Cancer Mortality Study Of U.S. Nonwhites Shows Relation to Environment

A new geographical study of cancer death rates among the nonwhite population in the United States further supports a relationship between environment factors and cancer risks, according to a recent National Cancer Institute report.

The Atlas of Cancer Mortality Among U.S. Nonwhites: 1950-1965 describes geographic patterns for cancer among whites. 1969, which describes geographic patterns for cancer among whites, but further study will be necessary before many of the specific reasons for these patterns can be identified.

RELATES TO OTHER ATLAS

The Atlas is a companion publication to the Atlas of Cancer Mortality for U.S. Counties: 1950-1965, which describes geographic patterns for cancer among whites. Authors of both volumes are Dr. Thomas J. Mason, Frank W. McKay, and Drs. Robert Hoover, William J. Blot, and Joseph F. Fraumeni, Jr., of the NCI Environmental Epidemiology Branch. Both publications are based on reports of the Cancer Mortality Study.

(See CANCER STUDY, Page 5)

3 NIH Publications Win 1976-77 STC Awards

Three NIH publications received awards from the Society for Technical Communications at the 1976-77 awards luncheon of the Washington, D.C. chapter on Jan. 18 at the Bolling AFB Officers Club.

In the brochures category, The Human Heart—A Living Pump, a National Heart, Lung, and Blood Institute publication, won an Award of Excellence.

In the house organs category, the NIH Record received an Award of Excellence.

The Journal of the National Cancer Institute received an Achievement Award in the complete periodicals category.

Winners of the Awards of Excellence are entered automatically in the STC International Publications Competition in May.

Research on Prisoners Is Subject of Commission's Recently Released Report

On Jan. 14 HEW Secretary David Mathews released the Report and Recommendations on Research Involving Prisoners compiled by the National Commission for the Protection of Human Subjects of Biomedical and Behavioral Research.

The Commission was established in late 1974 under the National Research Act, Public Law 93-348, and was required to make recommendations with regard to research on human subjects generally, and on prisoners, the mentally infirm, psychiatry, and the fetus.

Recommendations Implemented

Recommendations on fetal research appeared in August 1975, and were promptly implemented by HEW.

The Commission has carried out an extensive study of the nature of research on prisoners conducted in the U.S. In addition, Commission members made visits to four prisons, including interviews with inmates who had been research subjects. Consultants to the Commission conducted similar studies at five additional prisons.

Public hearings were held to hear testimony from prisoner advocates, prisoner legal services, research scientists, and members of the general public.

The Commission also sponsored an extensive study of the nature of research on prisoners conducted in the U.S. In addition, Commission members made visits to four prisons, including interviews with inmates who had been research subjects. Consultants to the Commission conducted similar studies at five additional prisons.

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The NIH Record reserves the right to make corrections, changes, or deletions in submitted copy in conformity with the policies of the paper and the Department of Health, Education, and Welfare.

NIH Record Office — Bldg. 31, Rm. 2B-03. Phone 49-62125

January 26, 1977

THE NIH RECORD

Blood Donor Month Held; Everyone Urged to Give

In celebration of National Blood Donor Month—January 1977—President Ford issued the following statement:

“Blood Donor Month gives all Americans an annual opportunity to honor their fellow citizens who have voluntarily given blood so that others might live.

“They are a nation whose well-being they have served.

“I urge every American to join in building an all-voluntary system of blood donation. It is in the finest American tradition of humanitarian concern for those in need.”

Everyone is urged to give blood in support of patient care and the NIH Blood Assurance Program in the Clinical Center.

To become a volunteer donor, please contact Jimmie Driscoll, CC Blood Bank, Ext. 61048, 8:30 a.m. to 4 p.m.

Maximum Per Diem Travel Costs Increase

The maximum daily per diem travel allowance has increased from $33 to $35, effective Oct. 1, 1976. It was last increased in May 1975.

The rate is higher in some, specified, cities: Washington, D.C., and Queens and Brooklyn, N.Y., are now $50 a day. New York City metropolitan area was already $50. Others above the $55 maximum are Boston, $49; Philadelphia, $46; Chicago, $43; Newark, $42; San Francisco, $41; and Los Angeles, $40.

