

Who's the Ugliest Man On Campus? Students get a chance to put their penny to good use by voting from October 19th to the 27th. Alpha Phi Omega sponsors the booth in Lobby 10 to raise funds for charity.

Ken Church/The Tech

## Baltimore accepts Rockefeller offer

By Irene C. Kuo

Whitehead Institute Director David Baltimore '61 will become the sixth president of Rockefeller University on July 1, the board of trustees of the New York institution announced Tuesday.

Baltimore, who is also professor of biology, said upon accepting Rockefeller's offer, "It was a very difficult decision for me. The remarkable success of the

Whitehead Institute and my own eventful and enormously satisfying career at MIT, now in its 21st year, caused me to think long and hard about this opportunity."

Charles Sawhill, former secretary of energy and current chairman of the Whitehead board of directors, heads the committee that will search for Baltimore's successor at Whitehead. Other members include former Provost Frances E. Low; Richard O. Hynes '71, head of the biology department; Herman N. Eisen, professor of biology; Maxine

Singer, president of the Carnegie Institute and a leading biologist; and Susan Whitehead, board member and daughter of the philanthropist whose gift created the MIT-affiliated biomedical research institute.

Baltimore's special assistant, Alfred Kildow, would not speculate on who might become Whitehead's next director, though he said that the search committee will consider people both within and without MIT and added that its members were

(Please turn to page 17)



Lisette W. Lambregts/The Tech  
David Baltimore '61

## Admissions report tops faculty meeting agenda

By Irene C. Kuo  
and Niraj S. Desai

The May report of the Committee on Undergraduate Admissions and Financial Aid was the center of long discussion at Wednesday's faculty meeting, at which the progress of the presidential search committee, the recommendations of the Context Review Group, and the need for minority faculty were also brought up.

Professor Keith D. Stolzenbach '66, chair of CUAFA, reiterated the report's three recommendations, which were for the Admissions Office to retain current recruitment practices and use of non-numerical indices, for it to place greater weight on demonstrated capability in "MIT's traditional strengths in mathematics and science," and for MIT to

(Please turn to page 23)

## MIT Corporation cites Colombian president for leadership in drug crisis

By Mauricio Roman

The MIT Corporation adopted a resolution saluting Colombian President Virgilio Barco '43, for his "courageous leadership of Colombia during a time of formidable challenge." The resolution, unprecedented in its kind, was accepted and passed by acclamation, according to Corporation Chairman David S. Saxon '41.

The Corporation action was announced last week on Wednesday by Saxon and President Paul E. Gray '54. The resolution states that "[the Corporation] is proud of this MIT alumnus, who served with distinction as trustee of his alma mater for a decade." It adds that Barco's "dedication and strength as a national leader bring honor to his native land that he has served for many years with pride and devotion."

Barco, who received an SB in

civil engineering from MIT, was a member of the MIT Corporation from 1970 to 1980, Saxon said. "The members of the Corporation feel very proud of him to have become president of his country, and we appreciate his efforts on behalf of MIT as a trustee," Saxon added.

Before becoming president in 1986, Barco had been senator and member of the House of Representatives in Colombia, minister of public works, minister of agriculture, and mayor of Bogota.

Barco has recently received international attention for his declared war on international drug trafficking. After the assassination of a leading presidential candidate in Colombia last August, Barco declared measures that would allow drug traffickers to be summarily extradited to the United States for trial and or-

dered the military to confiscate the assets of leaders of the drug trade. He held drug users partially responsible for the violence spawned by drug trafficking in Colombia.

"I applaud his stance on the issue of drugs," Saxon said. "It is clear that what he is doing requires more than political courage — it requires physical courage."

Barco addressed the United Nations General Assembly last month on the issue of drugs. He is meeting with President George Bush and the presidents of Peru and Bolivia to discuss the issue sometime during the next 90 days, *The New York Times* reported.

Barco is one of the candidates under consideration for commencement speaker next June, according to Class of 1990 President Joseph Babiec Jr.

## Policy mandates earlier closings for some parties

By Niraj S. Desai

Security concerns have prompted MIT to take steps to reduce the number of people without college IDs at on-campus events, and to lessen the danger of disturbances outside such events, Campus Police Chief Anne P. Glavin announced yesterday.

Beginning on Nov. 1, some parties, concerts, and dances will be required to close at 12:30 am. The new policy, which will have a trial period of one year, will affect registered events of 100 or more persons held in the Student Center, Kresge Auditorium, Walker Memorial, or the Athletic Department facilities.

Events elsewhere on campus registered with the Campus Activities Office or the Campus Activities Complex and requiring a Campus Police detail will have closing times of no later than 1 am, Glavin said.

Registered events in living groups will not be affected by the policy change at this time. Presently campus events may continue as late as 2 am, though 1 am is the normal closing time for many kinds of activities.

Also, the Campus Police will assign an additional police detail to patrol the perimeter outside Institute buildings on nights when a heavy concentration of events is taking place, Glavin said. Officers are already positioned at the door and inside such activities. The additional officer will be charged with dealing with potential altercations and disturbances outside the building, particularly those involving people turned away from parties and dances.

The decision to change the closing times came out of discussions between Glavin, Dean for Student Affairs Shirley M. McBay, and Senior Vice President William R. Dickson '54. No students were involved in the decision-making process.

Non-students attend events

Glavin said she had been concerned for some time about people who are not college students coming to MIT parties, concerts, and dances. Campus events that run until or beyond the hour at which area bars close tend to draw outsiders who sometimes

create problems, Glavin said.

On Sept. 30, a Boston man who had been refused entry into a Student Center party pulled a gun while arguing with a Cambridge man in the parking lot near Kresge. The gun went off in the course of the argument, though no one was hurt. Campus Police officers subsequently arrested four men. That incident contributed to yesterday's announcement, Glavin said.

Glavin, Associate Dean for Student Affairs James R. Tewhey, and Director of Campus Activities Susanna C. Hinds met yesterday morning with five student leaders to discuss the closing time change.

The students expressed disappointment at not being involved in discussions leading to the decision, according to Undergraduate Association President Paul Antico '91. Glavin accepted full responsibility for not involving students, and said she would be willing to attend a UA meeting to talk about the change, Antico said.

The new closing policy will be periodically reviewed over the coming year by Glavin in consultation with administrators and students. If it proves not to be effective, other steps may have to be considered, Glavin said.

## MIT ranked seventh in college survey

By Prabhat Mehta

MIT dropped from fifth to seventh this year among "national universities" in *US News & World Report* magazine's annual "America's Best Colleges" survey.

The criteria behind the rankings this year were primarily objective ones. These included: student selectivity, which in turn was based on applicant rejection rates, standardized test scores and high-school class standing; faculty quality, based on student/faculty ratios, percentage of faculty with doctorates and per-student instructional budgets; financial resources, based on per-student endowment income, per-student library budget and,

(Please turn to page 19)



Virgilio Barco '43 and Howard Johnson, former president of MIT, look out over the Charles.

# Disciples' doctrine: Obey, bear fruit, be happy

## Analysis

By Seth Gordon

(Second in a four-part series)

Like all disciples of the Boston Church of Christ, Ose Mannheim has to go to twice-a-week church services, a weekly Bible Talk, and occasional devotionals and seminars. She must read the Bible daily. Also, she has a "discipler," who gives her one-on-one spiritual guidance and hears her confession every day.

But Mannheim doesn't tell non-members about these duties when she first "shares her faith" with them; she said they would think her "weird" or "stupid" if they didn't understand other church principles first. Also, "it's a spiritual understanding. God allows us to understand."

The BCC, which recruits heavily at MIT, says it is based on the Bible only, yet some of its sharpest critics come from other conservative Christian sects. They applaud the church for exposing so many people to the Bible, and concede that the church's basic theology is valid. However, they say, some of the church's techniques are un-Biblical.

The BCC's leaders reply that other church leaders are jealous of its high growth rate, and are not committed enough to following Jesus. Since Jesus was persecuted by religious leaders of his day, they argue, if the BCC is arousing controversy, it's a sign that the BCC is on the right track.

### Thou shalt obey

All BCC disciples must have disciplers. Critics say that the disciplers, and other church leaders, exercise dictatorial control over their disciples' lives.

Mannheim denies that church leaders even give orders; rather,

between Jesus and his apostles. Furthermore, disciples should be best friends with their disciplers, according to church literature.

"Criticalness of leaders" is considered a sin. One disciple explained that there is a difference between "constructive criticism" and "criticalness;" it depends, he said, on the critic's attitude. Ron Gholston, a former BCC House Church Leader, says all critics are told they have bad attitudes.

The BCC justifies its leaders' authority with Hebrews 13:17. In the translation used by the BCC, this verse reads, "Obey your leaders and submit to their authority." However, in the original Greek, the word for "authority" — *exousia* — does not appear in this verse. Gholston wrote that *exousia* appears 102 times in the New Testament, but never refers to any church leaders except the apostles.

By contrast, in Matthew 20:25-27, Jesus said: "You know that the . . . high officials [of the Gentiles] exercise authority over them. Not so with you. Instead, whoever wants to become great among you must be your servant, and whoever wants to be first must be your slave. . . ."

Gholston wrote to the BCC's elders, critiquing the BCC's practice on Biblical grounds. He said that a few days after they received his letter, the elders fired him from his position as House Church Leader; they forbade other disciples from talking to him or reading copies of the letter.

Marty Wooten, a BCC evangelist, complained that religious critics of the church interpret passages like Matthew 20 "through the eyes of materialistic, self-indulgent Americans rather than through the eyes of disciples willing to go anywhere, do anything, and give up everything [to save souls]."

Disciples must obey their "disciplers," make converts, and sacrifice everything for the BCC. A disciple who does not want to do this, in the BCC's view, is not a true disciple, and may not be saved from Hell.

they're suggestions or guidelines. She says she follows those suggestions because she trusts that the leaders have her best interests in mind. "The outcome will be good if the [follower] is faithful . . . [The suggestions are] often misinterpreted as controlling, because the person develops attitudes of bitterness."

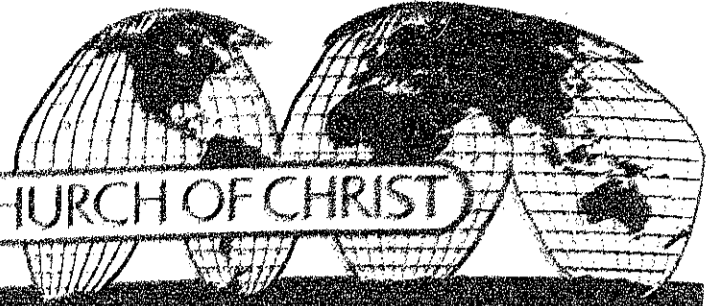
According to church bulletins and sermons, disciples must obey their leaders, unless the leader's command violates the Bible or the disciple's conscience. (Mannheim said she has sometimes refused to follow a leader's advice for this reason, but would not give any examples.) The relationship between disciplers and their disciples should mirror that

### Thou shalt make converts

In one sermon, Rob Green, the BCC's campus minister at Boston University, said that if a given disciple is not making converts, it is because of unrepented sin in that disciple's life. No other excuse, he said, is acceptable.

To make converts, in the BCC's argot, is to "bear fruit." The consequences of "bearing fruit" and "fruitlessness," disciples say, are described in John 15: "If a man remains in me and I in him, he will bear much fruit. . . . If anyone does not remain in me, he is like a branch that is thrown away and withers; such branches are picked up, thrown into the fire and burned."

# Boston CHURCH OF CHRIST



One Biblical concordance lists 31 references to "fruit," and not one of those defines it as making converts. Rather, Galatians 5:22 says "the fruit of the Spirit is love, joy, peace, patience, kindness, goodness, faithfulness, gentleness and self-control." The BCC hardly ever uses "fruit" in that sense.

Associate Dean Robert M. Randolph, head of MIT Student Assistance Services, has two graduate degrees in theology; he claims the first-century Christians were not as "fruitful" as the BCC preaches. "Jesus could not have gotten 12,000 people together for a service in the Boston Garden. If he had, half of them would have been informers and Roman soldiers."

Flavil Yeakley Jr., head of the Church Growth Institute at Abilene Christian University, observed that Noah preached for a century and only converted seven relatives.

Buddy Martin, a former minister in the Church of Christ in Cape Cod, wrote, "I fear some of the greatest preachers in the Bible could not make it as a [BCC] House Church Leader."

### Thou shalt commit thyself

"As a disciple," Mannheim said, "you give up your life. Your life is not your own. . . . Twenty-four hours a day, seven days a week, is for God."

Ron Lovejoy '90 joined the church in his freshman year. He says that he spent so much time with church duties that he had hardly any time left for problem sets. He left the church and took a leave of absence from MIT after failing Unified Engineering. According to Lovejoy, his Bible Talk Leader argued that Lovejoy flunked because he was not committed enough to the church.

Peter Simon (not his real name), another former disciple, concedes that the church motivates some individuals to study harder. However, he says, most disciples will get lower grades, switch to easier classes, or find ways to get good grades without actually learning.

Robert Watts Thornburg, Dean of the Chapel at Boston University, said that when he expressed concern about disciples' academic problems, Baird gave him a list of the BU disciples' grades. Thornburg claims that those grades were inaccurate. "Either the students were lying to [Baird], or he was lying to me."

In sermons and bulletins, leaders urge disciples to give the BCC all the money they can afford, if not more. Some, Simon recalled, were making \$30,000 a year in

computer jobs, but they had the same standard of living as students making a third of that.

In August, the BCC held its "World Missions Contribution." The elders encouraged disciples to give 20 times their regular weekly donation for this contribution. A month and a half before the contribution, one BCC Zone Leader wrote: "In the very short time left some will take on temporary extra jobs (like paper routes), have garage sales, and sell diamond rings, second cars, houses, and/or other valuables, and perhaps sentimental items. Some will skip meals, delay significant purchases, or dip into savings."

the BCC is "works-oriented;" i.e., that it holds people are saved by their good works, and not by God's grace. Most Protestant sects believe in salvation by grace.

The church's real theology is more subtle. Disciples believe that if you commit yourself to being a disciple of Jesus, and are appropriately baptized, the Holy Spirit will give you the desire to perform the church's duties.

Hence, in the BCC's view, disciples who do not want to go to church, make converts, and so on, have problems with their relationship with God. If they are chronically unmotivated, their leaders will say they must not

Ron Lovejoy '90 joined the BCC and flunked Unified. His Bible Talk Leader said he flunked because he wasn't committed enough to the church.

Disciples gave \$2,520,554 for the World Missions Contribution. On the following Sunday, with 10,000 disciples present from all over the world, Baird preached that they should give even more.

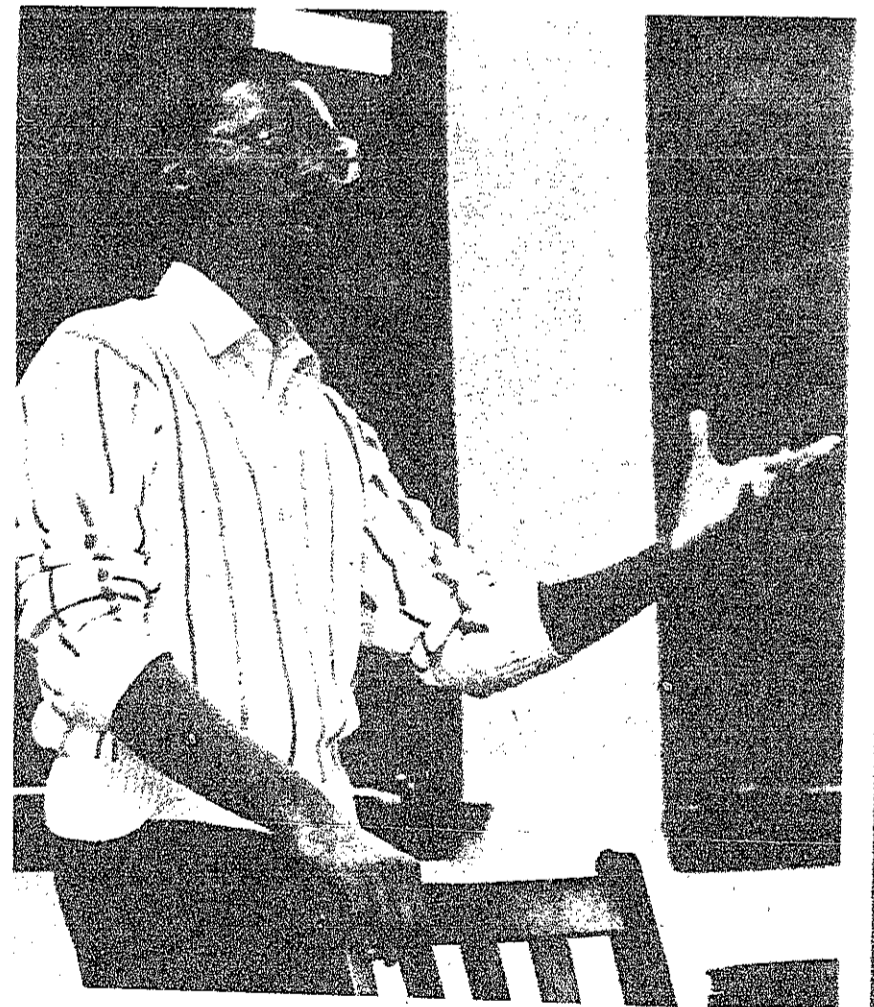
There is no evidence that any BCC leaders are personally profiting from these donations.

