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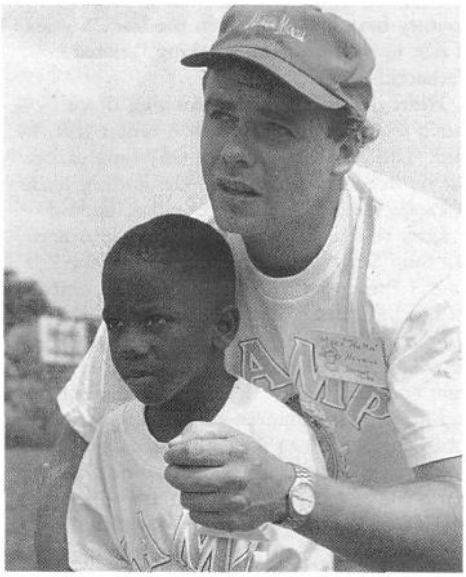
"Still The Second Best Thing About Payday"

The NIH Record



The ninth annual Camp Fantastic held recently in Front Royal, Va., was a particularly festive occasion. More than 500 volunteers from various civic and community groups pitched in to make the week memorable for 88 campers. In the photos above, Christopher Ellis (l) and David Boinott examine a "creepy critter" during nature class and counselor Mark "Moo Moo" Newbill (r) gives a golf lesson to camper Mario Parham of Richmond. (Photos: Bill Branson)

Heart Disease Replaced

Lung Cancer Now Leading Cause of Mortality Among Smokers

By Francis X. Mahaney, Jr.

Lung cancer has replaced coronary heart disease as the single leading cause of excess mortality among cigarette smokers in the United States, researchers at the National Cancer Institute and American Cancer Society reported recently.

Lung cancer will account for the vast majority of the projected excess cancer deaths attributable to cigarette smoking—more than 123,000 deaths. Furthermore, an additional 34,000 deaths attributable to smoking are expected from cancers of the esophagus, oral cavity, larynx, bladder, pancreas, kidney and uterine cervix.

Donald R. Shopland and Dr. Terry F. Pechacek of the institute's Smoking and Tobacco Control Program, and Dr. Harmon J. Eyre, past president of the American Cancer Society, said the relative risk of cigarette smokers dying of lung cancer has increased substantially since the surgeon general's report on smoking was first issued in 1964.

During the past 3 decades, the relative risk of dying from lung cancer has doubled among male cigarette smokers, while the relative risk among women cigarette smokers has increased fourfold.

Male cigarette smokers have a 22-fold higher relative risk of dying from lung cancer compared to male nonsmokers. Women cigarette smokers, on the other hand, have a relative risk of dying from lung cancer 11 times greater than women who do not smoke.

The joint NCI-ACS report was published in the Aug. 21 issue of the *Journal of the National Cancer Institute*. An editorial by Dr. Jessie Steinfeld, U.S. surgeon general from 1969 to 1973, accompanies the article.

Today, 50 million adult Americans smoke. According to the American Cancer Society, lung cancer deaths have risen 131 percent in men and 420 percent in women since 1955.

Slightly more than 90 percent of male and 79 percent of female lung cancer deaths are directly attributable to cigarette smoking, NCI's Shopland said. For males and females combined, cigarette smoking accounts for 86.1 percent of the projected lung cancer deaths in 1991, compared to 21.5 percent of deaths caused by heart disease, the authors said.

"The medical and public health communities have done a good job reducing factors that affect heart disease," said Eyre, a coauthor of the report. "But now it's time to get serious about controlling this nation's number one cause of early death and disability—smoking."

The authors estimate that cigarette smoking will contribute to nearly one-third, or more than 157,000, of the estimated 514,000 total cancer deaths expected to occur this year in the U.S.

Overall, cigarette, pipe and cigar smoking directly contribute to 45 percent of all cancer deaths in men, and cigarette smoking contri-

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Campus Scientists Praise Research Network

By Greg Wilson

For NIH scientists, "connectivity" means being able to zip huge data files across the globe in seconds, tap into supercomputers from their own laboratories, and pose complex questions to experts they may never have met. Connectivity means that investigators don't have to wait for an annual conference to learn about groundbreaking discoveries in their fields; all they have to do is switch on their computers. NIH's high-speed research oriented network, RESnet, is the computer tool that makes all of this possible.

RESnet is an attempt to take networking "beyond electronic mail," according to DCRT's network task group chief, Dave Songco. RESnet connects 9 NIH buildings and serves as a high-speed compliment to NUnet, which connects all 36 NIH buildings. Together the two make up the campus-wide networking system known as NIHnet (June 11, 1991 *NIH Record*).

Dr. Carl Saxinger's HIV research at NCI is heavily dependent on computer networking.

The high-speed connectivity offered by RESnet—6 times faster than NUnet, soon to be 60 times faster—is designed to meet the needs of biomedical researchers who work with large data files such as genetic sequences or medical images from CAT or NMR scanners. RESnet allows scientists to

- move such files from computer to computer in seconds rather than minutes,
- access sophisticated software and databases stored on remote high-powered computers like DCRT's IBM 3090 and Convex, and
- connect to international computer networks like Internet and Bitnet that offer endless access to information and software databases.

Along with CCnet—the Clinical Center network developed jointly by the network task group and Clinical Center management—RESnet connects 40 local area networks

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CANCER

(Continued from Page 1)

butes to 21.5 percent of all cancer deaths in women.

"These estimates are conservative at best," Shopland said. "They do not include cancer deaths caused by smokeless tobacco or deaths from types of cancer for which elevations in smokers' risk have been observed, but the causal nature of the association has yet to be established."

The findings are based on the American Cancer Society's Cancer Prevention Study II, a prospective study of 1.2 million men and women showing that mortality risks among cigarette smokers have increased substantially for most of the eight major cancer sites causally associated with cigarette smoking, Shopland said.

A series of authoritative reports issued during the past 30 years by the U.S. surgeon general, Great Britain's Royal College of Physicians, the World Health Organization, and other international scientific organizations has documented the causal relationship between smoking and cancer of several sites, say the authors.

These reviews have conclusively shown that smoking causes lung cancer as well as cancers of the larynx, oral cavity (including pharynx), and esophagus. Smoking also contributes to increased death rates for cancers of the bladder, kidney and pancreas in men and women, and cancer of the cervix uteri in women.

According to Shopland, the risk of developing lung cancer—as well as other cancers associated with smoking—increases with the number of cigarettes smoked daily. The more cigarettes one smokes daily, the earlier age one initiates smoking behavior, and the more years one has smoked greatly enhance risk, he said.

Pipe and cigar smokers also have elevated risks for cancers of the oral cavity, larynx, pharynx and esophagus—"often equal to and sometimes exceeding the risks for cigarette smoking alone," the authors said.

In addition to active cigarette smoking, the authors said that involuntary or passive smoking "has now been established as a cause of lung cancer in nonsmokers."

"The public is increasingly aware that tobacco smoke is a major social carcinogen," said coauthor Pechacek of NCI. "Legislators and health officials need to recognize the public's growing demands for protection from tobacco smoke at work, in restaurants, and in public places."

Cigarette smoking also contributes to premature death from a variety of other causes including heart disease, chronic obstructive lung disease and stroke, the researchers said. For instance, cigarette smoking accounted for an estimated 109,988 of the 511,045 heart disease deaths that occurred in 1988, the most recent year for which complete data are available. "We now know that one of the major reasons that heart disease death rates in this country have been falling in the last 25 years is due to men quitting smoking," noted Pechacek.

Heart disease risk from smoking drops much faster after quitting than cancer risk, he said. This fact helps explain why lung cancer has replaced heart disease as the leading cause of excess mortality among smokers, he said.