The uniform daily allowance for meals and other expenses has increased from $14 to $16 a day.

The mileage rate for Federal employees who use their own cars on Government business has increased from 15 cents to 15 ½ cents a mile. For privately owned aircraft used on Government business the rate has increased to 22 cents to 24 cents a mile.

Also the Washington, D.C., rate has been expanded and now includes—Virginia—the cities of Alexandria, Falls Church, Fairfax, and the counties of Arlington, Loudoun, and Fairfax. In Maryland it includes Montgomery and Prince George’s counties.

Active C.O.’s Get Dental Care

Commissioned Officers of the U.S. Public Health Service on active duty and assigned to NIH can receive dental care at the Commissioned Officers Dental Clinic, Bldg. 31, Room B2-B34.

For more information and appointments, call Ext. 62044 between 8:30 a.m. and 2 p.m.

Registration for FAES Courses Jan. 27-Feb. 2

In-person registration for spring courses in the Graduate Program, sponsored by the Foundation for Advanced Education in the Sciences, begins tomorrow (Thursday, Jan. 27) through Feb. 2 in the FAES office located in the Bookstore, Bldg. 10, Room B1-L-101.

The spring Catalog Supplement omitted in error the course on Medical Bacteriology, MIRC 390, which will be given on Wednesdays, from 5:30 to 7:30 p.m.

Also, a new course, Introduction to Studio Art, GENL 106, is being offered on Thursdays from 7:40 to 9:40 a.m.

PSYC 242, Death and Dying, has been cancelled by the instructor.

For information, call Ext. 65272.

Special Westwood Drive Seeks Blood Donors

Because blood shortages are greatest during the winter season, the Clinical Center Blood Bank and the Montgomery County chapter of the American Red Cross are holding a drive at the Westwood Bldg., Conference Room D, on Tuesday, Feb. 1, from 9:30 a.m. to 3:15 p.m., for new and regular donors.

Help make this winter safe for those who need blood.

Blood Donor Month Held; Everyone Urged to Give

In celebration of National Blood Donor Month—January 1977—President Ford issued the following statement:

“Blood Donor Month gives all Americans an annual opportunity to honor their fellow citizens who have voluntarily given blood so that others might live.

“Their gift is easy and painless. Yet it represents one of the supreme acts of human compassion and generosity.

“It has earned them the thanks of many grateful recipients and of a nation whose well-being they have served.

“I urge every American to join in building an all-voluntary system of blood donation. It is in the finest American tradition of humanitarian concern for those in need.”

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Radiation Safety Talks For Housekeeping NIH’ers

How to avoid the potential hazards of radiation sources will be discussed in a presentation entitled Radiation Safety for Housekeeping Personnel.

So that all interested persons may attend, three sessions will be held in the CC Maxim Auditorium:

Wednesday, Feb. 9, from 2 to 3 p.m. and from 5 to 6 p.m.

Thursday, Feb. 10, from 2 to 3 p.m.

The program will be presented by the Radiation Safety Branch, DRS, in cooperation with the Environmental Sanitation Control Department, CC, and the Sanitation Services Branch, DAS.

Interested employees should contact their supervisors to schedule attendance.

History of Med. Soc. Meets Tomorrow to Hear 2 Speakers

The next meeting of the Washington Society for the History of Medicine will be held tomorrow (Thursday, Jan. 27) at 8 p.m. in the Billings Auditorium at the National Library of Medicine.

Fear, Confusion, Optimism; People's Health Movement will be discussed in a presentation entitled The Art of Healing in Pre-Hispanic Peru.

Visitors are welcome.

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Help make this winter safe for those who need blood.