### Thou shalt be enthusiastic

Some critics say that because of all its demands of its disciples,

have received the gift of the Holy Spirit at baptism. Therefore, they must not have really committed themselves to being disciples of Jesus, and their baptism is not valid. Such church members are not really saved from Hell, according to BCC doctrine, and must be baptized into the BCC all over again.

Disciples say that they are happier now than before joining the church.



At the conclusion of AIDS Awareness Week, Sidney Borum discussed AIDS from a personal perspective with MIT students last night.

## GENERAL DYNAMICS

### RECEPTION

TUESDAY, OCTOBER 24TH

6:00 to 8:00 P.M.

ROOM 4-149

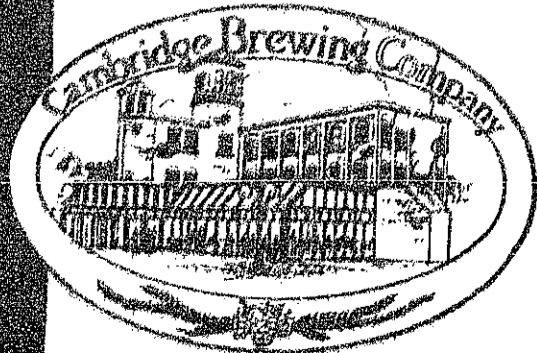
COME LEARN ABOUT THE COMPANY

ALL THOSE SCHEDULED FOR INTERVIEWS AND OTHERS INTERESTED

### 3 Blocks from MIT!

## Cambridge's only Brewery

Come sample freshly brewed beer in the fun atmosphere of a Brew Pub!



Burgers  
Sandwiches  
Salads  
Daily  
Specials  
Restaurant  
open Lunch  
& Dinner

M-F at 11:30 am, Sat & Sun at 1 pm

One Kendall Square Complex, Cambridge

located at Hampshire & Broadway 494-1994

# news roundup

from the associated press wire

## Nation

### Earthquake update

Officials now believe the number of people trapped under Nimitz Freeway is much lower than early estimates of 250, since cars are being found farther apart than first expected. Thirteen bodies had been recovered as of yesterday.

Residents of San Francisco's Marina district are finally being offered 15-minute passes to fetch clothing, medicine, food and belongings from homes damaged by the quake and subsequent fires. Aftershocks as strong as 4.3 on the Richter scale were still being felt yesterday in Santa Cruz.

President Bush left before dawn today for a survey of damage done by the quake. He will tour both by helicopter and car and will make stops in Oakland and Santa Cruz. House Speaker Thomas Foley said at least \$2.5 billion is needed for earthquake relief in Northern California.

Meanwhile, insurance officials are estimating that the quake will end up being one of the costliest disasters in American history. Insurance estimators tabulate that insured damage will total up to \$1 billion. They say that only five other natural disasters have been more expensive.

### Bush alienates moderate Republicans on abortion legislation

Moderate Republicans are urging President Bush not to veto a Senate-passed bill that would allow federally funded abortions in cases of rape or incest. Fearing backlash against the party in the next elections, they say Bush's opposition to the measure puts them in a "really indefensible position." Constance Morella (R-MD) called Bush's decision discriminatory. "He would support affluent women terminating their pregnancies in the case of rape or incest but not allow poor women to get Medicaid funding." Bush contends the bill would fund the taking of unborn life.

## World

### Earthquakes hit China

China's official news agency says 8,000 homes were flattened and at least 29 people killed when a series of earthquakes hit yesterday about 135 miles west of Beijing. Chinese officials say there's no evidence the tremors are linked to the San Francisco quake.

### Drug lord's pilot arrested

The head of Colombia's Medellin drug cartel may be looking for a new pilot. Colombian officials say they have arrested the drug lord's personal pilot and will extradite him to the US to face cocaine charges.

### National study by blacks shows pattern of diminishing life expectancy

One of the first national studies of blacks conducted by blacks has been released and reports a pattern of diminishing life expectancy. The report was commissioned by the Black Culture Institute at the University of Massachusetts in Boston. It cost about \$100,000 and was taken on by academics in response to another study done by whites. That report, issued by the National Research Council, cost about \$2 million.

But the findings of the two reports are actually quite similar. Both say race continues to be a factor in health care and opportunities for jobs and education. The UMass study also reports that the average black life expectancy dropped to 69.4 years in 1986, while the figure for whites reached an all-time high of 75 years.

### Senate rejects proposed amendment to ban flag burning

Senators yesterday rejected a proposed constitutional amendment to ban flag burning. Senate majority leader George Mitchell says Americans should not be forced to "make a false and unnecessary choice between the flag and the Constitution."

## Local

### Highest jackpot in state history

Massachusetts lottery officials say the jackpot in today's Mass Millions game will be about \$40 million, the highest in state lottery history. Odds of winning are 1 in 9,366,819. Of every dollar bet, 35 to 37 cents goes to cities and towns and the state.

### Shannon will fight Nuclear Regulatory Commission ruling on Seabrook

Massachusetts Attorney General James Shannon says he will appeal a ruling made yesterday by the Nuclear Regulatory Commission on the Seabrook Nuclear Power Plant in New Hampshire. The commission ruled unanimously that the financial troubles facing the plant have no impact on whether the plant receives a full-power license. Seabrook officials say the plant could receive such a license by the end of the year. The NRC rejected Shannon's argument that the Public Service Company of New Hampshire, which owns the largest share of Seabrook, and eleven other owners are financially unable to guarantee the plant's safe operation. Shannon says he will take the matter up in federal court.

### Local youth gives reason for anti-Semitic activities

A Natick teenager said he was intoxicated when he spray-painted anti-Semitic and racist messages throughout neighboring Wellesley earlier this month. Nineteen-year-old Bickford T. White Jr. said he was sorry for the hurt and trouble he caused and said he would not have acted in such a manner had he been under control. The incident occurred on the eve of Yom Kippur, the most sacred Jewish holiday.

## Sports

### Oakland and San Francisco go through the motions

The Oakland Athletics and San Francisco Giants returned to the field for the first time since the earthquake interrupted the World Series. At the Oakland Coliseum, shortstop Walt Weiss called the mood "one of depression." And Dave Parker said the A's will not have a champagne celebration if they win the series. The lone Athletics no-show was Rickey Henderson, though manager Tony Larussa said he was not upset, considering the situation.

Across the Bay, the Giants played an intra-squad game. They are tentatively slated to host game three of the series next Tuesday at Candlestick Park.

Don Robinson is the choice of Giants manager Roger Craig to start game three when the series resumes.

## Weather

### Will it ever end?

The answer is, perhaps someday. In the meantime, an incredible upper level low pressure system in the Ohio River Valley promises to keep us wet for the next few days. This low has produced heavy snows over Indiana and Ohio, and it will begin to drift northeastward over the next couple of days. Rain will continue until the low passes to our northwest late Saturday evening. At that time, the rain may become mixed with snow for a brief period of time, especially to the north and west of our area. After passage of the low, we will likely still see some wet, showery weather on Sunday as New England become affected by the "backwash" from this system. Monday looks like the earliest day when there will likely be some significant sun (a bright yellow disc often seen in desert skies).

**Friday afternoon:** Windy with rain. Highs 56-61°F (13-16°C). Winds east becoming south 10-20 mph.

**Friday night:** Rain likely. Lows 48-52°F (9-11°C).

**Saturday:** Mostly cloudy with a chance of rain showers. High 55-60°C (13-16°C).

**Sunday:** A good chance of showers, possibly mixed with snow before sunrise. A morning low near 35°F (2°C). High 45-50°F (7-10°C).

Forecast by Robert Conzemius

Compiled by Irene C. Kuo and Cliff Schmidt

## classified advertising

**Classified Advertising in The Tech:** \$5.00 per insertion for each 35 words or less. Must be prepaid, with complete name, address, and phone number. The Tech, W20-483; or PO Box 29, MIT Branch, Cambridge, MA 02139.

**Sexually Transmitted Disease**  
Confidential testing and treatment of STD's and AIDS. Also general medical care. Private office. Robert Taylor, M.D., 1755 Beacon Street, Brookline, 232-1459.

**Car for Sale**  
Chevy Malibu '78, automatic transmission, power steering, a/c. 125K miles, recently passed inspection. Selling for \$450. Call 547-2245 and leave message.

**Attention - Government Seized Vehicles from \$100.** Fords, Mercedes, Corvettes, Chevys. Surplus Buyers Guide. 1-602-838-8885 Ext. A4058.

**New and Used Sofas, \$50-250; Desks \$25-125; Bedroom sets \$259-399; Bureaus \$30-89; Kitchen tables \$15-175; Chairs \$10-60; Bookcases \$10-85; Refrigerators, washers & dryers \$90-150. Call 524-1000.**

**Lowest Student Airfares**  
Thanksgiving Break • Winter Break. For all of your breaks call TAKE A BREAK Student Travel, 617-527-5909 (Newton).

**Guitar Lessons**  
Play better, learn faster, understand more. Experienced professional musician and former Berklee tutor offering instruction in Blues, Jazz, Folk, Rock and other styles. Focus on musical and technical skills. Call Brian Seeger at 661-8764.

**Attention - Earn Money Reading Books!** \$32,000/year income potential. Details. (1) 602-838-8885 Ext. Bk4058.

**A FREE GIFT** just for calling plus raise up to \$1,700.00 in only ten days! Student groups, fraternities and sororities needed for marketing project on campus. For details plus a FREE GIFT, group officers call 1-800-950-8472, ext. 0.

**UP YOUR APPLES!**  
DRINK ELLIOTT'S AMAZING APPLE JUICE

**Be Your Own Boss**  
We are looking for highly motivated students to join our team of on-campus travel agents. Have fun and make lots of \$\$\$! Call TAKE A BREAK Student Travel, 617-527-5909 (Newton).

**For Rent in ski season - large home in Quechee, VT.** Close to Killington and Suicide Six. Call for details and price (203) 795-5291 or (203) 799-2530.

**The Tech Subscription Rates:** \$17 one year 3rd class mail (\$32 two years); \$44 one year 1st class mail (\$86 two years); \$49 one year foreign; \$8 one year MIT Mail (2 years \$15). The Tech, W20-483; or PO Box 29, MIT Branch, Cambridge, MA 02139. Prepayment required.

### Telemarketing Position

Want to earn some extra money before the holidays? We are looking for MIT students to telephone alumni/ae from the ten youngest classes seeking contributions to the Alumni/ae Fund.

There are 10 positions available, paying \$7/hour, working 3 or 4 nights a week for 4 hours/night, starting October 23, and ending November 22. Interested? Call Gail Johnson at 253-8184.

## COLD FUSION EXPERIMENTAL DEMONSTRATION

### NUCLEAR ENGINEERING OPEN HOUSE FAMILY WEEKEND

Saturday, October 21, 1989

1:30 - 3:30 pm

Room 24-115

### OTHER TOPICS

CAREER OPPORTUNITIES

PLASMA FUSION

NUCLEAR MEDICINE

RADIOLOGICAL SCIENCES

NUCLEAR ENERGY TECHNOLOGY

# opinion

## LETTERS TO THE EDITOR

### Pollution clouds GM's "forward look" in autos

Last Thursday and Friday, General Motors had two of its concept cars on display in front of the Student Center. The Chevy Express was a technology demonstrator. Powered by a turbine engine, it was never intended to be mass produced and was essentially a rolling test bed.

On the other hand, the black Cadillac Voyage was much closer to the type of car that GM plans to introduce to its show rooms in the future. The promotional pamphlet spoke of the awesome power developed by the V8 engine and all of the advanced features that have been included in this car. The pamphlet also stated that "at higher speeds, aerodynamics are vitally important for stability and fuel economy." I asked the GM employee with the car what the fuel economy actually was (a figure that was con-

spicuously missing from the specifications), and he proudly assured me that it was over 20 miles per gallon. He thought that it was about 22 MPG. Gas mileage that low is disgraceful!

We are facing the worst pollution-related environmental problems ever, including acid rain, the greenhouse effect and cities choking in smog, and GM is working on 3800-pound gas-guzzling land yachts. Many cars on the road today get gas mileage of 30 or even 40 MPG while GM is threatening to close plants because of "unreasonable" Corporate Average Fuel Economy requirements of 26.5 MPG (for the average of all cars they sell in 1989).

GM failed to meet CAFE requirements from 1983 through 1985 and then in 1986 successfully lobbied to have them lowered.

The requirements will go up again next year, and GM plans to fall behind again. The descendants of the Cadillac Voyage will not hit the production lines until 1995, and GM is still planning to use the same engine as is being used in Cadillacs today. The six-year lag between conception of a new model and the start of production ensures that an effort to improve now would not be seen for years to come.

GM's blatant disregard for the environment is distressing because huge corporations like GM can make the needed difference, but their "spirited look toward the future" is looking as dirty and polluted as ever. It is unfortunate that GM is making no effort to set a good example and it will probably take another oil crisis before they consider making more efficient cars.

Andrew Heafitz '91



© 1989 CHARLES RIVER PUBLISHING, INC.

LOOK, PAPA!  
TINY-HEADED,  
THREE-EYED  
CREATURE FROM  
OUTER SPACE!



NYET...  
IS JUST  
FORMER  
WORKER FROM  
CHERNOBYL.

# The Tech

Volume 109, Number 44 Friday, October 20, 1989

Chairman ..... Marie E. V. Coppola '90  
Editor in Chief ..... Niraj S. Desai '90  
Business Manager ..... Genevieve C. Sparagna '90  
Managing Editor ..... Peter E. Dunn G

News Editors ..... Annabelle Boyd '90  
Linda D'Angelo '90  
Irene C. Kuo '90  
Prabhat Mehta '91

Opinion Editor ..... Michael Gojer '90  
Sports Editor ..... Shawn Mastrian '91  
Arts Editor ..... Debby Levinson '91  
Photography Editors ..... Lisette W. M. Lambregts '90  
Kristine AuYeung '91

Contributing Editors ..... Jonathan Richmond G  
Michael Franklin '88  
Ezra Peisach '89  
Advertising Manager ..... Lois Eaton '92

### NEWS STAFF

Associate News Editors: Andrea Lamberti '91, Gaurav Rewari '91, Reuven M. Lerner '92; Staff: Neil J. Ross G, Anita Hsiung '90, Miguel Cantillo '91, Seth Gordon '91, Adnan Lawai '91, David Rothstein '91, Aileen Lee '92, Dawn Nott '92, Amy J. Ravin '92, Joanna Stone '92, Cliff Schmidt '93; Meteorologists: Robert X. Black G, Robert J. Conzernius G, Michael C. Morgan G.

### PRODUCTION STAFF

Associate Night Editors: Bhavik R. Bakshi G, Daniel A. Sidney G; Staff: David E. Borison '91, Blanca D. Hernandez '91, Lawrence H. Kaye '91, David J. Chen '92, Peggy C. Hsieh '92, Lesley C. Johnson '92, Sheeyun Park '92, Jonathon Weiss '93.

### OPINION STAFF

Columnist: Adam Braff '91; Illustrators: Pawan Sinha G, Kai F. Chiang '92.

### SPORTS STAFF

Michael J. Garrison G, Harold A. Stern '87, Anh Thu Vo '89, Manish Bapna '91, Emil Dabora '91.

### ARTS STAFF

Associate Arts Editor: David Stern '91; Staff: Mark Roberts G, Julian West G, V. Michael Bove '83, Mark Roman '87, Manavendra K. Thakur '87, Michelle P. Petty '89, Rob Martello '90, Peter Parniassa '90, Paige Parsons '90, Alfred Armendariz '92.

### PHOTOGRAPHY STAFF

Associate Photography Editor: Lerothodi-Lapula Leeuw '92; Staff: William Chu G, Frank Espinosa G, Michael D. Grossberg G, Andy Silber G, Ken Church '90, Mike Niles '90, Mark D. Virtue '90, Sarath Krishnaswamy '91, Georgina A. Maldonado '91, Ognen J. Nastov '91, Ray Powell '91, Mauricio Roman '91, Marc Wisnudel '91, Matthew Warren '93, Jeremy Yung '93, Wey Lead '93, Jacqueline D. Giener; Darkroom Manager: Ken Church '90.

### FEATURES STAFF

Christopher R. Doerr '89, Jeff Ford '90, W. Owen Harrod '90, David J. Kim '90, Allan T. Duffin '91, Taro Ohkawa '91.

