



The first clinical trial of a novel form of cancer therapy—boron neutron capture therapy—begins at the MIT Research Reactor. The patient, Venor Adam, has his foot positioned to receive a beam of radiation in the Reactor Lab's "med room." Far side of the table, left to right: Professor Otto M. Harling, Reactor Laboratory director; Dr. Guido R. Solares of the Reactor Lab; research associate; and Dr. Robert Zamenhof, senior medical physicist, New England Medical Center. Opposite them is Dr. Hywel Madoc-Jones, head of NEMC's Department of Radiation Oncology. Photo by Donna Coveney

## Reactor used in trial of new cancer therapy

The first clinical trial of a novel form of experimental cancer therapy in which MIT plays a major role got under way last week at the Research Reactor. The event culminated efforts that began six years ago.

The treatment was the first use of boron neutron capture therapy on a human patient in the United States in more than 30 years and the first ever use of an epithermal beam (intermediate energy) for neutron-capture therapy.

MIT, the New England Medical Center (NEMC) and Boston University Medical Center are involved.

Leading the work are Professor Otto M. Harling, Department of Nuclear Engineering and director of the MIT Nuclear Reactor Laboratory; Dr. Robert Zamenhof, senior medical physicist at NEMC; and Dr. Hywel Madoc-Jones, radiotherapist in chief and head of the Department of Radiation Oncology at NEMC. Dr. Gary Rogers, a Boston University Medical Center dermatologist, is also participating in the clinical aspects.

Professor Harling stressed that the achievement was the result of "a major interdisciplinary and interinstitutional effort on several fronts." A number of faculty and staff from the Department of Nuclear Engineering and the Reactor Laboratory have been involved over the last six years with colleagues at the other institutions, primarily NEMC.

The therapy's target is glioblastoma, a highly malignant brain cancer that kills about 8,000 people in the United States each year.

The clinical trial that began September 6 was required by the Food and Drug Administration to demonstrate that the therapy will not cause harm. Consequently, the trial calls for treating a limited number of patients who have melanomas on their arms or legs. The treatment starts with a low dose of radiation and will be eventually stepped up to a therapeutic level. The Nuclear Regulatory Commission, the Department of Energy (DOE), and nine MIT and NEMC committees also have approved the trial.

The therapy involves the patient consuming a drink containing boronated phenylalanine. The boron is taken up largely by the tumor cells. The tumor is then irradiated with a neutron beam. The neutrons cause the boron to split into two highly energetic particles which destroy the tumor cells while largely sparing adjacent healthy cells. Why the boronated phenylalanine is concentrated in the tumor cells is not known.

The clinical trials take place in a "med room" below the core of the reactor. The patient reclines on a table that can be precisely positioned so that the tumor site aligns with the reactor beam. The initial volunteer is Venor

Adam, 64, who has a melanoma on the sole of his foot.

The therapy was first attempted in the United States in the 1950s at Brookhaven National Laboratory in Upton, NY, and in the 1960s at MIT. Those trials were unsuccessful. The present effort using the MIT reactor benefits from an improved boron-containing drug, improved neutron beams, accurate and rapid boron analysis technology and other important advances, the researchers said. For example, in the 1950s and 1960s, thermal (low energy) neutron beams were used. These required that the skull be opened surgically to allow the neutron beam to reach the tumor site. The current MIT beam is an epithermal one that can penetrate more deeply. No surgery is therefore needed.

The DOE's Office of Energy Research and the Herbert M. Karol Cancer Foundation in Brookline are funding the work. NEMC and MIT also contributed.

Individuals interested in the clinical trials are asked to have their primary care physicians contact NEMC (617-956-6167) or Boston University Medical Center (617-638-8491).

## Advance yields information about workings of unusual disease agent

By Elizabeth A. Thomson  
News Office

For more than a decade, scientists have been working to explain how infectious agents called prions cause certain neurodegenerative diseases in humans and in some animals.

Now MIT scientists and colleagues have taken an important step toward solving the mystery by replicating part of the disease process in a test tube.

Among other things, the work could lead to a test for whether prion diseases can be transmitted between species. That issue is of particular interest in England, where an outbreak of "mad cow disease" has fueled concerns over whether the disease can be transmitted to people who eat beef.

The prion is an unusual protein that exists in two different forms: one is a common brain protein, while the other spells disease. And in the molecular equivalent of a bad apple, the normal protein can turn into the infectious version when exposed to its abnormal counterpart.

The MIT and NIH researchers demonstrated that conversion in a test tube.

"We took the good stuff and converted it to the bad stuff outside of the cell. That's never been done before," said Dr. Peter T. Lansbury, associate professor of chemistry and co-author of a paper on the work, published in an August issue of *Nature*. Other MIT authors are Graduate Students David A. Kocisko and Jon H. Come of chemistry.

Because the scientists' test-tube concoction contained no cellular material, the work "demonstrates that the prion protein alone can work this conversion," Professor Lansbury said. That distinction is important: many scientists have argued that some co-factor

associated with the abnormal protein, such as a virus or some undiscovered genetic material, is actually causing the disease—not the prion alone.

"The new research greatly reduces the possibility" that a co-factor causes prion diseases, wrote Sandra Blakeslee of the *New York Times*. Earlier tests used prions that were in a less purified form, so "it was difficult to prove that a more conventional infectious agent was not involved," she said.

*Alzheimer's, too, is believed to begin when a "normal" protein is converted to an abnormal form.*

Nevertheless, to prove conclusively the "protein-only" theory, the scientists must first put the abnormal prions created in the test tube back into a living animal to see if they do indeed cause disease. The team is now working to do so by modifying parts of the  
(continued on page 4)

### Where to vote

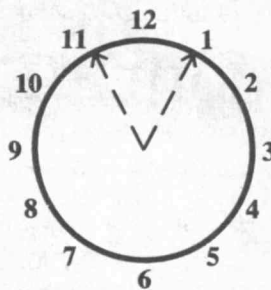
Here is a list of polling locations corresponding to residences of students and other campus residents who plan to vote in the September 20 primary and the November 8 general election:

Ashdown House, Baker House, Bexley House, Burton House, East Campus, Green Hall, McCormick Hall, Senior House, Eastgate, Westgate—MIT Athletic Center.

Edgerton House, MacGregor House, West Campus Houses, 500 Memorial Drive, Tang Hall—Fire House at Massachusetts Ave. and Main Street.

Random Hall—Salvation Army headquarters at 402 Massachusetts Ave.

### IN BRIEF



#### CLASS TIME REMINDER

Instructors of undergraduate and graduate subjects are reminded that classes begin five minutes after and end five minutes before the scheduled hour or half-hour.

#### STRATTON MEMORIAL

A memorial service for President Emeritus Julius A. Stratton will be held Wednesday, Sept. 21, at 1pm in Kresge Auditorium, followed by a reception in McCormick Hall. Dr. Stratton, who was president of MIT from 1959-66, died June 22 at the age of 93.

Julius A. Stratton (1901-94), an exhibit of photographs and quotations from his life mounted by the MIT Archives, is now on view in the Hayden corridor.

## Century mark approaches for two MIT professors emeriti

By Charles H. Ball  
News Office

A lot can happen in a lifetime, especially when it stretches to 100 years or more.

And so it is that two retired MIT professors, who turn 100 within a few days of each other this month, can look back on lives filled with accomplishment and, in one case, controversy.

They are Charles Fayette Taylor, professor emeritus of automotive engineering, and Dirk J. Struik, professor emeritus of mathematics. They came to MIT in the same year—1926—and both retired in 1960.

Professor Taylor, known to all by his middle name or as "Fay," was a pioneer in the development of the internal combustion

engine, especially those used in aircraft, and was personally acquainted with Orville Wright. His dual career as a painter and, more recently, as a sculptor in metal, also brought him acclaim. Professor Taylor lived for many years in Boston (he remembers skiing across the frozen Charles River to MIT) and later in Brookline. Although he was active until a few years ago, he is frail now, living in a Weston retirement home with his wife of 40 years, Alice, who is 96. His nurse, Eileen O'Shea, reads to him and takes him on walks in his wheelchair. He and his first wife had two sons, Charles, who died in 1988, and Philip, a retired businessman who lives in California. Members of his family, which includes 10 grandchildren and 14 great-grandchildren, visit him frequently, although he said he most misses being with them when they stay at his summer home in Rockport. "He is really a great man," his wife says. A

former social worker and guidance counselor, she was involved in humanitarian causes with Professor Taylor, among them raising scholarship funds for some 2,000 young Boston minority students and guiding them to colleges. Some 150 people will gather at the retirement home for Professor Taylor's 100th birthday on September 24.

Professor Struik, renowned as a mathematician and as an historian of mathematics, saw his name leap into headlines in the 1950s when his outspoken Marxist views led to his indictment on charges of advocating the overthrow of the United States and Massachusetts governments. The charges were eventually dropped, and he was restored to the MIT faculty after a five-year paid suspension. He is vigorous and alert, living alone in his Belmont

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# Student Notices

the MIT Libraries Preservation Fund. Every sale includes some free materials. Sponsored by the MIT Libraries Gifts Office, X3-5693.

## RELIGIOUS ACTIVITIES

*The Chapel is open for private meditation 7am-11pm daily.*

**Baptist Student Fellowship\***—Supper and Bible Study meets Tuesdays, 5:15pm in Bldg W11-small dining room; "Experiencing God," small group meeting, meets Fridays at noon, Bldg W11-035. Sponsored by the MIT Baptist Chaplaincy (Baptist Campus Ministry). More info: x3-2328.

**Tech Catholic Community\*\***—Regular weekday mass Tues & Thurs 5:05pm, Friday 12:05pm, Saturday 5pm, Sunday 9:30am & 5pm. Call x3-2981.

**Graduate Christian Fellowship\*\***—We invite you to join us. Open to believers and seekers, GCF is a group of graduate students, faculty, and staff who desire to know, love, and obey God better and reflect the love and presence of Jesus Christ. Weekly meetings in Student Center, DR 1&2, Thursdays at 5:30pm. We also have weekly Bible studies, a Responsible Technology discussion group, and more. Info: Andrew Parris x3-2319 or <andrewp@mit.edu>.

**Christian Science Organization\*\***—Meetings are Thursdays at 7:30-11pm in the Chapel. We'll share thoughts about God, hear testimonies of Christian healing and read from the Bible. All are welcome! Call x3-8797 or <lnorford@eagle.mit.edu> for further information.

**Communitas-Life Together\*\***—Protestant Worship Sunday mornings at 11am in the MIT Chapel. Sponsored by: American Baptist Church, United Church of Christ, United Methodist Church, Presbyterian Church (USA). All welcome. More info: Chaplain John Wuestneck, x2-1780 or <chaplain@mit.edu>.

**Friends Worship Group\***—Under the care of Friends Meeting at Cambridge, meets Wednesdays during the academic year in Rm 3-137C. Gather at 5pm for unprogrammed ("silent") worship, 5:15-5:45pm.

**MIT Hillel\***—Sept 14: Pre-fast Meal, Hillel, 4-5:30pm. Yom Kippur Conservative Svcs, Kresge Little Theatre, 6:30pm. Reform Svcs, MIT Chapel, 7:30pm. Tickets are required for

all Wednesday evening Kol Nidre svcs. Sept 15: Yom Kippur Conservative Svcs, Kresge Little Theatre, 9am, 5pm. Reform Svcs, 10am, 6pm, MIT Chapel. GradHillel Break the Fast, Hillel, 7:45pm. Sept 16: Sukkah Moving. Orthodox Svcs, Hillel, 6pm. Shabbat Dinner, 6:45pm. Sept 17: Orthodox Svcs, Hillel, 9am. Sept 18: Sukkah Building, Kresge Oval, 10am-3pm. Brunch, Hillel, noon. Sept 19, 20, 26: Holiday Dinner available in Sukkah. reservations should be by noon on Sept 14. Sept 21: GradHillel Study Break, Sukkah, 9-11pm. Sept 22: Kosher Ko-op Dinner, Hillel, 5-7pm. Study Break, Sukkah, 9pm. Sept 23: Egal Chavura Svcs, Hillel, 6pm. Orthodox Svcs, Hillel, 6pm. Shabbat Dinner, Sukkah, 6:45pm. Sept 24: HUG Party, see Institute Calendar, Social Activities. Sept 25: Egal Chavura Sandwich Lunch, Sukkah, noon. Deli Dinner, Sukkah, 5pm. Call for more info: x3-2982.

**MIT Korean Baptist Student Koinonia (KBSK)\*\***—Friday Night Bible Study and Fellowship 7-8:30pm, Private Dining Room #3, 3rd floor of Student Center. Everyone is welcome, refreshments provided. For more information contact Chris Pak x3-9342 or 876-8594.

**Lutheran-Episcopal Ministry at MIT\***—Wednesday worship, 5:10pm, MIT Chapel, followed by supper and conversation across the street at 312 Memorial Drive. Contact Rev. Susan P. Thomas x3-2325.

**Lincoln Laboratory Noon Bible Studies\***—Tues & Thurs, Kiln Brook III, Rm 239. Annie Lescard, x2899 Linc.

**MIT Muslim Students Association\***—5 daily prayers in the prayer room, Ashdown House (Bldg W-1) west bsmt. Friday congregation: 1:10-1:45pm in Ashdown House (Bldg W-1) west bsmt. Info: x8-9755.