Later this year, NCI will begin the American Stop Smoking Intervention Study for Cancer Prevention (ASSIST), the government's largest initiative to reduce smoking in the U.S. ASSIST will be a collaborative effort between the NCI and the ACS along with state and local health departments to develop and implement comprehensive smoking and tobacco programs to control tobacco use in 15 to 20 states, affecting between 50 million to 100 million Americans. NCI's contribution to ASSIST will total more than $100 million. □

Cohen Named Acting NIA Director

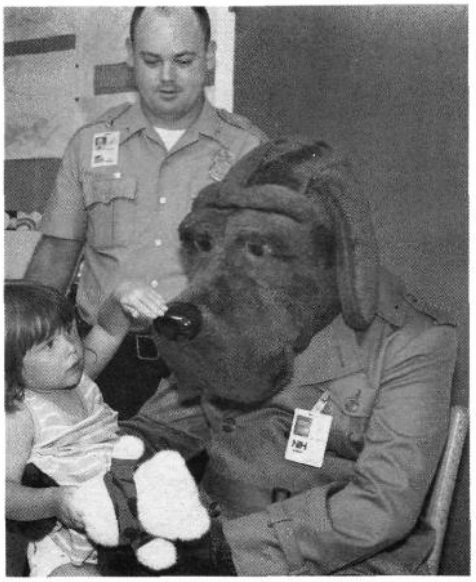
Dr. Gene D. Cohen has been appointed acting director of the National Institute on Aging. In addition to serving as deputy director of the institute since 1988, he is executive secretary for both the DHHS council on Alzheimer's disease and the congressionally appointed advisory panel on Alzheimer's disease.

Cohen is a graduate of Harvard College and the Georgetown University School of Medicine, and has a doctorate in geriatric health and mental health. He is clinical professor of psychiatry at Georgetown, editor-in-chief of

Dr. Gene Cohen

International Psychogeriatrics and a past chairman of the clinical medicine section of the Gerontological Society of America. He also has been the primary investigator of a 20-year longitudinal study of ill older adults living independently in the community. He is the author of *The Brain in Human Aging* in addition to a number of other publications.

Before joining NIA, Cohen had served as the first chief of the Center on Aging of the National Institute of Mental Health. □



Emma Gutierrez of NIH's daycare center sits on McGruff's lap during his recent visit to NIH. McGruff, a crime prevention dog, toured NIH and talked with children in the Clinical Center as well as at the daycare center. Accompanying McGruff on his tour was Tom Hayden, NIH police officer.

The NIH Record

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STEP 1991-92 Offerings: Times Are A Changin'

The STEP committee has announced its 29th season of Modules, Forums, and Science for All presentations. This highly successful continuing education program for extramural staff addresses current issues and training needs in three different formats. Modules treat topics in depth; Forums explore current, frequently controversial issues in a short format; Science for All lectures provide health-relevant, scientific training for staff on a level that can be understood by the nonscientist.

The programs, generally, are open to all extramural staff, regardless of grade or function. Certain sessions are targeted to a specific audience. No prior registration is required for Forums or Science for All lectures, but applications are needed for Modules and are now being accepted.

The application deadline is Oct. 11 for Modules 1-3 and 5. Module 4 has a separate deadline of Dec. 13. Applicants should read carefully the module descriptions and application procedures prior to submitting NIH Form 2245 (revised 3/89) to the STEP office in Bldg. 1, Rm. 252. Space may be limited and selection criteria may apply.

STEP, an acronym for Staff Training in Extramural Programs, is a committee function of the Office of Extramural Research under the auspices of Dr. George J. Galasso, NIH associate director for extramural affairs, Dr. James F. O'Donnell, director, Office of Extramural Programs, and Dr. Donald G. Murphy, director of the extramural staff training office.

The STEP educational program is formulated each year by a 25-member committee composed of experienced NIH'ers who are drawn from across all of extramural NIH. The committee plans and conducts the training sessions with the assistance of former members, senior staff, and training professionals. Faculties are drawn from leaders inside and outside NIH.

Dr. Michael Rogers, deputy director of the Pharmacological Sciences Program, NIGMS, has been appointed chairman of the STEP committee for 1991-92. David Snight, chief of the Research Contracts Branch, OD, is vice-chairman. The program is directed by Arlene Bowles.

The agenda for this year includes five Modules, four Forums, and two Science for All presentations that cover a range of topics of importance to extramural staff. These programs are designed to help staff stay abreast of today's "hot" issues, and sharpen skills necessary to deal effectively with the fast-paced and quickly changing world of science administration.

Module 1, "IRG to Award: The Times They Are A Changin'" gets the STEP module series off to a running start on Dec. 11-12. Perhaps at no time in NIH's history have significant changes occurred at such a breathtaking pace. Remember terms like "motions for approval and disapproval," and "executive secretaries"? Heard of "not recommended for further consideration"? How about early release of priority scores, competitor conflict, the BRDPI, SEPs, Shannon Awards, and strategic planning? Been audited lately? This module will explore how changes are affecting the work we do and how different ICDs deal differently with them. Primarily senior staff at NIH will serve as the faculty for this module, and it is expected that lively discussions will serve to highlight the issues for participants.

Module 2, "Clinical Trials (and Tribulations)" will be offered Jan. 8-9. Clinical trials represent an area of considerable support by NIH; they garner a great deal of public attention and are frequently the center of controversy. Yet for many of our staff it is probably a method of scientific endeavor that is shrouded in mystery. Human factors play a major role. A variety of players are involved, frequently including academia, industry, and NIH. Decisions to start or end clinical trials are complex and often have political overtones. This module will attempt to bring interested staff "up to speed" in understanding the nature of clinical trials and the policy and ethical issues that surround them.

Dr. Michael Rogers is the new STEP committee chairman for 1991-1992; he is deputy director of the Pharmacological Sciences Program, NIGMS.

Module 3, "A Module for Extramural Staff in Grades 10 and Below" will offer an expanded version of the extremely successful module of the same title given last year. This module was so oversubscribed that a pilot and two separate sessions were insufficient to meet the demand. The module is only available to staff in grades 10 and below. It will again be offered twice, once on Feb. 5-6 and once on Feb. 19-20. Improvements have been made based on feedback from last year's participants, and it will now run for 2 days. Led by a professional trainer, this course is highly interactive, using role playing and real life examples. The focus will still be on improving communication skills, dealing with difficult people, examining job-related attitudes, and developing support networks.

Module 4, "Effective Alliances" will be back for its second redux on Mar. 24-26 and has its own application deadline. This is a popular module that has generated strong feelings among participants and touched something in the heart of the NIH community. It has spawned continuing get-togethers of former participants to share insight and experiences. This 2½-day module is targeted to review, program, grant and contract officials and is held at an off-campus, residential site. A professional trainer, assisted by NIH staff working as facilitators, will lead attendees through a series of interactive exercises designed to foster understanding of the individual authorities and the interdependence of NIH staff.

Module 5, "Sleeping With Your Decisions: The Acts of Life" will be a 2-day module to be held Apr. 15-16. On what basis are your decisions made? Have you thought about it? Are you as good at making decisions as you could be? Are you comfortable with group decisions? Do you understand the process by which group decisions are made? Making decisions more easily and effectively, personally and in groups, could add free time to your busy schedule. The module will provide an interactive, dynamic experience led by a professional trainer.

The popular afternoon Forum series talks are held in Wilson Hall, Bldg. 1, for 2 hours and do not require advance registration. Dates will be widely announced well in advance of the presentations. An important aspect of the forum lectures is the time allotted for discussion and questions from the audience. This year for the first time one of the forums will be specifically targeted to staff in grades 10 or below and will cover techniques for striving. Additional presentations will cover recognizing the barriers to communication that gender differences and cultural diversity can present, creating opportunities for minority scientists, and the latest on indirect costs.

This year the Science for All presentations continue with two lectures, dates to be announced. One will provide an update on AIDS and one will deal with hormone replacement therapy.

The STEP Catalog contains information on all of this year's programs and includes an application form. The catalog is now available from ICD personnel offices and from the STEP office in Bldg. 1, Rm. 252. In addition, forms and catalogs can be obtained from David Snight (Bldg. 31, Rm. 1B44), Dr. David Longfellow (EPN, Rm. 700), Dr. Faye Austin (EPS, Rm. 642), Mary Whitehead (Federal, Rm. 1004), and Dr. Michael Rogers (Westwood, Rm. 919). □

Symposium Honoring NIDDK's Ashwell To Be Held

By Kathy Kranzfelder

A symposium on "The Chemistry and Biology of Carbohydrate-Protein Interactions" will be held on Sept. 12 and 13 in Lister Hill Auditorium. The event honors NIDDK investigator Dr. Gilbert Ashwell, who jointly discovered (with Anatol Morell of the Albert Einstein College of Medicine in 1966) a hepatic recognition system for the terminal galactose residues of circulating serum proteins, also called asialoglycoproteins.

