a Job	Aug. 27-31



On June 8, members of the NIH Toastmasters International Club elected their officers for this year. They are (l to r): Shirley Dibble, sergeant-at-arms; Nancy Sherry, treasurer; Ellen Chu, secretary; Dr. Hideo Kon, educational vice president; Ivadale Ford, president; and Joanne Ward, administrative vice president. All NIH employees are eligible to join this group, which is dedicated to helping people improve their public speaking. The Toastmasters meet every Friday at noon in Bldg. 31, Rm. B2C-05.

Center Drive To Be Closed; Detours Planned



Sam Lapolla, HEW project officer, stands beside the sign warning that Center Drive will be closed soon.

Beginning in late August or early September, Center Drive north of the Ambulatory Care Research Facility will be closed to automobile traffic, with detours scheduled until the end of 1979. The first anticipated detour is the closing of Center Drive between Memorial Road and West Drive. For a limited time this road will also be closed to pedestrians.

Rerouting Necessary

The rerouting is necessary so that the Center Drive roadway can accommodate the design of the new facility, which is expected to open early in 1982.

Workmen have already cleared the hilly area opposite the construction site and some lawn in front of Bldg. 20 for a new sidewalk.

Roadway construction plans call for the building of a retaining wall along part of Center Drive. Later, say construction officials, the roadway along West and Convent Drives will be reconstructed, but the scheduling is arranged so that this section will be closed after the first portion is completed.

Summer Blood Drive Program Begins

The Clinical Center Blood Bank and the Montgomery County Chapter of the American Red Cross will hold a joint summer blood drive at the Federal Building, at 7550 Wisconsin Ave., Bethesda, on Aug. 9, in Conf. Rm. 6C-01, 9:30 a.m. to 3:30 p.m.

Traditionally the combination of summer-time and vacation schedules leaves the Blood Bank with a shortage of blood, so help replenish the supply by calling today for an appointment—496-1048.

Revised Directory Of MBS Programs Released

The 1979 revised directory of research study projects currently under way in Minority Biomedical Support Program has been published and is now available.

Titled *Minority Biomedical Support Program, A Research Resources Directory*, the booklet contains 67 pages and serves as a ready reference on the research activities and participants in the Division of Research Resources-supported program.

A single free copy of the directory may be secured by writing to the Research Resources Information Center, 1776 East Jefferson St., Rockville, Md. 20852, or by request from the Office of Science and Health Reports, DRR, Bethesda, Md. 20205.

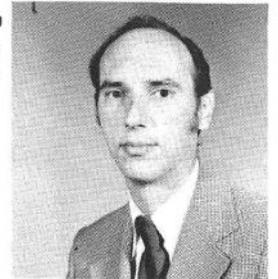
Dr. Slater Joins DRG Grants Associates Program

Dr. Martin L. Slater, an NIH staff fellow, has joined the Grants Associates Program for a year of training in health science administration.

He received his B.S. degree from the University of Pittsburgh, his M.S. from Miami University in Ohio, and his Ph.D. in 1970 from the University of Hawaii.

The next 3 years, he held an NIH Postdoctoral Fellowship at Tufts University School of Medicine.

Dr. Slater was a research associate with Worcester Foundation for Experimental Biology until 1975, when he joined NIH as a staff fellow in the Laboratory of Biochemistry, National Institute of Arthritis, Metabolism, and Digestive Diseases.



Dr. Slater

Martin Darby's Money-Saving Suggestion Earns Letter From President

Martin L. Darby became the ninth NIH employee—the sixth from the Division of Engineering Services—to be honored under the Presidential Recognition Program since its inception in 1977.

Mr. Darby, planner-estimator, received personal congratulations in a signed letter of commendation from President Carter for his proposal that numbers be painted on the pavement for reserved parking spaces.

Prior to Mr. Darby's suggestion, such reserved parking spaces were identified by vertical stanchions bearing signs designating by color and number the type of reserved parking allowed in given areas. As a result of his suggestion, the conversion saved NIH about \$28,000.

The Presidential Recognition Program cites Federal employees whose ideas save the Government \$5,000 or more or represent a major contribution to the Nation's energy conservation effort.

NIH employees who would like to submit a suggestion should fill out a Suggestion Blank, Form HEW-170. These forms may be obtained and returned to the B//D suggestion coordinator listed in Item #44 of the yellow pages of the *NIH Telephone and Service Directory*.



NIH Deputy Director Dr. Thomas E. Malone (r) presents the President's letter of commendation to Mr. Darby for his suggestion, and offers his own congratulations.

Directory of Pathology Training Programs Now Available

The 1980-81 edition of the *Directory of Pathology Training Programs*, published June 25 by the Intersociety Committee on Pathology Information, is now available for guidance of prospective pathology residents.

The new edition provides useful information about the methods, facilities, stipends, and faculties of programs at 224 U.S. and Canadian hospitals, including those of 102 medical schools.

The editorial office of the *Directory* is at Suite 735, 4733 Bethesda Ave., Bethesda, Md. 20014.

Mary Brew, CC Spiritual Ministry Department, Retires

Mary Brew, secretary for the Clinical Center Spiritual Ministry Department, retired this summer. She began her NIH career in 1964 working as a part-time employee in the Administrative Office and then in the CC Admissions Section.

In 1972, Mrs. Brew became secretary to the ministers, priests, and rabbis responsible for the spiritual guidance and counseling provided for CC patients and their families.

Mrs. Brew also worked for the government several years in Washington, D.C., and took time off to raise her five sons. Her retirement

plans include a trip to Ireland with her husband in mid-August and a month-long vacation in Florida this winter. She also plans to be an active grandmother to her three grandchildren and to continue her volunteer work.

Chaplain Leroy Kerney, chief, Spiritual Ministry Department, reflected on his employee's recent retirement and said, "She was an excellent secretary and did all her clerical duties beautifully. She always received visitors warmly and in a gentle way, but we used to kid her about her mild Irish temper."



Mrs. Brew poses with the Spiritual Ministry Department staff during a retirement party for Rabbi Maurice Kleinberg (second from left). With Mrs. Brew (l to r) are: Father Eugene Linehan, Rabbi Kleinberg, Chaplain Leroy Kerney, Chaplain Robert White, and Chaplain William Payne.

Nat'l Toxicology Program Holding Open Meeting On First Annual Plan

The National Toxicology Program is holding an open meeting at the main auditorium of the HEW North Bldg. on Friday, Aug. 10, scheduled to begin at 10 a.m.

The program's goal is to strengthen the Department's activities in the testing of chemicals of public health concern as well as in development of new and better integrated test methods.

Dr. David P. Rall, NIEHS Director and Director of the NTP, has announced availability of the program's first annual plan. The meeting is designed to present the plan, receive comments and questions, discuss future directions, and receive recommendations for compounds to be tested.

The annual plan consists of a description of the program's current-year efforts and resources and a review of current HEW research related to toxicology.

Four components within HEW dedicate resources to the program: the National Cancer Institute and the National Institute of Environmental Health Sciences, NIH; the National Institute for Occupational Safety and Health, Center for Disease Control; and the National Center for Toxicological Research, Food and Drug Administration.

At the open meeting, key NTP agency staff will receive comments and questions from the public from 11 a.m. to noon and from 1 to 5 p.m., unless comments have been received earlier. In addition, written comments on the annual plan are welcome and will be considered through Aug. 17.

Written comments should be addressed to: Dr. David P. Rall, Director, National Toxicology Program, P.O. Box 12233, Research Triangle Park, N.C. 27709.