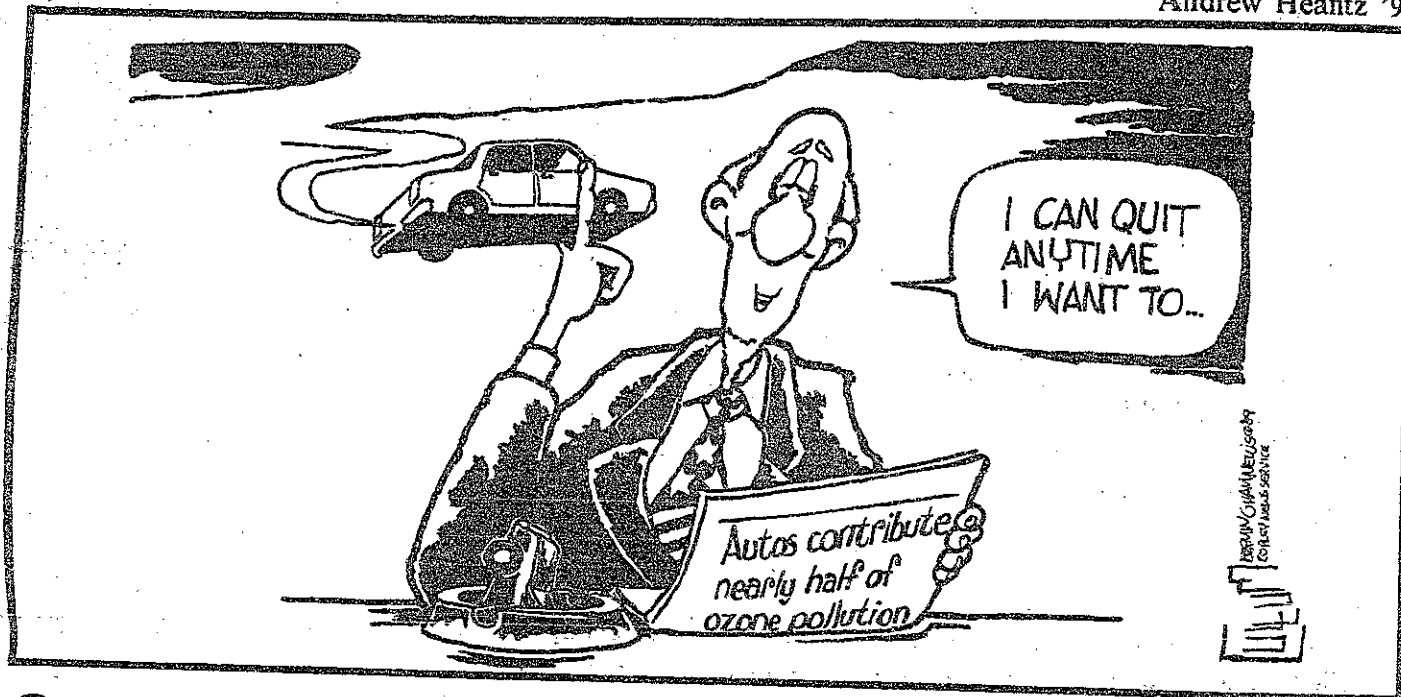
### BUSINESS STAFF

Associate Advertising Manager: Mark E. Haseltine '92; Delinquent Accounts Manager: Russell Wilcox '91; Staff: Shanwei Chen '92, Heidi Goo '92, Ellen Hornbeck '92, Jadene Burgess '93.

### PRODUCTION STAFF FOR THIS ISSUE

Night Editor: ..... Marie E. V. Coppola '90  
Associate Night Editor: ..... Lawrence H. Kaye '91  
Staff: Peter E. Dunn G, Michael Franklin '88, Kristine AuYeung '91.

The Tech (ISSN 0148-9607) is published on Tuesdays and Fridays during the academic year (except during MIT vacations), Wednesdays during January, and monthly during the summer for \$17.00 per year Third Class by The Tech, Room W20-483, 84 Massachusetts Avenue, Cambridge, MA 02139-0901. Third Class postage paid at Boston, MA. Non-Profit Org. Permit No. 59720. POSTMASTER: Please send all address changes to our mailing address: The Tech, PO Box 29, MIT Branch, Cambridge, MA 02139-0901. Telephone: (617) 253-1541. FAX: (617) 258-8226. Advertising, subscription, and typesetting rates available. Entire contents © 1989 The Tech. The Tech is a member of the Associated Press. Printed by Charles River Publishing, Inc.



### Gay rights should concern heterosexuals also

Rebecca Kaplan's letter ["Poster attack was act of hatred," Oct. 13] was an eloquent defense of National Coming Out Day as a necessary part of the struggle for gay and bisexual civil rights nationally and at MIT. I doubt, however, that the perpetrators of that same day's "Get Back in the Closet" poster attack will pay Kaplan much heed — after all, they demonstrated a complete lack of respect for her, all members of Gays, Lesbians, and Bisexuals at MIT, and every other gay and bisexual in the world. Because of that, I would like to provide them with another view.

I am straight. I am also white, male, and an atheist. I have never been a victim of prejudice. I am extremely lucky but I wish I was not. I wish everyone could lead a

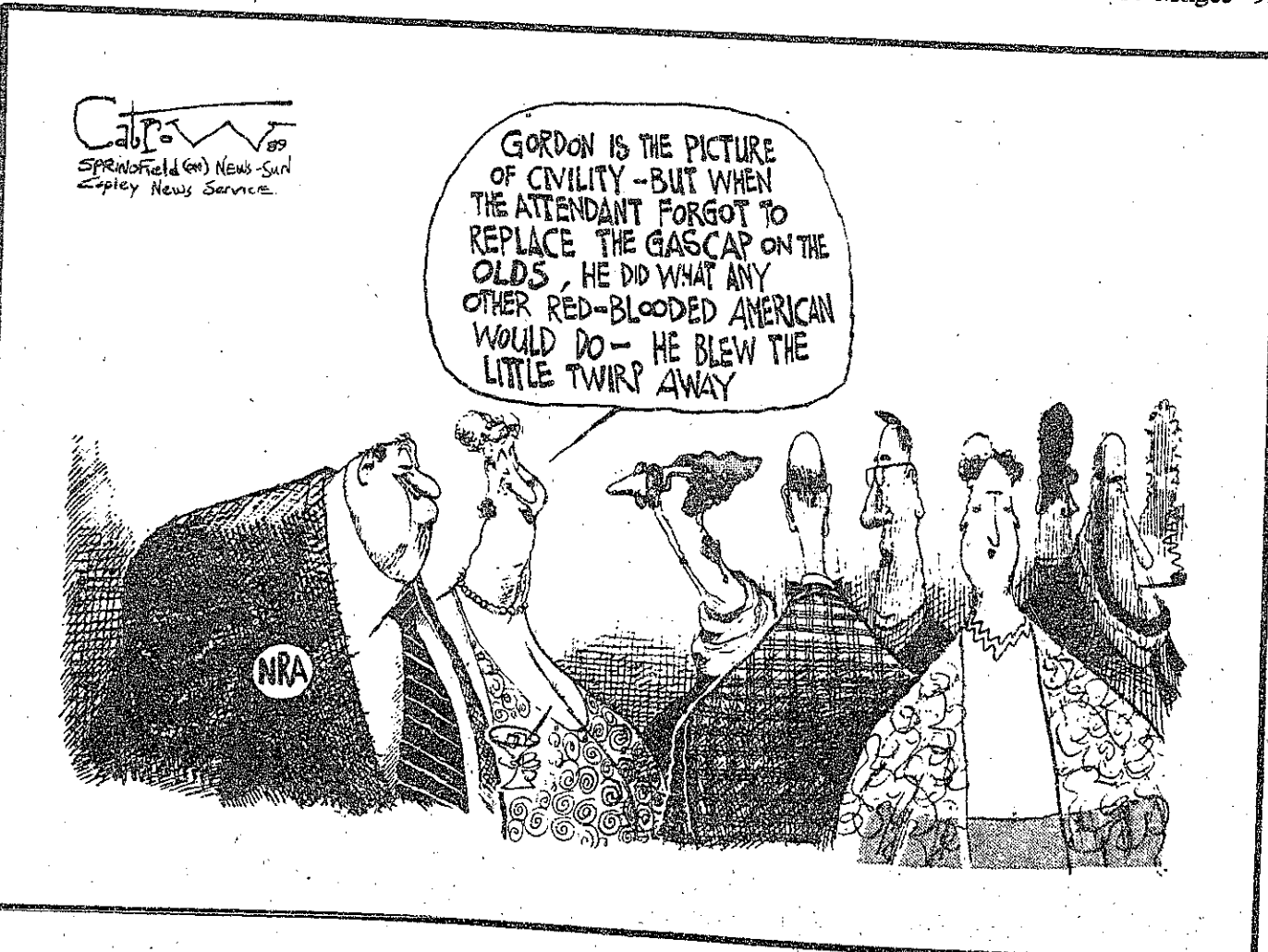
life free of senseless hatred.

As a society, we have progressed pretty far towards complete equality, but it still seems acceptable to persecute people on the basis of their sexual preference. This is mostly due to the fact that we are all supremely insecure about our sexuality, but it also has roots in the common perception of sexual preference as just that: preference. That attitude is simply wrong. Generally, there is not much of a choice involved, as is the case with race and sex. For that reason, people who openly persecute gays and bisexuals might as well be publicly racist and sexist as well. (Of course, many of them are.)

I am confident that the posterers' prejudices will catch up with them some day. The fu-

ture is bright, and the recent passing of a gay rights bill in the Massachusetts Senate is testament to that. There is still, however, a distinct lack of gay rights activism in the straight community. I do not have to be hurt directly to be outraged by prejudice, and I think I speak for a lot of people in saying that. I am amazed at the extraordinary self-confidence shown by everyone who organized and participated in National Coming Out Day. Their strength seems even greater next to the pathetic weakness of those who anonymously tried to ruin their day. I hope they have learned a lesson, and I hope their actions have helped more straight people like me to take an active role in the fight for gay rights.

John J. Magee '92



# opinion

## Baltimore inquiry sends disturbing message

Column by Ben Z. Stanger

(First of two columns)

Witch-hunts are a favorite pastime of bureaucracies. The typical witch-hunt engages the government, the media, and the public in a search for the causes of society's woes — and a quick cure.

Government scrutiny has now come to bear on the practices of basic science laboratories, specifically that of David Baltimore '61, an MIT biology professor who has been the subject of an investigation into misconduct in science.

Baltimore decided this week that he would assume the presidency of the Rockefeller University. While this is certainly a step up in terms of administrative responsibility, and while it is impossible to know his real reasons for making the move, it is nonetheless not surprising that he would take a position farther from the line of fire.

The Baltimore inquiry has caught the attention of the national press by bringing up issues of peer review, laboratory hierarchies, and government intrusion into science. But more subtly, it has called into question the integrity of researchers as a group in a way that should frighten anyone interested in pursuing a career in science.

Moreover, as Baltimore's decision to leave MIT portends, the security of our country's scientific future becomes more tenuous as the scientific climate worsens.

For starters, it is unclear what the investigators are after. Is it a resolution of the discrepancies leading to the dispute over a paper, which appeared in *Cell*, that had been co-written by Baltimore? Or are congressional investigators looking for ways to bring research practices under tighter government control — to find something wrong with the organization of scientific support?

The House Subcommittee on Oversight and Investigation has spent a great deal of time, effort, and funds to unearth a culprit in this case. Nothing has come out so far. But, unfortunately, the most likely outcome of this affair is increased government supervision of researchers.

What would be wrong with such an outcome, though? No one would deny that fraud takes place. Isn't it worth being overzealous to ensure that the public's trust is not violated?

Such a supervisory stance would be devastating. The threat stems from bureaucrats' veiled desire to treat researchers as they treat all government contractors — in other words, to keep tabs on all aspects of all projects to ensure that they are not getting ripped off. There are few words as scary as "supervision" to the creative mind.

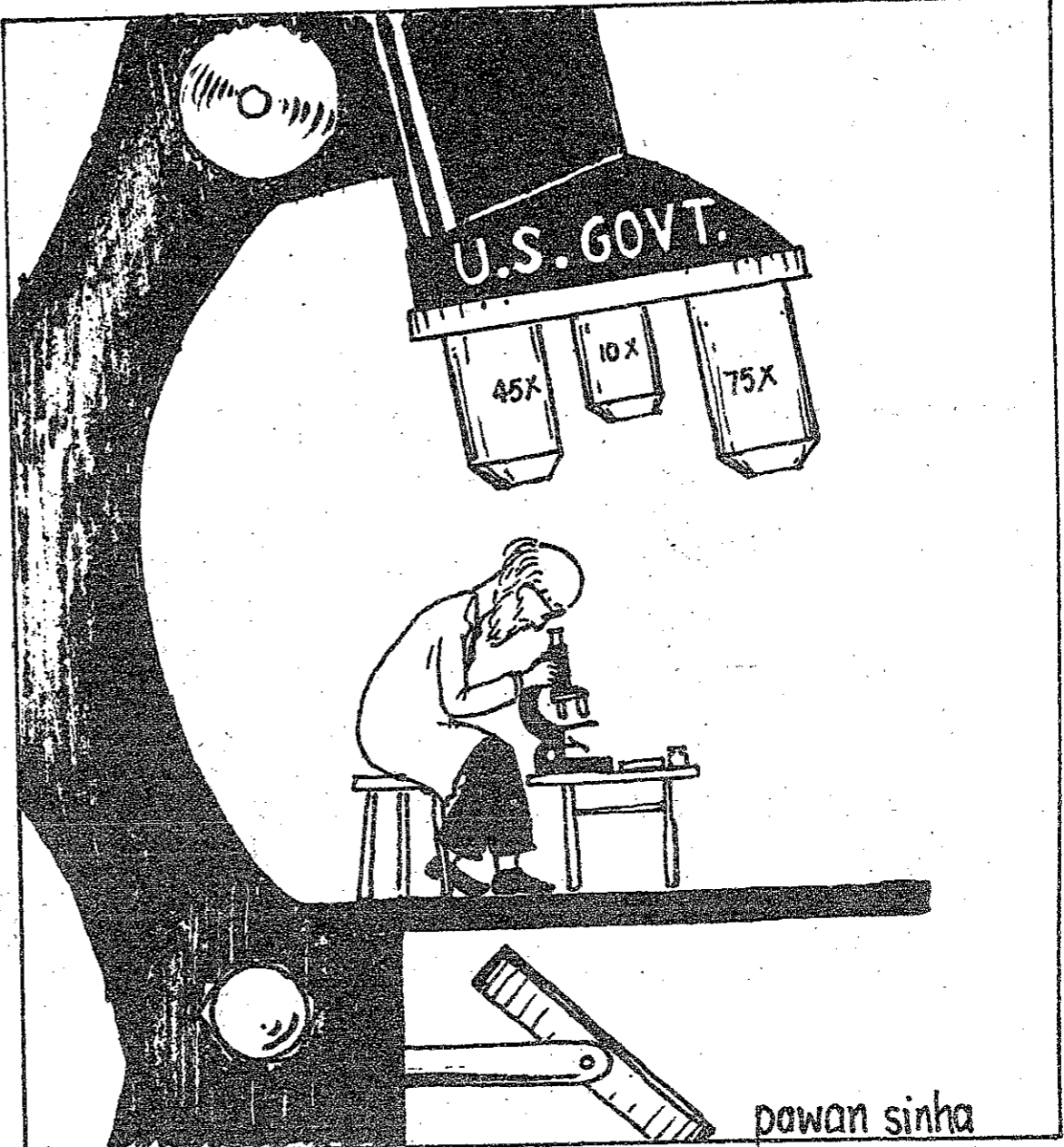
Of course, there are many differences between government expenditures on military endeavors and scientific research. The first is the amount of fraud which actually does occur in the scientific community. It is an impossible thing to judge, but my own experiences and those of experienced researchers tell me that the number of people who would knowingly distort data for publication is vanishingly small.

A second difference is that false results in science are so easy to detect. Any discovery should be repeatable. If it is not — as with "cold fusion" — then the result is discredited. It may not be possible to tell if the result was due to fraud or poor science, but does it matter that much? Even this can be found out by following the progress of the research concerned.

Finally, the repercussions of the watchdog posture make the policing of researchers more ominous than the policing of government contractors.

I spoke with a faculty member at MIT recently who confirmed some of my worst fears about the Baltimore inquiry. The investigation has had a definite effect on researchers around the country, who no longer feel that they are trusted. It has made the job of research, which is exhausting enough, even more demanding by endorsing the feeling that the work goes unappreciated. It has made some scientists feel betrayed.

In addition to changing the attitudes of today's researchers, this atmosphere of mistrust is likely to discourage those re-



sponsible for the future of research. I have for quite some time planned a career in biology research. But my innocent view of the profession as a challenging way to help the world has lately been less secure. The feeling that researchers are being transformed into suspects, along with the funding cuts which are likely to follow, makes science less desirable and potentially less fulfilling.

Baltimore's decision to leave MIT may be completely his own. But the emotions it has elicited from the scientific community — the impression that science is changing

from the fun, creative enterprise it used to be — have shown that the debate extends far beyond Baltimore's independent struggle.

This latest witch-hunt is a political maneuver for which there are virtually no grounds. It has a good chance of crippling the nation's scientific pre-eminence. It has already weakened my commitment to a scientific career.