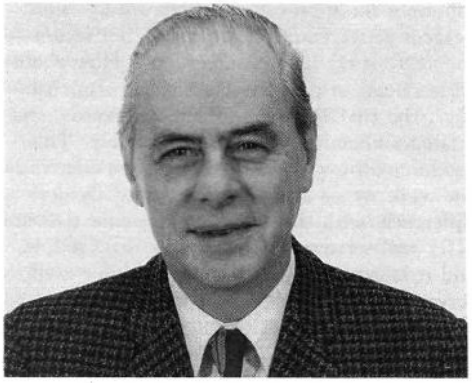
Ashwell had been seeking a way to radiolabel serum glycoproteins for study when he had the idea of removing the terminal sugar, sialic acid, whose function at the time was not known, and using an enzyme methodology to label the galactose.

"When he took that blocking group off, radiolabeled the asialoglycoprotein and reinjected it into an animal, it disappeared within minutes, whereas the protein would normally remain in circulation for a day or so," explained Dr. Joe Harford of NICHD's Cell Biology and Metabolism Branch, one of the symposium organizers. Ashwell then went on to show that a protein in liver cells binds specifically to these experimentally altered proteins by binding to the newly exposed galactose residues.

"This was certainly one of, if not the first, receptors to be identified and purified," said Dr. Harvey Lodish of the Whitehead Institute and the Massachusetts Institute of Technology, who will lecture at the symposium on the structure and assembly of the human asialoglycoprotein receptor. "Dr. Ashwell identified, purified and characterized this molecule at a time when this kind of science was thought simply impossible. This was before recombinant DNA technology and so forth. He really laid the groundwork for a lot of very important discoveries."

Twelve investigators from France, Israel and across the United States will present their research, which has been influenced by Ashwell's work. Among the speakers will be Nobel laureate Dr. Joseph Goldstein of University of Texas Southwestern Medical Center in Dallas, who will present on the "LDL Supergene Family: Multiple Domains and Multifunctional Proteins."

Other speakers include Drs. Jacques Baenziger, Stuart Kornfeld and Alan Schwartz of Washington University in St. Louis; Dr. Samuel Barondes of the Psychiatric Institute in San Francisco; Dr. Nathan Sharon of Weizman Institute of Science in Rehovot, Israel; Dr. Robert Hill of Duke University; Dr. Y.C. Lee of Johns Hopkins University; Dr. James Paulson of Cytel Corp. in San Diego; Dr. Michel Monsigny of the Centre Nationale de la Recherche Scientifique in Orleans, France;



Dr. Gilbert Ashwell

and Dr. Paul Wasserman of Roche Institute of Molecular Biology in Nutley, N.J.

Ashwell received his M.D. from Columbia University College of Physicians and Surgeons in 1948 and completed a 2-year postdoctoral appointment there before coming to NIH. His early accomplishments here included the discovery of D-xylulose phosphate as an intermediate in the pentose cycle, the biosynthesis of ascorbic acid and the isolation of the beta-ketogulonic acid as the intermediate in the formation of L-xylulose, the key sugar in pentosuria.

In the 1960's, Ashwell found new pathways for the metabolism of uronic acids, isolated and characterized novel sugar nucleotides, and studied in detail the biological mechanisms in the formation of deoxysugars. During the past 20 years, Ashwell has focused on the ubiquitous role of protein-bound carbohydrates in directing and regulating cellular responses to a variety of metabolic stimuli. Included in these studies has been extensive investigation of receptor-mediated endocytosis with particular reference to the role of hepatic receptors for asialoglycoproteins.

Ashwell has been honored with several awards including the Gairdner Foundation Prize in 1982, the ASBC-Merck Prize in 1984 and the Alexander von Humboldt Foundation Senior Scientist Award in 1989. He has also been elected to the National Academy of Sciences (1979), named NIH Institute Scholar (1984) and awarded an honorary doctoral degree by the University of Paris (1988).

Aside from his obvious contributions to the advancement of science in many fields, Ashwell is well known among his colleagues as a gentleman and a most ethical and generous scientist and teacher.

"Gil Ashwell is one of NIDDK's most distinguished scientists and is a model of individual creativity," said NIDDK director Dr. Phillip Gorden. "He is an example of why NIH intramural research is outstanding."

"Gil is held in such esteem and viewed with such fondness," said Dr. Richard Klausner of NICHD's Biology and Metabolism Branch. "He is such a model and a spectacular figure within the field."

"This guy is exactly what he seems to be—a very sweet guy. It's a pleasure to honor him," said another colleague in NIDDK's Laboratory of Biochemistry and Metabolism, who has known Ashwell for more than 20 years. "Gil is also someone who doesn't look very well upon such efforts to honor him."

"He is notoriously modest," Klausner explained. "We never could have organized this symposium if we had asked him (for permission) first. He would have said, 'Why are you wasting your time when you could be doing science?'" NICHD's Klausner and Harford, and Dr. Joan Lunney of the USDA Agricultural Research Service, all of whom worked under Ashwell in NIDDK's Laboratory of Biochemistry and Metabolism during their first years at NIH, are the principal organizers of this NIDDK-sponsored symposium.

The conference opens at 1 p.m. on Sept. 12. Goldstein will present at 3:30 p.m. On Sept. 13, the sessions run from 9 to 11:30 a.m. and 1 to 4 p.m. □

BEAC Develops 1992-3 Workplan

Members of the NIH Black employees advisory committee (BEAC) recently attended a 2-day training retreat at the Parklawn Bldg. on total quality management (TQM).

The retreat provided an overview of the concepts of TQM, helped BEAC develop a work plan, and provided strategies for implementing the plan.

Dan Rondeau, director of the PHS Office of Equal Employment, presented the training. Eugene Kinlow, HHS acting assistant secretary for personnel administration, opened the session with an overview of TQM.

The BEAC 1992-3 workplan is designed to assure that Black employees have the opportunity to learn the rules and regulations that govern employment; to increase the number of Blacks recruited, hired or converted to permanent positions and promoted; to increase the retention of Blacks employed at NIH; to eliminate the manifest imbalance and conspicuous absence of Blacks in certain NIH occupations; and to expand distribution of training information.

BEAC's purpose is to advise the DEO director, through the Black Employment Program manager (Jalil Mutakabbir), on all matters concerning equal opportunity and affirmative action for Black employees. The group meets monthly and welcomes all employees. BEAC also welcomes comments, recommendations and suggestions that may assist the committee.

For more information, call 496-6301. □

NINDS' Di Chiro Gives ASN President's Lecture

By Shannon Garnett

What man is known throughout the world of radiologic science for his keen intellect, fiery speechcraft, absolute honesty and sharp wit? Dr. Giovanni Di Chiro, chief of the neuroimaging section of the National Institute of Neurological Disorders and Stroke, is the man so described by the executive committee of the American Society of Neuroradiology. The society recently honored Di Chiro by dedicating its annual President's Lecture to him.

Each year the ASN recognizes the special contributions of a distinguished member, and 1991's spotlight shone on Di Chiro, who was honored at the 29th ASN annual meeting recently. The lecture was given by Dr. Louis Sokoloff, a world renowned neurochemist and physiologist with the National Institute of Mental Health.

Di Chiro was born in Vinchiaturo, Italy (a mountainous village just east of Rome), in 1926. When he was 10 years old his family moved to the more cosmopolitan city of Naples, where Di Chiro grew up and matured during World War II. The events of these tumultuous war years shaped his personality and character and deeply involved him in moral and social controversies, including the wartime antifascist movement in Italy.

In spite of the demands of these times, he continued to pursue his studies with dedication. In 1949, at the age of 23, he received his doctor of medicine (summa cum laude) from the University of Naples. He went on to sharpen his neuroradiologic, clinical and investigative skills in Sweden and France, then completed his residency training at Boston City Hospital.

He returned to Naples in 1954 to organize and direct the x-ray department of the Neurological Institute at the University of Naples, and in 1958 he became the chief of the section on neuroradiology at the National Institute of Neurological Diseases and Blindness (now NINDS). Quite recently, Di Chiro's section was enlarged to become the NINDS Neuroimaging Branch.

In addition to his extensive research duties, Di Chiro also imparts his knowledge to future research scientists and other physicians by teaching at Georgetown University School of Medicine and George Washington Medical School, where, for the past 20 years, he has been clinical professor of radiology and clinical professor of diagnostic neurosurgery, respectively.