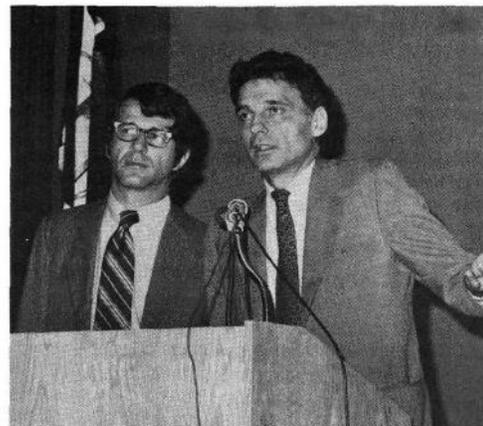
Persons planning to attend the open meeting on Aug. 10 should give advance notice to: Leslie Gardner, NTP, P.O. Box 12233, Research Triangle Park, N.C. 27709, (919) 541-3267 or FTS 629-3267.

FIC RESEARCH FELLOW

Dr. Masato Kasuga, a Fellow from the department of internal medicine, University of Tokyo, arrived July 9 to begin an international research fellowship with the Fogarty International Center in the Diabetes Branch, NIAMDD.

Training under the preceptorship of Dr. C. Ronald Kahn, Dr. Kasuga's research is on the insulin receptor and insulin action.

"WHY WAIT FOR THE CATASTROPHE?" was the theme solar energy advocate Ralph Nader and his associate, Dr. Sidney Wolfe, presented to an overflow audience of public health experts and scientists at the Masur Auditorium on July 19, when they spoke on the alternatives to nuclear energy. Both men came to NIH at the request of the Solar Transition Committee, an employee group which seeks to protect the public from radiation damage by working for a national policy of promoting solar and renewable energy production, and for the phasing out of nuclear energy. After a question-and-answer period, Mr. Nader and Dr. Wolfe encouraged the audience to become involved in the questions surrounding nuclear energy. Advocate Nader (right) makes a point while sharing the podium with Dr. Wolfe during a question-and-answer session. Mr. Nader (bottom left) joins some members of the NIH Solar Transition Committee and listens to Dr. Wolfe's speech on the health hazards of nuclear energy. Mr. Nader and four other passengers squeezed into a VW Rabbit after addressing an overflow crowd at the Clinical Center. Prior to leaving, Mr. Nader put on his seatbelt.—Photos by Gary Best.



Genetic Engineering Used To Synthesize Hormone Needed for Human Growth

Using genetic engineering techniques, scientists at the University of California in San Francisco have taken a major step toward the mass production of human growth hormone (HGH), also called somatotropin.

National Institute of Arthritis, Metabolism, and Digestive Diseases grantees Drs. John Baxter and Howard Goodman and their associates recently induced bacteria to synthesize the hormone, which is needed by humans to achieve normal height.

One of the first practical spin-offs of recombinant DNA research, the procedure could potentially deliver ample supplies of HGH for treatment of pituitary dwarfism, a disorder resulting from HGH deficiency, and for basic research.

A similar synthesis was recently reported by Genentech, Inc., a private biochemical firm in Palo Alto, Calif.

To synthesize the hormone, the investigators attached the gene for production of HGH to bacterial plasmids, which are messenger rings of DNA inside bacteria. The plasmids, now loaded with new biochemical instructions, were then inserted into strains of the common laboratory bacterium, *Escherichia coli*. These bacteria, acting as living "factories," began to manufacture HGH.

While radioimmunoassay has assured the synthetic hormone's authenticity, its bioactivity—the ability to function in the body identically to the natural growth hormone—has yet to be verified. This information is essential; any deviation from the natural hor-

none could render the synthetic HGH ineffective or capable of causing undesirable side effects.

If the synthetic HGH does demonstrate bioactivity, it may become available commercially in the not too distant future.

Currently, the only source of HGH is pituitary glands from human cadavers. Since at least 120 pituitaries per year are required to treat each victim of pituitary dwarfism, supplies of HGH are limited.

In previous research, Drs. Baxter and Goodman successfully manufactured rat growth hormone using recombinant DNA techniques. This achievement demonstrated that alterations in the message-coding plasmid and its subsequent implantation into bacteria could eventually produce numerous proteins needed to correct a variety of human diseases.

In addition to human growth hormone, other likely targets for future genetic engineering include thyroid hormone, hormones that stimulate red cell production and nerve growth, and enzymes for industrial use.

Decorative Plants Can Be Poisonous

Poisonings from plants have increased dramatically with the rise in popularity of house plants. Some poisonous plants found in homes are philodendron, dieffenbachia, African violet, and begonia.

If you have small children, keep these plants out of reach.

USDA Fall Class Schedule Lists Courses Open to All

The Graduate School, U.S. Department of Agriculture's schedule of 1979 *Fall Quarter Courses* is now available.

The schedule lists hundreds of inexpensive job-related and leisure courses.

Day, evening, and correspondence courses cover such subjects as accounting, management, secretarial skills, computer sciences, writing skills, graphic arts, paralegalism, journalism, photography, and others.

Included in the schedule of classes is a mail registration form. Mail-in registration is being held through Sept. 1. In-person registration will be held at the Department of Agriculture Sept. 19-22.

Details are given in the schedule. For a copy, call 447-4419.

Willie L. Ensor Dies, With NIH 14 Years

Willie Luther Ensor, Jr., died July 16 after a brief illness.

Mr. Ensor had been with NIH for 14 years, 5 with the Supply Management Branch, Division of Administrative Services, as a warehouseman, and 9 years with the National Heart, Lung, and Blood Institute as a laboratory worker and general supply assistant.

At the time of his death, he worked in the Laboratory of Biochemical Genetics, Division of Intramural Research, NHLBI, in which Dr. Marshall Nirenberg serves as chief.

Molecular Graphics Allows Scientists To Examine 'Flesh' of Proteins, Other Molecules

Tucked away in the basement of Bldg. 12A at NIH is a unique computer graphics system that attracts scientists from all over the world.

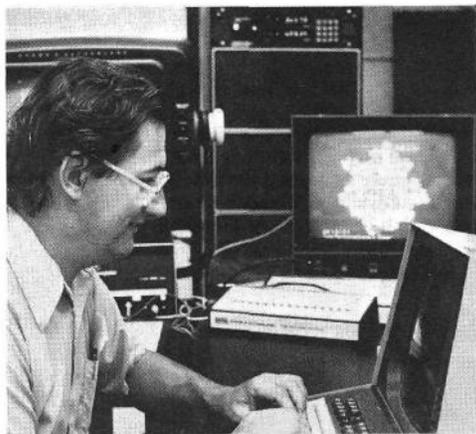
They come because the system, known as molecular graphics, allows them to examine the contours and surfaces—the "flesh"—of biological molecules such as proteins and nucleic acids.

It does this by producing on a display screen (a TV-like cathode-ray tube) a picture of the molecule which shows its external surfaces, the atoms that other molecules "see." Color is used to differentiate and highlight parts of the molecule. The resulting picture resembles a cluster of beautifully colored balls.

The picture produced on the display is versatile. It can be turned around, enlarged, or made smaller, thus enabling the scientist to view the molecule from any angle, in its entirety, or in detail.

Developed at DCRT

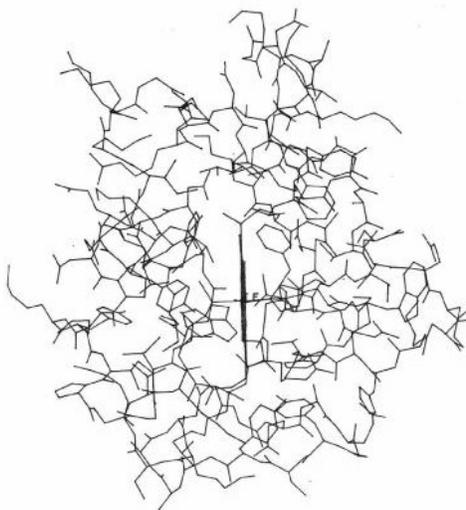
Once the atomic coordinates of a molecule and instructions for coloring it are given to the computer, it takes 20 to 60 seconds to produce a picture, said Richard Feldmann, the computer specialist in the Division of Computer Research and Technology who together with former colleague Thomas Porter developed the molecular graphics system. Mr. Feldmann attributed the speed of the system to a program developed by Mr. Porter at DCRT for making spheres quickly, "hundreds, thousands of times faster than anyone else has been able to do it."