Ben Z. Stanger '88 is a former managing editor of *The Tech*. His next column will deal with methods for dealing with issues of faculty fraud.

## Beyond ideas, colloquium promotes community

Column by Jonathan Richmond

The afternoon had begun with a large crowd listening lethargically to a succession of formal speeches in Kresge Auditorium. But now, with an illuminated green frog casting a watchful eye over the proceedings and a massive, but friendly, stuffed dog standing guard, the setting at the independent living group pika was homey and intimate and the discussion — six hours into MIT's colloquium on "Science Smarts: The Scandal of Scientific Illiteracy" — was both animated and serious.

"Science Smarts" — held last Monday — was the latest in a series of campus-wide colloquia at MIT and, despite its slow start, was a huge success not only in promoting discussion of topics of fundamental importance, but in bringing people from all over MIT together and fostering something often said to be lacking at the Institute — a sense of community. The colloquium idea must be applauded, continued, and further developed.

The day took participants on a trip through a funnel: everyone starting apart and traveling slowly at the top, but coming together and accelerating in pace as the evening drew on. The presentations in Kresge were generally dry and uninspiring. President Paul E. Gray '54, at least, tried to be witty, but F. James Rutherford of the American Association for the Advancement of Science, was platitudinous. Sandra Spooner, assistant superintendent of schools for the City of Cambridge, had some significant points but, like Rutherford, failed to crystallize what she had to say.

Gray reeled off a series of statistics to demonstrate the poor performance of Americans in science, and said that "scientific illiteracy threatens our ability to compete effectively." He never said what he meant by "scientific illiteracy," however, nor established why the inadequacy of scientific education should attract our attention any more than what he admitted to be the dismal state of education as a whole.

Rutherford, like Gray, saw the inability to "produce people who are literate in science, technology and math" as a "scandal." He made the important point that the humanities and ethics must be studied in tandem with science but talked only in vague terms, offering no ideas as to how this might be appropriately done. His patronizing manner was unfortunate as well.

Spooner was surely right when she said that science taught from the textbook is

unlikely to inspire students — more creative, exciting approaches are needed. But this begs the question of why learning in general is often not only unexciting but given low priority, or why so many American students are illiterate in their own language and uneducated in matters as basic as the use of logic to deal rationally with whatever matter comes to hand. It also begs the question of what might be done about it.

Afterwards, an audience member, Rob

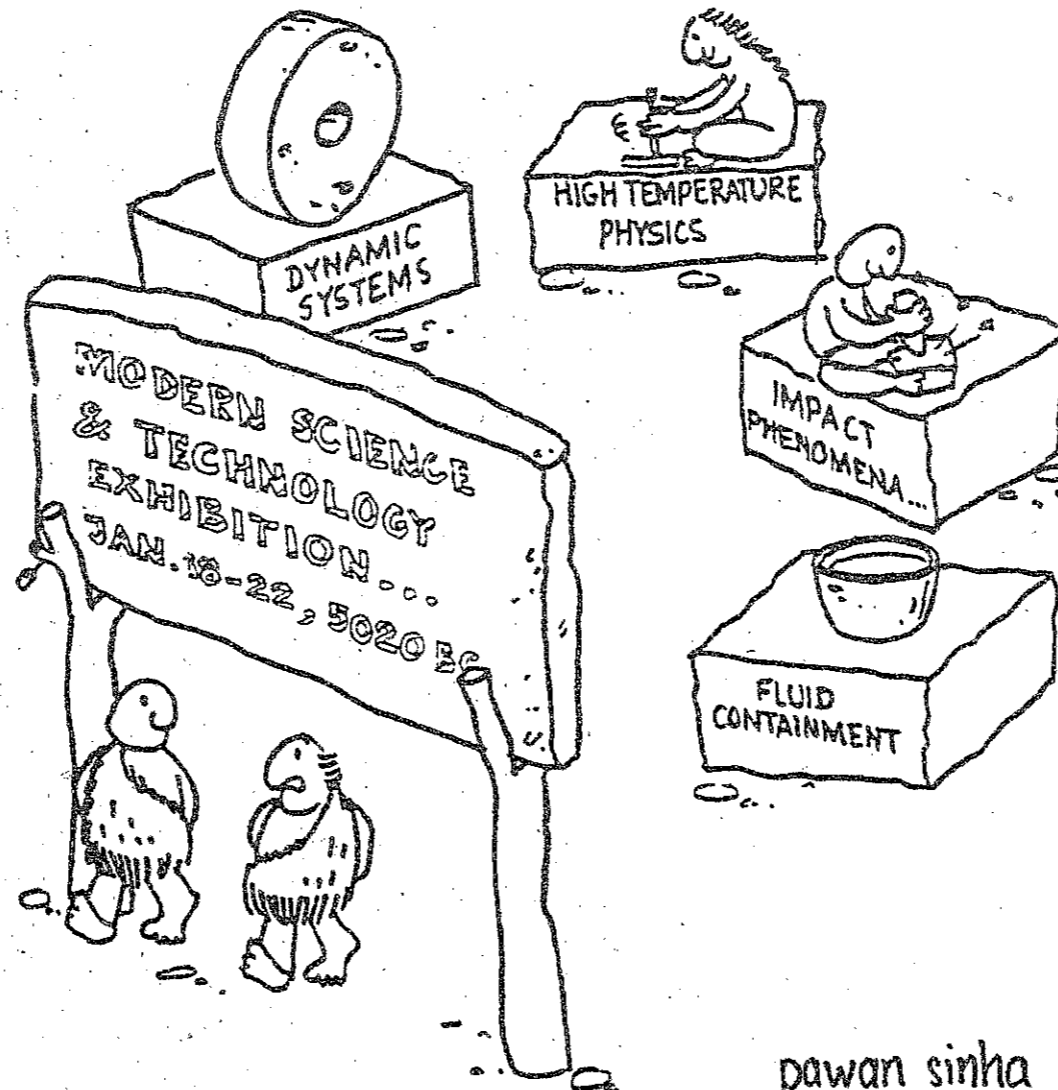
Fellows G, expressed his disappointment with the presentations: "It was just deadly dull, and it didn't get near the point: why is it that kids aren't interested in learning?"

It was left to the audience to ignite the debate, and with question time — which was much too short compared to the time allotted the speakers — the colloquium took off. Long lines of students formed at the microphones set up in the aisles to passionately challenge the speakers to confront the most difficult problems of education. One student took the discussion into the realm of politics by contrasting the highly-structured nature of his East European education to the American system which exists in a "free country [where] everyone has the right to be stupid." Another addressed the low societal and self-images of people interested in science.

Most poignantly, one student told of her mother's difficulties of teaching in a Harlem school where she lacked proper funding or support: "My mother spent a year without a door on her classroom," she said. Perhaps here was the real problem: as a society we lack a commitment to education; we don't care.

The colloquium reconvened at a plethora of living groups on and off the MIT campus, and it was here that the most productive business was done. Dinner discussions at pika — a cross between an out-of-control experiment in high-energy physics and the kind of womb-like kindergarten we'd all secretly like to regress to — were wide-ranging. My table had people from Australia, Denmark and Britain as well as from the United States and, fueled by copious quantities of dynamite pikan-produced chili and fresh-baked cornbread (the pikans were delightful and hospitable hosts), compared the principles, pros, and cons of educational systems around the world.

(Please turn to page 7)



"I never could understand all that abstract modern science."

# Don't zip up your jeans for 30 days.



It's a no-risk offer. Really.

*Try Levi's® 501® button fly jeans for 30 days. And if you don't absolutely love them, just return them for a full refund.*

But what's not to love? They're made to be the most comfortable jeans you've ever worn.

The special Levi's denim actually conforms to your body. And the button fly lets denim do what denim ought to do.

Fit you perfectly.

Stop by the nearest participating Levi's retailer (call 1-800-227-5600 for exact location). Ask about the Levi's 501 button fly no-risk offer.

And forget about zipping up. Forever.



# opinion

## LETTERS TO THE EDITOR

### Untenured housing plans for first year grad students inevitably backfire

I agree that the housing situation for newly arriving graduate students at MIT is a disaster which requires immediate attention. However, I oppose implementation of an "untenured" housing policy in Ashdown House not because I am "selfish" as Mark Engel's letter ["First-year students deserve priority in housing," Oct. 17] would have you believe, but because just such a plan was recently tried and quickly repealed just over a year ago.

I have very recent memories of all the newly arriving students complaining to the Housing Office about the failure of one-year non-renewable leases on campus and their demand that all on-campus beds be made tenured. In addition to strongly agreeing with Mark Engel's position that the Albany Street dormitory should be reserved exclusively for newly arriving graduate students, I believe the real solution requires that MIT make a new graduate

dormitory the first priority on the extension of the Campaign for the Future.

Portrayal of on-campus students as selfish simply because they oppose the idea of untenured housing doesn't wash. Every untenured policy proposed so far fully grandfathers all on-campus students, so certainly their reasons for opposition have nothing to do with their personal circumstances. Historically, on-campus students have done more than their share to help newly arriving students. For example, last year the telethon for graduate student housing drew 25 percent of Ashdown residents, though Ashdown at that time comprised less than 10 percent of the graduate student population. The Zoning Board of Appeals hearing, which was essential to creating the Albany Street dorm, was well attended by graduate students, but half of them were from Ashdown House. Beth and Vernon Ingram were the prime movers in the re-

cent addition of 28 beds to Ashdown by conversion of under-used basement space. I believe 15 percent of all on-campus rents are continually put into a fund which recently made Albany Street a reality. We do not oppose untenured housing because we are fundamentally selfish, we oppose it because of its recent history of failure.

That's right. The Institute recently repealed a policy similar to one being proposed now because the complaints from the students affected by the policy were so numerous that it became impossible to administer. New students were arriving in untenured slots and then immediately trying to get out of their one-year lease rather than waiting to be kicked out the following August when the housing market would become a nightmare again. New students who found special value in the on-campus communities were complaining that they could not build meaningful relationships

over time since they would have to move out in one year. Ashdown showed an unusually large vacancy that spring as so many wanted to move out and few wanted to move into untenured slots. What became apparent after this experience was that the quality as well as the quantity of beds for new students is of importance. Ashdown had 35 percent or 150 beds for new students this fall without the untenured policy. The new policy would push that to 50 percent, but one must recognize that those 50 percent are exclusively non-renewable leases and that the 35 percent we offer now are all renewable.

The experience we have with untenured policy shows us that most new students would rather accept the lower odds with the better housing, especially after a month or two of living under tenured policy.

A policy must be formulated which truly solves the problem of

the graduate student housing crisis at MIT instead of changing its form so some people will imagine it went away. Mark Engel hits the nail on the head in his call for Albany Street to be reserved exclusively for first year graduate students. Think of the opportunities to meet future off-campus roommates for those who chose it; similar plans, such as Harvard's freshman houses, have been successful.

Lastly we must recognize that graduate students must no longer tolerate some second rate status at MIT. It is really laughable how slow MIT has been to build the necessary graduate housing when these very students are the work-horses responsible for the Institute's greatness as a research institution. New graduate housing must become the first priority of the extended Campaign for the Future.

Jim Abbott G

### Housing first year grads should be top priority

I am writing in response to the letter from the housemasters at Ashdown House, Beth and Vernon Ingram ["Housing Office plan for dorms threatens graduate community," Oct. 13]. They have surely missed the point about the urgent need for housing of first year graduate students. In their letter, they say that "the current graduate student housing policy does not meet the needs of all incoming students, but it does provide much more than shelter to many students." They obviously have their priorities mixed up: shelter is a fundamental need, and any *stuff* which accompanies it should be considered at most secondary. The graduate student community overwhelmingly indicated this in the survey compiled by the Graduate Student Council Housing and Community Affairs Committee, as reported in *The Tech*. Eighty-two percent of the respondents indicated that first year students should be given priority for on-campus housing.

The Ingram's admission that finding an apartment in the Boston/Cambridge housing market is a "distressing", "disillusioning", and "inconvenient" experience does not even confront the economic realities of the problem. Current MIT policies governing on-campus housing distribution do not minimize overall

graduate student hardship because they create a system of haves and have nots.

First year graduate students who do not receive on campus housing face undue inconveniences as well as an economic fine of about \$1000-\$1500 that first year graduate students who receive housing do not (given summer transportation to Boston, lodging, and meals while looking for an apartment, time lost from work, realtor's fee, etc.).

But finding an apartment from a Boston/Cambridge base during the summer after the first year of graduate school is not nearly as inconvenient, expensive, or difficult, since options for finding shelter are much more varied and accessible, not to mention that one has an entire year instead of several days to determine which areas are safe and affordable.

Given the obvious needs of the first year graduate students and the desires of the graduate student community, any plan that does not guarantee all incoming graduate students at least one year of on-campus housing and allows others to remain indefinitely is *inherently unfair*. Unless all of the incoming students are offered housing, those who were unfortunate and did not receive housing carry both the financial and time burden of securing off-

campus housing. While any plan which improves the situation by increasing the number of available spots in housing for incoming graduate students will attenuate the problem, until every graduate student wanting on-campus housing in their first year receives it, the system remains inherently unfair.

Other universities are able to provide one year of guaranteed housing for all incoming students with all other spaces available by lottery each year, achieving a fair and equitable distribution and having dorms with a community atmosphere. There is no reason MIT could not do the same.

Of course it would be nice if MIT built more housing; however, no matter what happens, that will not occur overnight. Therefore, MIT should concentrate on distributing equitably the housing that it has.

As for the "new" plan, that the Ingrams find to be so bad, it obviously does not even meet the needs of incoming graduate students and is thus still inherently unfair. As with most proposals, however, it is clearly a compromise, and the authors of the proposed plan should be applauded for their courage and efforts which have begun to address compelling needs of first year graduate students.

Linda Baston G

### Letters policy

*The Tech* welcomes letters from its readers. All letters are subject to editing and are published solely at the editors' discretion. Authors must sign their letters and include their phone number, and MIT affiliation, if any, for verification, and should type letters double-spaced for ease of reading. Letters should be kept under 500 words. *The Tech* publishes letters anonymously only in rare circumstances, at the editors' discretion. Bring letters to *The Tech's* office on the fourth floor of the MIT Student Center or send them to: Letters to the Editor, *The Tech*, P.O. Box 29, MIT Branch, Cambridge, MA 02139; or to Room W20-483 by interdepartmental mail.

### Even the green frog was smiling

(Continued from page 5)

Stomachs satiated, colloquium participants sprawled themselves comfortably on a series of easy chairs, in a cushion-filled antique bathtub pikans rescued from the dump a year ago, or on the floor of the "Murph" — pika's name for its living room — and engaged in intense and committed discussion for two hours. How did schools shape children? What was education like in Japan and was it *really* any better? What damage was TV doing to children's education in the United States, and why wasn't it a problem in Japan? What could we do about a public not educated to vote on topics such as Seabrook nuclear power plant?

From the general and the global, discussion came back home to MIT to ask why few MIT graduates became legislators. How could people from MIT contribute to the democratic process? Was it just the responsibility of the general public to become better acquainted with science, or should those trained in science show more humility in explaining their knowledge to the public in understandable terms?