**MIT Orthodox Christian Fellowship\*\***—Meets every Wednesday at 5:30pm in Private Dining Rm #1 in the Student Ctr for dinner/fellowship/discussion followed by Vespers (evening prayer) in the MIT Chapel. Open to Eastern Orthodox Christians and those interested in learning about traditional Christian Faith. Info: Mike Decerbo, Dorm x5-7569.

## INTERNATIONAL

**MIT Language Conversation Exchange\*\***—This service assists members of the MIT community to practice a language with a native speaker and get to know someone from another country. Call x3-1614 for more information.

**Guide for Foreign National Spouses Seeking Work\*\***—Guides provide information on topics such as American resumes, job interviews, volunteer work, employment agencies, salary negotiation, visa issues, much more. Free information booklets available in Rm 5-106 (International Students Office) and Rm 4-105 (International Scholars Office). Reference binders may be used in Rm 12-170 (Office of Career Services); ask for Cathy Taylor.

**Chinese Lunch Table.** Meets every Tuesday, 12-2pm, Student Center, Rm 439. Bring your own lunch and come practice speaking Chinese. All levels welcome. Sponsored by the Chinese Students Club.

**Esperanto Conversation Group.** Meets Mondays 7:30-9pm in the SCC Coffeeshop in the Student Center. Sponsored by the MIT Societo por Esperanto. More info: <speak@athena.mit.edu>.

**La Table Francophone.** Meets Thursdays 12pm in Walker. Open to anyone who wants to speak French over lunch in a friendly atmosphere. More info: 3-9777.

**Japanese Lunch Table.** Starting Sept 15 the Japanese Lunch Table will meet every Thursday through Dec 8, except on November 24, at 12:30-2pm in Rms 400 and 491 in the MIT Student Center, co-hosted by the MIT Japan Program and the MIT Japanese Wives' Group. Bring a bag lunch (or buy one at Lobdell) and talk with native Japanese speakers. Beginning Japanese speakers are especially welcome. Free baby-sitting is provided. More info, call Yu Hasegawa-Johnson, 252-4314 or Cornelia Robart, x3-2839.

**Hosts to International Students Program\***—Each year many international students arrive at MIT to study. Far from family, friends and familiar ways, they face a challenging transition. Through the MIT host program one can offer assistance, encouragement and occasional hospitality to our students from around the world. This is not a home-stay program but rather one planned to promote friendship among people from different cultures. Faculty, staff and alumni/ae (singles, couples or families) are particularly encouraged to participate in this most rewarding volunteer opportunity. If you are interested, please call Kate Baty x3-4862.

## STUDENT JOBS

There are more job listings available at the Student Employment Office, Rm 5-119. The Student Employment Office has many "one time only" jobs. Many students find these jobs a good way to earn money fast.

**Off Campus, Non-Technical.** Childcare position open for 10 month old girl. Part-time beginning in Sept. 1994. 9:00-3:30 about 5 days a week. Work involves playing with their daughter, giving her lunch and snacks, diaper chang-

ing, taking walks to the park, and giving her a nap. Should have experience with babies this age and speak English well. Location: 1 mile North of Harvard Sq. on Garden St. Contact Lilian Hsu-Flanders (617) 354-1901.

**On Campus, Non-Technical.** The Program Marketing, Recruitment, and Enrollment unit of the Sloan School of Management is looking for a student who can provide general office help, such as troubleshooting computer software (FileMaker Pro) and hardware (MacIntosh), open and distributing mail, answering phones, taking requests for applications, typing, filing, and various other duties. Daily interaction with staff, students, and visitors is a vital part of this job. Must have excellent typing and interpersonal skills. Must be familiar with MacIntosh, Word, and FileMaker. Should be creative, flexible, able to work with minimal supervision, assertive in problem solving and able to prioritize tasks. Contact Rod Garcia at 253-3730.

**Off Campus, Non-technical.** Cambridge market research company is looking for people to conduct person interviews, where respondents taste new food products sold in Fanueil Hall. Testing is done at Fanueil Hall Marketplace in Boston. Professional appearance a must. \$8.00/hr Contact Dianna Liefson at 492-1400.

**On Campus, Non-technical.** Person needed to put up posters for SCC customers, 2-3 hours, Mon and Fri mornings. Hours are flexible as long as posting is done before noon. No experience necessary, all supplies provided. Contact Michael Evans 253-3916.

## VOLUNTEERS

The MIT Public Service Center has compiled the following volunteer opportunities.

**Asian-American Mentor needed!** A 15 year-old Vietnamese-American boy who is at risk of dropping out of high school needs your help! Wendy Nelson, who works at an alternative middle-school in Charlestown, is looking for someone who can spend a few hours a week with this very bright young student (with a special interest in computers) who feels there is no point in pursuing his education. Please contact Ms. Nelson at 635-5221.

**Computer technicians and trainers needed:** The Cambridge Public Schools need people to set up new computer equipment and train the teachers and staff to use them! Please call Ross Crowley at 349-6792.

**Women's Issues:** The Massachusetts Coalition of Battered Women Service Groups and the Jane Doe Safety Fund seek interns and volunteers to assist the main office in development, public policy, membership, the Walk for Women's Safety, and general office help. Contact Carrie Smith at 248-0922 for more information.

**Have a few free hours a week in your schedule?** The MIT Public Service Center (3-123) has hundreds of volunteer opportunities that can match your interests and schedules. Work at the Children's Museum! Help an elderly person live more safely and independently in their own community. Help harvest vegetables for the hungry! Come on by and check out how you can help!

## UROF

The UROF Office invites MIT and Wellesley students to join with faculty members to pursue research projects of mutual appeal. For detailed information on procedures, please read the participation section of the 1993-1994 UROF Directory, available now at 7-104 and 20B-140.

Pertinent information is posted regularly on the UROF bulletin boards in the infinite corridor near Rm 3-103, and in the UROF Office, Rm 20B-140.

Faculty supervisors wishing to have projects listed may send brief descriptions to 20B-140, call x3-7306, or email to <uof@athena>.

**Center for International Studies.** UROF student needed to work on an environmental policy project at the Center. The project, commissioned by the Mitsubishi Research Institute in Japan, involves studying the environmental impact statement (EIS) process in Japan by analyzing the experiences in the United States. The study will include a historical review of major legislation related to EIS, review of the literature on the experiences of EIS implementation, and case studies of U.S. experiences. The UROF student must be interested in environmental policy and possess good analytical and writing skills. Knowledge of Japanese language a plus but not required. The job involves library research and writing on case studies and other related research. Faculty supervisor: Dr. Tatsujiro Suzuki, E38-268. Please contact: Ms. Jennifer Lee at 482-9485.

**Visual C++ Programmer.** Computer science student or experienced programmer wanted to create a graphical user interface (GUI) in Microsoft Visual C++ as a front end to a genetic algorithms program. Experience in C programming and familiarity with C++ or visual basic required.

**Engineering Diagnostic Models.** Chemical or mechanical engineer wanted to create probabilistic causal models of air separation plants, for use in sensor-based remote diagnostics. This research involves modeling real plants with data provided by an industrial partner, and you may see the results of your research put into practice. Juniors/seniors given preference.

For both positions, please contact: Carlos Rojas-Guzman at x3-8182, 66-317. Faculty supervisor: Prof. Mark Kramer at x3-6508, 66-317.

**Virtual Worlds.** To develop advanced distributed simulation systems, intelligent entities, and virtual reality applications. Experienced C programmer, experience with Silicon Graphics Workstations a plus. Faculty supervisor: David L. Brock, Research Scientist. If interested, please stop by NE43-831 for an application or send mail to <dlb@ai.mit.edu> with the following information; name, address, phone, e-mail, major, class, programming experience, previous UROP experience, hobbies, GPA, other additional info, and resume.

**Scientific Photography and Imaging.** An opportunity to create pictures in science throughout all departments in the MIT research community. Join science photographer Felice Frankel, a visiting lecturer and artist-in-residence at the Edgerton Center as she collaborates with researchers to improve their visual submissions to publications using techniques in macro and microphotography, EM, AFM, STM and computer enhancement. The potential aesthetic value of visually documentable principles will be included in the image-making. Familiarity with photography is encouraged. Approximately 6 hours (2 days, 3 hours each day). Faculty supervisor: Felice Frankel. If interested, please send mail to <felicef@mit.edu>.

**Human-Machine Systems Lab.** Research includes control analysis, computer simulation, experimentation with human subjects, human factors engineering, and design of hardware prototypes in a variety of human-machine systems. Appropriate background/interest is mix of control, design, computer graphics and simulation, cognitive and experimental psychology, artificial and computational intelligence.

**Data Acquisition and Analysis System of Real-Time Psychological Data.** A PC based data acquisition system for physiological data is currently being developed. Preliminary data has already been acquired on patients undergoing open heart surgery at a local hospital. The system will be refined and plans are being made for the system to be introduced in Intensive Care Units in the hospital. We need UROP students to work on data acquisition and data analysis. Requirements are interest in medical computer applications & knowledge of computer programming and statistics.

For both positions, please contact: Dr. James Thompson, Draper 3-347, x8-6075, or at MGH/Harvard Med. School, 724-9634 or by e-mail to <thompson@helix.mgh.harvard.edu>.

## CABLE

Frequent schedule updates now appear on TechInfo. For more information about cable at MIT, call Randy Winchester at x3-7431, Rm 9-050, e-mail: <randy@mit.edu>; <tv-messages@mit.edu>, x3-9383, Rm E19-722E.

Sept 20: Channel 8: 4-5:30—Live coverage of the MIT VLSI Seminar: "High Performance TFTs by Solid Phase Crystallization (SPC) and Excimer Laser Annealing (ELA)", Takashi Noguchi, Sony.

Sept 21: Channel 8: 1-2pm—Live coverage of the Memorial Service for Julius A. Stratton.

## Crimewatch

The following incidents were reported to the MIT Campus Police Department between August 20-September 7.

Aug 20: Bldg 38, suspicious activity.

Aug 21: Bldg 7, computer stolen, \$1,500; PBE, bike stolen, \$350; DKE, suspicious activity.

Aug 22: Bldg 35, wallet stolen, \$80; Pacific St Lot, male arrested for breaking and entering a motor vehicle and other related charges; ADP, bike stolen, \$200; Walker, \$4,300 speakers stolen; Bldg 14, bike rack, suspicious activity; Student Ctr, bike stolen, \$15.

Aug 24: Eastgate, domestic disturbance.

Aug 25: West Garage, car lock vandalized.

Aug 26: Bldg N42, radio stolen, \$100.

Aug 27: Eastgate, domestic disturbance; Bldg 13, bike stolen, \$120.

Aug 28: Bldg E25, 1) compact disc player stolen, \$140; 2) robie the robot, \$15 cash; Student Ctr, assault and battery between persons known to each other.

Aug 29: Bldg E25, 1) desk broken into; 2) compact disc player, \$200; Lobdell, food stolen, \$5; Bldg N52, cardboard stolen, \$30; Bldg E17, suspicious letter; Student Ctr, bike stolen, \$120; Next House, mattress stolen, \$125; Westgate, male arrested for larceny of a bike.

Aug 30: New House, Student ID stolen; Bldg N52, two-way radios stolen, \$800; Student Ctr, eyeglass frames stolen, \$150.

Aug 31: Hermann Garage, bike stolen, \$300; Tang Hall, bike tire stolen, \$25; Bldg 4, copper stolen, \$500; Bldg 31, scale stolen, \$500; Bldg E51, suspicious activity.

Sept 1: Student Ctr, three males arrested for attempted larceny of bicycle and other related charges. Hayden Library, bike stolen, \$450; Bldg 5, \$53 cash stolen.

Sept 2: Bldg E17, tape recorder stolen, \$460; Baker House, bike stolen, \$150; Student Ctr, eyeglass frames stolen, \$290; Tang Hall, box of household items, \$300; MacGregor House, bike stolen from lounge, \$260; Dupont Men's Lockerroom, 1) wallet stolen, \$45; 2) wallet, \$95.

Sept 4: Infinite Corridor, GAMIT bulletin board vandalized; Kresge Lot, attempted larceny of '88 Dodge Caravan.

Sept 5: Westgate, suspicious activity; Random Hall, bike stolen, \$400; Tang Hall, various household items stolen, \$100; Hayden Library, backpack stolen, \$280; Bldg 16, stereo stolen \$100.

Sept 6: Student Ctr, 1) bike stolen, \$150; 2) bike, \$200; MacGregor bsment, bike stolen, \$150; Hermann Garage, VW broken into and radio stolen, \$500; MacGregor, wallet stolen, \$80.

Sept 7: Bldg E25, camera stolen, \$1,163; Bldg N52, sunglasses stolen, \$237; Infinite Corridor, wallet stolen, unknown value; Bldg 13, bike stolen, \$300; Bldg E25, pocketbook stolen, later recovered minus \$300 foreign cash, \$40 US currency.

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Printed on Recycled Paper

# David Lampe to direct Sloan communications

As part of its plan to become recognized as the preeminent management school by the year 2000, the Sloan School has appointed David R. Lampe, formerly associate director of corporate relations, to the new position of director of communication.