Mr. Feldmann uses computer graphics to produce a space-filling picture of a biological molecule.

Before the system was developed 1½ years ago, the best models of proteins available to scientists were three-dimensional line drawings produced by an earlier, complementary computer system and wire models constructed by hand. Space-filling models showing the surfaces of molecules were impractical, because of the expense, difficulty, and amount of time involved in building them.

The line drawings and wire models showed only lines connecting the centers of atoms, or the skeleton of a protein, explained Mr. Feldmann.



"But proteins are like people; they're flesh and bones," he said. "It's really the surfaces of the protein that count, because it's through them that the protein interacts with its environment. The skeleton gives you some understanding of the protein, but it doesn't really tell you how it functions in biological systems."

The DCRT system for drawing space-filling pictures of molecules is one of very few in existence. When first developed, it was used solely by NIH scientists. "But, if you build a better mousetrap the whole world will beat a path to your door, and we have a giant path of crystallographers, pharmacists, and biochemists that comes beating its way to our door from all over the world," said Mr. Feldmann.

They usually go away with an altered insight on the molecules they're studying, he added.

Areas Highlighted

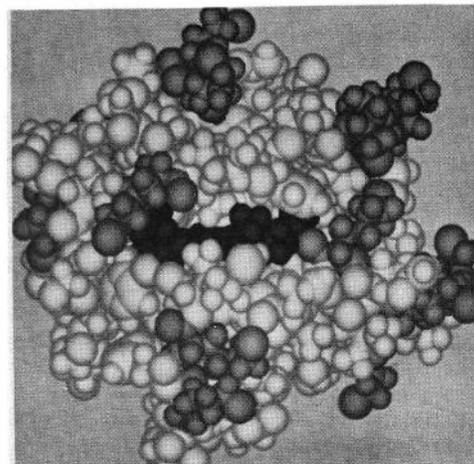
The space-filling pictures produced by the molecular graphics system often bring out something in a molecular structure which otherwise is not readily seen.

For example, said Mr. Feldmann, insulin can be colored to differentiate between the receptor-binding region of the molecule and the site within this region responsible for negative cooperativity.

"Negative cooperativity" means that the binding of insulin to its receptor sites reduces the affinity of the other receptor sites for the hormone. In a sense, then, the binding region and the negative cooperativity site within it compete against each other.

"Dr. De Meyts, in the National Institute of Arthritis, Metabolism, and Digestive Diseases, spent years trying to convince people that this actually happens with respect to insulin," said Mr. Feldmann, and molecular graphics illustrates what Dr. De Meyts was saying.

The crystallographers in the Molecular Structure Section, Laboratory of Molecular Biology, NIAMDD, frequently use molecular



A ferricytochrome C molecule is depicted in a line drawing (l) and as a space-filling image (above).

graphics in their research on the structures of biological molecules.

They use the line-drawing system to determine molecular structures, and the space-filling system to present the results of their work.

"One of the major points in studying proteins is to find out how they work so well, and the answer is in the geometry," explained Dr. Richard Bott, a crystallographer in LMB. "So finding ways of looking at our results is very important."

With biological molecules such as proteins, which contain thousands of atoms, it is difficult to demonstrate what is what within the molecule, he said. "You can do this quite clearly with molecular graphics," by using color to highlight various parts of the molecule.

Movies, photographs, and slides of the space-filling images produced by molecular graphics have great educational impact, said the crystallographers. They enable scientists to communicate their findings to colleagues, students, and the public.

Usage Expanded

Initially, molecular graphics was used only to produce images of molecules whose structures had been determined. Usage of the system has been expanded, said Mr. Feldmann, to include construction of semi-empirical molecular models.

By starting with known three-dimensional atomic coordinates of one molecular structure such as porcine insulin and changing small portions of it, the researcher can use molecular graphics to produce a model of human insulin, he explained.

"Biochemists need a basic understanding of what human insulin looks like," he said, "and it would take a few years to determine its three-dimensional structure." The semi-empirical model gives them something to work with in the meantime, said Mr. Feldmann.

CLINFO, Special Computer Data System, Expands Its Uses for Clinical Human Patient Studies

Story and photos by Jerry Gordon

Seven years of intensive effort by the Division of Research Resources to perfect a simple and accessible data information computer system for use of NIH-supported clinical researchers has resulted in the successful development of the CLINFO™ system. The NIH planners now intend to allow commercial distribution for the clinical research community.

Currently operating on an experimental basis at three locations in General Clinical Research Centers, the CLINFO prototype system is now becoming heavily used in clinical human patient studies ranging from organ transplantation to drug abuse. Consisting of a minicomputer with four to six individual terminals which include a video display and a hard copy device, the CLINFO prototype systems are at Vanderbilt University, Baylor College of Medicine, and the University of Washington.

In 1972 DRR recognized the need for special computer instrumentation designed specifically for clinical researchers to expedite data management and analysis function in their projects. The CLINFO project was initiated with joint participation of the Division's Biotechnology Resources and General Clinical Research Centers Program Branches.

Working with engineers at the Rand Corporation, three early prototypes were produced and put into operation. The system, implemented as a collection of approximately 110 modules written in the BASIC programming language, runs on a Data General Eclipse S/200 computer.

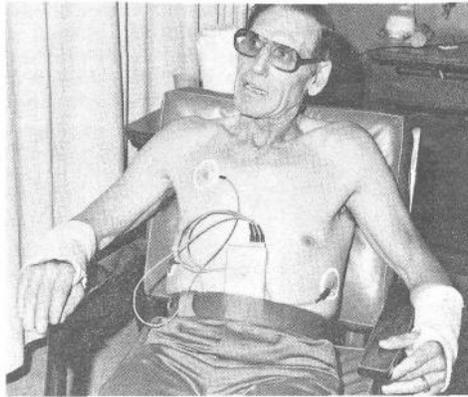
Basically, CLINFO allows the researcher to acquire the ability to use the system with very little experience or training. Designed as a "friendly system," it enables scientists to perform the functions of data description, entry, retrieval, and analysis with minimal reliance on computer-trained personnel.

Use of System Expands

A close look at the CLINFO development at one experimental location, the General Clinical Research Center at Vanderbilt University School of Medicine, shows an ever-expanding use of the clinical research data system. The researchers there are convinced that CLINFO has arrived. CLINFO has given them a method of their very own which eliminates the drudgery of compiling patient data by handwritten notes.

Heavy users of the CLINFO system at Vanderbilt are NIH-supported investigators conducting studies for the National Heart, Lung, and Blood Institute; the National Institute of General Medical Sciences; the National Institute of Arthritis, Metabolism, and Digestive Diseases; the National Institute of Neurological and Communicative Disorders and Stroke; and DRR.

"In the past year, we have had about 130 investigations on CLINFO, which represents a 30 percent increase over the previous year,"



A typical use of CLINFO at the Vanderbilt General Clinical Research Center—Wiley Stone, truckdriver for a Nashville wholesale food firm, suffered broken wrists when his truck turned over. An irregular heartbeat was detected, and he was moved to the Cardiology Unit for observation. The patient is mobile and can move around at will while his heart function is recorded.

said Dr. Thomas R. Harris, director of the Division of Biomedical Engineering Services. "Currently, we are holding about 40 additional GCRC study requests for CLINFO time which we can't accommodate as yet. We estimate that over a 4-week period, the system is actually being used 7 days a week for about 8 hours each day."

An M.D. and investigator, Dr. Harris is personally involved in two major research studies in blood tissue exchange in the heart and lungs. "You can do all sorts of things with CLINFO," he said. "For instance, you can monitor your progress, can get intermediate results, can find out where you are, determining what to do next, and can keep entering data as you go along."