Computer operator Linda Ford puts a fresh roll of paper into the new IBM 3800, the high-speed printer recently installed in the National Library of Medicine's computer room. Instead of printing by the impact of mechanical type, the IBM 3800 uses a combination of laser and electrophotographic technology. The previous printer produced off-line rates of about 900 lines per minute. The new printer's high-speed capability of about 9,000 lines per minute should continue to assure next-day mailing of bibliographies printed off-line, even with increased use of the system.
NIH Visiting Scientists Program Participants

1/1—Dr. Katerina Dorovini-Zis, Greece, Medical Neurology Branch. Sponsor: Dr. W. King Engel, NINCDS, Bg. 10, Rm. 10D16.
1/1—Dr. Israel Izja Lederhendler, Canada, Section on Neural Systems. Sponsor: Dr. Daniel L. Alkon, NINCDS, Bg. 36, Rm. 2A29.
1/1—Dr. Hiroshi Oda, Japan, Laboratory of Central Nervous System Studies. Sponsor: Dr. Carleton Gajdusek, NINCDS, Bg. 36, Rm. 8B16.
1/1—Dr. Michael Przybylski, Germany, Laboratory of Chemical Pharmacology. Sponsor: Dr. Richard H. Adamson, NCI, Bg. 37, Rm. 6D1.
1/1—Dr. Stephen I. Katz, NCI, Bg. 10, Rm. 2A29.

Dr. Gottschalk Is Given Kidney Foundation Award

Dr. Carl W. Gottschalk, University of North Carolina, was recently presented the David M. Hume Memorial Award. The presentation was made by Dr. Nancy B. Cummings, associate director for Kidney, Urologic, and Blood Diseases in the National Institute of Arthritis, Metabolism, and Digestive Diseases.

Dr. Gottschalk—honored at the National Kidney Foundation annual awards banquet in Washington, D.C.—was cited for his significant contributions to the understanding of kidney function, notably for the development of a technique for analysis of nephron function in mammals.

This technique has opened the door to a wealth of knowledge about kidney activity in health and disease.

He is co-chairman of a NIAMDD-supported study, Evaluation of Research Needs in Nephrology and Digestive Diseases.

Fluorides and Caries: Proceedings of Dental Symposium Published

The proceedings of an international symposium on the Cariostatic Mechanisms of Fluorides have been published as a special supplement to Caries Research.

The symposium, held in 1976, was sponsored by the National Caries Program of the National Institute of Dental Research and organized in cooperation with the American Dental Association Health Foundation.

The purpose of the symposium was to evaluate existing information on the mechanisms of action of fluorides and to provide a basis for development of more effective fluoride regimens for the prevention of dental caries.

The proceedings encompass in vivo and physicochemical aspects of fluorides in caries inhibition and the biochemistry and microbiology of plaque fluoride. Specific assessments of these areas of research and recommendations for priorities of future research are also included.

A limited number of copies of this publication are available from Dr. Thomas C. O’Brien, Westwood Bldg., Room 522, Ext. 67884.
Investigators Check Pressure of Cheeks
As Measurable Force in Shifting Teeth

Wind instrumentalists may find strong cheek muscles advantageous, but orthodontists find them a problem because these muscles can work to collapse the dental arch.

Dr. Sam Weinstein, professor of Connecticut School of Dental Medicine, and Dr. Wallace W. Bowley, professor of mechanical engineering from the Storrs campus, have teamed up to measure cheek muscle forces.

The co-investigators, who have received a grant from the National Institute of Dental Research to help orthodontists design appliances which receive cheek pressures and transmit them via the tube to a recorder.

Institute of Dental Research to help support their study, are interested in providing information which will help orthodontists design appliances to reduce the forces that cheek muscles exert on teeth. These forces are strong enough to shift teeth to different positions.

Co-Workers Named

Working with them will be Dr. Thomas Gay, an associate professor of oral biology, and Dr. Raymond Vanderby, a research fellow in engineering.

As Dr. Weinstein explained in a recent interview: “In orthodontics we are always dealing with small forces because we use appliances to move teeth very short distances over time to improve bite or alignment.

Relapse May Occur

“Once the new, desired tooth position has been achieved,” he observed, “we sometimes see a relapse with a tooth, or teeth, returning to the original location. Cheek pressures can help cause this in certain cases.