Finally, the issue of scientific literacy at MIT itself was addressed. Did the high-pressured teaching of techniques make for effective scientists? While one of the guests preferred such an emphasis, saying the most important ability for a bridge-builder was to know how to build a bridge correctly, others disagreed, maintaining that an ability to think reflectively — which MIT teaches less well than the analytic thinking skills at which MIT graduates are pre-eminent — should be given more attention than it currently has in the MIT curriculum. There were many majors who were "fine in problem sets at getting A's, but can't think about

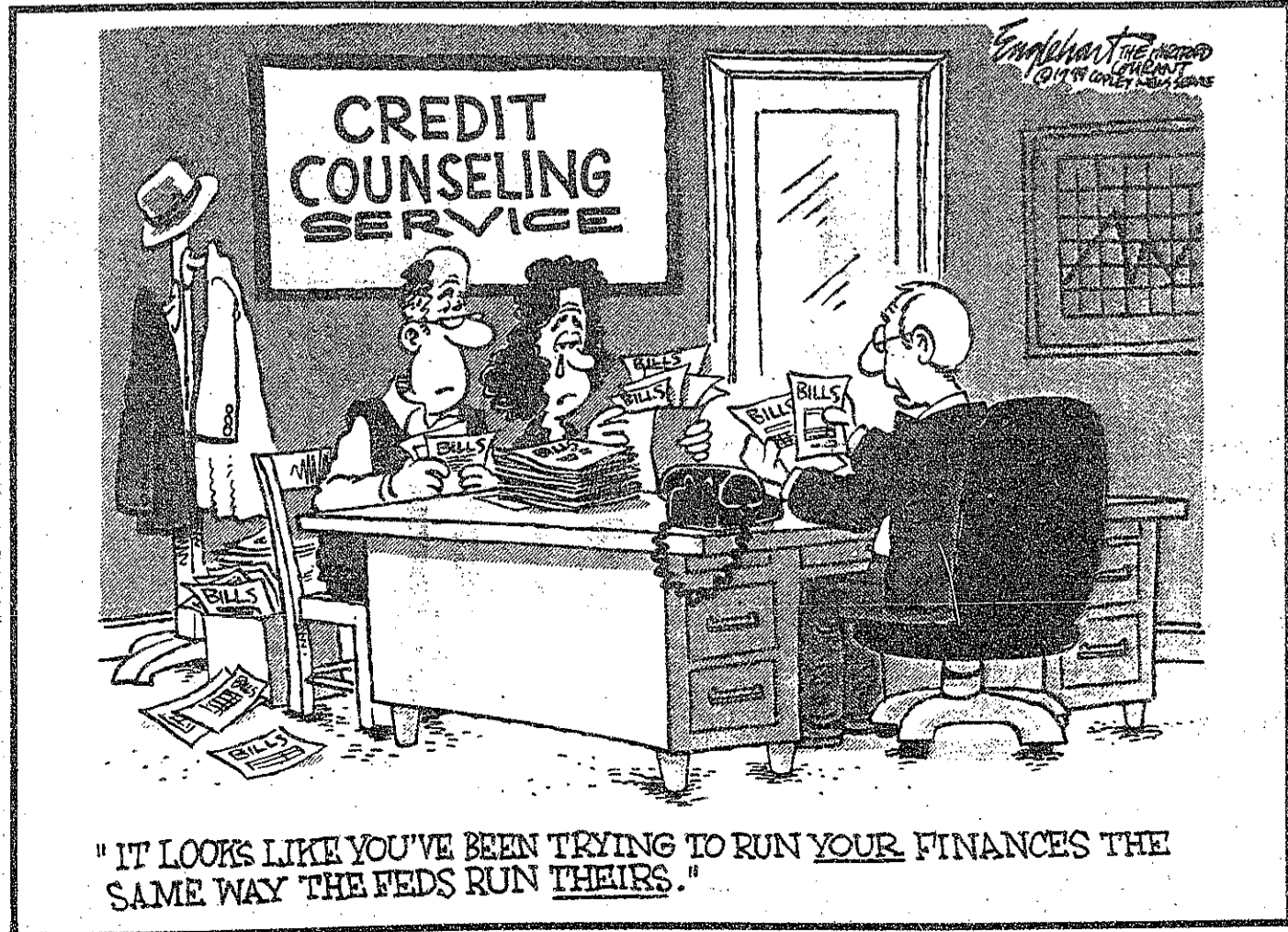
what it means at a basic level."

Elizabeth Morgan '92 said that she'd "never seen the rigors of doing problem sets as aiding comprehension," and contrasted her education at MIT with that of her sister, who was studying philosophy, Ancient Greek, math and music at St. John's College where she was "learning to critically analyze anything she deals with. . . I'm having information poured down my throat [but] she can deal with new facts much more readily and critically than we can."

Although perhaps none of us realized it at the time, however, the living group discussions were in themselves a contribution to the art of reflective thinking, a free, thoughtful, and sometimes quite deep interchange between professors, administrators and students. The maturity and involvement shown by contributions from the pika undergraduates certainly belied the myth of MIT students as narrow nerds. Reports from other living groups indicated that discussions there had been successful, too.

Perhaps most significantly, the evening provided for a diverse group of people who might otherwise never have met to come together and establish a community of interest in a rare atmosphere of equality and friendship. Even if the principal outcome is just to provide everyone more faces to say hello to in the Infinite Corridor, the colloquium had played a role in making MIT a more human place. Even the green frog seemed to be smiling.

Jonathan Richmond G, a graduate student in the Department of Civil Engineering, who has developed and taught a course that includes the application of moral philosophy to questions of transportation policy, is a contributing editor for *The Tech*.



# IT MAY COME AS A SURPRISE, BUT ONE OF THE MOST ACTIVE ORGANIZATIONS IN THE FIGHT AGAINST ALCOHOL ABUSE, DATE RAPE AND HAZING IS A FRATERNITY.

Delta Tau Delta is dedicated to dealing with many of the critical issues facing today's college students. Alcohol abuse, date rape and hazing simply cannot be tolerated.

As a result, we have instituted a comprehensive alcohol abuse education program among our 124 chapters.

We abhor date rape, believe in the worth of every individual, and have committed ourselves to the development of moral character.



We find hazing unthinkable, see no benefit whatsoever in the violation of an individual's physical well-being or personal dignity, and have taken steps to ensure that no Delta chapter engages in the practice.

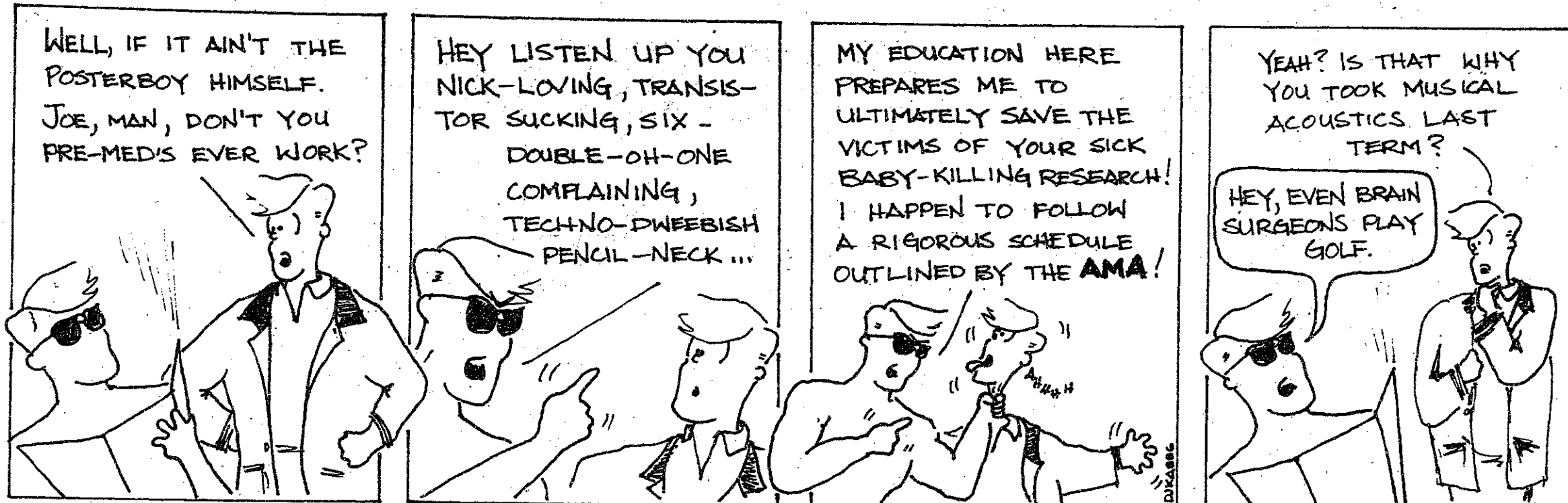
Those may be strong words, especially when you consider that they come from a fraternity.

At Delta Tau Delta, however, those are words to which we are thoroughly committed, and to which we have dedicated ourselves and our efforts.

**DELTA TAU DELTA**

# comics

By David J. Kim



## classified advertising

**Classified Advertising in The Tech:** \$5.00 per insertion for each 35 words or less. Must be prepaid, with complete name, address, and phone number. The Tech, W20-483; or PO Box 29, MIT Branch, Cambridge, MA 02139.

**Desktop Performance** — The Macintosh specialists. Have a Macintosh to sell? We buy and sell used Macs! Call us at Desktop Performance (617) 247-2470. We carry Mac products and peripherals. Guaranteed competitive prices and quality service. Upgrades our specialty.

**Spring Break 1990**  
Individual or student organization needed to promote our Spring Break trips. Earn money, free trips and valuable work experience. APPLY NOW!! Call Inter-Campus Programs: 1-800-327-6013.

**Attention** — Government Homes from \$1 (U-repair). Delinquent tax property. Repossessions. Call 1-608-838-8885 Ext. GH4058

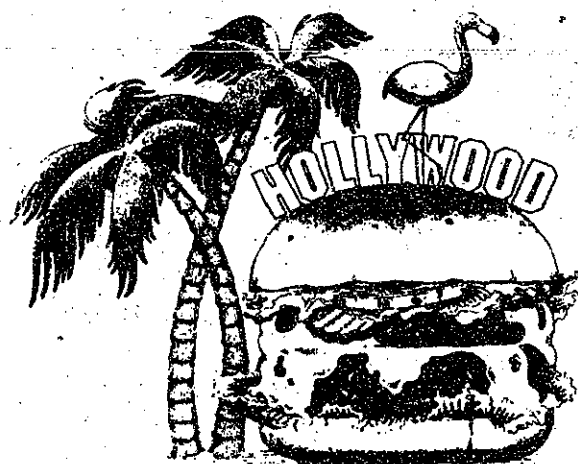
**Campus Reps Needed**  
Earn big commissions and free trips by selling Nassau/Paradise Island, Cancun, Mexico, Jamaica & Ski trips to Vermont & Colorado. For more information call toll free 1-800-344-8360 or in CT 203-967-3330.

**a b c & words, etc.**  
Letters, reports, manuscripts, theses, resumes. Academic manuscripts and formats my specialty. All work laser-printed. 24 hour rush service available. Ask for Sharon at (617) 738-6442.

**Travel Sales**  
Sell Spring Break package tours to Jamaica and Margarita Island. Earn free travel and extra cash. Great sales experience and flexible hours. Call 1-800-426-7710.

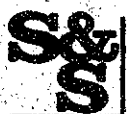
**Clerk position** at Massachusetts General Hospital available in Warren Building with beautiful view; tasks varied; some interesting — some boring; PAY: \$8.00-\$9.00 per hour. Call Dr. Holmes: 726-1742.

**YOU'D HAVE TO GO  
A LONG WAY  
TO FIND A BETTER VALUE  
THAN THE S&S.**



It's true. A deli in LA did get a teeny bit higher rating than us in a recent national survey. Still, the S&S being named one of the nation's 100 Top Value Restaurants by the renowned Zagat Restaurant Survey is quite an honor. Besides, the S&S isn't just a great deli. We have meal-sized appetizers like spicy Buffalo Wings. Unforgettable entrees including sauteed swordfish with sun-dried tomatoes and Chicken Monterey.

Generous drinks. And no tofu or waiters calling you dude. So why not fly over to the S&S and enjoy one of the country's best restaurant values. You'll save hundreds on airfare alone.



**Restaurant**  
A Great Find Since 1919.

Breakfast, Lunch, Dinner. Mon.-Sat. 7:00am-12:00am. Sun. 8:00am-12:00am.  
Inman Square, 1334 Cambridge St., Cambridge, 354-0777.

CENTRAL INTELLIGENCE AGENCY

## Vital Careers with a Vital Institution

Nowhere is more information about world events collected, analyzed, and managed by more capable people than at CIA. Nowhere else will you find an opportunity to become part of such a dynamic and exceptional team working for our nation's security.

CIA currently has positions for extraordinary individuals interested in a wide range of careers, offering a great diversity of opportunity — opportunities in science and technology, management and administration, high level analysis of information, and the special demands of overseas operations.

### Opportunities as Diverse As Your Talents

The intelligence process is a complex cycle, moving from the collection of information to the presentation of informed analyses to our nation's highest policymakers. Each of CIA's four directorates offers a diversity of challenges:

### Directorate of Science and Technology (DS&T)

Developing and integrating new technologies, from electro-optics to satellite communications. Collecting and processing information from around the world. Using the most advanced equipment and concepts to provide technical services for national security.

### Directorate of Operations (DO)

The Clandestine Service, the vital human element of intelligence collection. Working overseas, recruiting and maintaining intelligence networks and reporting what they find. Courageous individuals with high integrity utilizing their specialized tradecraft to help protect American interests worldwide.

### Directorate of Intelligence (DI)

Intelligence Officers analyzing and disseminating vital information from both open and clandestine sources. Focusing their specialized knowledge and experience about political, economic, scientific, and military affairs in reports to the nation's top policymakers about fast-breaking world events and long-term trends.

### Directorate of Administration (DA)

Supporting all the other directorates with vital and innovative services in

personnel and financial management, communications, computer technology, medicine, security, logistics, and training. Bringing new challenges to career disciplines that may be found elsewhere—but are not the same anywhere else.

### The Professional Profile

Special people with a special mission. That describes the men and women entering the CIA's Career Training Program. Applicants must be US citizens with a Bachelor's degree or an advanced degree with a strong GPA. A second language, or an ability to learn, is required for some positions. Related experience and military service are pluses. Many applicants must be willing to accept foreign assignments.

Applicants must also measure up to a stringent personal profile requiring honesty and a highly developed sense of personal ethics; superior intellectual and analytical ability, combined with first-rate communications skills; an unquestionable loyalty and desire to serve our country.

All applicants must successfully complete a thorough medical and psychiatric exam, a polygraph interview, and an extensive background investigation.

### Special Rewards for Special Individuals

If you have the drive, skills, desire, and integrity, you will be given every opportunity to succeed and excel. In addition to the excellent benefits of a federal government career, you will enjoy the special rewards of making a positive difference in the world — rewards you won't find anywhere else.

Take the first step by sending your resume along with a thoughtful letter. Include day and evening telephone numbers. We will respond to WRITTEN inquiries only, within 30 days to those judged to be of further interest. CIA is an equal opportunity employer and encourages applications from US citizens of all races, creeds, and ethnic backgrounds.

Send resumes and letters to:

Personnel Representative (DA50)  
P.O. Box 1920  
General Mail Facility  
Boston, MA 02205



# Imagination paves the way to tomorrow

Ford Motor Company is involved in an ongoing quest for technological superiority. That's why we look for engineers with the creativity and imagination to bring to reality the vehicles of the 21st century.

We encourage our select group of engineers to reach into any discipline to adapt technologies that will meet changing customer needs and keep Ford at the head of its industry.

We have built our success on the pride, drive and vision of our employees. It is our goal to find resourceful people who can generate and implement better ideas that will sustain Ford's leadership into the future.

Ford's challenging human resource development programs introduce you to our corporate culture of achievement. And, our employee involvement and participatory management processes encourage a free exchange of ideas, recognition and rewards. At Ford, you'll find a stimulating environment in which you can grow and flourish.

If you are prepared to use your expertise in unique and challenging applications, join the world class engineering team at Ford Motor Company. Representatives will be on campus on October 25th, 1989 to interview students interested in employment with Ford in the following divisions:

**Car Product Development**  
**Electrical and Fuel Handling Division**  
**Electronics Division**  
**Engine Division**  
**Product and Manufacturing Engineering Staff**  
**Transmission and Chassis Division**

For more information on career opportunities at Ford, contact your placement office or:

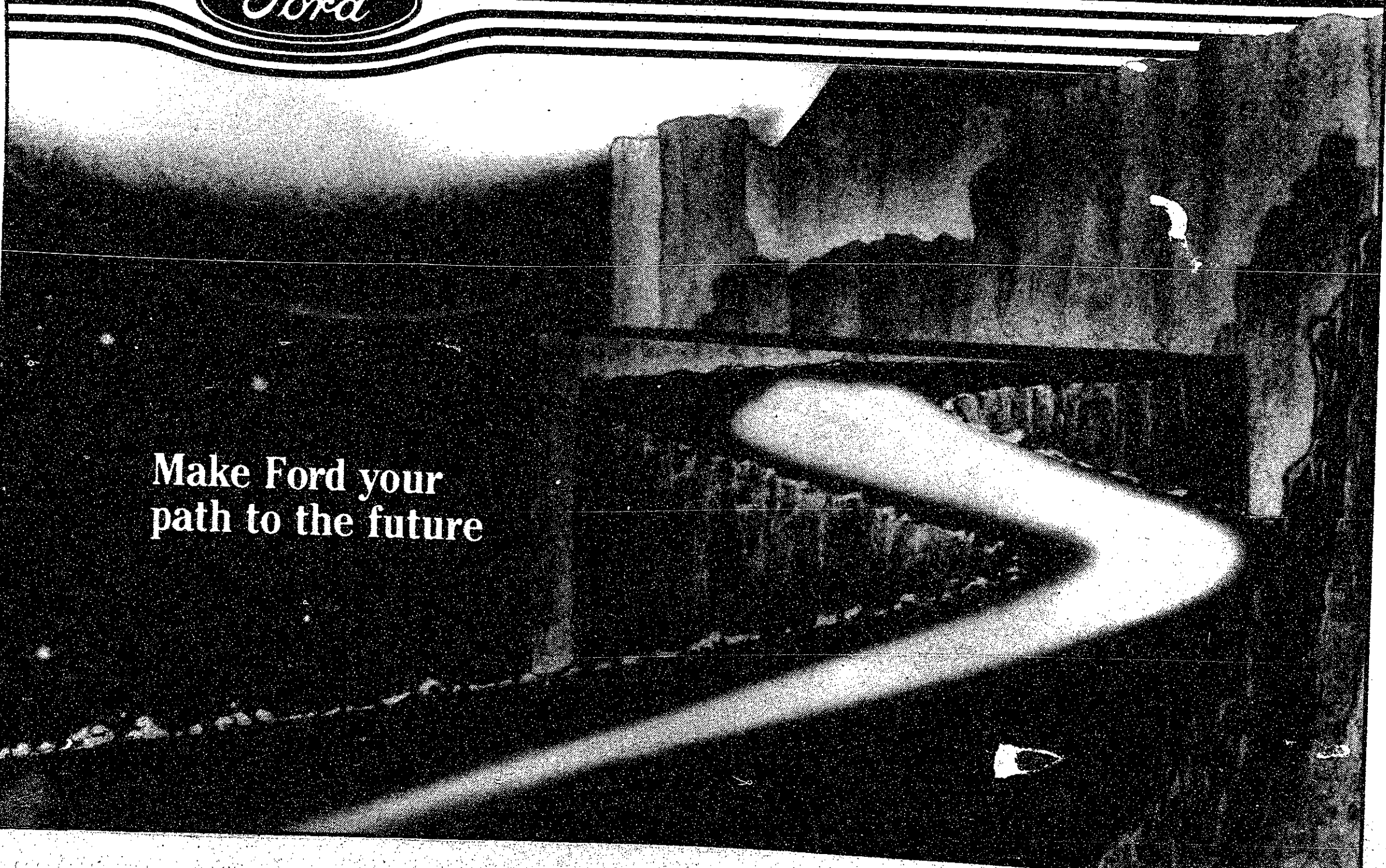
**Corporate Recruitment Manager**  
**Ford Motor Company**  
**Central Placement Services**  
**Box MIT**  
**The American Road**  
**Dearborn, MI 48121**

By choice, we are an equal opportunity employer.