Major Research Areas Noted

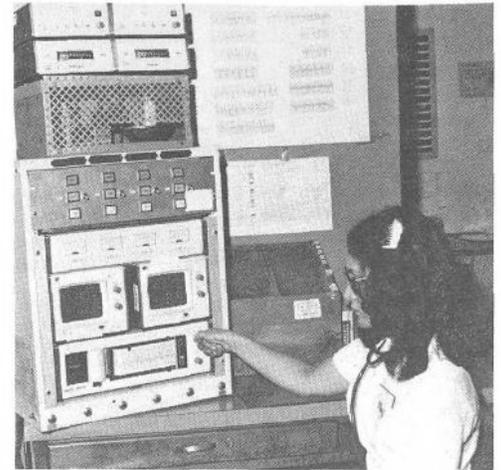
The major areas of research include gastroenterology, clinical pharmacology, pediatrics, physiology, pulmonary studies, cardiology, endocrinology and metabolism, and pathology.

The availability of CLINFO at Vanderbilt was of particular interest to Dr. Oscar B. Crofford, professor of medicine, who was in the process of setting up a Diabetes Research and Training Center, funded by NIAMDD.

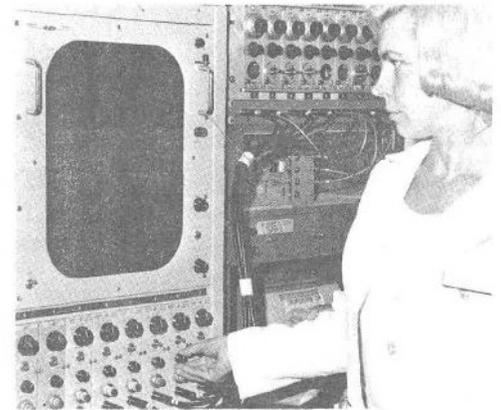
Because of the anticipated new center, Dr. Crofford and his associates, Dr. Alan Graber, set up a project at the GCRC to develop better methods for evaluating metabolic control achieved by patients (both children and adult diabetics) over a long period of time in their home environment.

"Most doctors taking care of diabetic patients at home really have very poor measures as to what level of metabolic control they are actually maintaining day in and day out. . . . There's little information available as to the way an individual's kidneys handle glucose," Dr. Crofford said.

"So about 3 years ago, we brought about a dozen patients into the GCRC as



EKG monitoring equipment is located at the nurses' station of the GCRC. Nurse Anne Mooneyhan monitors for safety of patient. If the heartbeat becomes abnormal, the nurse can detect it immediately.



Nurse Rebecca Wilson can also monitor the heartbeat signal in the Cardiology Unit. The EKG analysis equipment receives the signal and enters the data. Results of the analysis are transferred to tape, which is loaded into the CLINFO system.



The analysis of Wiley Stone's heartbeat is now available for clinical investigation, so Dr. William Lacy, program director of Vanderbilt's GCRC (r) and Dr. William R. Baker, NIH CLINFO project co-administrator, discuss the analysis at the terminal.

inpatients and then calibrated their kidneys. Thus, we established a working relationship between blood sugar and urine sugar. Then was sent them home and had them collect

24-hour urine specimens twice a week.

"They put the specimens into little mailing tubes, and mailed them to us. We analyze them and use CLINFO on the basis of previous information that had been stored in the computer to translate the 24-hour urine glucose content into an estimate of what the patient's blood sugar was at home. Thus, we are processing a large volume of information collected repetitively on the same patient day after day."

Other Uses Described

Another very valuable use of CLINFO is in the display of this data, Dr. Crofford noted. The bulk of the data collected and hand-written on paper by his staff in 18 months on one patient stacked up to over 4 inches high. By entering the data into CLINFO, it is possible to calibrate each patient and come out with one or two readouts, graphing the data with time on a logarithmic scale. This condenses all of the patient history on one or two pieces of paper.

"We also plot weight on a 'log days ago' scale," he said. "Then we can see fluctuations, perhaps 5 or 10 pounds. We can see if this has been a pattern for the past 10 or 15 years or whether it represents a persistent trend in that patient."

Dr. Crofford feels that the ability of CLINFO to handle massive amounts of data repetitively on individual patients will be a boon to the entire clinical research community. He sees the future utility of CLINFO in following patients with chronic diseases for a long-time "to only be able to easily process, analyze and store the data, but to reduce it, summarize it, and display it in a way which makes it far more useful than ever before."

In August 1977, NIH evaluated the project and approved the plan for commercial diffusion of 30 additional systems at GCRC's throughout the country. The plan is now in process of implementation with CLINFO installations contemplated this year at Duke University and Johns Hopkins University GCRC's.

Salvador B. Waller Named Deputy Director Of NIH Library

Salvador B. Waller has been named deputy director of the NIH Library, Division of Research Services.

Mr. Waller comes to the Library from the Parklawn Health Library, Office of the Assistant Secretary for Health, where he was also deputy director.

Duties Noted

In this position he will assume the administrative responsibility of technical operators of the Library through the section chiefs and the administrative officer.

Mr. Waller received his master's degree in library science from Catholic University. He has experience in the technical, reference, and administrative aspects of health science libraries. He has studied management extensively and has authored several articles, the latest of which is *Libraries, Managers, and People*.

An active member of the Medical Library Association on the national and regional levels, Mr. Waller is currently the association's representative with the Federal Library Committee. He is the co-author of the association's continuing education syllabus entitled the *Literature of Health Administration*, a course he teaches in various states for the association.

Mr. Waller is also secretary of the regional advisory council of the mid-Atlantic region, Regional Medical Library Network. He is active in the training of paraprofessionals, professional information specialists, and, for the past 2 years, has been program chairman for the East Coast Conference for Library Media Technical Assistants.

GERIATRIC

(Continued from Page 1)

According to NIA Director Dr. Robert N. Butler, "We have some 330,000 practicing physicians in this country, many of whom are not equipped to meet the needs of today's 23 million old people—a situation which is likely to grow worse as the number of older people increases by almost 50 percent in the next three decades."

Curricula Will Be Developed

The award will allow for the development of undergraduate medical school curricula and continuing medical education courses in geriatrics, basic and clinical research opportunities in gerontology, and geriatric residence and postresidency training. Recipients will meet annually to exchange ideas, methods, and program evaluations.

A semitechnical booklet describing special health problems of the elderly, *Observations in Geriatric Medicine*, is available by writing NIA/OBS, 8630 Fenton Street, Suite 508, Silver Spring, Md. 20910.

Symposium To Consider Potential Human Hazards

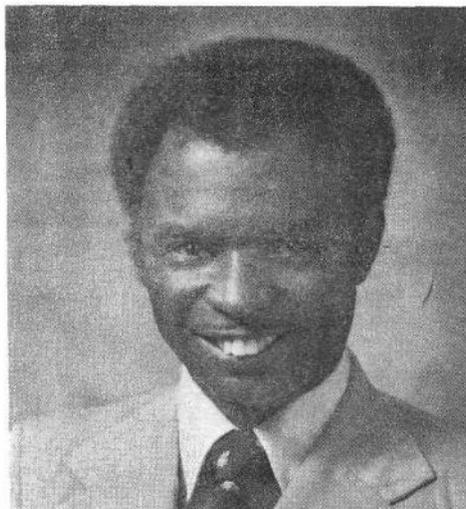
The emerging field of Environmental Health Chemistry will be highlighted at a 2½-day symposium on Sept. 10-12 in Washington, D.C.

The symposium, sponsored by the National Institute of Environmental Health Sciences and the Environmental Chemistry Division of the American Chemistry Society, will be part of the 178th national ACS meeting Sept. 9-14.