An internationally recognized leader in radiological research, he has taken the lead in the use of advanced neuroimaging methods to study diseases of the central nervous system. Among his professional accomplishments are his contributions on imaging of cerebrospinal fluid circulation (he was first to demonstrate,

Dr. Giovanni Di Chiro

in humans, the circulation of this fluid by imaging), spinal cord arteriography (Di Chiro was first to arteriographically demonstrate a spinal cord tumor), positron emission tomography of brain tumors, and nuclear magnetic resonance studies of the central nervous system. He is particularly proud of the accomplishments of his team of collaborators in the area of equipment building: advanced imaging units such as the axial transverse pneumoencephalographic unit, the petrascanner, the tomoscanner and the neuro-PET, represent some of the pioneer devices built at NIH by the NINDS neuroimaging group.

Di Chiro's many duties and research activities have been publicly appreciated in the past. In 1987 he received the highest honor in American radiology, the Gold Medal of the Radiological Society of North America.

In addition to this prestigious medal, he has received numerous other awards and honors. He is a founding member and past president of the American Society of Neuroradiology and was president (1982) of the XIIth Symposium Neuroradiologicum, one of the oldest and most prestigious international meetings in the neurological sciences.

Di Chiro is the founding editor of the *Journal of Computer Assisted Tomography* and has led the publication to a position of prominence and respect among international radiology publications. He also serves on the editorial boards of many other scientific journals. □

Infant Care Available

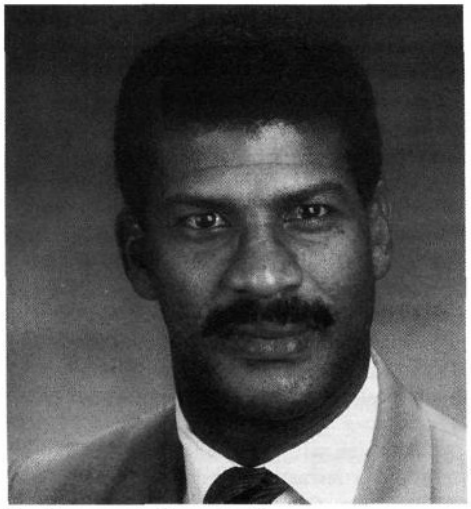
The NIH Infant/Toddler Center run by ChildKind, Inc., in Bldg. T-46 has spaces available for children 18 months to 2 years of age. Subsidy information is available on request. Call Lee Eltman, 496-8357. □

Lawrence Prograis Named Deputy Director of NIAID Division

Dr. Lawrence J. Prograis, Jr., was recently appointed deputy director of NIAID's Division of Allergy, Immunology, and Transplantation (DAIT), where he continues to serve as chief of the division's Asthma and Allergy Branch.

DAIT supports extramural research on the immune system as it functions in the maintenance of health and as it malfunctions in the production of disease. Among his many duties as deputy director, Prograis is responsible for managing the daily operations of the division as well as being directly involved in planning and developing DAIT initiatives. Prograis is particularly dedicated to bringing more women and minorities into the biomedical research arena.

Prograis received his medical degree from Meharry Medical College in Nashville, Tenn. From 1981 to 1983, he did postdoctoral research in complement/immunology in the NIAID's Laboratory of Clinical Investigation.



Dr. Lawrence J. Prograis, Jr.

After 6 years as director of Meharry's division of allergy and immunology, he returned to the institute in 1989 as chief of the Asthma and Allergy Branch, where he played a major role in developing the institute's 5-year National Cooperative Inner-City Asthma Study. In this study, eight institutions will design, implement, and evaluate a comprehensive intervention program to reduce recurrent asthmatic episodes and asthma-related deaths among 4- to 11-year old African-American and Hispanic children living in the inner city.

Prograis is vice-chair of the NIAID minority senior scientists advisory committee and serves as NIAID's minority coordinator. He is also a member of NHLBI's expert panel on the management of asthma. He belongs to several scientific organizations including the American Academy of Allergy and Immunology and the American Association of Immunologists. □

New Labs for 7 Institutes

Bldg. 49 Enters Final Construction Phase, Completion Seen in 1992

By Rich McManus

The new Child Health and Neurosciences Building (Bldg. 49), due to be dedicated next fall under the name of its chief congressional sponsor, the late Rep. Silvio O. Conte, has entered its fourth and final construction phase right on schedule.

The eight-story laboratory and animal facility on the west side of the NIH campus will house research programs from NICHD, NIMH, NINDS, NIAAA, NEI, NIDR and NIA.

"Progress has just been tremendous on this thing," said project officer Stephen R. Hagan of the Division of Engineering Services.

Ground was broken for the building in October 1988 when Conte visited the campus for what he called the proudest moment of his political career. Phase I—creation of the site foundation and utilities—began shortly thereafter, followed by phase II, the concrete superstructure, and phase III, mechanical systems and exterior.

The contract for phase IV, the fitting out of laboratory and office space, will be awarded this month. This last phase will end in just over a year, said Hagan.

"Bldg. 49 is really two separate buildings," he said as he led a walking tour of the facility, now swarming with specialists working on their own discrete parts of the project. "The north side of the first five floors is for the animal facility and the south side contains laboratories and offices." The remaining three upper levels will be limited to labs and offices.

The design will provide state-of-the-art facilities for research in child health and the neurosciences. One guiding principle in the design has been to achieve AAALAC (American Association for the Accreditation of Laboratory Animal Care) approval and to segregate animal research and other activities, Hagan explained.

There are two separate loading docks at the rear of the building for animals and laboratory materials. Inside, four elevators serve the animal side—two for large animals, mainly primates, and the other two for such small animals as rats, mice and other rodents.

To enhance the psychological well-being of the animals, small windows have been built in many holding rooms. Anterooms are provided outside these rooms for maintenance and for minor procedures and record-keeping. Directly across the hallway are procedure rooms for animal experiments.

On the laboratory side, an 8-foot-wide utility corridor, which backs onto a freight elevator, divides the labs, providing a delivery route, access to lab support rooms and giving easy access to ventilation shafts and other utilities to maintenance workers.

The south side of Bldg. 49 will be the entrance to the facility, scheduled for completion in fall 1992.

Visitors to Bldg. 49 will enter at a security desk, past which is a large, open staircase rising four floors through a glassed-in atrium. That central staircase, plus glassed-in fire stairs on each side of the building, provide "interaction spaces," where the "human primates" can enjoy some "psychological well-being" of their own.

The front of the building, which faces south, features conference rooms with solarium-type floor-to-ceiling windows on each of its five upper floors; there will be conference rooms for each of the institutes doing research in the building. Office space for the ICDs will occupy a 10-foot deep area of the building's front portion.

In front of the building are large concrete

As seen from the roof of Bldg. 38A, the new edifice (c) is slowly taking its place on the NIH skyline. Adjacent (l) is the complex of Bldgs. 35, 36, and 37.

air shafts resembling silos. These house air-intake equipment for the ventilation of 49 and are built off the ground to avoid contamination from car and delivery truck fumes.

To meet the parking demands of the estimated 500 or so workers who will occupy 49 and others in that area of the campus, a new multi-level parking garage is slated to be built just west of Bldg. 34. March 1993 is the target date for completion of the garage.

Another change planned in that corner of campus is construction of Bldg. 29B, an FDA facility to rise adjacent to Bldg. 29, said Hagan. In the fall, Convent Dr. will be straightened out in the vicinity of Bldg. 36 to make room for the FDA addition, he noted. □

Beginner Judo Begins

The NIH Judo Club will hold its fall beginners' class on Tuesday and Thursday evenings from 6:15 to 7:30 starting Tuesday, Sept. 24 at the Malone Judo Center in Bldg. 31. The cost for 8 weeks is $35. For more information call Stephanie Harrison, 496-9490. □

The north side of what will be known as the Conte Bldg. is actually the rear of the building. The small windows on the first five floors admit the outside world to animal holding areas and were built for the animals' benefit.

Four new members have joined the National Deafness and Other Communication Disorders Advisory Board. Joining NIDCD director Dr. James B. Snow, Jr. (r) and board chair Geraldine Dietz Fox (third from l) are (from l) Roy Koenigsknecht, Dr. Herbert Jones, Dr. Mary Downs, and Dr. Richard Stoker.

Honored for 20 years' service to R&W at its annual meeting recently were Dorothy Pulver, assistant general manager (second from l), and Patricia Walton (r) of the Westwood gift shop. Looking on are Randy Schools, R&W general manager, and Dr. Helen Gift, R&W president.