**\* Ford invites you to a pre-recruiting information session and mixer at the Cambridge Marriott, 5:00 pm, October 24th, 1989.**



Ford

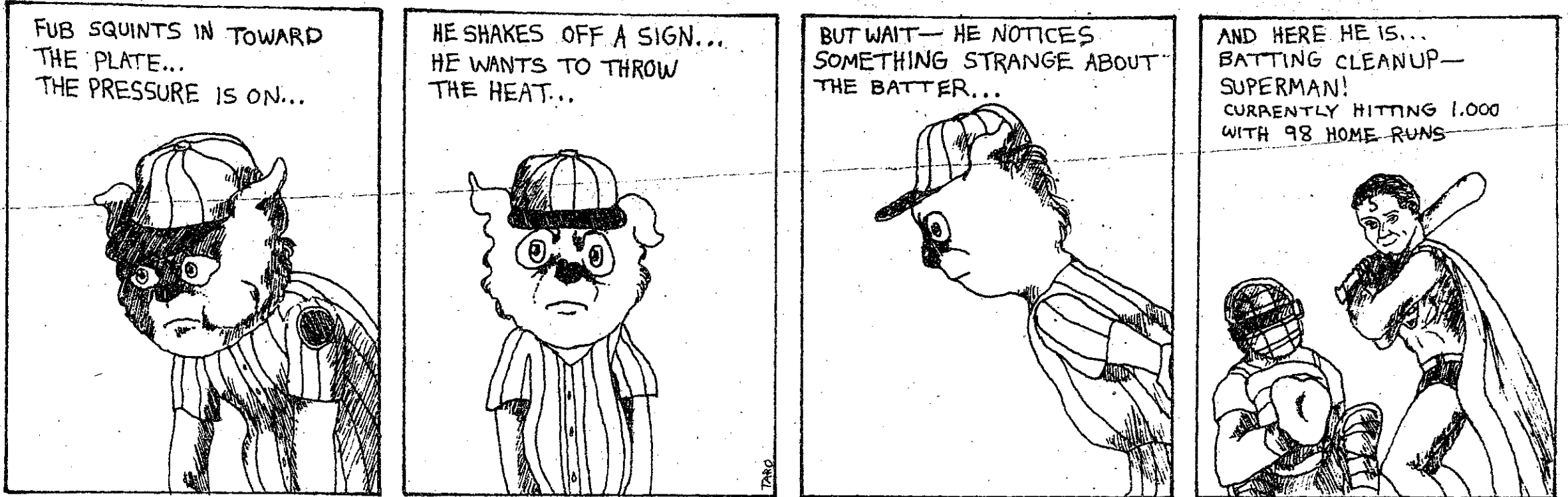


Make Ford your  
path to the future

# comics

## FUB

TARO OHKAWA



**Housing and Community Affairs Committee  
of the Graduate Student Council**

**Mondays 5:00 to 7:15  
in the GSC Lounge, 50-222**

Mon., Oct. 23 – general business and introductory discussion of graduate student housing policies

Mon., Oct. 30 – continued discussion of graduate student housing policies

# Interview us before we interview you!

Representatives from GE's Product Management Development Program are coming on campus to interview likely MBA candidates. It's an important opportunity, and here's how you can make the most of it.

Come to our pre-interview open house and learn about the program. Then, if you do sign up for an interview, you'll be able to spend your time telling us about you, instead of asking about us.

There's a demand throughout GE for top-tier people who can maintain and expand our market leadership. The Product Management Development Program is

designed to meet that need. It's a 2-year program that turns talented MBA's into productive managers with broad practical skills.

So if you have strong leadership skills and want to apply them to managing a multi-functional team, come interview us!

**GE Information Meeting**  
Date: October 24, 1989  
Time: 5:30-7:00 p.m.  
Place: Building E-51, Room 317  
Disciplines: MBA's  
Refreshments will be served.



The mark of a leader.

**Unitech Computer Discount Centers**

## We'll Beat Any Price!

**FREE SOFTWARE!**

- As-Easy-As Lotus-like software
- Cooking Recipe software
- Hunt and Destroy Action arcade game

**\$0.00** for all IBM-Compatibles! Bring this ad for your free software!

**UNITECH Computer Discount Centers**  
CAMBRIDGE 24 Thorncliffe Street (617) "UNITECH"  
SPRINGFIELD, MA DANVERS DEDHAM NATICK

**COMPUTER PAPER** \$19.95 (Reg. \$29) Letter or draft quality cases

**3 1/2" DISKS** \$8.95 Double side/double density

**Thinkmate 40Mb 286/AT VGA** \$1630 (Reg. \$1862, Sale \$1730, Coupon \$100 OFF)

One 1.2Mb floppy drive • Serial/parallel ports  
1Mb high speed RAM • 40Mb High Speed Drive  
VGA color card • 1.44Mb 3 1/2 Drive  
101-key keyboard

Limit 1 coupon per system. May not be combined with other offers. MIT1020

Valuable Coupon Expires October 26, 1989

\*Doesn't apply to mail orders, ref. rebates, unit discounts, going out of business sales, floor samples, one-of-a-kind, or limited quantities, or when advertised items are unavailable from other retailers. Applies only to computer retailers in Mass. and on the same model of equipment that we sell.

# O'CONNOR & ASSOCIATES

LEADER IN THE OPTIONS AND FUTURES MARKETPLACE

## THE O'CONNOR OPTION!

A private international risk management trading firm, O'Connors' excellence relies heavily on the interaction between our Trading, Systems, Quantitative Research and Fundamental Research departments.

Our intense, fast-paced and innovative securities trading environment gives talented individuals the opportunity to assume early responsibility and to shape their own future. We seek exceptional people with quantitative, analytical and problem-solving abilities to join our team.

**"CAREER OPPORTUNITIES IN OPTIONS TRADING"**

**MONDAY  
OCTOBER 23, 1989  
5:00-7:00 PM  
(Have dinner with us!)**

**MARRIOTT CAMBRIDGE, SALON #3**  
*Equal Opportunity Employer*

Chicago - New York - Philadelphia - San Francisco  
London - Stockholm - Toronto

**To be continued Monday!**

ARTS

# Thumbs down to Eurythmics' dull *We Too Are One*

**WE TOO ARE ONE**  
Eurythmics

By DAVID STERN

**E**URYTHMICS HAVE BEEN ONE OF THE most interesting pop groups of the past seven years: it is clichéd but true to say that Dave Steward's production and songwriting talent combined with Annie Lennox's voice makes Eurythmics unique. From their first album, *Sweet Dreams*, they have made challenging pop music of many different styles that has always been superior to the norm of pop music. Unfortunately, Eurythmics have become complacent in their success. On their latest album, *We Too Are One*, they have created formula and uninspired songs that do not match up to their earlier work.

Throughout, I had a sense of having heard this before. Of course every group "borrows" material from elsewhere, but not to the extent that the listener is conscious of it in almost every song. (At least in the case of De La Soul, it is done overtly.)

On several songs such as "Revival" and "How Long?" an attempt is made to fuse 1980's dance music with 1960's-style Motown or gospel. Unfortunately, Eurythmics forgot one element of the Motown style: soul, that elusive quality that you know when it's there. It ain't here.

The worst aspect of this album is the lyrics. Inane and banal are not quite strong enough words to describe them, but they'll suffice. I had difficulty deciding on the most inane lyrics to use as an example, but here's a good candidate, from the title track:

*So put your lovin' arms around me baby  
and hold me tight  
Give it everything you've got now baby  
We'll get it right  
People like us are too messed up  
to live in solitude  
I'm gonna cure that problem baby  
I'm gonna fix it good.*

Lyrics have never been Eurythmics' strong point, but this album is a low. It is tempting to put in another example, but trust me that the lyrics are, well, consistent.

The songs are in general well-written; most of them would likely receive an "A" in Songwriting 101. However, none of them are as inspired as past classics such as "Sweet Dreams" or "Love Is A Stranger." The production is generally also well-done; "Sylvia" among others has some captivating sound textures. But, to compare once again, the production seems lackluster compared to the cerebral neopsychedelia of their earlier efforts.

On the plus side, the songs are, in general, catchy, carefully produced (compared to most music hitting the top-40 today), and danceable. A few of these songs are obviously chartbound ("We Too Are One," "(My My) Baby's Gonna Cry," "Angel," "How Long?"), and Eurythmics

will not be written off quite yet.

However, for making novel and challenging pop music, Eurythmics have seemingly become obsolete, replaced by more innovative artists such as Sinead O'Connor or the Sugarcubes. If this album were by a new group, I would probably think:

well-done; they have potential. But for Eurythmics, who have made almost-brilliant albums in the past, it is a shame for them to make well-done music on the level of Huey Lewis and the News. The album is almost thoroughly uninspired, and Eurythmics' smugness with this is depressing.



*The Tech Performing Arts Series presents. . .*

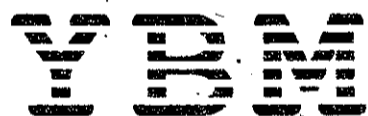
**MONTREAL SYMPHONY ORCHESTRA**

Charles Dutoit will conduct the Montreal Symphony Orchestra in a program including Schubert's *Symphony no. 3*, Hindemith's *Symphonic Metamorphosis on Themes of Weber*, and classic Stravinsky piece *The Firebird*.

Symphony Hall, October 27 at 8 pm.  
MIT price: \$6.

Tickets are on sale at the Technology Community Association, W20-450 in the Student Center. Office hours posted on the door. Call x3-4885 for further information.

If you're looking for more out of a job than just this:



Yuppie Business Machines  
New York, New York

1075981

February 1st, 19 90

PAY TO THE  
ORDER OF

Joe Engineer

\$ XXXX.XX

X THOUSAND, X HUNDRED, XTY-X AND XX CENTS

FOR Jan. Salary (Empl. #215437-3)

Namely, having an opportunity to:

- influence product development
- be a crucial member of a dynamic team
- contribute to an emerging field
- be exposed to a wide range of technologies
- see your work applied to major commercial and government projects
- get your paycheck... plus stock options!

You should consider employment at MIL 3, Inc., a pioneer in computer-aided-engineering systems for the telecommunications industry. We are currently seeking software engineers and technical communications specialists who are graduating in December. Sign up for interviews at the MIT Career Office.



**MIL 3, Inc.**

3400 International Drive, N.W.  
Washington, D.C. 20008  
Tel: (202) 364-8390

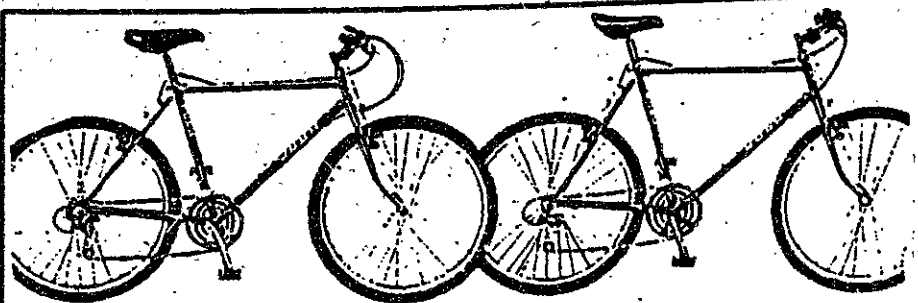
**We'd Like To Be Your Travel Agent.**  
 Lowest Airfares Anywhere  
 All Travel Arrangements  
 Eurail Passes · Amtrak  
 Major Credit Cards Accepted

**GARDNER TRAVEL**  
 1105 Mass. Ave.  
 Cambridge  
 492-2300

**KENDALL SQUARE TRAVEL**

Cambridge Marriott Hotel  
 2 Cambridge Center  
 Cambridge, MA 02142

617-494-1616



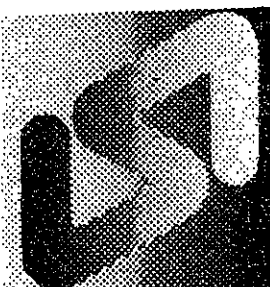
your alternative to high prices  
**the bicycle workshop**  
 259 Mass Ave  
 Cambridge (near MIT)  
 876-6555

**BIKES BLOW OUT SALE!**

**BIKES!**

**10% SAVINGS ON ALL MODELS**

**Your foreign language ability is valuable!**



Linguistic Systems, Inc.  
 116 Bishop Allen Drive  
 Cambridge, MA 02139

Translations into your native language are needed for industrial literature. You will be well paid to prepare these translations on an occasional basis. Assignments are made according to your area of technical knowledge.

We are currently seeking translators for:

- Arabic • Chinese • Danish • Dutch
- Farsi • French • German • Greek
- Italian • Japanese • Korean
- Norwegian • Polish • Portuguese
- Romanian • Spanish • Swedish and others.

Into-English translations from German and French. Many other languages also available.

Foreign language typists also needed. All this work can be done in your home!

Linguistic Systems, Inc. is New England's largest translation agency, located a block north of the Central Sq. subway station.

**For application and test translation call Ms. DePhillips 864-3900**

日本人留学生・日本に興味をお持ちの皆さんへ。

**ダイヤモンド就職ガイド**

**DIA-ACCESS**

Career Opportunities in Japan Vol. 4

ただ今 配布中!  
 発行 Now Available!

日本の産業界、社会、企業の採用動向などの情報を満載。あなたの留学経験を生かす企業選びのために、欠かせない一冊です。Career Placement OfficeあるいはInternational Officeでお受け取りください。

☆直接ご自宅へも無料でお送りします。右記のOfficeまでお電話またはハガキでお申し込みください。

**DIAMOND-BIG Co.,LTD.**  
 One Wilshire Building,  
 624 S. Grand Avenue, Suite 1210  
 Los Angeles, CA 90017-9805  
**213-629-0086**  
 (コレクトコールもどうぞ)

**HI, CAMBRIDGE!**

**BLOCKBUSTER VIDEO**

**GRAND OPENING**

**NOW GOING ON!**

**THERE WILL BE A NEW KID ON THE BLOCK AT PORTER SQUARE ARCADE!**

- ★ FREE Gifts for Everyone!
- ★ Grand Opening Prizes!
- ★ Over 10,000 videos & 7,000 titles!
- ★ 3 EVENING RENTALS!
- ★ Largest Selection of Quality Kids' Videos!
- ★ Video Cassette Player Rentals Available!
- ★ All the Latest Releases & More!

**OPEN 10AM - MIDNIGHT 7 DAYS A WEEK!**

**FREE MEMBERSHIP!**

**AMERICA'S FAMILY VIDEO STORE!**

MAP: WILSON ST, MASS AVE, PORTER SQUARE, UPLAND RD, ELM ST, BLOCKBUSTER, WHITE ST, T. STOP (red line), SOMERVILLE AVE, RT 2A

**PORTER SQUARE PORTER SQUARE ARCADE CAMBRIDGE**

**EMILE BUSTANI MIDDLE EAST SEMINAR**

Fall 1989

Chair, Professor Philip S. Khoury

Tuesdays, 4:30-6:30pm  
 MIT E51-332  
 Open to the public

OCT. 3 Ambassador **Richard Murphy**  
 Assistant Secretary of State for Near Eastern Affairs in the Reagan Administration  
 "The Search for Middle East Peace: Prospects and Perspectives"

OCT. 24 Dr. **Malise Ruthven**  
 British Broadcasting Corporation  
 Dartmouth College  
 "Islamic Movements in the Contemporary Middle East: Their Successes, Failures, Prospects"

NOV. 7 Prof. **Nikki Keddie**  
 U.C.L.A.  
 "The Iranian Revolution and its Implications Ten Years After"

NOV. 28 Dr. **Sara Roy**  
 Fellow, Center for International Studies, MIT  
 Author, *The Gaza Strip Survey*  
 "The Gaza Strip: Critical Effects of the Israeli Occupation and the Palestinian Uprising"

Sponsored by  
**The Center for International Studies at MIT**

# Investment Banking Opportunities at First Boston

First Boston, a special bracket investment banking firm, headquartered in New York, will be recruiting for its financial analyst program. Positions are available in Investment Banking (including Mergers and Acquisitions & Real Estate), Sales and Trading and Mortgage Product Development. All Seniors are cordially invited to attend a presentation and informal reception.