Thirty papers will highlight the subject, *Environmental Health Chemistry: The Chemistry of Environmental Agents as Potential Human Hazards*.

Dr. James D. McKinney, chief of the NIEHS Environmental Chemistry Branch, organized the symposium.

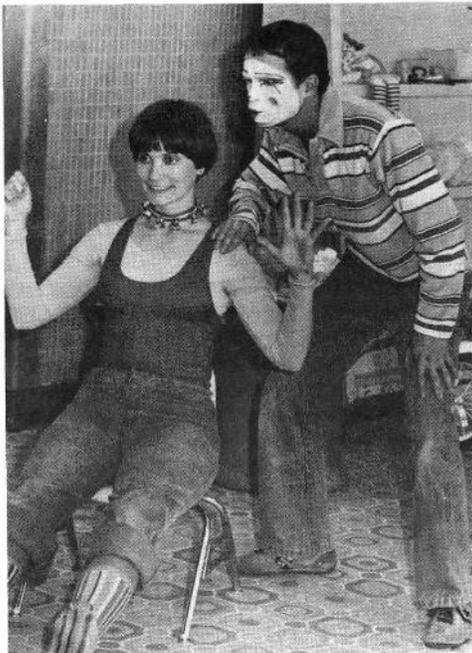
Further information can be obtained from Dr. McKinney, NIEHS, P.O. Box 12233, Research Triangle Park, N.C. 27709.



Mr. Waller is a writer and educator.



A typical CLINFO terminal consists of a video display unit and a hard copy device, designed to allow investigators and support staff to perform the functions of data description, entry, retrieval, and analysis with a minimum of prior computer training. Dr. William DeCesare, director of DRR's General Clinical Research Centers Program, checks information on a GCRC clinical trial in the Study Data File contained in one of the CLINFO minicomputer centers.



Clinical Center patient Monica Anderson was the guest of honor recently when the Wonder Company Mime Show volunteered their services to entertain her and a nursery school class in the 14th floor playroom. The entertainers read of Monica's rare crippling disease in a recent newspaper story and asked to present their show to her and the class which Monica's mother teaches.

Arthur McKay Retires; Helped NIH in Preparing Plans for Emergencies

Arthur G. McKay, Emergency Preparedness Planning officer for NIH, recently retired after nearly 42 years of Government service.

Mr. McKay, an Air Force veteran of World War II, left military service with the rank of colonel.

Established Traffic Plan

He came to NIH in 1963 from the government of the District of Columbia, where he was an official in the Metropolitan Police Department. He began his NIH career in the Protection and Security Management Branch as a detective. Later, he was assigned as chief



Mr. McKay will remain in the NIH area, where his time will be spent doing voluntary Civil Defense work and taking a more active part in the NIH Amateur Radio Club.

of the Parking and Traffic Control Section, PSMB, where he planned and established the traffic enforcement plan now in operation at NIH.

VISITING SCIENTIST PROGRAM PARTICIPANTS

7/1—**Dr. Koji Nakayama**, Japan, Laboratory of Molecular Genetics. Sponsor: Dr. Akio Sugino, NIEHS, Research Triangle Park, N.C.

7/1—**Dr. Amos Panet**, Israel, Laboratory of Experimental Pathology. Sponsor: Dr. Robert Friedman, NIAMDD, Bg. 4, Rm. 310.

7/1—**Dr. Usharanjan Ray**, India, Laboratory of Oral Medicine. Sponsor: Dr. Abner Notkins, NIDR, Bg. 30, Rm. 121.

7/1—**Dr. Giovanni Rossi**, Italy, Pulmonary Branch. Sponsor: Dr. Ronald Crystal, NHLBI, Bg. 10, Rm. 6D06.

7/1—**Dr. Susan Harlap**, United Kingdom, Contraceptive Evaluation Branch. Sponsor: Dr. Heinz Berendes, NICHD, Landow Bg., Rm. A716.

7/1—**Dr. Laura Saiani**, Italy, Laboratory of Preclinical Pharmacology. Sponsor: Dr. E. Costa, NIMH, WAW Bg., St. Elizabeths.

7/1—**Dr. Daniel N. Sauder**, Canada, Dermatology Branch. Sponsor: Dr. Stephen Katz, NCI, Bg. 10, Rm. 12N250.

7/1—**Dr. Hirofumi Takagi**, Japan, Biometry Branch. Sponsor: Dr. David Hoel, NIEHS, Research Triangle Park, N.C.

7/1—**Dr. Mohammad A. Talaizadeh**, Iran, Pediatric Oncology Branch. Sponsor: Dr. Daniel Glaubiger, NCI, Bg. 10, Rm. 3B04.

7/1—**Dr. Toshikatsu Yokota**, Japan, Neurobiology and Anesthesiology Branch. Sponsor: Dr. Ronald Dubner, NIDR, Bg. 30, Rm. B18.

7/1—**Dr. Kunito Yoshiike**, Japan, Laboratory of Viral Diseases. Sponsor: Dr. Kenneth Takemoto, NIAID, Bg. 5, Rm. B126.

7/3—**Dr. Mohammed Abdelmoumene**, Algeria, Neurobiology and Anesthesiology Branch. Sponsor: Dr. Ronald Dubner, NIDR, Bg. 30, Rm. B18.

7/9—**Dr. Annette Maluish**, Australia, Laboratory of Immunodiagnosis. Sponsor: Dr. James L. McCoy, NCI, Bg. 10, Rm. 8B07.

7/9—**Dr. Masahiko Negishi**, Japan, Developmental Pharmacology Branch. Sponsor: Dr. Daniel Nebert, NICHD, Bg. 10, Rm. 13N234.

7/11—**Dr. Johan Breed**, Netherlands, Clinical Pharmacology Section. Sponsor: Dr. Charles Myers, NCI, Bg. 10, Rm. 6N104.

7/11—**Dr. Hari G. Garg**, India, Laboratory of Biochemistry. Sponsor: Dr. Vincent Hascall, NIDR, Bg. 30, Rm. 111.

7/11—**Dr. Yoko Nakaya**, Japan, Molecular Disease Branch. Sponsor: Dr. Bryan Brewer, Jr., NHLBI, Bg. 10, Rm. 7N117.

7/13—**Dr. Patricio Mujica**, Chile, Surgical Neurology Branch. Sponsor: Dr. P. L. Kornblith, NINCDS, Bg. 10A, Rm. 3E68.

7/17—**Dr. Yiannakis Ioannou**, Cyprus, Laboratory of Pharmacokinetics. Sponsor: Dr. Marshall Anderson, NIEHS, Research Triangle Park, N.C.

7/17—**Dr. Dulce Veloso**, Portugal, Laboratory of Chemical Biology. Sponsor: Dr. Hiroshi Taniuchi, NIAMDD, Bg. 10, Rm. 9N308.

7/19—**Dr. Maurezio Solca**, Italy, Laboratory of Technical Development. Sponsor: Dr. Theodor Kolobow, NHLBI, Bg. 10, Rm. 5D15.

7/23—**Dr. Ephraim Yavin**, Israel, Laboratory of Biochemical Pharmacology. Sponsor: Dr. Leonard Kohn, NIAMDD, Bg. 4, Rm. B1-31.

From this position he assumed the dual role of assistant chief of the Protection and Security Management Branch and chief of the Security Evaluation Section.

In 1976, Mr. McKay became the Emergency Preparedness Planning officer for NIH.

During his 15½ years at NIH, Mr. McKay received several awards, commendations, and letters of appreciation. The two he values most highly are the 1977 award as Outstanding Supervisor of Stay-in-School Employees and one from President Ford for courtesies extended the President during a visit to NIH.

DR. PICKETT

(Continued from Page 1)

Pickett became deputy director of that Division and then director of the Division of Special Mental Health Programs. From 1976 until her NIA appointment, she directed the Division of Extramural Research Programs.