Lampe

"We have created this position to expand and coordinate our efforts to keep key constituencies—including corporate executives, government officials, the media, potential students, recruiters, alumni and donors—aware of the School's ongoing accomplishments

and underlying strengths," said Dean Glen L. Urban. "David's top-notch communication skills and broad experience in dealing with these constituencies as well as with the faculty make him an excellent choice to fill it."

At Corporate Relations, which includes the Industrial Liaison Program, Mr. Lampe was responsible for a wide range of communications, including The MIT Report, which he founded in 1982. He won several national awards in such areas as periodical writing, video communication, and resource management. He has published two books examining how MIT's relationships with industry and the federal government led to the development of the innovative high-tech region along Route 128 in eastern Massachusetts.

Before coming to MIT, Mr. Lampe was a business journalist for the Los Angeles Times and Business Week magazine. He holds master's degrees from MIT in mechanical engineering and from Stanford University in journalism. He received a bachelor's degree from Virginia Polytechnic Institute and State University.

In his new post, Mr. Lampe will advise on the strategic communications aspects of the full range of Sloan's external relations.

## Crewel classes

Priscilla K. Gray will teach classes in intermediate and advanced crewel embroidery beginning Tuesday, Sept. 27, 11:15am-1:30pm, in the Emma Rogers Room (10-340). Those interested should register ahead with Mrs. Gray, x3-0064, or Muriel Petranic, x3-0637.

# Group aims to improve access to MIT

By John R. Squillante  
Office of the Senior Vice President

Who can help and how is the focus of an ad hoc working group formed to coordinate the efforts of the many offices and individuals at MIT that provide services to those with disabilities.

Expertise among the group's members includes access renovation and construction, human resources, student services, information and telecommunication systems and legal considerations. Employees with disabilities are also represented in the group. Most members have operating responsibilities in the implementation of services to the disabled.

Among specific projects underway:

- A service database is being designed by M. Susan Jones, coordinator of the ATIC Lab (Access Technology for Information and Computing) which provides and tests adaptive computer equipment for MIT students and employees. The database will match people who need accessibility services from MIT with the offices that provide them.
- Michael Owu of the Planning Office is updating the Institute's barrier

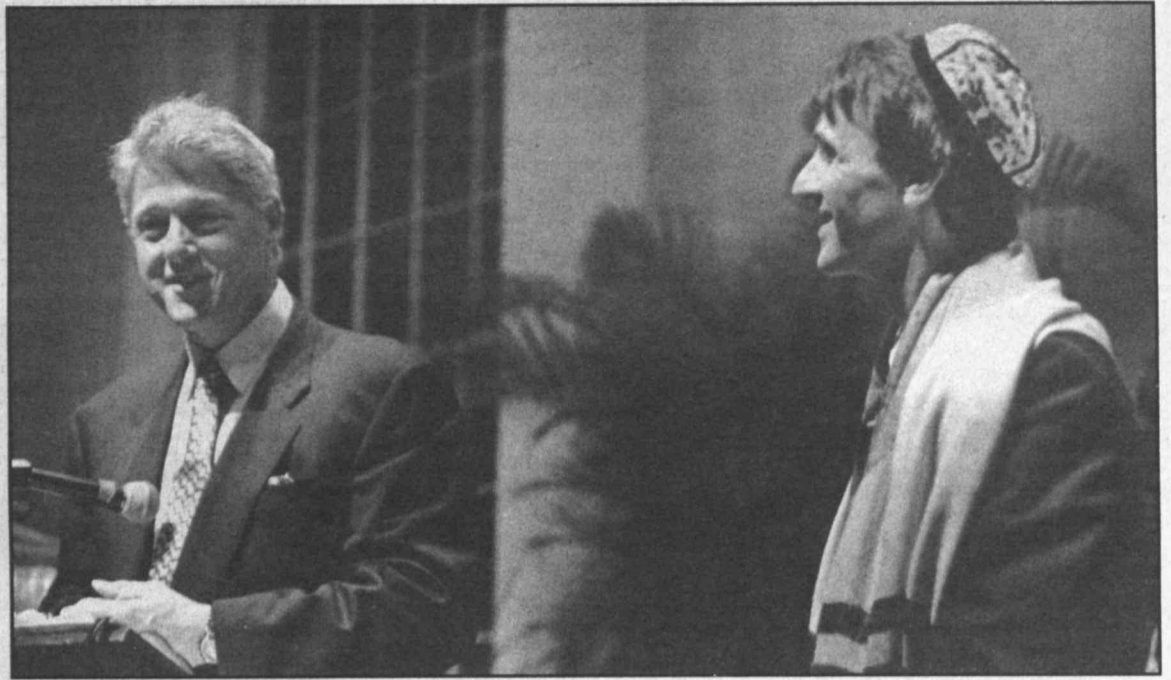
removal program. With the help of student data collectors, Mr. Owu is surveying the campus to determine priorities and establish an organized process to remove barriers around campus.

- Roy Ward serves as a resource for path-of-travel and compliance information in construction and renovation projects. A staff architect and designer in Physical Plant, he will play a major role in implementing the barrier-removal program.

- The group is writing a new section entitled "Accessibility Services" to be included in the *Offices and Programs* listing of the MIT Directory this year. A new e-mail address to monitor questions and concerns about accessibility issues at MIT also will be established.

- Members are also working with Human Resources to develop a job description for an ADA/Accessibility Assistance Coordinator, whose responsibility will be the maintenance and distribution of all information regarding these services.

At the direction of Senior Vice President William R. Dickson, the group was organized by Stephen D. Immerman, director of special services, to focus MIT's implementation of ser-



President Clinton spoke to Rabbi Plaut's congregation gathered for Rosh Hashonah services last week on Martha's Vineyard. Photo by Peter Simon

# MIT rabbi shares holiday with Clinton

By Charles H. Ball  
News Office

MIT's new Jewish chaplain, Rabbi Joshua Eli Plaut, helped make history last week when he invited President Clinton and his wife, Hillary

Rodham Clinton, to join the rabbi's congregation in Martha's Vineyard for Rosh Hashonah services.

Never before had a sitting American president attended Jewish high holiday services, according to Jacob Marcus of Hebrew Union College in Cincinnati, the dean of American Jewish history scholars.

Professor Marcus told Rabbi Plaut in a telephone conversation that other presidents had been to services but none had so honored the holiest of the Jewish holidays. The holiday period began with Rosh Hashonah on September 5, marking the Jewish year 5775, and ends tomorrow with Yom Kippur, the day of atonement.

"It was an historic occasion," Rabbi Plaut said. "He honored the spirit of diversity and religious pluralism in this country by his presence."

In ancient times, when the king arrived at the temple, he said, the congregation always feared the worst. "But here it is different. We are honored to have the leader of our country at our service."

Jokingly, he added that President Clinton should feel right at home with a Reform congregation. "We favor health reform, crime reform, welfare reform."

During his visit, President Clinton addressed the congregation briefly and spoke the traditional New Year's greeting, "Shanah Tovah."

The 500 people attending the services in the hall of the Old Whaling Church in Edgartown rose from their seats and applauded.

Rabbi Plaut came to MIT last fall as one of two Jewish chaplains (Miriam Rosenblum is the other) and rabbi for Hillel, the center for Jewish activities on campus. He serves part-time as rabbi for the Martha's Vineyard congregation. It is housed at the Martha's Vineyard Hebrew Center, but the building has become too small for the growing congregation and a new building is planned.

At the services, Rabbi Plaut drew laughter from the congregation and the Clintons when he said, "For the 10 days of Jewish holidays, we're calling [the church where the services were held] the Old Wailing Wall Church."

Rabbi Plaut invited President Clinton, who wore a white yarmulke, to join him in front of the congregation as he

blew the ceremonial shofar, or ram's horn, to signify the beginning of the holidays. "You might think it is a Jewish saxophone," he said with a smile.

In his sermon, Rabbi Plaut thanked President Clinton on behalf of the Jewish people for his efforts in bringing peace to the Middle East and said he would go down in Jewish history as a peacemaker.

In his remarks, President Clinton said his efforts to bring about the Israel-Palestine accords were "one of the most rewarding things I've done."

Rabbi Plaut gave President Clinton, a Baptist, a Hebrew Bible with commentaries on the Torah written by Rabbi Gunther Plaut, his uncle. He also gave the president a 100-year-old silver Torah pointer, used in readings of the sacred Torah texts.

By coincidence, Rabbi Plaut said he discovered later that President Clinton "is a serious student of the Hebrew Bible."

He summed up his impression of the president, "whether you like his politics or not," as "a man of the people, warm, accessible and very bright."

President Clinton came to the services as the result of a letter written by Rabbi Plaut and conveyed to the president by Cambridge Attorney Alan Dershowitz, a member of the congregation. The invitation was also extended to Jewish members of the White House staff and the press corps.

Rabbi Plaut said he asked the Clintons to the service after a telephone conversation with his mother, Hadassah Plaut, who lives in Jerusalem, where the rabbi was raised. When the rabbi mentioned that the Clintons were on the island, he said, she urged him to invite them "because it's the right thing to do."

Rabbi Plaut mentioned this to President Clinton, who told the congregation that his own mother had been free with her advice to him and that Jewish mothers do not have a monopoly on "guilt peddling."

As the Clintons were leaving, Rabbi Plaut said, "Hillary said to me, 'Say hi to your mom in Jerusalem for us.'"

(Information and quotations from articles in *The Boston Globe* and *The Providence Journal-Bulletin* were used in this story.)



James Turner, in wheelchair at left, who recently received the PhD degree in mathematics, conducted a tour of routes he must use to navigate the campus. The tour was arranged by Carla Kirmani to demonstrate access problems to members of the ad hoc group and other interested members of the community. Stephen Immerman, director of special services and coordinator of the group, also used a wheelchair on the tour, shown here in the driveway between Buildings 7 and 3. Photo by Donna Coveney

# Speaker suggestions wanted

The Commencement Committee invites suggestions for the guest speaker at MIT's Commencement Exercises on Friday, June 9, 1995, from all members of the community. The speaker should be one who can address topics of relevance to MIT.

Written nominations may be dropped off at the Undergraduate Association Office, Rm W20-401; Graduate Student Council Office, Rm 50-222, or the Information Center, Rm 7-121.

Suggestions may also be filed with

Roger Kermode, president of the GSC; Mehran Islam, president of the Class of 1995, or Mary L. Morrissey, executive officer for Commencement.

All suggestions will be reviewed and a list will be submitted to President Charles M. Vest for consideration. The list will not be made public nor will it be rank-ordered. The responsibility and authority for selecting a Commencement speaker and issuing an invitation will rest with President Vest.

The deadline for nominations in Friday, Sept. 23.

# Classified Ads

Tech Talk ads are intended for personal and private transactions between members of the MIT community and are not available for commercial use. The Tech Talk staff reserves the right to edit ads and to reject those it deems inappropriate.

**INSTRUCTIONS:** Ads are limited to one (of about 30 words) per issue and may not be repeated in successive issues. All must be accompanied by full name and extension. Persons who have no extensions or who wish to list only their home telephones, must come in person to Rm 5-111 to present Institute identification. Ads using extensions may be sent via Institute mail. Ads are not accepted over the telephone. Faxes are not accepted.

All extensions listed below are campus numbers unless otherwise specified, i.e., Dorm, Lincoln, Draper, etc.

MIT-owned equipment may be disposed of through the Property Office.

Deadline is noon Friday before publication.

## ■ FOR SALE

TV, stereo, bed, rubber boat, weight bench, lights, bikes, novelties for the dorm, 9/17-18 in Belmont. Pat, Linc x2402.

2 chrome end tables w/glass top, \$25/set; 2 lamps, ceramic beige color, \$5/ea. Jan Blair, Draper x8-2843.

Refrigerator, compact, Kenmore 1.7 c.f., approx. 18 3/8" h x 18 1/2" w x 19 1/8" d, yours for \$53. Arieh, Linc x0920 or 244-6336 eves.

Nov '92 Kitchen Aid washer/dryer, used 3 mos, mint cond, balance of 3-yr warranty (to Nov 95) incl, \$550 firm. Call 484-4767.

W's emerald/diamond ring, \$275 (orig \$900); W's rollerblades & access, sz 7 1/2, worn 2x, \$150; 2 Nova Scotia folk art hooked rugs, \$65/ea; cotton quilt, \$200; Imagewriter, \$125. Marcia x3-3845 or 491-4239.

Golfclubs w/bag, \$25 & \$65; phone, new, rotary, \$25; rowing machine, \$45; Pre Cor ski exercizer, retail \$800, sell for \$100; Oriental rugs, \$75-\$1500. Call x3-3175 or 332-8251.

46" RCA projection TV, walnut cab, \$1500 or bst. Call x3-4255.

Value-Tale children's books, 30 biographical volumes focusing on values such as determination, honesty, kindness, etc., cartoon-style illustrations, over \$200 new, gd cond, \$30 or bst. Call x3-6794.

Sofa, mauve/floral print, gd cond, \$100; Tunturi Stairmaster, like new, \$120 (pd \$220). Call x3-0786.

M's 23" 12-sp bike, Fuji del Ray, 24.1 lbs, exc cond, \$225 or trade for equivalent mt. bike. Steve, Draper x8-3374 or <scop@draper.com>.

Apple Imagewriter II printer w/cables & cover, \$175 or bst; carrying case for Mac computer, \$75 or bst; carrying case for Imagewriter, \$50 or bst. Call 252-9153.