Extramural Staff Training Survey Is Now Available

The Staff Training in Extramural Programs (STEP) committee, in cooperation with the NIH Training Center, recently completed a survey of the needs, barriers, and perceptions of training among extramural staff. Executive summaries of the report are available from the STEP Program Office, Bldg. 1, Rm. 252, 496-1493. Questions or comments should be addressed to Dr. James Scheirer at NHLBI, Westwood Bldg., Rm. 548, or phone 496-7363. □

Mahoney Lecture Set, Sept. 25

The fifth annual Florence Mahoney Lecture on Aging, sponsored by NIA, will be held on Sept. 25 at 8 p.m. in the Lister Hill Center auditorium. This year's lecture, "Jumping Genes and Their Potential for Genetic Damage," will be presented by Dr. Maxine F. Singer.

Singer is a distinguished biochemist and is well-known at NIH where she retains the title of scientist emeritus. After receiving her Ph.D. from Yale University, she became a postdoctoral research fellow at NIH. She continued her research at the National Institute of Arthritis and Metabolic Diseases and at the National Cancer Institute. In 1988 she accepted the presidency of the Carnegie Institution of Washington.

For more information call Shirley Bagley, 496-6765, or Pat Cunningham, 496-1752. □

NETWORKS

(Continued from Page 1)

(LANs), making high-speed connectivity available to the researchers who need it most. Songco explains, "Scientists are interested in exchanging information and mail, but there's another dimension to their needs." They want the computer in their laboratory to be a powerful tool for research. The following examples show how NIH scientists are using the network for just that purpose.

Dr. Carl Saxinger, NCI, Laboratory of Tumor and Cell Biology:

Saxinger's laboratory is involved in all facets of HIV research: molecular biology, immunology, and vaccine design. When asked what role the network plays in his work, he responds, "I would almost be lost without it."

Through the Silicon Graphics Workstation in his lab he can access databases of information over the network. He uses the network to obtain molecular genetic sequences that can be manipulated and studied on the Silicon Graphics machine. These databases are updated frequently, so as scientists in one laboratory sequence a gene or protein and post it to a network database, almost immediately other scientists around the world can access that new information.

For Saxinger, "at the present time, the connections to the outside world are most important," more so than being connected to other researchers at NIH. Through the network, he is able to obtain public domain software for his research and to read and post to electronic bulletin boards. "If you have a question, you can find a B-board of experts to answer it for you," he says.

Equally important, bulletin boards carry grant and meeting announcements. "I'm going to an important meeting that I wouldn't have seen without the B-boards," adds Saxinger.

Arthur David Olson, Computer Programmer, NCI, Laboratory of Experimental Carcinogenesis:

Olson's lab originally got into computers for the analysis of 2-dimensional gel electrophoretograms. Simply put, they apply an experimental condition to a group of cells, break the cells up into proteins and then go about trying to figure out how many and what types of proteins are present. They are interested in how the different experimental conditions affect the types of proteins that remain.

This is important, explains Olson, because "there can be certain marker proteins that appear, disappear, or change in abundance when certain diseases are present." The work may eventually lead to the use of these marker proteins as a way to detect the early onset of diseases before clinical symptoms are noticeable.

Members of the lab have developed software to analyze the protein fragments their experiments produce, and they share this software over the network with 35 other laboratories doing similar work.

In the past, according to Olson, "they sent us mag tape; we processed it, and then we sent it back. It took a lot of time." Thanks to the network, each lab can now have its own copy of the software, and when new versions are written, the updates can be sent out over the network as well.

The network is also useful in the software design phase. Because scientists in different laboratories use different types of computers, the software must be designed to work on different machines. Using the network, Olson can test the software on a variety of computers maintained by DCRT.

Dr. Eric Ackerman, NIDDK, Genetics and Biochemistry Branch:

Ackerman conducts research in two areas: how toxins kill cells, and how damaged DNA is repaired by cells. Both projects are providing insights to other researchers working on cancer treatments.

"The computational aspects are not that sophisticated for a molecular biology lab," he concedes, but he often needs to obtain genetic sequences from DCRT's Convex or from the National Cancer Institute's computers at Frederick, Md. Since he has been connected to the network, this process has become easier and faster. "In the old days, if I needed to transfer a large sequence, it might take several minutes. Now I can do it in a second or two," he says.

He first found out about the network by reading *Interface* and *PC Briefs*, published by DCRT's Computer Center Branch and Personal Computing Branch, respectively. He made one phone call and, within days, members of the NTG arrived to connect his Macintosh to the 28-strand fiber optic CCnet backbone.

Perhaps the biggest impact that connectivity has had on Ackerman's day-to-day routine has been an improvement in his electronic mail capability. He uses a freeware mail program called Eudora that has all of the advantages of a modern word processing program. "Consequently, I use E-mail much more frequently, and I've found it to be a big help scientifically," he says.

Through E-mail he communicates with collaborators within his own building, around the NIH campus, around the country, and around the world. His recent work with a Dutch scientist has heightened his appreciation of the advantages of modern E-mail. "Sending E-mail is so much easier than faxing something overseas," Ackerman remarks, adding "the quality of the output is much better, and the messages are all stored on the computer so I don't have to file them in my desk. When we get to the paper-writing stage, it will be easy to E-mail drafts to each other, and make corrections on the computer."

Dr. Geoffrey Sobering, NCRR, In Vivo Nuclear Magnetic Resonance Research Center:

Alice Hawley of NIDDK studies protein folding with the aid of computer networks.

The Nuclear Magnetic Resonance (NMR) Center houses six machines: three small-bore instruments used for basic NMR research, various in vitro and chemical measurements, and animal research; and three large-bore, "whole-body" instruments used for methods development, animal and human research, and diagnostic imaging. The machines generate two types of images: "pictures" of living tissues, or spectra that show the presence of certain chemicals in living tissues. At first, however, these images are nothing more than unrecognizable strings of data that must be "processed" before they can be interpreted by researchers or physicians.

Sobering is in charge of computer data processing facilities in the NMR center. The LAN within the center and its connection to the NIH campus network help to simplify the complex processing procedure. Typically, it is necessary to move data between different machines that perform different functions, so it helps to be able to transfer it over the network in seconds.

Raw data or images recorded by the computer on an NMR instrument are transferred to a collection of networked SUN and Macintosh workstations for off-line processing. From there they may be stored on local hard-disks, backed-up on tape, or sent via RESnet to a DCRT file-server or to a researcher's own workstation in a lab somewhere on campus. Typically, some form of "number crunching" is applied to the data with the workstations. If more processing power is required, the data can be sent over the network to DCRT's Convex mini-supercomputer.

The resulting images, graphs, or other output may then be transferred to a Macintosh where there is better software for interactive analysis and production of color images, graphics, and slides. On the Macintosh, these graphics can also be incorporated into manuscripts for publication. To complete the cycle, the processed image may even be transferred back to an NMR instrument that is

capable of high-quality output.

The network makes it possible to move data back and forth easily between machines where it can be manipulated best. To a large extent, there is no choice but to transfer image and spectral data off the instruments to the workstations. No analysis software is available on the instruments because such software is much easier to develop for the general purpose workstations.

NIH researchers using the facility often rely on Sobering and other NMR center staff to assist with processing the data that is generated. "We are a repository of expertise, techniques, and methods, as well as being an instrument repository," Sobering explains.

Alice Hawley, Chemist, NIDDK, Laboratory of Chemical Biology:

Hawley's area of study in the protein chemistry and conformation section is protein folding; specifically, she's investigating "the underlying physical and chemical forces that hold a protein in its 3-dimensional form." She explains that each protein has a unique structure and "in biochemistry, it's not clear what the prominent force is that holds a protein in that structure."

Part of the work in her lab has involved examining the folding patterns of cytochrome c, a respiratory protein present in many animals. Scientists take cytochrome c from horses, tuna, Candida, and yeast, fragment the protein into two pieces, and then attempt to join a fragment from one creature with a fragment from another creature and form the original protein.

The Silicon Graphics Workstation in Hawley's laboratory proves to be a useful tool in this research. Over the network, she can access the PIR (Protein Identification Resource) database resident on DCRT's Convex computer. The specific protein structure and sequence for cytochrome c can be downloaded to the Silicon Graphics machine and the effects of specific amino acid changes can be analyzed.