She came to NIH in 1957 as executive secretary of the Behavioral Sciences Study Section, DRG, and later became executive secretary of the DRG's Experimental Psychology Study Section.

Before joining NIH, Dr. Pickett worked at the Smithsonian Institution as a professional associate in the Bio-Science Information Exchange program. Additionally, she has served on the NIMH Research Task Force, the Interagency Committee for the Implementation of the Research on Aging Act of 1974, the NIH Grants Associates Board, and the NIH Extramural Associates Program.

At the 1980 American Psychological Association Convention, to be held in Montreal, Dr. Pickett will accept that 1979 Harold M. Hildreth Award for "distinguished contribution to psychology in the public service." Her other honors include a citation from the Graduate School of Brown University in 1978, lauding her accomplishments in the field of mental health; the DHEW Distinguished Service Award in 1975; and the DHEW Superior Award in 1972.



Dr. Pickett has received the DHEW Superior and Distinguished Service Awards.

Born in Providence, R.I., she was the third woman to receive a Ph.D. degree in psychology from Brown University. She has held several academic positions, including assistant professor at the University of Nebraska and at the University of Minnesota in Duluth, and is the author of a number of articles related to behavioral and learning processes.

NIDR's Dr. Edward Driscoll Retires After 42½ Years of Service

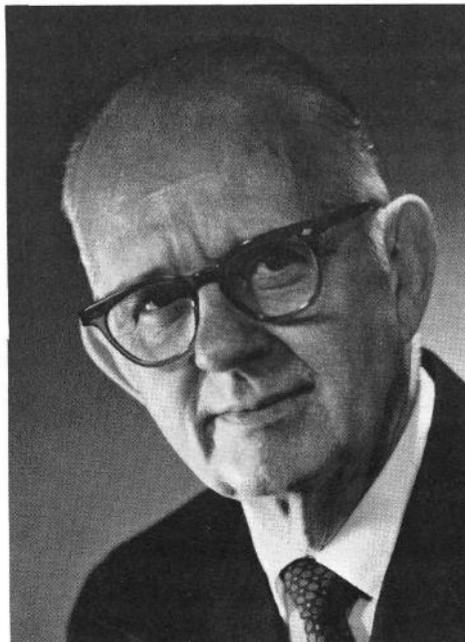
Dr. Edward J. Driscoll, chief of the Anesthesiology Section of NIDR's Neurobiology and Anesthesiology Branch, retired on July 24 after 42½ years of Federal service.

Among the posts held by Dr. Driscoll since joining the NIDR staff in 1954 were: chief of the Clinical Investigations Branch, clinical director, associate director for Extramural Programs, and chief of the Anesthesiology Section of the Oral Medicine and Surgery Branch.

As one of the earliest clinical researchers in general anesthesia in dentistry, Dr. Driscoll pioneered physiologic studies in intravenous sedation for patients who remained conscious during dental procedures. An international authority, Dr. Driscoll's leadership has helped to assure the safety of modern dental anesthetic procedures. He played a key role in the development and administration of NIDR's pain control programs.

Among his honors, Dr. Driscoll received the coveted Horace Wells Club Award in 1967, the Heidbrink Award in 1972, the Monheim Award in 1978, and the American Association of Oral and Maxillofacial Surgeons 1979 Research Recognition Award. He also received the HEW Superior Performance Award in 1972.

Dr. Driscoll is a diplomate of the American Board of Oral and Maxillofacial Surgery, a member of the American Society of Oral and Maxillofacial Surgery, a recent officer in the American Dental Society of Anesthesiology, and a fellow of the American College of Dentists.



Dr. Driscoll played a key role in pain control programs.

Retirement plans include travel, a return to school for selected academic and technical courses, and some fishing.

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Task Force Suggests Ways for FIC To Strengthen Its Role

The Task Force to Assess the Mission and Functions of the Fogarty International Center recently reported its recommendations to NIH Director Dr. Donald S. Fredrickson. They made 23 recommendations, addressing all aspects of current Center programs.

The Task Force suggested that the role of the Center be strengthened as the central coordinating and integrating point for international activities within NIH and as a major source of advice to the NIH Director on all matters related to international health. To that end, the Task Force recommended that the Director of the Center also serve as NIH Associate Director for International Activities.

At a meeting of all Center staff, called to announce the appointment of Dr. Edwin D. Becker as Acting Director of the Center, Dr. Fredrickson also asked him to assume that role immediately. Dr. Becker, who will serve until a permanent Director is chosen, is chief, Laboratory of Chemical Physics, NIAMDD.

The Task Force felt that, in order to provide FIC with the ability to carry out international activities and to provide such advice, a strong analytical capability must be established at the Center.

They recommended that a Policy Studies Program be established to consider issues and topics concerning international aspects of biomedical and behavioral research, research manpower training, and the transfer of research results to health care systems.

It was further recommended that an advisory council or board be established for the Center to provide a continuous assessment and redefinition of the appropriate scope of such studies and suggest priorities among competing demands, as well as to provide broad advice and guidance to the Center in the development and administration of its international activities.

Other recommendations were made to cull and realign the current functions of the Center to achieve a more focused, integrated, and cohesive program structure; to modify the Scholars-in-Residence Program to better serve the broad interests of the NIH community; to increase the effectiveness of the training experience provided by the fellowship programs; and to develop a more effective strategy for the participation of the NIH in bilateral agreements and in the programs of multilateral organizations.

The need to focus attention on the special health needs of the less developed countries and to promote a greater community of interest at the NIH in international health was also highlighted.

In accepting their report, Dr. Fredrickson thanked the group for their year-long effort, stating that it will be a valuable resource in discussions regarding the future role of the Fogarty Center.

Members of the Task Force were drawn from senior staff of the Office of the Secretary, Office of the Assistant Secretary for Health, NIMH, and NIH.

Some rats and mice at the National Institute of Environmental Health Sciences spend their afternoons swimming, walking the balance beam, demonstrating the "tail flick," and performing other feats.

No, they are not training for the "Rodent Olympics." They are participating in a study to determine how various environmental contaminants affect neurobehavioral function.

Scientists administer the contaminants to the rats and mice, then conduct a battery of tests designed to measure the animals' ability to hear, see, smell, move, react, learn, and remember.

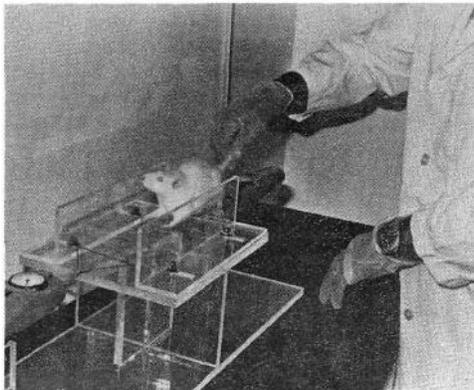
"The tests are standardized and validated on animals dosed with compounds having known neurotoxic effects," explained Dr. Clifford L. Mitchell, chief of the Laboratory of Behavioral and Neurological Toxicology. The complete battery of tests can be given to 40 animals by three or four investigators in two afternoons, he said.

Among the tests given to the animals is a swimming test. Since rats and mice swim naturally, difficulty in swimming may indicate neurotoxicity. A scientist "lifeguard" pulls the animal out of the water if it bobs under before the end of the test. All swimmers, or nonswimmers as the case may be, are towel-dried after each dip.

"Negative geotaxis," the animal's ability to reorient itself head upward, is tested by placing the rat or mouse on a screen and rotating it 180 degrees.