Presentation:

**Thursday, October 26, 1989**  
**Main Building 4-149**  
**7:30-9:00 p.m.**

This presentation has been rescheduled from October 18th.

A reception will immediately follow the presentation.

Interviewing Date: January 23, 1990

For further information and inquiries, please feel free to contact:

Jasjeet Sood  
Investment Banking  
(212) 909-2131

Jane Morison-Canlon  
Sales & Trading  
Mortgage Product Development  
(212) 322-7749



**FIRST BOSTON**

Park Avenue Plaza  
New York, N. Y. 10055

Y

ou worked hard to get into the right college.

Now make sure you get into the right company—

—Microsoft

Come talk with our technical leads — that is, if you're interested in advanced computer technology, multimedia, developing sophisticated operating systems and networks, powerful applications, state-of-the-art programming languages and more.

**Saturday, October 21**  
**12:00 pm - 5:00 pm**  
**La Sala de Puerto Rico,**  
**MIT Student Union**

Positions available include Software Design Engineers and Program Managers. We will be interviewing on-campus November 3. See your Career Center for more details.

Bachelor's, Master's and PhD candidates welcome.

**Microsoft**

We are an equal opportunity employer

HARDCORE  
SOFTWARE

## Baltimore to be president of Rockefeller University

(Continued from page 1)  
not automatically exempt from consideration.

### Lured by "challenge"

"The challenge of Rockefeller has caught me," Baltimore, the winner of the 1975 Nobel Prize in Medicine, said Tuesday. "It is much larger than Whitehead and more diverse in its activities, yet it still lets me focus my activities in the area I understand best, biomedical research." Increasing the teaching role of the university, increasing the role of younger scientists, and positioning the university to lead in understanding the nervous system are among his goals.

Baltimore's decision came two and a half weeks after representatives from Rockefeller University,

a biomedical research and teaching institution, offered him the position a second time. He turned down their first offer upon returning from an event where Whitehead scientists presented their research.

"He realized what exciting things were going on and felt rather exhilarated," according to Alfred Kildow, Baltimore's special assistant.

Baltimore has been director of the Whitehead Institute since its founding in 1982 with one of the largest philanthropic gifts made to American science. He has gained recognition for speaking on behalf of the scientific community on such issues as genetic research, priorities for national research, biological warfare, and the regulation of science.

## Call For Entries

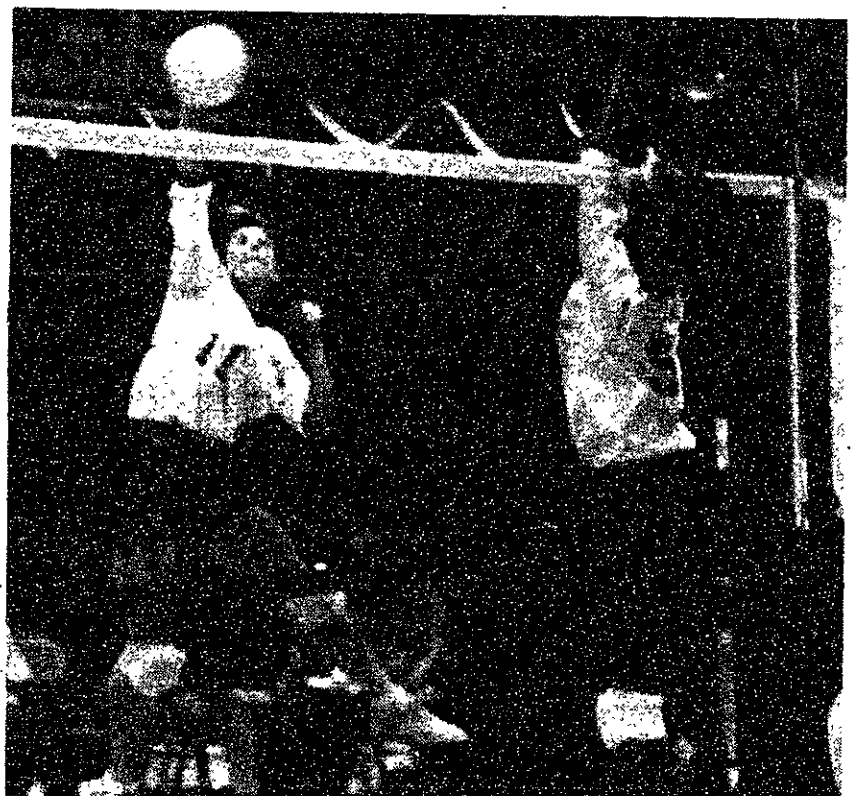
### Student Art Exhibition and Awards

#### "Change in the Age of AIDS"

**Who?** All currently enrolled MIT undergraduate and graduate students.

**What?** A juried art exhibition and contest at the Weisner Student Art Gallery sponsored by ARMIT (AIDS Response at MIT), the Medical Dept. and the List Visual Arts Center, offering a \$200 first prize and other awards. The winning entry will be displayed at the Sixth International Conference on AIDS in San Francisco.

**When?** Original works of art should be submitted Nov. 13. The exhibition runs from Nov. 17 through Dec. 9. Pick up entry information at the Office for the Arts (E15-205), the List Visual Arts Center (E15-109) the Student Health Resource Center (W20-547), or the Medical Dept. (E23-205). For more information call Ron Platt at 253-4400.



Ken Church/The Tech  
Cecilia Warpinski '90 spikes the ball past the Brandeis block in Tuesday's game. MIT scored a victory, 3-0.

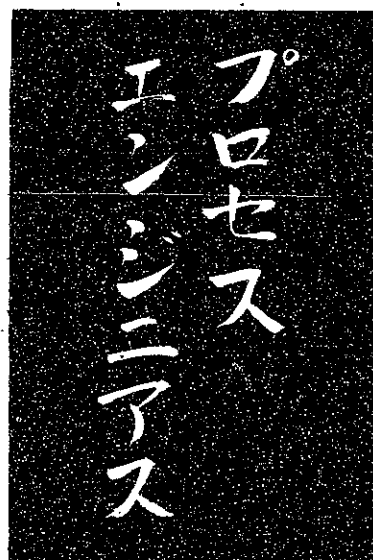
## COMMENCEMENT 1990

The Commencement Committee invites suggestions for a guest speaker at MIT's Commencement Exercises on Monday 4 June 1990 from all members of the MIT Community. The Commencement speaker should be one who will be able to address topics of relevance to MIT. Written nominations may be dropped off at the following locations:

Undergraduate Association Office - Room W20-401  
Graduate Student Council Office - Room 50-222  
Information Center - Room 7-121

The deadline for nominations is 1 November. In addition, suggestions may be filed with Mr. Joseph R. Babiec, President of the Class of 1990; Miss Mary L. Morrissey, Executive Officer for Commencement; Professor Martin F. Schlecht, Chairman of the Commencement Committee; and Mr. Michael J. Warwick, President of the Graduate Student Council.

All suggestions will be reviewed and a list will be submitted to President Gray 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 Gray.



### From process engineering to software programming—

Applied Materials has opportunities for you in Japan, the U.S. and around the world.

Applied Materials, Inc., is the leading independent supplier of semiconductor manufacturing systems in the world, with product lines that include systems for chemical vapor deposition (CVD), dry plasma etching, epitaxial deposition and ion implantation. We are a global company with corporate headquarters in Santa Clara, California, and close to 30 offices throughout the U.S., Europe, Japan, Korea and the People's Republic of China. In fiscal 1989, Applied Materials will have sales revenue exceeding \$450 million, increasing from \$363 million in fiscal 1988.

Currently, Applied Materials has unique career opportunities in Japan, the U.S. and around the world for both graduates and experienced candidates with Japanese language skills, including:

- Process Engineers
- Sales/Marketing Engineers
- Electrical Design Engineers
- Mechanical Design Engineers
- Field Support Engineers
- Programmers
- Finance, MIS and Human Resources Professionals

If you have an educational background and/or experience in any of these areas and you are looking for a challenging opportunity, come meet with us at one of the Nikkei Career Forums to be held at the following locations:

Date: Oct. 27-29 (Fri, Sat, Sun), 1989  
Place: Hynes Veteran Auditorium, Boston, MA

Date: Nov. 4 & 5 (Sat, Sun) 1989  
Place: Hyatt Union Square, San Francisco, CA

If you do not plan to attend either forum, please send a resume to Applied Materials, Inc., College Relations Dept. MP, 3050 Bowers Avenue, Santa Clara, California, 95054. We are an equal opportunity employer.

 **APPLIED MATERIALS**  
Worldwide Solutions...  
Time after Time.

# O'CONNOR & ASSOCIATES

LEADER IN THE OPTIONS AND FUTURES MARKETPLACE

## Programmers!

O'Connor programmers use state-of-the-art computers to build proprietary decision-processing systems to transform real time data and analytics into sophisticated trading and risk management tools. Applications enable O'Connor professionals to model the behavior of financial prices and understand the risk attributes of portfolios of options and related products.

Our open UNIX-based computing environment consists of a heterogeneous, distributed network of workstations, super-mini and mini-super computers.

We seek exceptional individuals with proven problem-solving

**MONDAY**  
**OCTOBER 23, 1989**  
**5:00-7:00 PM**  
**(Have dinner with us!)**

**MARRIOTT CAMBRIDGE, SALON #3**

*Equal Opportunity Employer*

Chicago - New York - Philadelphia - San Francisco  
London - Stockholm - Toronto

**Learn more Monday!**

# US News ranks MIT 7th among national schools

(Continued from page 1)

where applicable, total per-student funding from state and local governments; and retention patterns, based on average percentage of freshmen who became sophomores and average number of freshmen who graduate with a bachelor's degree within five years.

In addition, the magazine polled college presidents, academic deans and admissions officers in order to rank schools on the basis of academic reputation.

Although refinements have been made to the ranking system, the basic criteria remain unchanged.

MIT ranked second in academic reputation and fourth in student selectivity, the two most important criteria in the survey. (These two attributes were given twice the weight in the overall ranking as the other three listed above.)

These rankings, however, were

not high enough to compensate for the relatively low rankings in the other three criteria. The Institute ranked eighth in faculty quality, 13th in retention patterns and 45th in financial resources.

MIT was one of 204 schools categorized by *US News* as national universities. According to the magazine, they were grouped together because "they offer a full range of baccalaureate programs, give a high priority to research and award the most PhD's each year." The other universities and colleges in the survey were classified as national liberal-arts colleges, regional colleges and universities, regional liberal-arts colleges or specialized institutions. Comparisons were made only among those schools which belonged to the same category.

Changes in "methodology and in the categories" make this year's categories incompatible with those in previous years, the magazine says.

## Top 15 National University Rankings by US News and World Report

Rank	Overall Score*	Scoring Categories					
		1	2	3	4	5	
1	Yale University	100.0	5	3	3	2	9
2	Princeton University	99.2	3	2	4	15	1
3	Harvard and Radcliffe	97.6	1	1	8	11	2
4	CalTech	97.2	14	7	28	1	3
5	Duke University	94.3	8	6	7	3	20
6	Stanford University	94.2	4	5	9	10	7
7	MIT	90.6	2	4	13	8	45
8	Dartmouth College	89.8	13	8	2	7	17
9	University of Chicago	88.5	11	22	37	5	15
10	Rice University	84.8	25	13	11	22	5
11	Cornell University	84.7	7	12	25	32	13
12	Columbia University	84.7	12	10	10	26	25
13	UC Berkeley	83.6	6	11	46	58	11
14	Johns Hopkins University	83.2	10	23	17	9	73
15	Brown University	82.5	15	9	1	33	60

Scoring Categories:  
 1 Academic Reputation  
 2 Student Selectivity  
 3 Retention Patterns  
 4 Faculty Quality  
 5 Financial Resources

\*Overall Score is a weighted percentile based on figures for the five scoring categories.

Source: *US News & World Report: America's Best Colleges 1990*

**YOUR Ticket to SUCCESS**

PASSENGERS: PROGRAMMERS, ENGINEERS, ETC.

EARNINGS: **HIGHEST** in the Industry

Princeton Information offers an unbeatable combination: the security and unlimited career potential you're entitled to as a professional, along with a continuous and exciting variety of assignments and challenges. As one of America's fastest growing consulting firms, we supply the finest programming and data processing consultants to many industry leaders involved in research and development, as well as state-of-the-art high tech systems.

If you would like to be a Princeton Information consultant, we will provide you with the training you'll need, and offer you diversified career paths, enhanced earning potential, and an exceptional benefits program.

**A Princeton Information Representative will be on your campus on**

**OCTOBER 23**

Talk to us — it just could be the most important conversation you'll ever have.

NEW YORK • NEW JERSEY

**PRINCETON INFORMATION**

# Temple, Barker & Sloane, Inc.

invites all interested students to

## "Starting Your Career in Management Consulting"

Tuesday, October 24 at 7:00 p.m.  
 in Room 8-105  
 An informal reception will follow

**Temple, Barker & Sloane, Inc.**  
 Management and Economic Counsel

## Associate Scientist/R&D

### Molecular Biology/Molecular Immunology

T CELL SCIENCES, INC. is a health care company engaged in the development and marketing of therapeutic/diagnostic products. Positions at T CELL SCIENCES include a career-enhancing environment and offer the opportunity to work with internationally recognized scientists in converting their discoveries into products.

Outstanding growth opportunity to be involved in scientific research exploring recombinant pharmaceutical product development. Working with senior scientists, you will participate in investigations in protein expression and receptor/ligand interaction in a state-of-the-art environment. You should have a BS/MS and 1-4 years experience in molecular biology and mammalian cell culture. Background in immunology a plus.

T CELL SCIENCES, INC. offers comprehensive benefits and competitive salaries. For immediate consideration, please send resume to Paula R. Freeman, T CELL SCIENCES, INC., 38 Sidney Street, Cambridge, MA 02139.

An Equal Opportunity Employer M/F/H



## PRACTICAL ETHICS AT M.I.T.

- 1 **"ISSUES OF PRIVACY"**  
Friday, October 20 8:30 p.m.  
Walker Hall, Blue Room (2nd floor)  
Prof. Jeffrey A. Meldman '65  
*M.I.T. School of Management  
Associate Dean for Student Affairs*
- 2 **"THE USE OF HUMANS AS EXPERIMENTAL SUBJECTS"**  
Friday, October 27 8:30 p.m.  
Walker Hall, Room 50-010  
Walter Jones, M.D.  
*Chief of Medicine, M.I.T. Medical Department  
Chairman, M.I.T. Committee on the Use of Humans as Experimental Subjects*
- 3 **"COMPARISONS IN JEWISH & CIVIL ETHICS"**  
Friday, November 3 8:30 p.m.  
Walker Hall, Room 50-010  
Michael Grodin, M.D. '73  
*Professor of Medical Ethics, Boston University*

Sponsored by MIT Hillel, 253-2982  
Shabbat dinner is served every Friday at 6:45 p.m.  
Dinner reservations are due at the MIT Kosher Kitchen (253-2982) by Thursday

## PHYSICISTS! MATHEMATICIANS! COMPUTER SCIENTISTS!

XonTech is a highly respected, progressive R&D firm specializing in the empirical analysis of complex physical phenomena, and development of advanced concepts and technologies in support of numerous defense programs.

Our research encompasses the following:

- Analysis and evaluation of flight test data (aircraft ballistic missile, satellite), including:
  - Trajectory reconstruction
  - Re-entry aerodynamics
  - Navigation analysis
  - Orbital mechanics
- Research, development, and evaluation of advanced radar and weapons systems including:
  - Signature analysis
  - System design
  - Signal processing
  - Performance analysis
  - System simulation

Our work is technically challenging, and offers exceptional visibility and direct client contact, with opportunities for technical and managerial advancement.

Positions are available at the Ph.D., Master's, and Bachelor's levels. Degrees must be in Physics, Mathematics, or Computer Science. Electrical Engineering with signal processing emphasis is also acceptable.

Qualified professionals are invited to contact our Corporate Personnel Office at (818) 787-7380, or send a resume in confidence to **Corporate Personnel Dept., XonTech, Inc., 6862 Hayvenhurst Ave., Van Nuys, CA 91406.**

U.S. Citizenship Required.

XonTech will be at the  
Office of Career Service &  
Professional Advising  
on Monday, October 23rd.  
Sign up today for an interview!