There are two molecular modeling software packages (Gemm and Quanta) on DCRT's Convex that the lab uses over the network to examine the structure of protein molecules and to make quantitative calculations about the forces that bind the molecules together. The programs have been designed to be user friendly, which is important for scientists who perform sophisticated research but are not computer experts. "We spend most of our time doing experiments," Hawley remarked. "The computer is more of a tool for us. It lets us see, but it's not the end-all."

The Goal of RESnet

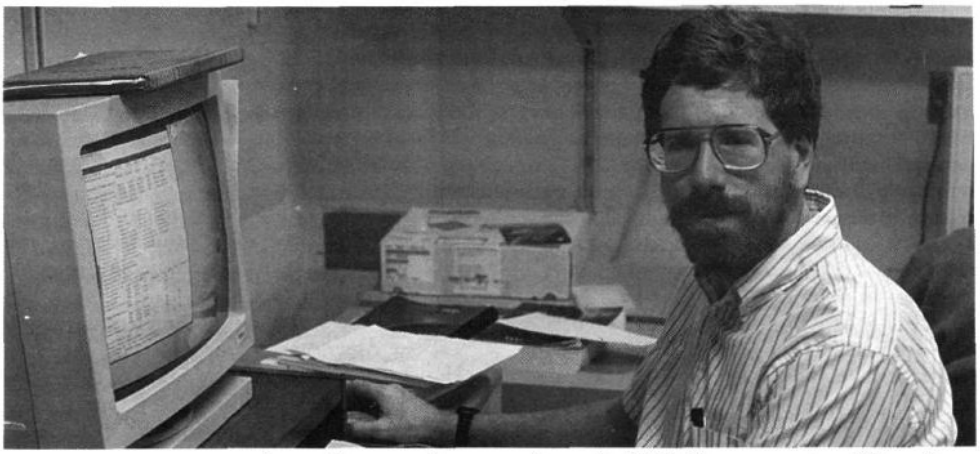
The fact that some scientists see the computer as "just a tool" excites rather than disappoints DCRT's network technicians. NTG's goal is to provide "seamless connectivity" to the NIH campus: a scientist requests information from a workstation; the command goes to the server and to the mainframe; and the scientist receives the information back without knowing how it got there.

"That is our ultimate goal," explains Dave Songco. "To bring computing to the scientist's bench, and do it in a transparent way so scientists can think about science and not about computers. A prerequisite for any of that is today's high-speed network."

If you are interested in connecting to RESnet or CCnet call 402-1547. □

Chamber Players Hold Concert

The NIH Chamber Players, a group composed of NIH employees and alumni, will give a concert of music for piano and strings on Friday, Sept. 13 at noon in the 14th floor assembly hall, Bldg. 10. All are invited to attend. Sponsored by FAES, the group will present Mozart's Quartet No. 1 in G Minor, Kochel 478 and Schubert's Trio in B Flat, Op. 99. Refreshments will follow the concert. □



Dr. Geoffrey Sobering is in charge of computer data processing at the NMR Center on campus. His work involves moving data rapidly between computers and instruments.

Genome Lecture Series Set

The National Center for Human Genome Research is sponsoring the Human Genome Lecture Series to be held at NIH. The series will feature nine distinguished scientists in the field of genome research, covering topics that span the breadth of the human genome project's goals. The schedule is as follows:

Sept. 19, 11:30 a.m., Masur Auditorium, Bldg. 10, "Why We're Sequencing the Yeast Genome," Dr. David Botstein, professor and chairman, department of genetics, Stanford University School of Medicine.

Oct. 17, 11:30 a.m., Lipsett Amphitheater, Bldg. 10, "The Human Genome Project and Society: A Simultaneous Concern for Science and Social Impact," Dr. Nancy Wexler, president, Hereditary Disease Foundation.

Nov. 20, 2 p.m., Lipsett Amphitheater, "New Computational Methods for Genome Analysis," Dr. Thomas Marr, senior staff investigator, Cold Spring Harbor Laboratory.

Dec. 19, 11:30 a.m., Lipsett Amphitheater, "Genetic Mapping of Human Breast Cancer," Dr. Mary Claire King, professor, department of biomedical environmental health science, University of California, Berkeley.

Jan. 16, 1992, 11:30 a.m., Lipsett Amphitheater, "The Genome of C. Elegans: Mapping and Sequencing," Dr. Robert Waterston, professor, department of genetics, Washington University School of Medicine.

Feb. 20, 11:30 a.m., Lipsett Amphitheater, "High Speed DNA Sequencing in Ultrathin Gels," Dr. Lloyd Smith, assistant professor, department of chemistry, University of Wisconsin.

Mar. 19, 11:30 a.m., Lipsett Amphitheater, "Social Implications: Genetics and Popular Culture," Dorothy Nelkin, department of sociology, New York University.

Apr. 16, 11:30 a.m., Lipsett Amphitheater, "Genome Mapping and the Functional Organization of the Interphase Nucleus," Dr. Jeanne Lawrence, assistant professor, department of cell biology, University of Massachusetts Medical School.

May 21, 11:30 a.m., Lipsett Amphitheater, "Consequences of the Human Genome Project for the Future of Medicine," Dr. Francis Collins, professor, department of internal medicine, University of Michigan School of Medicine.

Anyone interested in more information or in meeting with an invited speaker may call Dr. Carol Dahl, 402-0838. □

DCRT Fall Computer Training Gets Under Way

School starts in September, and the fall program of the DCRT Computer Training Program offers many new opportunities to learn about computers and their applications in research.

Scientific computing is the topic of a number of seminars. They include "Analysis of Ligand Binding Data Using the LIGAND Program" on Sept. 20, "Downloading Sequences from GenBank on the Convex" on Oct. 8, and "Recurrent Problems in Data Analysis" beginning Dec. 9. A 2-part seminar on topics related to flow cytometry is planned for Sept. 26 and 27 featuring several speakers from the NIH intramural research community. On Nov. 13, Dr. Ralph Nossal will speak on "Advances in Tissue Optics."

A general description of what bibliographic managers are and how they can be used to manage references for use in manuscripts are some of the topics to be discussed on Sept. 19 in "Manuscript Preparation Using Bibliographic Manager Programs." Three programs will be discussed.

A course on SPSS, a comprehensive and integrated system for statistical data analysis, will begin on Sept. 9. This course will be offered on five consecutive mornings. Students will learn to write SPSS programs, define and analyze data, manipulate files, perform statistical computations, create and use SPSS System files, and interpret error messages and SPSS output.

SAS has long been the most popular statistical software at NIH. On Sept. 30 through Oct. 11 and again on Dec. 2-13, the Laboratory of Statistical and Mathematical Methodology will offer the class "Use of SAS at NIH."

Structured Query Language (SQL) and Query Management Facility (QMF) are tools used to select, insert, update, and delete data in DB2 tables. These and other tools will be discussed in the Sept. 11-13 course, "DB2: SQL and QMF Selected Topics." Other popular DB2 courses include "DB2 Application Programming," beginning Oct. 7 and "Getting Started with DB2" beginning Nov. 21. Students interested in DB2 should register early because these classes fill up quickly.

For people who plan to begin programming or who currently use programs written by others, the course "Introduction to Programming and Program Logic," starting Oct. 21, may be useful in teaching more about programming concepts. This course is only offered during the fall semester.

C language is gaining wide use because programs written in C language for one type of computer can be used on many others without recoding. A 5-day class, "C Language Fundamentals," begins on Sept. 30. Four 3-hour sessions in "Getting Started with C" will be given starting Sept. 16 for anyone who needs additional background before taking the rigorous full-week fundamentals course.

The Microsoft Windows environment that runs under DOS on the PC will be the subject of three new seminars: "Introduction to Microsoft Windows" on Sept. 30, "Windows Sampler" on Nov. 26, and "Windows Optimization" on Dec. 26.

PostScript is a programming language specifically designed for creating text and graphics on a printed page. A new seminar, on Nov. 8, "Introduction to the PostScript Language," will describe the features of Adobe's PostScript.

Beginning Sept. 18, the Convex staff will inaugurate a monthly series of question-and-answer sessions. Another new offering for Convex users is a 3-session introduction to the Perl language, to be given starting Oct. 28. During each class, a 1-hour lecture will be followed by an opportunity for hands-on practice. "GCG Sequence Analysis on the Convex," starting on Nov. 12, will cover topics such as homology searching against DNA and protein databases, sequence assembly, sequence comparisons, and general sequence analysis tools.