“We've known for a long time,” Dr. Weinstein added, “that cheeks exert an inward force on teeth. Among the key questions are: How much and what levels of forces are present as teeth are moved outward or inward, toward or away from the cheek?”

The team will use a unique device developed by Dr. Bowley to obtain exact information about the effects of cheek muscle forces.

It consists of a removable partial plate with a small plunger which can rest against the inside of the cheek. The appliance is connected to electronic recording equipment outside the mouth.

As the plunger moves in or out responding to changes in pressure from the cheek, its movements, as well as cheek forces, are displayed and recorded by the electronic equipment.

“This has to be sensitive,” Dr. Weinstein noted, “because we are dealing with distances of only a few millimeters and forces of several grams per tooth. Forces placed on teeth by braces are much greater.”

He pointed out that even a small force acting steadily over weeks and months can have a significant effect and must be considered by orthodontists.

“Even at rest,” he added, “the cheek exerts about four to five grams of force against each tooth. This force increases as teeth are moved outward against the cheek.”

In addition to forces, the team will also study some other characteristics of cheek muscles. For example:

Future Studies Outlined

Do the muscles tend to adjust and lose some of their inward pressure after an orthodontic appliance holds the cheeks outward for a period of time?

Do they increase their rate of tension in a uniform or nonuniform pattern?

How do they change with age and growth?

BONE EXPERTS

(Continued from Page 1)

Dr. Alvioli said, “We know that diet may play an important role in predisposing to the increased incidence of bone fractures in some people.”

One of the aspects that makes the Bone Center so special is the development of simplified bone biopsy procedures which can be performed under local anesthesia.

Also, the center is one of the few places in the Nation studying the effects of cortisone on bone metabolism.

Another technique developed is use of the scanning electron microscope, which has proved most effective in delineating the actual structural defect in the bone collagen of children with an inherited disorder of bone known as osteogenesis imperfecta.

Studies Cause

These studies were instrumental in detailing the specific cause for the many bone fractures experienced by these children.

The inevitable bone loss associated with chronic renal disease is another area in which the Bone Center has made some significant progress through development of a method of measuring parathyroid hormone levels in blood.

Research in this area has led to exciting new concepts regarding prevention of bone disease “by appropriate dietary manipulation...now being applied worldwide,” according to Dr. Avioli.

While tackling the major problems of renal osteodystrophy, there are occasional spin-offs which lead to discoveries in allied areas.

For instance, specialized techniques developed to look at vitamin D, calcium, and phosphate metabolism led to the development of assays which can be routinely applied to patients.

Another area of study is in treating Paget’s disease, a bone disorder with an unknown cause which may affect over 10 percent of the geriatric population.

Hormone Evaluated

The hormone calcitonin, which comes from the thyroid gland and blocks bone resorption, was recently evaluated. When it proved capable of suppressing the bone disease without deleterious side effects, it was successfully administered to patients with the disease in a routine fashion.

A detailed article by Phyllis Hillinger about the Washington University School of Medicine Bone Center was recently published in their quarterly publication, Outlook.

A single free copy of a 7-page reprint describing the center, entitled Bone Disease Study at the General Clinical Research Center, is available at the Office of Science and Health Reports, DRR, NIH, Bethesda, Md. 20014.

Absorption of calcium from the patient’s food is of prime consideration in dietary treatment of various bone diseases. The Tri-Carb Scintillation Spectrometer measures the calcium absorbed by the skeleton. Clinical researchers are delving into the relationship between vitamin D and bone loss.

D, calcium, and phosphate metabolism led to the development of assays which can be routinely applied to patients.

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Puerto Rican Scientists Report Progress Toward Immunizing for Schistosomiasis

Progress in immunization against schistosomiasis, an unconquered parasitic disease, has been reported by Dr. George V. Hillyer, head of a research group at the University of Puerto Rico.

Appearing in the December 1976 monthly publication of the Federation of American Societies for Experimental Biology, the report, Can We Vaccinate Against Schistosomiasis?, is one of eight scientific papers written by researchers of the Minority Biomedical Support Program, which is funded by the Division of Research Resources.