Bookcases: 2 teak veneer, 72" h x 30" w x 12" d, \$30/ea; loom, hand, H&D, -24" w, \$150. Bill, Draper x8-3460.

Dining room set, dk solid pine, 42" x 72" oval tbl, 6 captains chrs, glass hutch & buffet, mint cond, may be willing to sell pieces individually, \$900 or bst. Ken x3-8107 or 646-7139.

Whirlpool Super Capacity Gas Dryer, like new, used only 3 years, \$225. Bob, Linc x4230.

Yamaha Full-size Upright Piano, Model U1-E w/ bench, satin ebony finish, 5 yrs old, exc cond, tuned regularly & recently, smooth, responsive action, beaut clr sound, \$4000 or bst. Dan, Linc x0807 or 643-6529.

Sailboat, 19' Flying Scot, fine cond, white deck, blue hull, new Harken blocks, gd main, jib, spinn. Motor mount, trailer & many extras, \$3200. Todd, Linc x3533 or 603-642-4611 eves.

Solid maple dbl bureau, cedar-lined bottom drawer, 33"Hx41"Lx17"D, \$50 or bst; maple rocking chair, \$25 or bst; 2 solid mahogany chrs, \$35 ea or bst. Charlene, Linc x8-5427.

13" color TV w/ remote, \$125; mini stereo w/ 3CD changer & remote, \$400; both exc cond. John x3-7114 or 441-5069.

Camera Nikon-F 50/F2 lens, Auto-Nikkor 135/F3.5, Micro Nikkor Auto 55/F3.5, Soligor 240/F4.5, Luna Pro meter waist levl vw findr, flash, 3 filters, 3 tripods, etc, top cond, all \$650. Elly 861-8948.

10-sp, 10 yr old Univega M's bike, used once, \$75. Call x3-6989 or 353-0439.

Rollerblades, M's size 8, hardly used, \$20, Call 3-6249

Moving sale: Couch, sofabed, chairs, DR table, file cabinet, stereo, piano, stove & hood, ans mach, painting, frames, plants, etc. Call 491-3585 a.m.

Shoei Duotec helmet, white, medium, nearly new, \$275. Paul, x8-6763 or <bethge@mit.edu>.

Blue Oriental Rugs \$85 & \$35; Solid wood full-sz futon frame \$85; Ofc swivel chr, \$40; Tbl lamp, \$15; M's 10-sp racer, Peugeot Monaco, \$120; Elec wok(new), \$30. Kim, 484-2379.

K-sz soft sider waterbed, top of the line, like new, \$500 or bst, Call dorm x5-9608 & lv mssg or email <hwtaylor@mit.edu>.

## ■ VEHICLES

1981 Buick Skylark Ltd, lt blue, 4-dr, -100K, 4-sp manual, V6, orig ownr, gd working cond, \$575. Costas, Linc x7956 or 508-443-2614.

1984 Chevrolet Celebrity, 4dr, black, loaded, Southern heritage (no rust), new eng, a/c, rack & brks, must sell to accommodate expanding family, \$2250 or bst. Ed, 981-2604.

1984 Toyota Celica GT in grt cond, 87K, 5-sp, a/c, sunrf, lots of new parts, askg \$3200, must sell fast. Call x3-7528 or 259-0885.

1987 Ford Escort, 5-dr hatchbk, auto, pb/ps, am/fm, in exc cond, only 57K, \$2000 or bst, call x3-4989 or <mauricio@math.mit.edu>

1989 Honda Accord Lxi, black, 3-dr hatchbk, 5-sp, exc cond, 104K, ps, pw, a/c, cc, roof racks, trailer hitch, lojack, \$7000. Dave, Linc x3929 or 508-486-0844.

1989 Pontiac Trans Am, 30K, red, auto, looks & runs grt, T-tops, a/c, AM/FM/cass, pw, pd, pt, ps, pb, tilt, cc, alarm w/remote, new exh, brks, batt, tune-up, extra winter tires, \$7500. Call 782-9903.

1990 Acura Legend RS, 3-dr, white, 5-sp, am/fm cassette, exc cond, \$6600. Jim, Draper x8-3067

1991 Honda Civic DX, 3-dr, 30K, 1 ownr, well-maint, askg \$8000 or bst. Call 262-7626.

1992 Honda Civic CX, hatchbk, black, 50K miles, 45-50+ mpg hwy, new Pirelli tires, exc cond, 5-sp manual transm, Z-lock, no a/c, driver's side airbag, \$6600. Call 508-544-5450 or <doughty@mtl.mit.edu>.

## ■ HOUSING

Arlington: Completely remodeled apt on 2 flrs, 6 rms, 2 baths, huge kitchen, laundry on premises, prkng for 3 cars, easy commute to MIT, \$1500, plus. Ann 646-9281.

Cambridge: walking distance from MIT, avail Oct. 1, 1BR, LR, dining area, kitchenette, bath, fully furn & equipped. <Isabelcv@athena>.

Cape Cod: condo, spect vws of canal, <1 hr from Boston, lux amenities (clubhouse, pool, tennis, etc), 2400 s.f., full bsmt, 4 fplcs, two min away from bus to Boston, \$184,900. Call 237-9702.

Florida: lux condo, Naples, 3BR, 2b, LR, DR, furn, appl, patio, htd pool, 15 min walk to Gulf beach, 5 min to shops, avail monthly Jan-Mar, \$2500/mo. John, Linc x3541 or 862-4809 or <southie@ll.mit.edu>.

Martha's Vineyard: property for sale, 1/2 acre waterfront lot, prime area, association tennis, boat landing, well-maint area, Edgartown, \$99K. Marie x3-5054 or 469-4680.

Newton Highlands: 1-1/2 BR Carriage House apt, funky & cute, sm yd area, walk to T & shops, near Rt 9 & 128, 1 car prkng, like living in a little house, avail Nov 1, \$750/mo. x3-8293 or <mconnors@mit.edu>.

St. Martin, Dawn Beach: Enjoy priv beach, snorkeling, pool, tennis, more, avail Apr 1-Dec 10, \$550/wk or trade for another resort in club. Mark x3-4107 or Julie x3-1718.

Shirley/Groton line: 3BR customized contemp garrison for sale in nbrhd abutting conserv land & river, 2.5b, cent a/c & vac, wdstone, fplc, deck, 2-car gar. Mike, Linc x2422 or 508-448-2636.

Waltham: mint cond, modern 3BR & study/library, 1.5 bath, fplc, LR, formal DR, gar, yd, pleasant nbrhd, nr Brandeis, 25 min to MIT, 2 blocks to Prospect Hill Woods, \$179,900. Reza Shadmehr x3-0546.

Watertown: Near Cambridge line, shopping, bus to Hvd Sq, furn sgl rm in newly remodelled intl house for visiting scholars/grad students, \$375 & up incl utils. Call 625-8349 or fax 527-0421.

## ■ WANTED

Experienced dressmaker needed to reproduce clothes from photos, salary negotiable. Call 876-0302 after 2pm.

Wanted: used NordicTrack, can't pay full price. Leslie x3-4965.

Wanted: canoe w/ paddles. Call x3-2796 or 246-5651.

Norwegian visiting prof w/ wife wants low rent, furn house/apt, Jan-June 1995, prefer western suburbs. Call x3-6809.

Wanted: Furn studio or 1BR sublet, Oct 1-Nov 30, for postdoc & wife, prefer areas conv to trans to MIT, Bos, Camb, Somerville, Arlington ideal. Linda, Draper x8-7040 or <lindlore@mit.edu>

MIT Research weight loss group forming late Sept, need F volunteers for diet study who are 40-60lbs overweight, non-smkrs & overeat when stressed or upset, no drugs. Call x3-3437.

Faculty couple planning sabbatical seeks furn 1BR apt near MIT/Harvard from 1/1/95-8/15/95. Call x3-6704.

## ■ ROOMMATES

Brighton: shr lrg 2BR apt, Indry, bus rtes 64 (Kendall), 57 (Kenmore/W'town), 301 (Boston), 20 min drive to MIT, 25+ prof/grad student, M/F, avail 10/1, \$400/mo. David x3-4264 or 254-4762.

Cambridge: spac apt to shr, 20min walk to MIT, fully furn. Clean, non-smkg F preferred. Call 354-5557.

Harvard Sq: 1 roommate wanted to shr modern, spac 2BR, 2 full bath apt w/law student, a/c, w/d, d/w, fplc, avail 9/1, \$787/mo per person. Jonathan 441-3907 or <sjonbaker@ai.mit.edu>.

Somerville, Union Sq: Roommates wanted to shr 4BR apt, near buses, Indrmat, on & off street prkng, 10 min by bike, 2nd flr, \$237.50/mo + utils. Call 623-7451.

## ■ CARPOOL

Driver & rider wanted; leave Londonderry & Derry NH area 6am, return trip at 4pm daily. Roy Waggoner, Draper x8-3454.

## ■ MISCELLANEOUS

Red Sox tickets: if you bought tickets from Anne that are for games after the strike date, call 508-877-9518 after 6pm.

Love to sew but have no time? Let me do it for you, expert seamstress/designer, no job too big or too small, 40 yrs experience. Call 738-0726.

# Two get Volvo awards

Two MIT doctoral students have been selected to receive the 1994 Volvo/MIT Award for Environmental Research.

They are Tamar Gutner of the Department of Political Science and Rosemary Sandford of the Department of Urban Studies and Planning.

The selections, announced by Provost Mark S. Wrighton, are the third annual awards under the program funded by Volvo North America Corporation. The program supports doctoral students whose research is focused on understanding fundamental obstacles to improving the environment.

Ms. Gutner and Ms. Sandford have received \$15,000 each to help finance their research projects.

Ms. Gutner's work examines the interaction between international institutions involved in economic and environmental reform in Eastern Europe and policy communities within the Eastern European countries. Her adviser is Associate Professor Kenneth A. Oye, director of the Center for International Studies.

Ms. Sandford's research will involve the implementation of global environmental treaties and focus on the supporting secretariats, the governmental organizations created by the treaty parties to assist them in managing and implementing agreements. Her adviser is Lawrence E. Susskind, professor of urban studies and environmental planning.

# Visiting committee dates set

MIT's governing body, the Corporation, appoints visiting committees for each academic department and certain other major operations.

The committees were established in 1875 to guide the course of education and research at MIT. They are composed of members of the Corporation, alumni/ae and other professionals with expertise in the various areas. (The membership of visiting committees is listed in the administrative organization section of the Faculty and Staff Directory.)

Biennial meetings of the visiting committees on the campus give faculty and students an opportunity to talk with Corporation and other committee members and make suggestions for improvements in departmental operations or policies.

Following is this year's visiting committee meeting schedule:

September 20-21, Aeronautics and Astronautics; October 18-19, Economics; November 2-3, Chemistry; November 15-16, Biology; November 30-December 1, Music and Theater Arts.

February 14-15, 1995, Undergraduate Education and Student Affairs; March 1-2, Ocean Engineering; March 6-7, Humanities; March 13-14, Chemical Engineering; April 3-4, Libraries; April 10-11, Political Science; May 3-4, Electrical Engineering and Computer Science; May 8-9, Brain and Cognitive Sciences.

Members of the community who would like information about an upcoming visiting committee meeting should contact the headquarters of the department that is being visited.

# Prion research


(continued from page 1) procedure, Professor Lansbury said.

The new work could lead to a test to determine whether mad-cow disease is transmissible to humans. In such a test researchers would expose healthy human prions to abnormal cow prions and observe the results.

Further, with the ability to replicate prion conversion in a test tube, Professor Lansbury said, "we can now study the mechanism of conversion in detail." This will result in a better understanding of prion diseases, which in humans include kuru and fatal familial insomnia.

The prion work could also aid research in Alzheimer's disease. Professor Lansbury, who has worked on Alzheimer's for six years, explained that the two groups of diseases resemble each other in a variety of ways. For example Alzheimer's, too, is believed to begin when a "normal" protein is converted to an abnormal form.

The work was sponsored by the NSF through a Presidential Young Investigator award to Professor Lansbury and by the NIH.