Software for the Macintosh has developed rapidly in the last few years, and a wide range of application programs is now available for scientists. Areas of potential interest to NIH researchers include extremely user-friendly systems for statistical analysis, publication-quality graphics and charting, powerful numerical computations and extensive special function libraries, and DNA sequencing and file management. Macintosh seminars offered this fall include "Macintosh Software for the Scientist" on Nov. 25, "Image Processing on the Macintosh II" on Nov. 6, "Macintosh System 7 Overview" on Nov. 5, "Macintosh Networking with System 7" on Oct. 16, "Scripts and Buttons in Filemaker Pro on the Macintosh" on Dec. 10, "Using MacVector" on Nov. 21, "Macintosh Dialup and Network Connectivity" on Nov. 19, and "Macintosh Networking with TCP/IP" on Nov. 27.

A seminar featuring BITNET, the network linking thousands of computer installations at universities, research organizations, government facilities, and commercial institutions throughout the world, is being offered twice, once on Sept. 25 and again on Nov. 20. This seminar will teach students how to send and receive Bitnet electronic mail, how to join an electronic mailing list, how to send a DOS file created on a PC, and how to list the Bitnet members in other countries. A 2-hour seminar on ENTER MAIL, the state-of-the-art electronic mail system on the IBM/370 mainframe, will be offered on Sept. 17 and again on Nov. 14.

Three seminars on networking are being offered this fall. The new "Introduction to NUnet for the New User" seminar presents a brief history of connectivity at NIH. This class is comprised of a morning lecture and an optional hands-on lab on Nov. 19. "Technology for Connecting Networks at NIH—NUnet" on Oct. 22 discusses mail connectivity on NUnet and among various local area networks. "NUnet, LAN, and Mainframe Mail Connectivity" on Nov. 7 is aimed at technical LAN coordinators, LAN administrators, engineers, programmers, and others interested in a technical understanding of the NIH connectivity architecture.

This semester also brings two stimulating seminars on innovations in computing. They include "Directions in Computing" on Oct. 25 and "Introduction to CASE (Computer-Aided Software Engineering)" on Oct. 21.

All together, the fall semester includes more than 60 courses and seminars. All classes in the DCRT Computer Training Program are given without charge. For assistance in registering, call the Computer Center Training Unit, DCRT, 496-2339. To receive a brochure fully describing all of the computer training courses and seminars to be offered this fall, visit the Technical Information Office in Bldg. 12A, Rm. 1015, or call 496-5431. For WYLBUR users, the information is also available online through the ENTER TRAINING command. □

Lecture on AIDS, Human Rights

The medical scientists committee (affiliated with Amnesty International) is sponsoring a lecture by Dr. Morton Winston on "AIDS and Human Rights," on Thursday, Sept. 19, from 2:30 to 3:30 p.m. in Masur Auditorium, Bldg. 10.

Winston is associate professor of philosophy at Trenton State College, New Jersey, and a member of the executive committee of the board of directors of Amnesty International-USA. He is the author of the book, *Philosophy of Human Rights* and numerous articles in the fields of ethics and biomedical ethics. □

Annual Asian American Health Fair

The annual Asian American Health Fair will be held on Saturday, Sept. 7 from 9 a.m. to 3 p.m. at the Visitor Information Center, Bldg. 10.

The main theme this year is "Understanding and Prevention of AIDS." As part of the event blood tests will be offered at a nominal cost, and free services of routine screening and consultation for health, nutrition and dental care will be provided.

The fair is sponsored by the Organization of Chinese Americans, Chinese Medical and Health Association, Organization of Chinese American Women, and assisted by the Montgomery County Government, D.C. Government and many other private organizations.

For more information call (301) 402-0702. □

TRAINING TIPS

The NIH Training Center of the Division of Personnel Management offers the following:

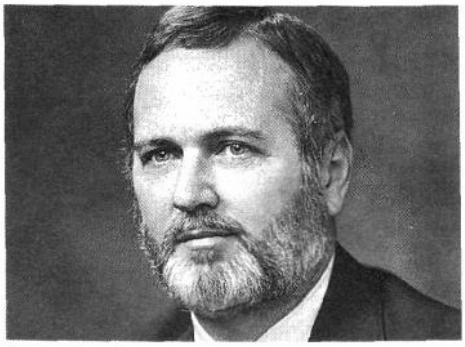
Courses and Programs	*Starting Dates*
Personal Computing Training	*496-6211*
Welcome to Macintosh	9/11, 9/20
Excel Level 3	9/12
HyperCard Programming-Level 2	9/18
3Com PC Network-Level 1	9/5
3Com PC Network-Level 2	9/9
3Com PC Network Management-Level 1	9/16
Introduction to DOS	9/5
Introduction to WordPerfect 5.1	9/4
Intro to Harvard Graphics, Rel. 2.3	9/5
Intermediate dBASE III +	9/10
Intro to Lotus 1-2-3, Release 2.2	9/9
Introduction to CRISP	9/10
The New CRISP Thesaurus	9/10

NCI Pharmacist Robert Moore Dies

Robert C. Moore, 49, a pharmacist with NCI's Pharmaceutical Resources Branch, Developmental Therapeutics Program, died July 31 of a heart attack.

Born in Rock Hill, S.C., Moore received a B.S. in pharmacy from the University of Georgia in Athens in 1969, and a doctorate in pharmacy from the University of Tennessee.

In the 1970's he was an assistant professor of pharmacy care administration at the University of Georgia in Athens and the University of Florida in Gainesville. From 1977 to 1978, he was a senior clinical research associate at Abbott Laboratories, Inc., in Chicago, conducting premarket testing of drugs. In 1978, he joined the Health Care Financing Administration in Baltimore as a program analyst. From 1982 to 1985, he worked for the United States Pharmacopeial Convention, Inc., in Rockville, where he directed a pharmaceutical reporting system and chemical safety program. He returned to HCFA in 1988 and helped implement the Medicare Catastrophic Coverage Act passed that year. He joined NCI early this year.



Robert C. Moore

He is survived by his wife, Elizabeth Clark Moore and a son, John Robert Moore.

NCI's David Byar, Biometry Branch Chief, Mourned

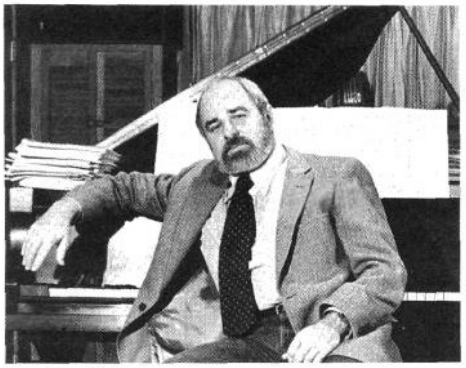
Dr. David P. Byar, 53, who was chief of the Biometry Branch, Division of Cancer Prevention Control, NCI, died on Aug. 8. His primary interest was the design of cancer prevention and screening studies and assessment of epidemiologic evidence. He had been with the institute for 25 years.

Born in Lockland, Ohio, Byar graduated from high school as valedictorian in Maryville, Tenn. He received his A.B. degree in 1960 from Emory University in Atlanta, and received his M.D. degree from Harvard Medical School in 1964.

After serving 1 year as a surgical intern in Denver, he went to work for 3 years at the Armed Forces Institute of Pathology where he studied the pathology of genitourinary tumors and performed laboratory experiments on the uptake of radioactive zinc by organ cultures of rat prostate tissue.

During that time, Byar started studying statistics and, in 1966, joined NCI as a fellow. In 1968, he became a medical officer in the Biometry Branch where he was principal statistician for several clinical trials for treatment of prostate and bladder cancers.

In 1972 the clinical and diagnostic trials section was formed with Byar as its head. The section divided its efforts between methodological work in biostatistics; applied work in designing, conducting, and analyzing clinical trials and other cancer studies; and consultation on biostatistical problems. He became chief of the Biometry Branch in 1985.



Dr. David Byar

In 1981, Byar was elected a fellow of the American Statistical Association, cited "for rare capacity, reflecting an unusual combination of medical and statistical expertise, to bring scientific rigor to clinical testing; for work in statistical theory; and for effectiveness as a communicator between statisticians and medical researchers."

In 1984, he was elected to the International Statistical Institute, and in 1991, he was named an honorary fellow of the Royal Statistical Society "in recognition of services to statisitics."