Parasites Cause Disease

Schistosomiasis is a disease of man and animals caused by blood flukes (parasitic worms) of the genus Schistosoma. The parasites causing human disease are found in the Orient (an estimated 200 million Chinese are infected), portions of Africa including The Nile, South America (especially Brazil), and some of the islands for the Caribbean.

Infectious Host Needed

It is estimated that 300,000 persons are infected in Puerto Rico. Infection does not occur in the U.S., but is present in the bloodstream of some immigrants entering the country.

It takes three to make a schistosomiasis infection—mammalian host, intermediary snail host, and the parasitic schistosome (a blood worm or fluke).

Transmitted by excretion, a schistosome egg passes through the intestine of an infected mammal into fresh water and hatch into a larval stage called a miracidium.

The miracidium infects a specific type of snail, and after several developmental changes in the snail, the parasite evolves into a fork-tailed larva or cercaria.

When it makes contact with a snail, the cercariae leave the mollusk, it propels its way through the water in search of a mammalian host.

When it makes contact with a human being, it penetrates the skin and enters the body. The cercariae eventually turn into mature schistosomes which live in the bloodstream. The parasites mature and eventually lay its eggs in the body. The adult worms remain in the blood vessels surrounding the intestinal tract or urinary bladder, their eggs traveling through the bloodstream to various organs of the body, particularly the liver. The victim generally experiences itching, pain, weakness, and a shortened life span.

Re-infection Resisted

When animals and man are infected with schistosomes, they acquire immunologic resistance to re-infection. Apparently the excretory product of the schistosome causes a produce a toxicity which is induced by an antigen.

Dr. Hillyer's group has been conducting long-range studies on immunology induction in mice an 1 hamsters before infection. In recent laboratory experiments, the researchers have found a complex of polyadenic-polyuridylic acid (poly AU) to be a powerful stimulant of antibody production when inoculated into animals together with an antigen.

By use of Fasciola antigens (from another kind of fluke) combined with one injection of poly AU, the researchers achieved a 67 percent reduction in worm burden (schistosome infection) in mice. When two inoculations of poly AU were used, the worm burden reduction was 74 percent, according to Dr. Hillyer.

Antigens Prime Host

They also report that mice immunized with Fasciola antigens had 4-fold or higher titers of antibodies to schistosomes than mice infected with schistosomes but not immunized.

Concluding that Fasciola antigens prime the host to have a secondary reaction when infected with schistosomes, the researchers are optimistic that eventually a vaccine can be prepared which will give total protection against this parasitic disease now so prevalent in China, Africa, South America, and Puerto Rico.

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PRISONER RESEARCH

(Continued from Page 1)

a National Minority Conference on Human Experimentation to insure that the voices of the various minority groups would be heard.

Finally, in a series of deliberative meetings open to both press and public, the Commission considered its own observations and those of experts who studied foreign methods on non-prison drug testing, alternatives to the use of prisoners, and sociological perspectives in the use of prisoners.

In summary, the Commission's five recommendations are:

- Studies of the causes and effects of imprisonment and of prison life may be conducted provided that the risks are minimal and do not seriously inconvenience the subject.
- Research may be conducted on new or accepted methods of diagnosis or treatment which are intended to improve the health or well-being of the individual prisoners and have a reasonable chance of success.
- Other types of research may not be conducted unless the research is found by the head of a responsible Federal department, in consultation with a national ethical review body, to fulfill an important social and scientific need. The reasons for involving prisoners must be compelling, and the conditions of imprisonment such as to insure a high degree of voluntariness on the part of the subject and openness on the part of the correctional institution.
- The investigators must in all instances be competent, the research facilities adequate, and the research subject to review by an institutional review board including among its members prisoners or prisoner advocates as well as meeting all other requirements for institutional review boards.
- Current research projects, subject to regulation by the Secretary of HEW, that cannot meet these requirements should be permitted to continue not longer than 1 year from the date of publication of the recommendations, or until completed, whichever is earlier.