Other tests include the "tail flick," a measure of how long an animal takes to remove its tail from warm water; the "rod walk," which is a sort of balance beam for

Rats and Mice Tested To Determine Effects Of Chemicals in Environment

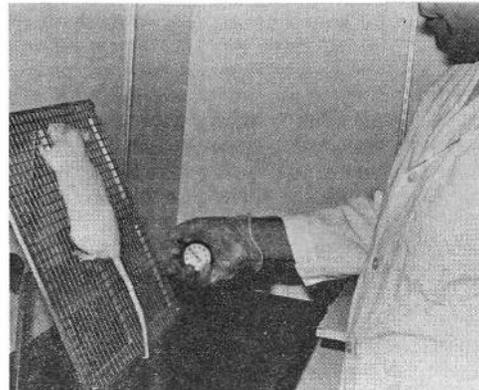


The gripping strength of a laboratory animal's fore- and hindlimbs is measured on a plexiglass device developed by NIEHS researchers.

rodents; and an "emergence test," in which scientists measure the time it takes an animal to leave a lighted cubicle and enter a darkened cubicle.

Animals are assessed for their ability to learn and remember a simple one-way avoidance task. They are also tested for eye reaction to a flashlight, hearing response to a low-intensity clicking sound, reaction to gentle tactile stimuli, and olfactory stimulation to a scented cotton swab.

The aftershave lotion used in the olfactory test attracts some animals and repels others; animals are graded solely on their reaction to the stimulus.



In a simple test for "negative geotaxis," an NIEHS scientist measures the length of time it takes an animal to reorient itself head upward after being rotated 180 degrees.

The battery of tests includes measurement of each animal's body weight and temperature, fore- and hindlimb strength, and overall motor activity.

The effects of polybrominated biphenyls (PBB's) have been investigated using the animal tests, said Dr. Mitchell. These chemicals were involved in the contamination of cattle feed, and subsequently dairy and beef products, in Michigan in 1973. The effects of PBB's on the test animals were similar to those occurring in humans exposed to the chemicals through environmental contamination, Dr. Mitchell noted.

Research Fellowships Are Now Available To Sweden, Switzerland, and France

The Swedish Medical Research Council, the Swiss National Science Foundation, and the French National Institute of Health and Medical Research will each make available in 1980 several research fellowships to qualified U.S. biomedical scientists. These fellowships will provide postdoctoral training in basic or clinical areas of medical research.

Eligible candidates must be U.S. citizens and have been engaged in independent, responsible research in one of the health sciences for at least 2 of the past 4 years. Applicants must also provide evidence of acceptance by a training institution and preceptor. Stipends range from \$11,000 to

\$16,700 per year, depending upon age, qualifications, and experience.

The deadline date for the receipt of completed applications for the French INSERM program is Oct. 1, 1979. The deadline date for the Swedish and Swiss programs is Feb. 1, 1980.

Application materials may be obtained from Scholars and Fellowships Program Branch, Fogarty International Center, NIH, Bethesda, Md. 20205.

Applications will be reviewed for scientific merit at the FIC and will then be forwarded to Sweden, Switzerland, and France as appropriate for final selection.

Lab Use of Chemicals Discussed; Further Comments Invited

The latest draft of Guidelines for the Laboratory Use of Chemical Substances Posing a Potential Occupational Carcinogenic Risk was discussed at a public meeting in the Masur Auditorium July 24.

The meeting, which drew 200 persons, was sponsored by the HEW Committee to Coordinate Environmental and Related Programs.

Some attendees supported the proposed guidelines, and said they have implemented similar, and in some cases more stringent,

guidelines in their laboratories. Others at the meeting cautioned that a cost-benefit analysis and a trial run should be made before the guidelines are accepted.

Written comments on the guidelines will be accepted until Aug. 14. Comments and requests for the draft document should be sent to Dr. Emmett W. Barkley, Office of Research Safety, NCI, Bldg. 13, Rm-2E-47, Bethesda, Md. 20205. Dr. Barkley's telephone number is 496-1862.

ASSAY AWARD

(Continued from Page 1)

research into the natural mechanisms of hormone degradation.

It applies not only to the study of insulin action, but to the study of the activity of other peptide hormones and neurotransmitters as well. With the accuracy of the method confirmed in normal subjects, the investigators are now developing studies of various receptor disorders, particularly diabetes, anorexia nervosa, and acanthosis nigricans with extreme insulin resistance, to obtain a better understanding of the hormone-receptor relationship.

A visiting associate with the NIAMDD Diabetes Branch, Dr. Wachslicht-Rodbard received her M.D. degree from the Federal Medical School in Sao Paulo, Brazil, and subsequently pursued advanced training in the field of endocrinology. She came to NIH in 1975 as a visiting fellow with the National Institute of Child Health and Human Development, and has worked in the Diabetes Branch for the past 2 years.

Early in his research career, Dr. Roth was a Fellow with Drs. Solomon A. Berson and Rosalyn S. Yalow at the Bronx Veterans Administration Hospital. He came to NIAMDD as a clinical associate in 1963, and was appointed chief of the Diabetes Section, now the Diabetes Branch, in 1966.

U.S. Health Delegation Visits Cuba And Meets With Fidel Castro

During a 5-day tour of Cuba in March, a PHS medical delegation visiting at the request of the Cuban government was able to ascertain the condition of Cuban public health and to speak with President Fidel Castro.

Later, in June, several of these delegates traveled to the People's Republic of China (see *The NIH Record*, July 24, 1979, p. 3).

Despite great differences in history, tradition, and culture, they found many similarities in the way health care is delivered in the two societies, said Dr. Thomas E. Malone, NIH Deputy Director, who visited each country.

Both communist countries share a philosophy that "health care is a basic right of every citizen, that the government should bear the expense, and that the people should be involved in its widespread delivery," he said.

Whether in a Chinese or Cuban province or city, health care involves a direct interaction between the state, the physician, and the citizen. During the March tour—which received widespread press coverage in Cuba—the medical delegation saw a recently opened provincial hospital which serves as a model for the construction of other hospitals that will serve each of Cuba's 14 provinces.

The group also toured a teaching polyclinic that provides primary medical care for a 3-year-old community of 35,000 near Havana.

The delegation looked in on a Havana psychiatric hospital that uses modern techniques of psychoanalysis. In addition, they saw Cuba's relatively new Health Development Institute, which serves as a "think tank," where a multidisciplinary professional staff develops Cuba's health policies. While there, delegates were repeatedly reminded of the "before" and "after" health care statistics that have resulted since its 1959 revolution.

The delegates were impressed by Cuba's success in reducing its infant mortality rate to 22 per 1,000 live births. This is the lowest rate in Latin America, and "is even lower than

Washington, D.C.'s," Dr. Malone said.

Prior to its revolution, Cuba was plagued by malaria, polio, tetanus, and typhus; today these diseases have been eradicated. Cuba's major causes of death are similar to those of the U.S., with cardiovascular diseases, cancer, and accidents heading the list.

The Cuban government is active in health promotion and prevention, which it deems as important as cure and rehabilitation. As is the case in China, Cuba's many polyclinics make use of a health team; physicians, nurses, dentists, and auxiliaries work with a variety of mass organizations that reach down to every neighborhood and block in Cuba. "From what we have seen, this concept seems to be working well in actual practice," said Dr. Julius B. Richmond, HEW Assistant Secretary for Health and PHS Surgeon General, just before he left Havana.

For example, one million Cuban women are active in Cuba's massive child immunization campaign. They share in the management of local clinics and meet frequently with clinical personnel to discuss problems.

One problem that Cuba has today is a lack of emergency medical equipment. However, the U.S. delegation found that Cuba, despite its isolation for almost 20 years, is surprisingly current in the areas of hospital environmental engineering and planning activities.

Cuba's pharmaceutical program was praised—it now meets 80 percent of its drug needs.

The remaining 20 percent are supplied by countries other than the U.S., which has a trade embargo against Cuba. Dr. Richmond was given a list of 22 drugs produced only in the U.S. that Cuba is interested in acquiring.