## MIT MEDICAL DEPARTMENT

### HEALTH EDUCATION

### FALL WORKSHOPS FOR PARENTS AND PARENTS-TO-BE

**DO WE WANT TO HAVE A BABY? MAYBE .....** Wednesday, September 28; 12:00-1:00pm

**THE EMERGENCY HOME CARE MEDICINE CHEST.....** Wednesday, October 5; 12:00-1:00pm

**MOTHERS AND DAUGHTERS: DREAMS AND DILEMMAS..** Wednesday, October 19; 12:00-1:00pm

**INFANT AND CHILD SLEEPING PROBLEMS.....** Wednesday, October 26; 12:00-1:00pm

**SEXUALITY IN CHILDHOOD -- WHAT IS NORMAL?.....** Wednesday, November 2; 12:00-1:00 pm

**COMMON CHILDHOOD ILLNESSES.....** Wednesday, November 30; 12:00-1:00pm

**SAFE AT HOME: A CHILD-PROOFING CHECK LIST.....** Wednesday, December 7; 12:00-1:00pm

**JOYS AND STRESSES OF NEW PARENTHOOD.....** Wednesday, December 14; 12:00-1:00pm

*NO FEE, NO REGISTRATION REQUIRED. CHILDREN WELCOME IF CAN SIT QUIETLY.*

**INFANT AND CHILD CPR.....** Preregistration required; \$25/person, \$40/couple  
Section A; Monday, October 31; 6:00-9:00 pm  
Section B; Monday, November 7; 6:00-9:00 pm

**FOR MORE INFORMATION AND PROGRAM BROCHURE**

**CALL OR VISIT HEALTH EDUCATION - E23-205 - (617)253-1316**

CityDays sights



Janelly Rivera, 10, of the Kennedy School in Cambridge, did some virtual interaction during CityDays with a computer-generated creature in the Media Lab thanks to Bruce Blumberg, who hosted participants. His doctoral work is on autonomous agents, which is modeled on ethology, the study of animal behavior in the environment. Photo by Donna Coveney

David Wilson to fill in at OME

Professor David Gordon Wilson has been named the interim director of the Office of Minority Education (OME). The announcement was made by Arthur Smith, dean for undergraduate education and student affairs. Professor Wilson, who retired from the Department of Mechanical Engineering on July 1, will serve until a new director is appointed. Dean Judy Jackson, the previous director, resigned the

position as of September 1 to enroll in a doctoral program in education at Harvard. Professor Wilson has been associated with OME in a variety of ways in the past, and his appointment has been received with enthusiasm by many of the students who are served by the office.

"I am very glad that David accepted this position," Dean Smith said in a letter to faculty members last week. "He will bring his long experience at MIT and his demonstrated concern for students as he helps to fill the gap left by Dean Jackson's departure. The programs that OME provides are extremely valuable to students, and this appointment should assure that they continue without loss of quality."

A search committee chaired by Professor Rafael Bras, head of the Department of Civil and Environmental Engineering, has been formed to advise Dean Smith on the selection of a new director. Committee members are Isaac Colbert, associate dean of the Graduate School; Zaragoza Guerra of the Admissions Office; Professor Daniel Hastings of aeronautics and astronautics; Dean Arnold Henderson of UESA's counseling and support services; Ann Davis Shaw of the Office of Career Services; Ted Hill, a senior in political science; Luis Rodriguez, a graduate student in electrical engineering and computer science; and Brian White Eagle, a sophomore in EECS. Two other undergraduate members are to be selected.

The committee will hold a meeting to receive community input on September 21 at 7pm in Rm 2-105.

work and learn more about the fields they cover and about the process of discovery and innovation. Their studies will include courses, specially organized seminars, laboratory visits and individual research. The program is an activity of the Program in Science, Technology and Society in the School of Humanities and Social Science.

The Knight Fellows began their work September 1. Last week, they

Ten science journalists arrive at MIT as Knight Fellows

By Victor K. McElheny  
Knight Fellows Program

Science journalists from across the United States, visiting the Institute for the academic year, will be introduced to the MIT community Monday at a reception with MIT President Charles M. Vest at 4pm in the Emma Rogers Room (10-340). As in 11 previous years, the reception is jointly spon-

sored by the MIT News Office and Technology Review magazine.

The 1994-95 Knight Science Journalism Fellows plan to study biology, genetics, physics, mathematics, the history of science and other subjects. They include staff and free lance journalists working for both broadcast and print media.

The program is an opportunity for the journalists to step back from their

Material holds promise for better bone grafts

A new composite bone graft material developed at MIT holds promise for improving surgical procedures for patients who have suffered bone damage through injury or disease.

The work was headed by Dr. Mohamed Attawia, a postdoctoral associate in the Harvard-MIT Division of Health Sciences and Technology. Co-authors of the paper presented at an August meeting of the American Chemical Society were Dr. Cato Laurencin, an orthopedic surgeon and MIT research scientist in whose lab Dr. Attawia worked, and UROP student Jessica Devin, who graduated last May. (Drs. Laurencin and Attawia moved this month to the Medical College of Pennsylvania, where Dr. Attawia is an assistant professor and Dr. Laurencin is an associate professor of orthopedic surgery and a research professor of chemical engineering at Drexel University.)

The new material consists of calcium phosphate ceramic called hydroxyapatite or HA, a material found in natural bone, and a biodegradable polymer, poly(lactide-co-glycolide) or PLAGA. This polymer is in the form of microspheres averaging 150 microns in diameter, and it acts as scaffolding for the growth of new bone in the patient. Over time, the PLAGA spheres degrade and are excreted harmlessly; the tiny holes they leave give the graft a porous structure like natural bone, allowing new bone cells to infiltrate the material. "It's something for the cells to grow on, and then it disappears," Dr. Attawia explained.

Tests using electron microscopy and other techniques have shown that the composite is "very successful" in allowing such growth, and that it also has the mechanical strength and integrity of real bone, he added.

Bone grafts now take one of two forms: autografts, in which bone is transplanted from a healthy to an injured area in the same patient, or allografts, in which bone from another person is used. Both of these methods have shortcomings, however. In the case of autografts, removing bone from

one part of the body can create the same deficit there as in the area being repaired. "We're dealing with a material of limited supply," Dr. Laurencin said.

Allografts can present obstacles in the form of compatibility between donor and recipient as well as the risk of passing on diseases such as AIDS, hepatitis and others. However, treating allograft bone through freeze-drying or irradiation to lessen the chances of in-

"The need for other alternatives is there."

—Dr. Cato Laurencin

compatibility and disease transmission also reduces the quality of the bone and the likelihood that it will be successfully incorporated into the patient's own bone, Dr. Laurencin said. "The need for other alternatives is there," he noted.

The number of bone graft operations—and the resulting demand for bone graft material—is rapidly increasing. In the 1970s, about 100,000 such operations were performed each year; in the 1980s, there were approximately 200,000 annually, while that number is projected to reach one million per year in this decade, he said. The surgery is indicated for patients who have suffered bone damage through a tumor or a fracture that leaves a gap in the bone. Also, patients who had hip or knee replacements many years ago and whose artificial joints have worn out are returning for repeat operations, and those procedures often require supplementary bone material, he added.

Dr. Laurencin plans to begin animal trials with the composite soon. If it proves to be effective and is approved for use in humans, it could some day be a widely used alternative to standard bone graft materials. The work was funded by the National Science Foundation.

Are you a United Way volunteer?

MIT is one of numerous institutions that participates each year in the annual drive of The United Way of Massachusetts Bay (UWMB), which will begin soon. As well as giving money to the United Way, many members of the MIT community have volunteered for—or been helped by—United Way agencies, a group of more than 100 non-profit social service agencies that help 1.7 million people in 81 cities and towns.

Each fall, Tech Talk features a series of articles focusing on members of the community who have been involved with agencies which the campaign's donations support. If you would like to share your story as either a provider or recipient of United Way help, please contact Alice Waugh, assistant editor of Tech Talk, x8-5401 or send e-mail to <awaugh@mit.edu>.

MIT's 1994 campaign will officially begin on October 19 and is scheduled to last until December 7. A meeting of the chief solicitors from MIT departments and centers will be held on Monday, Sept. 26, at 9am in the Mezzanine Lounge of the Student Center. The Institute's goal this year is to raise \$322,000 toward the UWMB's target of \$42.96 million. During last year's campaign, MIT community members topped the goal of \$320,000 with donations totaling \$322,378.

Agencies that receive United Way funding help clients obtain physical and mental health care, legal aid, affordable housing, and substance abuse prevention and treatment, among other services. Donations can be targeted to a specific agency or to one of eight general categories.



The 1994-95 Knight Fellows recently gathered in the Whitaker College courtyard. Seated: David Ropeik of Channel 5, Boston and Victor K. McElheny, director of the program. Middle row: Larry Gonick of San Francisco; Marcia Bartusiak of Sudbury, MA; Linda M. Lowe, program administrator; Larry Husten of Brooklyn; and Alex Barnum of San Francisco. Back row: Karen Wright of New York City; Colleen Sauber of St. Paul, MN; and Sylvia Wright of San Jose, CA. Photo by Graham Ramsay

started a schedule of approximately 60 twice-weekly group seminars with a visit to the Whitehead Institute, and on September 9, they met with Professor Steven Pinker of brain and cognitive science. Later this fall, they plan to visit the Woods Hole Oceanographic Institution and the US Forest Service research station at Hubbard Brook, NH.

The Fellows are: biotechnology reporter Alex Barnum of the San Francisco Chronicle, astronomy writer Marcia Bartusiak of Sudbury, MA, science cartoonist Larry Gonick of San Francisco, medical writer Larry Husten of Brooklyn, environment reporter David Ropeik of WCVB-TV Channel 5 in Boston, agriculture and biotechnology writer Colleen Sauber of St. Paul, MN, science writer Karen Wright of New York City, and science editor Sylvia Wright of the San Jose Mercury News. The 1994-95 Fellows bring the total number selected for the program to 128, including 69 men and 59 women.

Directing the program this year is Victor K. McElheny, who was on leave last year to work on a biography of Edwin H. Land, founder of Polaroid Corporation. David G. Ansley, acting director during 1993-94, became science editor of Consumer Reports magazine on September 1.

The Fellowship program, initially named for Vannevar Bush, was inaugurated in 1983 with grants from the Alfred P. Sloan and Andrew W. Mellon Foundations. The program has continued since 1987 under operating and endowment challenge grants from the John S. and James L. Knight Foundation of Miami. The challenge of \$5 million toward endowment was issued in 1989, and \$4 million of this has been paid.

# Institute Calendar

Sponsored by the Dept. of Chemical Engineering, 3pm, Rm 66-110. Reception at 2:45pm.

**What Do Osmium Isotopes Tell Us About the Earth's Crust\***—Prof. Karl Turekian, Yale Univ. Earth, Atmospheric, and Planetary Sciences Fall Department Lecture Series, 4pm, Rm 54-915. Refreshments, 3:30pm, Ida Green Lounge.

## MONDAY, SEPTEMBER 19

**Retrofitting and Repowering Technologies for Coal-fired Power Plants in the U.S.\***—Sumie Nakayama, CEEPR. Political Economy of Global Energy Brown Bag Luncheon Seminar Series, 12-1:30pm, Rm E38-714. Bring your lunch. Soda & cookies provided. For more info, contact Michael Lynch, x3-5806.

**R&D on Adiabatic Gas Engine & Application of Fine Ceramics in Japan\***—Yoshi Sakai, Japan Fine Ceramics Association, Sloan Automotive/Reacting Gas Dynamics Laboratories, 3-4pm, Rm 31-161.

## TUESDAY, SEPTEMBER 20

**The Medicean Stars and Borelli's 'Celestial Mechanics,'\***—Domenico Bertoloni Meli, Univ. of Cambridge. Sponsored by the Dibner Institute for the History of Science and Technology. Tuesday Lunch-Time Colloquium, 12-2pm, Rm E56-100. Please call if you plan to attend, x3-6989 or <kontoff@mit.edu>.

**Natural Structural Shapes (A Unified Philosophy of Optimal Design)\***—Professor W. Stadler, San Francisco State University. Sponsored by the Dept of Mechanical Engineering, Applied Mechanics Seminar, 3-4pm, Rm 5-234.

**High Performance TFTs by Solid Phase Crystallization (SPC) and Excimer Laser Annealing (ELA)\***—Takashi Noguchi, MIT/MTL Visiting Scientist, Sony Corporation. MTL VLSI Seminar Series, 4pm, Rm 34-101. Reception, 3:30pm.

**Building a Strong Economy in an Information Age\*\***—Deane D. Cruze, Corporate Senior Vice President of Operations, The Boeing Company. Sponsored by Leaders for Manufacturing Program, Aeronautics & Astronautics, Lean Aircraft Initiative, 4pm, Rm 9-150, Reception to follow.

**Aircraft Emissions: Is There a Smoking Gun?\***—Dr. Rick Mlake-Lye, Aerodyne Research, Inc., Fluid Mechanics Seminar Series, 4-5pm, Rm 1-246.

**Exploiting Unused Utility Capacity with Mobile Factories\***—Moshe Alamaro, Principal Engineer, Deshen Industries. Sponsored by the MIT Nanotechnology Study Group, 7:30pm, Bldg NE43-8th floor playroom. More info: <fhagood@world.std.com>.

## WEDNESDAY, SEPTEMBER 21

**Robert McNamara and Post World War II: The Limits of Expertism\***—Christopher Brown, University of Chicago and Ben Frankel, Editor, Security Studies. The Defense and Arms Control Studies Program Seminar, 12-1:30pm, Rm E38-615. More info: Lynne Levine, x3-0133

## THURSDAY, SEPTEMBER 22

**Round Table Discussion on Current Research Project\***—Robert Keohane, Professor of Government, Harvard & Eugene Skolnikoff, Professor of Political Science, MIT (Keohane: Global financing - Skolnikoff: IIASA) Harvard/MIT Joint Research Seminar on International Environ-

mental Affairs: Institutions, Politics, and Policies, co-sponsored by CIS, (MIT) and CFIA, CSIA(Harvard), 3-4:30pm, Harvard CFIA, 1737 Cambridge Street, Room 2, more info: Lois Hurst x3-2567.

**Polyhedral Composition\***—François Margot, Graduate School of Industrial Administration, Carnegie-Mellon University. Operations Research Center & Decision Sciences Center Seminar Series, 4-5pm, Rm E40-298, followed by coffee, tea, and cookies, Rm E40-106. More info: Dave Markowitz or Sarah Stock, x3-6185.