Under the terms of the National Research Act, the Secretary must seek public comment on these regulations before either rejecting or implementing them within the next 180 days.

Every whisper of infamy is industriously circulated, every hint of suspicion eagerly improved, and every failure of conduct joyfully published by those whose interest it is that the eye and voice of the public should be employed on any rather than on themselves. —Samuel Johnson.
Scientists Find New Synthetic Hormone Prevents Hereditary Angioedema by Correcting Biochemistry

NIH scientists have shown that a new synthetic hormone, Danazol, prevents potentially life-threatening attacks of hereditary angioedema (HAE). In addition, the National Institute of Allergy and Infectious Diseases and the National Institute of Child Health and Human Development investigators have found that the drug acts to correct the inherited biochemical abnormality believed to cause the disease.

Hereditary angioedema is a rare but serious condition characterized by episodes of swelling of the hands, feet, face, or airway passing by episodes of swelling of the face, or airway passage and recurrent abdominal pain.

Can Cause Death

Although these attacks can occur without provocation, anxiety, stress, or minor trauma—such as dental work—have been associated with an increased incidence of attacks. Deaths due to HAE—usually caused by airway obstruction—have been reported to be as high as 30 percent.

A lack of effective means of stopping an attack once it starts, patients with HAE have relied on long-term use of various drugs to prevent the attacks.

However, these agents can produce serious side effects, thus limiting their usefulness. In addition, the prolonged use of one class of these drugs—androgens—by women with HAE can result in masculinization.

The NIH researchers, therefore, decided to study the effectiveness of a new androgen, Danazol, which has a reduced potential for producing masculinization. Five young women and four men who had a history of one or more HAE attacks each month received randomized courses of either Danazol or a placebo. Each course lasted 28 days, unless an attack occurred. A new course was begun either after successful completion of a 28-day course, or after an attack subsided. Neither the physicians nor the patients knew when a patient was taking Danazol or a placebo.

Side Effects Are Few

During 46 Danazol courses completed by the nine patients, only one HAE attack occurred. Side effects of the drug were minimal: some weight gain in all patients, and menstrual irregularity in the women. However, the hormone did not produce virilization of the women nor affect the sexual potency of the men.

In sharp contrast, during the 47 courses of placebo in the same patients, 44 HAE attacks occurred. In addition, the Bethesda researchers found that Danazol reversed the biochemical defect thought to be the cause of HAE—low amount and diminished activity of a protein which inhibits the first step of complement (a series of interacting serum proteins involved in immune responses). While on Danazol, the amount and activity of this inhibitor protein in these patients climbed to almost normal levels.

One patient, who discontinued Danazol, after 60 days experienced a decrease in the level of this protein until she resumed taking Danazol.

The scientists hope that any possible side effects of long-term use of Danazol might be offset by lower dosages. Most of the patients—all of whom have chosen to remain on Danazol—have been able to decrease their daily dosages.

No Toxicity Seen

No further toxicity has been seen even in those patients who have been on Danazol for 6 months.

Further study of Danazol's action in hereditary angioedema may provide a greater understanding of the underlying factors controlling and modifying this, and possibly other, genetic diseases.


Peptides Identified by Dental Scientists As Bacterial Attractants in Chemotaxis

Recent studies by National Institute of Dental Research investigators—including Dr. Elliott Schiffmann, Ms. Barbara A. Corcoran, Dr. Sharon M. Wahl, and Dr. A. Aswanikumar—have clarified how white cells in the blood detect a bacterial infection and migrate to the area. Once in the area, the white cells engulf and eliminate the invading organism.

Earlier studies showed that the bacteria produced something that attracted the cells. In cells, detection of a chemical is often linked to movement of the cell to the source of the chemical—a process known as chemotaxis.

Attempts to identify a specific attractant produced by bacteria have been unsuccessful because it occurs in extremely small amounts and appears to be a mixture of peptides which are fragments of proteins.