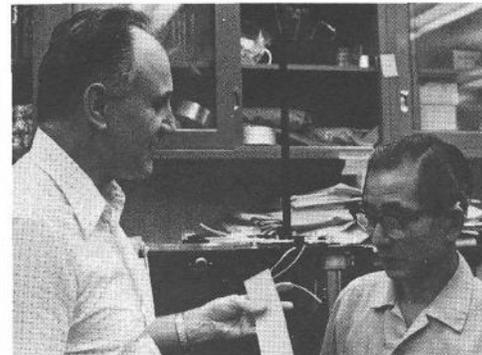
During a visit to the Institute for Health Development near the end of their trip, Dr. Richmond was informed that President Castro would see him, although no plans had been made for such a visit.

Dr. Richmond said that President Castro

was cordial, and their 1-hour and 10-minute conversation centered on a wide range of health and welfare concerns. Fidel Castro was interested in Dr. Richmond's assessment of Cuba's health care program, and pointed with pride at Cuba's low infant mortality and longevity statistics.

Quite spontaneously, said Dr. Richmond, President Castro began discussing the need for sound mental health programs and the need for people to learn how to live happy as well as productive lives. He showed great interest in the rearing of children and the education of parents for child rearing.

Invention by NIH Scientists Wins Tech-Excellence Award



Dr. Kolobow (l) and Ito discuss their invention, the blood cell separator pictured between them.

A blood cell separator invented by Drs. Yoichiro Ito and Theodor Kolobow, Laboratory of Technical Development, NHLBI, was recently selected by an international panel of judges as an outstanding and significant achievement in technological development.

The Tech-Excellence Award was presented to the scientists at the 1979 Annual World Fair for Technology Exchange held in Atlanta.

The new separator provides a simple, fast means for selectively collecting blood components such as red blood cells, platelets, plasma, and lymphocytes. Components can be collected independently, or all components can be collected in separate containers at a rate as high as one unit of whole blood in a few minutes.

The blood centrifuge can be used in any type of blood separation, including all blood banking activities, said Drs. Kolobow and Ito. With the machine, blood can be drawn from a patient, treated, and returned to the patient's body in a single operation.

The scientists began working on their separator in 1975. At that time, Dr. Jacques Suaudeau, a visiting associate who was working with Dr. Kolobow, was using a commercial blood cell separator which had rotating seals. Drs. Suaudeau, Kolobow, and Ito considered the separator unsafe because of the seals. Plans to build a centrifuge free of rotating seals were begun, and Drs. Ito and Kolobow completed the work last year.

Their blood cell separator, which Dr. Ito described as a portable, tabletop model, is not yet available commercially.

Dr. Ito, who holds 16 patents, researches methods of isolating, purifying, and analyzing biomedical compounds with highly refined liquid-liquid extraction systems. Dr. Kolobow's research interest is artificial organs.



Health Review members had the opportunity to meet Cuba's President Fidel Castro (c) during his unscheduled visit. Trip members included (l to r): Dr. George I. Lythcott, Health Services Administration Administrator; Dr. Mark Novitch, FDA's associate commissioner for health affairs; Marlyn Kefauver, director, Office for the Americas, PHS Office of International Health; William Watson, deputy director for the Center of Disease Control; Dr. Richmond; Dr. Malone; and Dr. Jose Gutierrez Muniz, Cuba's Minister of Health.

Dr. Heinz Berendes To Direct NICHD Epidemiology, Biometry Research Program

Dr. Heinz W. Berendes has been appointed director of the Epidemiology and Biometry Research Program, National Institute of Child Health and Human Development.

Before his appointment, Dr. Berendes served as the chief of the Contraceptive Evaluation Branch, Center for Population Research. In June, he received the NIH Director's Award.

A pediatrician and epidemiologist, Dr. Berendes' research interests have focused on perinatal factors in child development with emphasis on prenatal causes of various neurological disorders of infancy and childhood and their public health implications. This interest led to his joining NIH in 1960 as assistant director of collaborative research of the then National Institute of Neurological Diseases and Blindness. Later Dr. Berendes became chief of that Institute's Perinatal Research Branch.



Dr. Berendes

In 1973, he joined the NICHD to become acting chief of the Fertility Regulating Methods Evaluations Branch, which later became the Contraceptive Evaluation Branch.

Prior to government service, Dr. Berendes was a faculty member of the department of pediatrics at the University of Minnesota in Minneapolis, having received his training there. He earned his medical degree in his native Germany at the University of Goettingen in 1949, where he also studied clinical psychology. In 1972, Dr. Berendes received a master's in epidemiology from Johns Hopkins University.

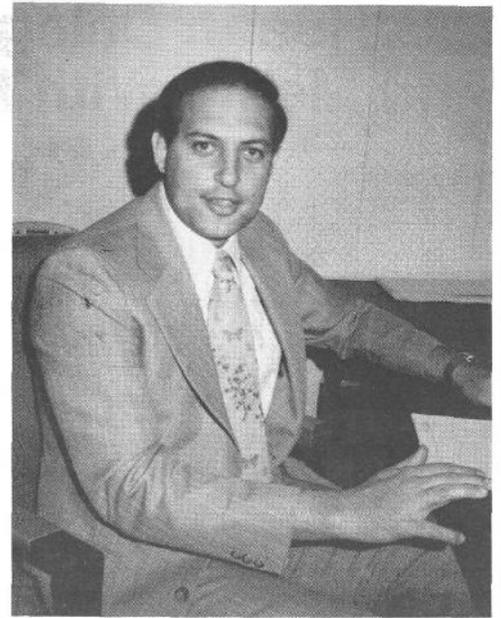
Dr. Berendes is also associate professor of pediatrics at Howard University and a member of the advisory board of the special program in reproduction of the World Health Organization. He is a past advisor to WHO on the prevention of perinatal mortality and morbidity and the medical effects of contraceptive methods.

HUD Booklet Gives Tips On Fire Protection

Each year, 6,000 Americans die in home fires.

In a new booklet titled *People and Fire*, the Department of Housing and Urban Development gives information to help keep a family out of danger.

For the latest in fire protection information, send \$1.30 to the Consumer Information Center, Dept. 93G, Pueblo, Colo. 81009.



Philip D. Amoruso has been appointed executive officer of the National Library of Medicine. He will serve as the NLM Director's principal staff officer for management and general administration. Mr. Amoruso received a B.S. degree from the University of Delaware, and a masters' degree in public administration from American University. He joined NIH in 1966 as a personnel management specialist, and has been with NCI since 1969, serving in a variety of administrative management positions, most recently as administrative officer of the Division of Cancer Treatment.

NCI and Naval Medical Center Will Cooperate In Research on Cancer Treatment



Vice Admiral Arentzen signs the General Memorandum of Understanding that creates an NCI-Navy Medical Oncology Branch as (l to r) Dr. Malone, Dr. Upton, and Rear Admiral Horgan look on.

The National Cancer Institute and the National Naval Medical Center have launched a cooperative research program in cancer treatment.

The venture was formalized last month when a General Memorandum of Understanding was signed by Vice Admiral W.P. Arentzen, Surgeon General of the U.S. Navy; Rear Admiral Joseph T. Horgan, Commanding Officer, NNMCC; Dr. Donald S. Fredrickson, NIH Director; and Dr. Arthur C. Upton, NCI Director.

"The close geographic distance and the shared areas of medical research make this alliance between the Navy and NIH especially important," NIH Deputy Director Dr. Thomas E. Malone noted in remarks at the signing ceremony. He said that this is the first such collaborative clinical program between the neighboring institutions.

Dr. John Minna of NCI will serve as chief of the NCI-Navy Medical Oncology Branch when it is established. He is currently chief of the NCI-VA Medical Oncology Branch. The branch will offer to Navy personnel and their dependents participation in clinical trials to explore innovative experimental approaches to the treatment of cancer.

The agreement provides hospital and laboratory space at the naval center for NCI physicians. Long-range plans are to renovate Bldg. 8 at the facility to house the NCI program. NCI will bear the cost of day-to-day operations.