**Novel Experiment on In-cylinder Adsorption of Fuel from the Oil Layer\***—Mike Norris, Graduate Research Assistant, Sloan Automotive/Reacting Gas Dynamics Laboratories, 4:15-5:15pm, Rm 31-161.

**Negotiating With the Japanese\***—Ms. Patricia Gercik, Managing Director, MIT Japan Program, CD-ROM interactive video, MIT Japan Program Technology Forum Lecture Series, 5:30-6:30pm, E38-6th floor conference room (292 Main Street at Kendall Square). More info: x3-2839

## FRIDAY, SEPTEMBER 23

**The Andes in Prehistory: Managing a Vertical World\***—Prof. Heather Lechtman, MIT. Earth, Atmospheric and Planetary Sciences Department Lecture Series, 4pm, Rm 54-915. Refreshments, 3:30pm, Ida Green Lounge.

## COMMUNITY INTEREST

**Adoptive Parents Group\*\***—Dates & time to be scheduled. No fee. Preregistration required. Sponsored by the Family Resource Center. Call x3-1592.

**African American Parenting\*\***—Dates and time to be scheduled. Continuing discussion series, begun in spring 1993, on the special challenges faced by African American families. New members welcome. Cosponsored by the Family Resource Center and the MIT Medical Dept. No fee. More info/preregistration: x3-4911.

**Alcoholics Anonymous (AA)\***—Meetings every Tues, 12-1pm; Thurs, 12-1pm, Rm E23-364. For info: Alise, x3-4911.

**Alexander Technique\***—Tuesdays 5:30-6:30pm, Group class sponsored by the MIT Women's League. More info: Lisa x3-5619.

**Women's 12-Step AA\***—Meetings every Mon evening, 5:30-7pm, Rm E23-364. More info: Alise, x3-4911.

**AI-Anon\***—Meeting every Fri, noon-1pm, Rm E25-117; every Tues, noon-1pm, Rm 66-056; and every Mon, 12-1pm, Lincoln Lab Bldg 1218, Family Support Ctr. The only requirement for membership is that there be a problem of alcoholism in a relative or friend. Call Alise, x3-4911.

**Alcohol Support Group\*\***—Meetings every Wed, 7:30-9am, sponsored by MIT Social Work Service. For info call Alise, x3-4911.

**Cancer Support Group\*\***—Meetings every Thurs, 12-2pm, Bldg E51. For those with acute and chronic forms of cancer. Sponsored by the MIT Medical Dept. For information about weekly luncheon meeting, call Dawn Metcalf, Social Work Service, x3-4911.

**Co-Dependents Anonymous (CoDA)\***—Meetings every Thurs, 6:30-8pm, Rm 66-168. Info: Alise, x3-4911.

**Family Resource Center\*\***—In addition to Parenting workshops and programs, the Family Resource Center also offers support and training programs for child care providers, workshops at your request, and individual consultations concerning parenting, child care options, and work/family issues. A lending library is also available, which includes a new collection of books and materials on giftedness. Call x3-1592. Lincoln Lab families can call 981-7028.

**The Furniture Exchange at MIT\*\***—Furniture and housewares at modest prices. Aug/Sept hours: 10-4 on Tues/Thu, and 10-1 on Sat. (Not open 9/3.) A service project of the MIT Women's League. Bldg WW15, 350 Brookline St. Call x3-4293. Also—Wanted: People who like people. Volunteer 3-4 hours a week. It's fun, and you'll be offering a valuable service. Plenty of parking. Call x3-4293 or x3-3656.

**GABLES (Gay, Bisexual, and Lesbian Employees and Supporters) at MIT\*\***—Take part in varied cultural, educational, and social activities. Meetings held twice a month, one for general business and one for a program or social gathering. For information on upcoming events, call the info line x2-1014. To sign up for the staff lesbigay e-mail lists, send e-mail to <gables-request@athena.mit.edu>.

**Infant-Toddler Child Care Briefing\*\***—Sept 19: Introductory discussion for expectant parents and those new to parenting or child care, covering types of care, costs, finding and evaluating care, and parental leave. Preregistration required, call x3-1592. Led by Kathy Simons, Administrator, MIT Child Care Resource and Referral Programs. 12-1pm, Rm 4-144.

# Obituaries

## HOTTEL MEMORIAL

A memorial service for Nellie Rich Hottel (Mrs. Hoyt C.) will be held Saturday, Sept. 24, at 11am in the Winchester Unitarian Church. Mrs. Hottel, who was active with the MIT Matrons, died on July 15 at the age of 88.

## ALBIN ANDERSON JR.

Albin Anderson Jr., 62, of Hopkinton, a technician at the Plasma Fusion Center since 1978, died on July 14. He leaves his wife, Carolyn Anderson.

## FRANK CASWELL

Word has been received of the August 14 death of Frank Caswell, 86, of Beverly. Mr. Caswell worked at Lincoln Laboratory from 1945 until his retirement in 1973. Survivors include his wife, Murielle, and a grandson, Scott Caswell.

## WESLEY A. FRANCIS

A funeral service was held August 30 for Wesley A. Francis, 66, of Cambridge, who died on August 25. Mr. Francis was a general assistant at Graphic Arts from 1968 until his retire-

ment in 1989. He leaves his wife, Gwendolyn Moore Francis; a son, Keith Francis, and five stepchildren.

## CAROLYN LEONARD

Carolyn Leonard, 72, of Norwell, a retired staff member in the Medical Department, died on August 3. Mrs. Leonard was a registered nurse in the infirmary from 1957 until her retirement in 1986. Her survivors include two daughters, Susan Clotfelter and Judith Sweeney, and a grandson, Michael Sweeney.

## JOHN OTERI

John Oteri, 78, of Everett, a support staff member in the Microreproduction Laboratory from 1968 until his retirement in 1979, died on August 20. His survivors include his wife, Virginia Oteri.

## JOHN WOODBURY

John Woodbury, 74, of Lake Park, FL, a retired service staff member in Housing and Food Services, died on September 2. He worked at MIT from 1967 until his retirement in 1982. He leaves his former wife, Miriam Woodbury.

## HEALTH EDUCATION

**Nursing Mothers' Support Group\*\***—Third Wednesday of each month, 11am-12pm, Rm E23-297. No fee. No registration. Call x3-2466 for details. Sponsored by the Medical Dept. and the Family Resource Center.

**Childbirth Preparation\*\***—Early Pregnancy, Lamaze Childbirth Preparation, and Lamaze Review classes are offered to patients of the MIT Medical Department's Obstetrics Service. Call x3-1316 for details.

**Tape Time for Health\*\***—A free video loan program. Topics include birth, parenting, baby care, smoking cessation, etc. Visit the Health Resources Center to borrow a tape or call x3-1316 for a list of titles available.

## MITAC

*Location: Room 20A-023, 18 Vassar St, Cambridge - 9:30am to 3:30pm, Monday, Wednesday, Thursday, & Friday. Room LLA-218, Lincoln Labs, Lexington - 1:15pm to 4pm; Thursday & Friday. MITAC is closed Tuesday and all Institute Holidays. Call x3-7990 or e-mail <byg@mit.edu> for further information.*

**Discount Movie Tickets:** Loews Cinemas \$5, for \$4.50; Showcase Cinemas \$4.75 for \$4.25; General Cinemas \$5 for \$4.50, all plus 50¢ service charge.

**Aquarium Discount Tickets:** \$5.50 for ages 11 and over, valid through May 1995, reg. \$8.50.

**Metro Museum Savings Book:** \$3 (reg. \$5). Great discounts to 9 museums (Children's Museum, Computer Museum, Franklin Park Zoo, Stone Zoo, JFK Museum, Museum of Fine Arts, Museum of Science, Peabody Essex Museum, Plimoth Plantation, and the Sports Museum) valid through June 1995.

**King Richard's Faire:** \$12 (reg. \$14). Valid Sept 17, 24, Oct 1, 8, 10, 15 & 22 ONLY.

**Topsfield Fair:** \$4.50 (reg. \$5 weekdays/\$6 weekends) Oct 1 - Oct 10.

## SOCIAL ACTIVITIES

**HUG Party: Toxic Waste\***—Sept 24: Sponsored by MIT Hillel, 9pm-1am, MIT Student Ctr, 4th Floor, Admission \$3. More info: Joe, dorm x5-9568 or <jhkarlin@mit.edu>.

## MOVIES

*Admission to below Lecture Series Committee Movies is \$2.00, and MIT or Wellesley identification is required. For the latest Lecture Series Committee movie and lecture information, call the LSC Movieline, x8-8881, or check TechInfo.*

**Sept 16:** Delicatessen, Rm 26-100, 7&10pm. A Streetcar Named Desire, Rm 10-250, 7:30pm. Sept 17: The Paper, Rm 26-100, 7&10pm. Sept 18: Women on the Verge of a Nervous Breakdown, Rm 26-100, 7 & 10pm. Sept 23: In the Name of the Father, Rm 26-100, 7 & 10 pm. The Magnificent Ambersons, Rm 10-250, 7:30pm. Sept 24: Sirens, Rm 26-100, 7 & 10pm. Sept 25: Henry V [1989], Rm 26-100, 7 & 10:30pm.

**Send notices for Wednesday, September 21-Sunday, October 2 to Calendar Editor Rm 5-111, before 12 noon Friday, September 16.**

# TechnologyReview

Don't Miss a Word  
of the October Issue!

**Confronting the Aids Vaccine Challenge** by Max Essex.  
Although HIV has proven an extraordinarily elusive foe, researchers are devising innovative ways to prevent its growth.

**How Numbers Can Trick You** by Arnold Barnett.  
Media accounts of studies on health, safety, and the physical and social sciences are often compromised by subtle errors in mathematical reasoning. A consumer filed guide.

**Down to the Sea in Robots** by J. Robert Fricke.  
MIT-designed autonomous vehicles could aid in oil exploration and production, monitor marine pollution, track endangered species, and enable a new kind of fish farming.

**Science Fiction: Stepchild of Science** by Frederik Pohl.  
Although science fiction often "don't get no respect," it has inspired the likes of Leo Szilard, Werner von Braun, and Stephen Hawking.

**The Humane Engineer** by Samuel C. Florman.  
Overpopulation is a challenge that daunts even the most hard-core optimist.

and much more...

For a copy or subscription, write to us at MIT Building W59 or email at mconnors@mit.edu

Arts Calendar

September 14-25

■ MUSIC

**Suenobu Togi, Japanese Music and Dance Master**—Sept 13-18. The master of Japanese Imperial Court music and dance will teach intensive workshops in both disciplines sponsored by the MIT Japan Program and the Jo Ha Kyu performance group. See article, right. **Gagaku** classes: (instruments provided) meet Sept 13-16, 6:30-9:30pm with a separate weekend workshop Sept 17-18. Series of 6 classes: \$180; weekend only \$65; single class \$35. **Bugaku** classes meet Sept 13-16, 2-5pm with separate weekend workshop. Series of 6 classes: \$120; weekend only \$50; single class \$25. **Performance**—Sept 17, 8pm, Kresge Little Theater. Tickets: \$12, \$9 students/seniors, \$5 MIT students. 868-3382

**The Family Singers**—Sept 14. Songs to help find answers to the questions and dilemmas found in today's stressful society, performed by the travelling troupe of 11 singers/musicians. Sponsored by MIT Marantha Christian Fellowship. 1:30pm, Student Center steps. 329-2024

**Gamelan Galak Tika Rehearsals/Meetings**. Wednesdays—7:30-9:30pm, Kresge basement; Sundays—5-7pm, Kresge. Info: Evan Ziporyn, 253-9822

**MIT Guild of Bell Ringers**. Change ringing on hand bells. Beginners always welcome. Will also ring for occasions. Call Ken, 253-7194 or 784-6114. Meets Mondays, 6:30pm, 2nd floor balcony of Lobby 7.

■ THEATER

**Lighting Workshop**—Sept 20. Hugh Thompson will conduct a lighting workshop for anyone interested in learning more about lighting design, or simply the mechanics of theatrical lighting. Sponsored by MIT Community Players. 7pm, Kresge Little Theater. 253-2530

■ DANCE

**MIT Folkdance Club**. Sun—International Dancing: Early teaching for beginners—7-8pm; Teaching & requests—8-11pm, Sala de Puerto Rico or Lobby 13. Tues—Advanced Balkan Dancing: Regular teaching & requests, 8-11pm, Student Center 4th floor (491/401). Weds—Israeli Dancing: Early teaching for beginners—7-8pm; Teaching & requests—8-11pm, Sala de Puerto Rico or Lobby 13. MIT/Wellesley students free, \$.25 others. Call 253-FOLK for locations on a given week.