Knowing that bacteria synthesize proteins with formylmethionine as the initiating chemical whereas all higher forms of life use methionine for this purpose, Dr. Schiffmann reasoned that perhaps peptides containing formylmethionine might be attractants because they would obviously be foreign to animal cells.

Therefore, the scientists synthesized a number of formylmethionine peptides and tested them for chemotactic activity. As shown in Fig. 2, white cells position themselves in response to a streak of attractant laid in front of them. Now many peptides have been prepared, some extremely potent at 10^{-12}M and others inactive or even inhibitory. The team's studies have provided evidence for the following sequence of events:

1) reaction of peptide with cell membrane,
2) activation of the cell and
3) cleavage of the bound peptide.

This last step frees the cell to react with other molecules and detect the level of attractants.

The synthetic compounds have been shown to activate each of the four major phagocytic cells involved in fighting bacterial infections, and to cause the release of histamine and other biologically active substances.

Since the compounds are active in vivo, they are being tested as stimulants of wound healing and as infection-combating substances. Inhibitory compounds are being examined for their ability to suppress local inflammatory reactions.

Organisms other than man appear to use formylmethionyl peptides to detect bacteria. Interestingly, these include such species as slime molds, which eat bacteria, and thus may represent an ancient and general adaptation.

Figure 1. N-formylmethionine and methionine. The formyl group (circled) is present during initiation of bacterial protein synthesis (a) and absent during animal protein synthesis (b).
Snow and Ice Frustrate Grounds, Other Workers

Frustrated and upset about the icy conditions of the campus parking lots during the week of Jan. 10 of the Plant Engineering Branch, DES, responsible for the snow and ice control program for NIH, took “several” calls from employees who could not understand why the parking lots were not clear when they came to work on Tuesday, Jan. 11 after a full day and night of no snow.

Thomas Cook, chief of GML, explains that when the snow and sleet stopped at 4 a.m. on Monday there was not sufficient time to plow the lots before normal working hours, and areas that were plowed continued to get freezing rain, creating extremely hazardous conditions.

Hope Sand Works

It was therefore decided to sand the 1 inch-plus of rain-soaked snow in the parking spaces (a 3-hour operation) and hope the temperature would rise enough to melt it. But the temperature rose only enough during the day to thaw the top, smooth it out, absorb the sand, and then freeze again that night.

Further plowing of parking spaces was virtually impossible because of the cars during the day and the frozen conditions at night. Parking lot travel lanes and spaces were sanded each morning (between 4 a.m. and 7:30 a.m.) and salt was applied where possible at all times when the temperature rose above 24 degrees (the required temperature for salt to work).

Hope Sand Works

After much compaction of the snow and ice by cars the only thing which might help would be to vacate lots during the daytime when temperatures were above freezing to loosen the ice from the pavement sufficiently for loaders, plows, and other equipment to remove it.

Finally on Saturday, Jan. 15, the temperature rose to 36 degrees after an additional inch of sleet and freezing rain fell on Friday night and GML was able to clear most all parking spaces and walks.

Similar Problems Everywhere

Mr. Cook says most people who called reported icy areas but understood the problems because of similar difficulties they had at home.

A few, however, called to suggest a lack of effort when everything possible was being done. Mr. Cook apologizes for the short answers he or some of his staff may have given people at times when GML was tired and had worked 24 to 36 hours straight.

Middle age has been said to be the time of a man’s life when, if he has two choices for an evening, he takes the one that gets him home earlier.

—Alvan L. Barach

National High Blood Pressure Program

Report Emphasizes Detection, Treatment

A recent report of the National High Blood Pressure Education Program marks “the first time this country’s medical associations and authorities have reached a consensus on an approach to diagnosis and treatment of high blood pressure,” according to Dr. Robert I. Levy, Director of the National Heart, Lung, and Blood Institute.

The report, the Joint National Committee on Detection, Evaluation, and Treatment of High Blood Pressure, underlines agreement over several points.

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Finally on Saturday, Jan. 15, the temperature rose to 36 degrees after an additional inch of sleet and freezing rain fell on Friday night and GML was able to clear most all parking spaces and walks.

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