A scientific workshop in Byar's memory will be held at NIH on Nov. 7-8, 1991. To register, contact Jennifer Gaegler, 496-8556.

Deadline Near for Postdoctoral Research Catalog Submissions

Tenured scientists are reminded that materials must be submitted to the Office of Education by Sept. 16 if they are to be included in the *1991-1992 Postdoctoral Research Fellowship Opportunities Catalog*. Individuals who have not received information about catalog listings should contact their chief or the Office of Education, 496-2427. Since the 1991-1992 catalog will include information on all tenured faculty, cooperation of all scientists is requested. □

NIMH Studies Need Women

The section on behavioral endocrinology, Biological Psychiatry Branch, NIMH, is currently seeking female volunteers between the ages of 18 and 45 to participate in studies on premenstrual syndrome. Volunteers must have regular menstrual cycles with no changes in mood in relationship to menses, be free of medical illnesses and not taking any hormones or medication on a regular basis. They will complete daily rating forms and be asked to participate in one of several protocols. They will also be paid in accordance with the duration of each visit and type of protocol. For more information call Dr. Rosenstein, 496-9675. □

Adolescent Subjects Needed

The Clinical Neuroendocrinology Branch, NIMH, and the Developmental Endocrinology Branch, NICHD, are conducting an outpatient evaluation study on depression in adolescents ages 11 through 16. Biological and psychological characteristics of depression will be examined. The study does not involve drug treatment. A group of healthy, nondepressed adolescents is also needed to serve as a comparison group. All individuals will receive monetary compensation for their time. For more information call 496-4319. □

NIA Seeks Volunteers

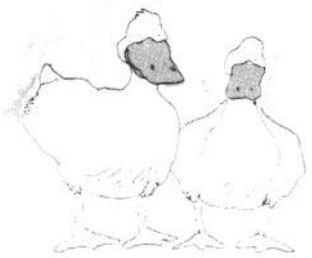
The Laboratory of Neurosciences, NIA, is seeking healthy volunteers to participate in a study investigating the effects of aging on brain functions. Volunteers must be in excellent health, medication free, and without past or present major health problems. Those under age 30 and above age 60 are particularly needed. Procedures require approximately 13 hours; participants can receive a stipend of up to $300 depending on the actual time involved. For more information call 496-4754, Monday through Friday, 9 a.m. to 5 p.m. □

Listen to a Few Wise Quacks About Lowering Cholesterol Levels

Don't be surprised if you turn on the television this month and see ducks talking about cholesterol. It's okay; you haven't been working too hard or not getting enough sleep. It's part of the National Cholesterol Education Program's (NCEP) new public service announcement, "Listen to a Few Wise Quacks About Cholesterol." This lighthearted PSA depicts a family of ducks expressing concern about their cholesterol levels. Yet the PSA carries a serious message, one prompted by the release of NCEP's expert panel reports: Everyone should follow a low saturated fat, low cholesterol eating pattern and lower their blood cholesterol. This message applies to adults and children over 2 years of age, not just to patients diagnosed with high blood cholesterol.

Also, watch for *Eat Smart* on your local PBS stations Sept. 16. NCEP materials will be offered along with the USDA/DHHS *Dietary Guidelines for Americans* and publications from the National Cancer Institute.

If Hollywood isn't your style, you can participate in National Cholesterol Education Month right here at NIH. NHLBI and the Occupational Medical Service (OMS), in cooperation with R&W and Guest Services Inc., have arranged for cholesterol screenings and for the "Stay Young at Heart" program's heart healthy food selections to be available in the NIH cafeterias throughout the month.



To have your blood screened, laboratory slips must be obtained in advance from any of the R&W gift shops. The laboratory procedure costs $5. Employees may have their blood drawn at any of the screening sites on a first come, first served basis (see schedule). NHLBI's *Facts About Blood Cholesterol* will be provided to all screening participants.

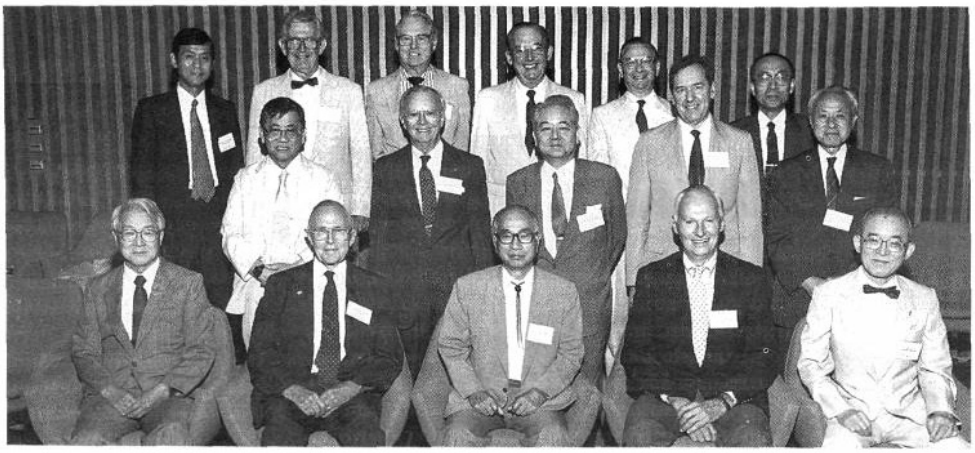
To participate in the "Stay Young At Heart" program, just bring your appetite to any of the NIH cafeterias during the month of September. Guest Services Inc. will conduct a special promotion of the program's heart healthy cuisine. Some of the gastronomic delights that will be available include stir-fried beef and vegetables, very lemony chicken, fish veronique, wonderful stuffed potatoes, and banana mousse, to name just a few. These special dishes originated in the NHLBI's Multiple Risk Factor Intervention Trial and Coronary Primary Prevention Trial to help people reduce their intake of calories, fat, saturated fat, and cholesterol—steps toward a healthy heart. Be sure to try the specials and see how delicious heart healthy fare can be. Don't forget to take home the recipe cards and make heart health a family affair.

The National Cholesterol Education Month activities at NIH are part of a broad national public education campaign that emphasizes the importance of finding out your cholesterol level and learning what it means. It also is designed to encourage everyone to take action to control their blood cholesterol by eating foods low in saturated fat, total fat and cholesterol. Do you know your cholesterol number? Do you know if it is too high? Take advantage of National Cholesterol Education Month to increase your awareness of high blood cholesterol as a risk factor for heart disease and learn how you can lower your blood cholesterol level and taste some heart healthy cuisine.

Detailed NHLBI brochures, *Eating to Lower Your High Blood Cholesterol* and *So You Have High Blood Cholesterol*, will be provided to individuals whose cholesterol readings are elevated.—Eileen Newman

Cholesterol Screening Schedule (All Dates in September)

Place	*Dates*	*Hours*
Bldg. 10/Rm. 6C306	10, 17, 24	8-11 a.m.
Housekeeping	12	1-3 p.m.
Bldg. 10/Rm. B1D25		4-5 p.m.
Bldg. 13/Rm. G904	11, 25	8-11 a.m.
Bldg. 31/Rm. B2B57	19, 23	8:30-11:30 a.m.
Bldg. 38A/B1N30Q	19, 23	1-4 p.m.
Westwood/Rm. 11	11, 25	1-4 p.m.
Federal/10B08	26	1-3 p.m.
EPN/103	26	8:30-11 a.m.
Fitness Center Bldg. 31/C-Wing B4 level	24	Noon-2 p.m.



Minister Hiroshi Hirabayashi of the Embassy of Japan (top, l) recently welcomed delegates to the NIAID-sponsored 27th annual meeting of the U.S.-Japan Cooperative Medical Science Program at NIH: (front row, from l) Dr. Akira Oya, Dr. Theodore Woodward, Dr. Shiro Someya (Japanese delegation chair) Dr. Charles Carpenter, Jr. (U.S. delegation chair), Dr. Tadao Shimao; (second row, from l) Dr. Takashi Sugimura, Dr. Richard Krause, Dr. Toshitsugu Oda, Dr. Robert Shope, Dr. Wataru Mori; (top row, from l) Dr. David Rall, Dr. Donald Whedon, Dr. Edward Hook, Jr., Dr. Barry Bloom, Dr. Hiroo Imura. The program provides an opportunity for American and Japanese scientists to cooperate in studying ten disease-related areas important to the health of the peoples of Asia.

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