■ FILMS

**Japanese Flicks**—Sept 16: *Tampopo*—The quest for the perfect bowl of noodles. Directed by Juzo Itami (*Taxi Woman*) and starring Nobuko Miyamoto as the aspiring restaurateur. 6:30/10:30pm. *Dreams*—Akira Kurosawa's 1990 blockbuster. This film is based on the director's own imaginative and unique vision. Eight sequences, including "The Blizzard," "Crows," "The Weeping Demons," and "Village of the Watermills." 8:30pm. All in Japanese with English subtitles. Screening times approximate. \$1 donation. Rm 1-390. 253-2839

■ READINGS

**Poetry @ MIT**—Sept 15. Sophie Cabot Black and Teresa Cader. Season opener in series sponsored by MIT Program in Writing and Humanistic Studies and the Literature Section. Black, author of *The Misunderstanding of Nature*, is the recipient of numerous awards including the Grolier Poetry Prize and a 1994 fellowship from the Bunting Institute. *Guests*, by Cader, won The Journal Award for Poetry in 1991 and the 1992 Poetry Society of America's Norma Farber First Book Award. Cader has also received fellowships from the National Endowment for the Arts and the Bunting Institute. She is completing a second manuscript, which is tentatively entitled *The Paper Wasp*. 7:30pm, Bartos Theater (E15). 253-7894

■ EXHIBITS

**"The Cube"** (E15): *MRC 50s/90s*—Through Oct 31. Retrospective exhibition of the work of Muriel Cooper, the late graphic designer and pioneer in the field of design for information-rich electronic environments. Prof Cooper cofounded and directed MIT's Visible Language Workshop at the Media Laboratory. Her teaching and research focused on how computers can enhance the graphic communication process and, inversely, how high-quality graphics can improve computer systems. Philippe Villers Experimental Media Facility ("The Cube"). Tues, Thurs, Fri 12-6; Weds 12-8pm; Weekends 1-5; closed holidays. 253-0640

**List Visual Arts Center (E15): Annual Student Loan Art Exhibition**—Through Sept 21. An annual exhibition featuring over 300 framed contemporary prints and photographs from MIT's permanent collections. Through the List Visual Arts Center's unique Student Loan Program, the original signed prints, artist-

designed posters, and photographs will all find homes in the dormitories and workspaces of MIT students at the close of the exhibition. Works include those by Berenice Abbott, Jasper Johns, Robert Motherwell, and Andy Warhol. Lottery held September 21. List Visual Arts Center. Tues, Thurs, Fri 12-6; Weds 12-8pm; Weekends 1-5; closed holidays. 253-4680

**Institute Archives: Julius A. Stratton (1901-1994): An Exhibit of Photographs and Quotations**. Bldg 14N first floor hallway.

**MIT Museum (N52): Light/Space/Time: CAVS/MIT—25 Years**. Retrospective exhibition highlighting the ground-breaking work in art, science and technology of the Center for Advanced Visual Studies at MIT. Show features work by CAVS alumni and faculty in media such as laser, light, video, and computer art. Curated by Otto Piene, Professor Emeritus and past director of the CAVS. Show runs through October 2.

**Holography: Artists and Inventors**. In 1993, the MIT Museum acquired the complete holdings of the Museum of Holography in New York—the largest and most comprehensive collection in the world. The show will explore the history of holography as well as technical and artistic applications. Curated by renowned holographers Professor Stephen Benton, of MIT's Program in Media Arts and Sciences; and Betsy Connors, a former fellow with the MIT Center for Advanced Visual Studies who has a Master's degree from and is a former instructor with the MIT Media Lab's Spatial Imaging Group.

**MIT Hall of Hacks**. Reopening of the exhibition which chronicles MIT's rich history of wit and wizardry, featuring a fascinating collection of artifacts, including props used in the recent police-car-on-the-dome hack. Opens Sept 15.

Ongoing: *Light Sculptures* by Bill Parker; *Math-in-3D: Geometric Sculptures* by Morton C. Bradley, Jr.; *MathSpace*. 265 Mass Ave. Tues-Fri 9-5, Weekends 1-5. 253-4444

**Compton Gallery—Charles H. Woodbury, Class of 1886: Artist**. Exhibition of paintings of one of the earliest American impressionists, MIT mechanical engineering graduate Charles H. Woodbury. Through September 16. Mon-Fri, 9-5pm, Compton Gallery (enter 77 Mass Ave). 253-4444

**Hart Nautical Gallery—Course 13, 1893-1993: From Naval Architecture to Ocean Engineering**. The history of the Dept of Ocean Engineering. Includes a prototype autonomous underwater vehicle, designed and built in the 1970s, and current work including research performed by the department for Bill Koch's successful America's Cup campaign with America's Permanent Exhibition of MIT Museum's Ship Models. Ongoing. Weekdays 9-8. 253-5942

**Sloan School Dean's Gallery: Sculptures by Glen Urban**. Exhibit of works by the dean of Sloan School of Management. Sept 21 through Nov 10. Dean's Gallery is located in E52-466 and is open Mon-Fri, 8-5pm. Michelle Fiorenza, 253-9455

■ OTHER

**Arts Grant Deadline**—Sept 14. First deadline for 1993-94 Council for the Arts Grants funding. Forms available at the Office of the Arts, E15-205, x3-2372

**"Recent Developments in Improbable Research"**—Sept 16. Lecture/slide show by Marc Abrahams, editor of the *Annals of Improbable Research* and Presenter of the Annual Ig Nobel Prizes. Discussion of topics like "The Taxonomy of Barney" and "The Aero-dynamics of Potato Chips." 3pm, MIT Museum. 258-9118

**Register for Art Classes**—Through Sept 23. Student Art Association registration deadline for fall classes. Enrollments limited. Sessions generally 10 weeks in duration. Open to all members of the MIT/Wellesley Community. 253-7019



The Arts Page is produced by the Office of the Arts in collaboration with ARTSNET. Lynn Heinemann, writer; Susan Cohen, layout; Mary Haller, editor. E15-205; 253-4003.

Welcome to the Arts Page

It has long been thought by many who pass through MIT's doors that the arts are one of the Institute's "best-kept secrets." Happily, the word is getting out. MIT is now recognized by many as a leader and innovator not only in the sciences and engineering, but in the performing, visual, and literary arts. More and more students, faculty, and staff are developing their creative talents and exploring new artistic interests at the Institute. Distinguished faculty and celebrated artists are drawn here from all over the world. And the list of concerts, plays, exhibitions, workshops, films, readings, and guest artist appearances continues to grow longer and more diverse.

MIT's 1994-95 academic year boasts a rich assortment of performances, programs, and exhibitions of the highest caliber, from the traditional to the radical, the controversial to the comic. And we're here to tell you about them. The Arts Page in Tech Talk is produced by the Office of the Arts to raise the level of awareness of the arts programs, activities, and opportunities offered by the Institute and to encourage members of the MIT community to explore and participate in the arts at all levels. We're also here to assist you in publicizing your events and programs to the outside world.

In order to get the word out, we need to hear from you. Send your event notices, news items, photos, and story ideas to Lynn Heinemann, Office of the Arts, E15-205 (heine@media.mit.edu), 253-4003. While giving preference to events and programs taking place on campus, we're also interested in off-campus arts activities involving members of the MIT community.

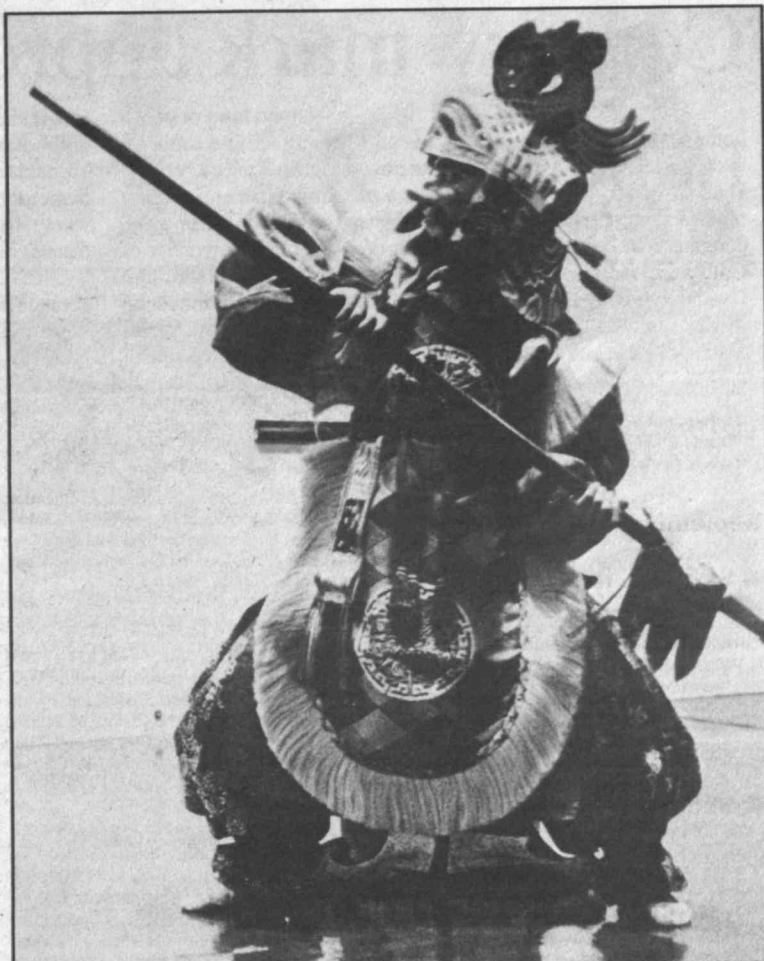
We welcome your thoughts and comments on the Arts Page as we enter into our eighth year in Tech Talk. And as we dive into another academic year, I invite you to discover the exciting, challenging arts programs and performances that make MIT such a stimulating place to study and work.

Mary Haller  
Director of Arts Communication  
Office of the Arts

Students: Sign up for art



Need to do some decorating in your new dorm room? Is your activities group's office looking a little drab? Check out the collection of signed posters, prints, and photographs in the Annual Student Loan Art Exhibition on view at the List Visual Arts Center (E15). The works are available by lottery for one-year loan to full-time registered MIT students. Students or group representatives simply complete a registration card with the names of the three favorite works of art. Only one card per student or group is accepted for consideration. The lottery will be held on Wednesday, Sept. 21, and the winners' names will be posted at 6pm on the doors of the gallery. Information: 253-4680.



Suenobu Tobi Sensei, Japanese court music master, in the dance "Kitoku".

Japanese music and dance master performs at MIT

Imported from China and Korea in the sixth century, the hauntingly beautiful *Gagaku*, Japanese court music, is the oldest living orchestral music in the world. When combined with the elaborate costumes and masks and slow symmetrical gestures of its dance counterpart, *Bugaku*, the result, it is said, is an atmosphere of harmony and elegance.

Suenobu Togi Sensei, master of Japanese Imperial Court music and dance, pictured above, will conduct intensive workshops in both disciplines Sep-

tember 13-18, which will culminate in a performance Saturday, Sept. 17, at 8pm at Kresge Little Theater. See Arts Calendar (left) for concert and workshop information.

Togi Sensei is from one of the oldest and most renowned *Gagaku* families in Japan, associated with the Imperial Court for over 1,000 years. Currently a ceremonial musician at the Meiji shrine in Tokyo, he is master of the *Hichiriki* (double reed instrument), and the *Biwa* (lute), and Dances of the Right (of Korean origin).

They call this a vacation?

For many members of the MIT community, summer is more than sunning, sailing, and sunbathing. Here's a look at the recent professional activities folks in the Music and Theater Arts Section:

Prof. **Jeanne Bamburger**, in addition to "running around giving various talks on various topics having to do with music and education," earned "a wonderful review" of her book, *The Mind Behind the Musical Ear* in the current issue of the *Journal of Music Theory*.

Prof. **Peter Child** was commissioned by the Boston Musica Viva for a piece for young audiences and also received a commission for a couple to celebrate the birth of their baby girl.

Prof. **John Harbison** was Composer-in-Residence — at both the Marlboro and Sarasota Music Festivals. He was guest teacher at Tanglewood, where the BSO and soloist Yo-Yo Ma gave an encore performance of his Cello Concerto. During the first week in September he co-directed the Token Creek Chamber Music Festival in Wisconsin.

Associate Provost for the Arts and Professor of Music **Ellen T. Harris** reports that she was "happily surrounded by Handel's own manuscripts and 18th-century manuscript copies" while working in England on an edition of Handel's cantatas for Oxford University Press. Harris also reports a summer of "full enjoyment" of London theater, the Tanglewood Music Festival and the Aspen Music Festival.

As part of a colloquium entitled "Cinema Turns 100," Associate Prof. **Martin Marks** provided piano ac-

companiment for hundreds of the earliest of silent films at the Museum of Modern Art in New York City. The films, each 2-3 minutes long and dating from 1895-1905 were presented by DOMITOR, a worldwide group of leading scholars devoted to the study of silent film.

Lecturer **Michael Ouellette** spent the summer on the staff at the Williamstown Theater Festival, conducting acting classes as a Festival Workshop. With the Festival's 16- and 17-year-old apprentices, he produced a condensed version of Wedekind's "tragedy of childhood," *Spring's Awakening*. Proving that apprenticeships are not solely for the young in years, Ouellette again ran the Festival's Acting Workshop for Seniors.

Lecturer **Elena Ruehr** worked on a commission for a new Boston-based string orchestra, *Metamorphosen*. She also finished a brass quintet commission for the Capital Brass (an ensemble run by MIT employee Jan Scott) and began a commission for the MIT Concert Band.

Prof. **Janet Sonenberg** spent the summer conducting interviews for her book on the acting process, which is due to be published in Spring of 1995 (Crown Publishing). Techniques perfected and practiced by such actors and theater professionals as Alan Arkin, Zoë Caldwell, John Turturro, Dianne Wiest, Olympia Dukakis, Mercedes Ruehl, Stephen Spinell, Teresa Ralli, Rosa Luisa Marquez, Walter Matthau, and Madeline Kahn will be included in the work.

# Century mark approaches for professors emeriti

(continued from page 1)

home and even driving his 1975 Ford Mustang around town on occasion. He walks with friends, but now sometimes uses a "stick." His wife of 70 years, Saly Ruth, also a mathematician and accomplished dancer, died last year at the age of 99. He has three daughters, Rebecca, a mathematics professor at the University of Colorado; Ann Macchi of Arlington, a retired teacher, and Gwendolyn Bray of New Zealand, an ecologist, all of whom keep in close touch. There are also 10 grandchildren and one great-grandchild. He has continued his scholarly work and still contrib-

utes reviews to professional journals. The mathematics department will honor him at a dinner on September 28, and he will deliver a "centenary lecture" at Brown University on his 100th birthday on September 30. In October, he will fly to Amsterdam, Holland, where friends and colleagues have organized a symposium to discuss aspects of his work and at which he will give a talk.

Both men express some pessimism about the future, brought about in part by the technological achievements of the 20th century.

Professor Taylor has written of "the despoilation of nature involved in nearly every aspect of technological development,"

along with "the problem of population growth and control."

Professor Struik conditions some of his remarks about society's future with the phrase, "provided the earth will prevail." He adds, "We now have to consider the safety of the earth," also naming environmental degradation and population growth as the greatest threats.

Neither centenarian offers any particular secret to longevity. Both have been pipe smokers, but they took the occasion of their interviews to caution against smoking.

On becoming 100, Professor Taylor remarks, "I don't recommend it." Professor Struik says, "I can't help it, but it's true."

## Struik straddled worlds of mathematics, Marxist politics

When the Dibner Institute for the History of Science and Technology paid tribute to Dr. Dirk J. Struik last spring, executive director Evelyn Simha said:

"We know him as challenging, sharp, funny, quick, kind, generous, deeply serious—a man of wit and honor, loyalty and steadfast friendship."

"As an historian of mathematics," she continued, "he is particularly important to us here, at this center for advanced research in the history of science and technology, because of his great and influential book, *The Concise History of Mathematics*, beautifully balanced between technicalities and generalities, translated into uncountable languages, most recently Persian. With this book and his historical scholarship, Struik has become the instructor responsible for half the world's basic knowledge of the history of mathematics."

It is an apt summary of the academic career of Professor Struik, who says jokingly as he nears the "patriarchal" age of 100, "I've become kind of an institution—me and other interesting monuments of antiquity. I was there—the 19th century. I've seen the world from both sides."

Professor Struik has come a long way in time and place from his birthplace of Rotterdam in the Netherlands. His father was a grade school teacher who came from "yeoman's stock" in the rural part of the Netherlands.

Professor Struik was educated at the University of Leiden in Holland, where he received his doctorate in 1922. He was an assistant at the Technical University in Delft from 1917 to 1924, and an International Education fellow in Italy and Germany from 1924 to 1926.

He came to MIT in 1926 as a lecturer in mathematics and was appointed an assistant professor in 1928. He was promoted to associate professor in 1931 and professor in 1940. He became an American citizen in 1934. In 1972 he was made an honorary research associate in the

History of Science Department at Harvard University.

As is well known, Dr. Struik's interests go beyond mathematics to politics and to the welfare of the working-class people, who he believes would be best served through the socialism embodied in the philosophy of Karl Marx. "From my student days on," he said, "I found the study of Marx' way of thinking has been helpful."

In her Dibner Institute tribute, Ms. Simha took account of this, noting that "from the very beginning, personally and professionally, and continuing even now, Professor Struik's great concern for people in oppressed situations has been the backdrop for all his activities—has informed his life and work, in fact, even when it brought him hard times."

"He wanted to link mathematics with the socio-economic background against which mathematics developed—questioning the weight of social and economic forces in the development even of the 'pure math' of the Greeks, for example. He is now interested in ethno-mathematics and remains unshaken in his social and political beliefs."

Indeed he is. Professor Struik keeps a sharp eye on the world through *The Boston Globe* (as for television, he is "addicted" to public television's "Masterpiece Theater" and "Mystery" series).

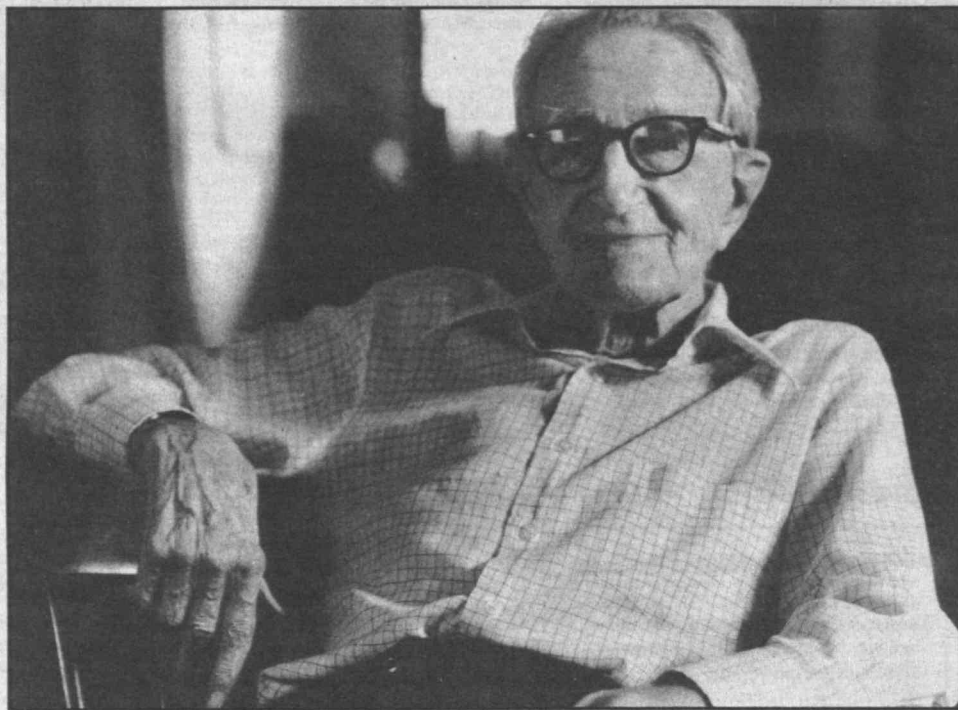
He views the dissolution of the Soviet Union as "a big tragedy" that has led to internecine warfare in the former Soviet Union and Yugoslavia.

He adds, "Some kind of stable situation may arise, with some of the old socialism restored, but with much more understanding of human rights. We now know that socialism cannot be built up in a police state."

Taking the longer view, he comments that "political revolutions go from defeat to defeat and

*"I've become kind of an institution—me and other interesting monuments of antiquity."*

—Dirk Struik



Dirk Struik

Photo by Donna Coveney

get stronger every time."

On the political scene in the United States, he said he "deplores the fact" that President Clinton "is not a partisan of a single-payer health care system." He also regrets that the diminished labor movement "has no one single force working for progressive legislation."

Of his own travails during the McCarthy era, he said strongly, "I fought back." However, he said his anger was directed at the state, "not at MIT," whose actions he found "not appropriate, but understandable."

Dr. Struik had been suspended, with pay, in September 1951, and was reinstated by President James R. Killian Jr. in May 1956, when all charges against him were dropped. In October, acting on the recommendations of a faculty review committee, the Corporation's executive committee upheld the restoration of Dr. Struik's tenure but censured him "for conduct unbecoming" an MIT professor, "based largely on his use

of the Fifth Amendment before the House Un-American Activities Committee" and "his comparative lack of candor with members of the administration."

Dr. Struik has always maintained that he was not a member of the Communist Party in this country, but acknowledged that he was sympathetic and a supporter.

Professor Struik still drops in at the mathematics department at MIT "to chat with colleagues and go to the library."

He said he has seen MIT "grow from a good, but more or less provincial Institute, to an international institution." He gives much of the credit for this to President Karl Taylor Compton, who served from 1930 to 1949.

He said that Dr. Compton, his good friend, understood that "a technical education, without modern science, was impossible."

Asked what he misses, he said simply, "My wife."

## Taylor's career took wing with WW I plane engine testing

Although he is mentally alert, it is no longer easy for C. Fayette Taylor to carry on a conversation and, when asked about aspects of his life, he is likely to refer a visitor to his 1974 autobiographical book, *Growing Up With the Twentieth Century*.

In the introduction is a passage that perhaps best sums up his view of the 100 years he has lived, which span the last six years of the 19th century and nearly all of the 20th:

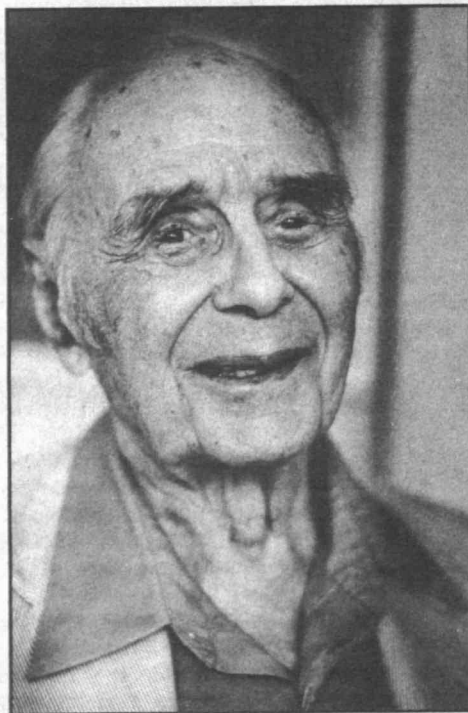
"At least for me, it is hard to imagine new developments that will change our life style more drastically than have the automobile, the telephone, electric power and light, the mechanization of farming, motion pictures, radio, television and the development of weapons of war of unimaginable power and range. Not one of these devices was in general use, and many were undreamed of, when I first became aware of the world around me."

In person, he adds, smiling, "I saw Halley's Comet twice." (It appeared in this century in 1910 and 1986.)

Fayette Taylor was born in New York City—most unusually for his time, in a hospital. But that was only because it was owned by his grandfather, a physician, as was Professor Taylor's father.

His family moved to Montclair, NJ, when he was 11, and he graduated from high school there. In 1915 he received a bachelor of philosophy degree from the Sheffield Scientific School at Yale University, and five years later he obtained the degree of mechanical engineer from Yale.

His career-long concern with engines, particularly aircraft engines, began during World War I when, as a young Navy officer, he was put in charge of airplane engine testing at the Navy's Aeronautical Engine Laboratory in Washington.



C. Fayette Taylor

Photo by Donna Coveney

Later, as a civilian, he held a similar position for three years with the Army Air Corps at McCook Field in Dayton, Ohio. And it was there, he recalled, that he met Orville Wright.

Orville and his brother had first flown at Kitty Hawk, NC, in 1903, when Professor Taylor was nine years old, and did many of their subsequent trials near Dayton.

Professor Taylor remembers his excitement when he first read of their accomplishments as a boy in a magazine. When he showed the article to his father, he recalls in his book, his father said flatly, "I don't believe it." It was an attitude shaped by many false claims for flying machines.

After completing his work with the Army, Professor Taylor joined the Wright Aeronautical Corporation, from 1923 to 1926, as an engineer in charge of airplane engine design and development. It was a time when the company was involved in developing the air-cooled "Whirlwind" engine used on Charles Lindberg's historic flight across the Atlantic and Richard Byrd's flight to the North Pole.

Professor Taylor came to MIT in 1926 as associate professor of aeronautical engineering. He was promoted to professor and acting head of the course in 1929. A few years later he was made professor of automotive engineering, in charge of instruction and research in internal combustion engines.

Throughout his career at MIT, Professor Taylor worked in tandem with one of his four brothers, Edward S. Taylor, who had received a bachelor's degree in mechanical engineering from MIT in 1924.

On receiving his own faculty appointment, Professor Taylor invited his brother to join him on the aeronautical engineering staff. "Fortunately," he said later, "the MIT authorities accepted this rather blatant act of nepotism."

Together, they built a teaching and research program in airplane and other types of internal combustion engines in a laboratory named for the man who provided the funds for its building and equipment, Alfred P. Sloan, president of General Motors.

Edward Taylor, who rose to the rank of professor without benefit of a graduate degree, an unusual circumstance even then, founded and headed the Gas Turbine Laboratory after World War II, playing a key role in the development of the jet

*"I saw Halley's Comet twice."*

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engine. He died in 1991 at the age of 88, ending what Fayette Taylor described at his death as "an intimate professional personal relationship that lasted 65 years."

Fayette Taylor's accomplishments included the writing of a standard textbook, *The Internal Combustion Engine in Theory and Practice*, which is still giving him royalties.

His parallel career as an artist and particularly in metal sculpture took on greater momentum after his retirement in 1965. He had devoted much time to painting and drawing since early childhood, and later received formal art training, studying under several well known artists. His work has been shown extensively in exhibitions and galleries, and is now in private collections and museums. Some of it is at MIT, including a stainless-steel sculpture hanging in the faculty club.

Professor Taylor had still another interest. A pianist, he often played classical music with three or four other musicians. It was, he remarked, "what I liked best."