 **XonTech, Inc.**

"People, Science and Technology"

Los Angeles Area • Orange County  
Washington, D.C. • Huntsville, Alabama  
Colorado Springs • Northern California

We are an equal opportunity employer M/F/H/V



Massachusetts Institute of Technology

## THE DAVID J. ROSE LECTURESHIP IN NUCLEAR TECHNOLOGY

1989 Lecturer

### DR. HANS BLIX

The Director General  
International Atomic Energy Agency  
Vienna, Austria

## THE WORLD'S ENERGY NEEDS AND THE NUCLEAR POWER OPTION

Monday, October 23, 1989  
4:00 pm

Building 34, Room 101  
The Edgerton Lecture Hall  
(50 Vassar Street)

Reception Immediately Following  
atrium between buildings 34 and 38

Massachusetts Institute of Technology  
Cambridge, MA 02139

Sponsored by:  
The Department of Nuclear Engineering  
and The Alpha Nu Sigma Honor Society



Dr. Hans Blix

## NIGHTCLUB at NIGHTSTAGE

### COLLEGE DANCE NIGHT

823 Main St.

Cambridge

EVERY THURSDAY

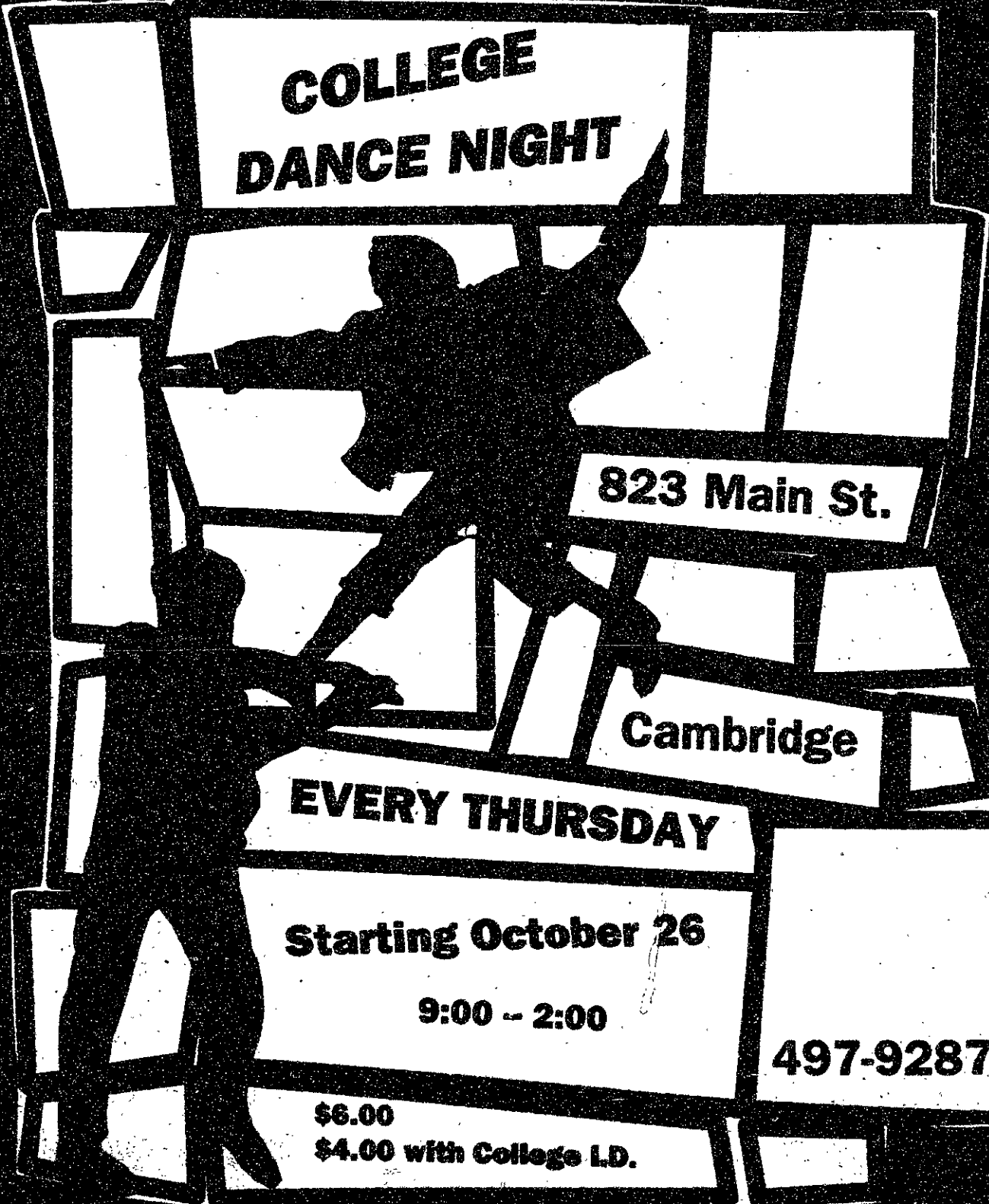
Starting October 26

9:00 - 2:00

497-9287

\$6.00

\$4.00 with College LD.



# *Information Services Management Training Program at MORGAN STANLEY*

*One of Wall Street's leading international securities firms invites Bachelor's and Master's candidates of all majors with superior academic records to apply to our Information Services Management Training Program.*

## ***WE SEEK***

- *FALL GRADUATES and RECENT ALUMNI of all majors for Winter and Spring start dates*

## ***WE OFFER***

- *A fast-paced leading-edge environment with high intellectual standards*
- *A structured training program teaching the use of Information Systems technology to solve business-related problems*
- *A series of challenging assignments with significant responsibility leading to rapid career progression*
- *An outstanding compensation program*

*MIT Recruiting Date: Monday, October 30*

*Sign-Up Deadline: Friday, October 27*

*For more information and to sign-up for interviews, visit the  
Office of Career Services/Room 12-170*

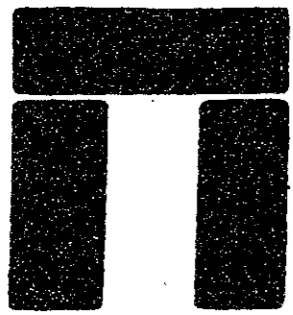
***MORGAN STANLEY & CO.***

*Incorporated*

*IS College Recruiting*

*1633 Broadway, New York, NY 10019*

*Morgan Stanley is an Equal Opportunity Employer*



**Kidder, Peabody & Co.**  
Incorporated

*cordially invites*

**M.I.T. SENIORS**

*to attend a presentation on the two-year*

**INVESTMENT BANKING  
FINANCIAL ANALYST PROGRAM**

**Monday, October 23, 1989**

**7:00 - 9:00 P.M.**

**Room 4-153**

**Appetizers and Refreshments to Follow Presentation**

# Faculty discuss CUAFA report, presidential search, Context

(Continued from page 1)

strengthen faculty linkages to the admissions process.

"The goal is not to [admit a class with higher test scores], though it might happen," Stolzenbach said.

Several faculty members, while satisfied with the high test scores of the Class of 1993, even suggested that the emphasis on analytical and quantitative skills be strengthened. Professor Anthony P. French noted that the doubling in size of the applicant pool over the past 10 to 20 years has not improved the "overall academic level," or the yield from students in the highest numerical indices. "Are we deliberately encouraging applications from students who won't be admitted?" he asked.

Another professor suggested that the Admissions Office accept everyone in the highest category of grades and test scores. "We might get some nerds, but there is the chance we would get some really excellent students," he said.

Responding to these comments, President Paul E. Gray '54 defended the diversity of the latest generation of students.

Professor Vera Kistiakowsky stressed that MIT should focus on attracting "diverse, thinking, caring human beings." None of the standardized tests measure the potential to become a good research scientist, she noted.

Professor Louis D. Smullin '39 expressed concern about MIT's recent elimination of its high school physics requirement. "MIT sends an important signal when it says what is needed and what is not needed. If we are [concerned about the state of science education in the United States], maybe we on our own actions should do something about it," he said, alluding to last

week's Institute-wide colloquium on the crisis in science education.

Faculty members have delegated the admissions process to specialists at the Educational Testing Service and the special offices, asserted Hartley Rogers Jr., professor of mathematics. He said that with students of such educational promise, MIT's professors delegate this responsibility with some danger.

In response to concern about the future of need-blind admissions and merit-blind financial aid, Stolzenbach could only say that it was a "constant possible topic."

## No deadline for presidential search

The Corporation and faculty committees searching for a new president for MIT have set no firm deadline for the conclusion of their search, reported Institute Professor Robert M. Solow. Solow chairs the faculty advisory committee on the presidential search.

The two committees agreed that to ensure a thorough search "we ought not to say to ourselves that we *must* finish by a particular time," Solow explained. But the groups do hope to have a candidate sometime next spring, he added. Gray announced last spring that he would leave the presidency to assume chairmanship of the MIT Corporation on July 1.

While Solow would not discuss candidates, he said the committees were looking at people both inside and outside the Institute, and considering the drawbacks and benefits of having someone who presently does not work at MIT become president.

The faculty committee and the Corporation committee have worked together as absolute part-

ners in the search process, Solow said. There has never been a suggestion that the opinions of the faculty are not desired or respected, he said. Solow urged faculty members to continue to volunteer advice about the search process and possible candidates.

So far the committees have been advised that they should look for a "weighted average of Winston Churchill, Niels Bohr, and Lee Iacocca," Solow reported.

## Context group presents report

The Institute Context Review Group, chaired by former Provost Frances E. Low, formally presented its report to the faculty at Wednesday's meeting. The group had been appointed by Dean for Undergraduate Education Margaret L. A. MacVicar '65 last October to evaluate MIT's Context offerings and make proposals for the future.

Context courses are classes which attempt to combine technical studies with knowledge of the societal contexts (e.g. political, ethical, economic) in which science and engineering are practiced. Among the classes offered by the MIT Context Program this term are Negotiation in Engineering Systems (13.95J/15.600J) and Automation, Robotics, and Unemployment (6.903J/STS013J).

Low announced the appointments of Lawrence M. Lidsky PhD '62, professor of nuclear engineering, and Merritt Roe Smith, professor of the history of technology, as co-directors of the Context Program.

The Review Group recommended in its report that context classes — both those offered by the Context Program and regular courses that embody the "context" idea — become an integral

part of MIT's educational program — for graduate students and faculty as well as undergraduates.

But the group stopped short of asking that a Context subject be made an Institute-wide requirement for all undergraduates. Undergraduate students are already forced to take a large number of required classes, Low explained at the faculty meeting, and the group did not feel another requirement was warranted. Also, the Institute does not have the resources to teach formal context subjects to 1000 students each year, Low continued. And the diversity of the student body in terms of preparation and goals also works against such a requirement.

Smullin, who teaches 6.903J/STS013J along with Smith, expressed skepticism about the future of Context classes. The idea behind the classes is so open-ended that there are many ways in which faculty can approach these classes, he said. At one extreme, Context instruction can deteriorate into mere "Sunday School teaching" — banal blandishments to students to think about social and political contexts. At the other, faculty offer a set of varied and specialized subjects that may interest the professors but do not interest the students, judging from low enrollments garnered in the past by Context classes, Smullin said.

## Need for minority faculty cited

The Bureau of Labor Statistics has reported that an increasing number of those entering the US workforce will be women and racial minorities — groups underrepresented among American doctoral students. This has created pressure on US universities to reduce the attrition rate in higher

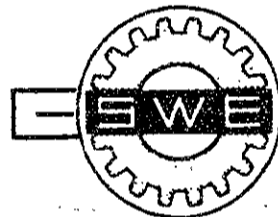
education among these groups, according to Institute Professor Herman Feshbach '42, chair of the Committee on Equal Opportunity.

The committee has worked with Provost John M. Deutch '61 to create a consortium of major research universities that will encourage minority students to continue along educational paths that lead to faculty positions, Feshbach reported to the faculty. Deutch and the committee have been in contact with University of Chicago, Columbia University, Cornell University, Harvard University, Princeton University, Stanford University, and Yale University about forming such a consortium.

Feshbach said the committee will soon present a plan to involve faculty members in the attempt to increase the number of minority PhD candidates and postdoctoral associates. But he did not provide any details.

Also at Wednesday's meeting, Gray described his annual report to the Corporation. Among the topics he addressed were investigations by an congressional committee into the Industrial Liason Program, dealings with Japanese firms, the Justice Department price-fixing investigation into 58 colleges and universities including MIT, and equal opportunity efforts.

How do they put it together? Come by *The Tech* and find out. Pizza every Sunday at 6 pm.



SOCIETY OF WOMEN ENGINEERS

MASSACHUSETTS INSTITUTE OF TECHNOLOGY STUDENT SECTION

## 11th Annual Career Fair and Banquet

sponsored by Society of Women Engineers

### Banquet

Friday, October 20

Reception — 6 pm

Dinner — 7 pm

at the Marriott, Kendall Square  
Members FREE, Guests, \$15.00

### Career Fair

Noon — 5 pm

Saturday, October 21

in the Sala de Puerto Rico,  
Student Center

Career Fair open to all members of the MIT community  
Banquet tickets on sale in Lobby 10 or call 253-2096.

# sports

## Women's volleyball record at 16-4

### Sports Update

#### Volleyball continues to shine

The women's volleyball team is currently 16-4 after easy 3-0 wins over Wellesley and Babson. This fact has propelled the team to a number three ranking in New England Division III play. Captain Cecilia Warpinski '90 was recently named to the All-Tournament teams for her play in the Salem State and Eastern Connecticut State University Invitationals. Teammate Jenny Harris '90 joined her on the All-Tournament team in the latter invitational.

#### Crew ready for Head of the Charles regatta

The heavyweight crew team recently placed fifth in the Head of the Charles regatta in Pittsburgh, won by the US Olympic Team. This prepares the team for this weekend's Head of the Charles regatta, the most important crew event of the year. All the classes of both the men's and women's crews will participate in this regatta.

#### Football continues to be ranked

The football team continues to be ranked 15th in the latest New England Division III poll, despite last week's loss. Quarterback Tim

Day '89 became MIT's all-time passing yardage leader last week, and added to the career touchdown mark which he already possessed. Day, Shane LaHousse '90, and Garret Moose '91 — MIT's "Rocket Backfield" — have all been named to the Eastern College Athletic Conference New England Division III honor roll at various times this season, with Day and LaHousse being Eastern Collegiate Football Conference Offensive Players of the Week. Defensive tackle Mike Ahrens '90 has also been previously named ECFC Defensive Player of the Week.

Compiled by Shawn Mastrian and the Sports Information Office

### Upcoming Home Events

#### Saturday, October 21

- 11:00 Field Hockey v. Nichols
- 1:00 Women's Soccer v. SMU

#### Sunday, October 22

TBA Crew Head of the Charles Regatta

## Maybe Your Future Should Be Different From Your Major.

Position available: Corporate Analyst.

Criteria: Willingness to work long hours alongside senior members of our firm. All majors are eligible.

For more information: Attend a presentation on Monday, October 30 at 4:30 p.m. in Room 4-159.

The Investment Bankers of Shearson Lehman Hutton



Douglas D. Keller/The Tech

Liz Stock '90 eclipses a Brandeis opponent in the fight for the free ball. Playing through yesterday's inclement weather, MIT lost, 1-0.

## Absence of top runner hurts cross country at MAIAW meet

By Theresa Fuentes

The women's cross country team was unable to defend their Massachusetts Association of Intercollegiate Athletics for Women title this past weekend at Gordon College. Simmons College finished first with 41 points, followed by WPI with 44, and then the Engineers with 55 points. The women also lost their Wellesley Invitational title to Simmons last week.

MIT suffered heavily from the absence of one of their top runners, Kristen Nummerdor '93. Nummerdor had been running third on the team, but had been bothered by a bad back the past week and did not run on Saturday. If Nummerdor had run, coach Chris Lane believed that the women could have won the meet.

The Beavers have consistently run tighter races than Simmons or WPI, placing their top five finishers before the fifth finisher of the other teams. But with Nummerdor missing, this was not the case on Saturday. This is not a new problem, as it has been difficult keeping the top runners healthy all season.

In order to compete with top rivals WPI and Simmons, the

team needs to be running at its best. The Beavers had been defeated by WPI at the Engineers' Cup Invitational, the first meet of the season by a small margin.

Dena Novak of Simmons won the meet in a fast 17:55. The top runners for the Beavers were Chris Goh '92 in fifth place, Theresa Fuentes '91 in sixth, Gabrielle Rocap '92 in tenth, Amy Rovelstad '92 in 12th, and Stacy Holander '92 in 23rd place. This meet also marked the return of Sharlene Day '91, who had been out all season with a back injury.

Goh, Fuentes, and Rocap were all named to the All-MAIAW Team based on these performances.

## STUDENT & FACULTY FARES

from Boston round trips starting at

LONDON	338
ATHENS	750
CAIRO	618
SAN JOSE C.R.	390
CARACAS	370
TOKYO	749
SYDNEY	1229

Taxes not included. Restrictions apply. One way fares available. Eurail passes issued on the spot! FREE Student Travel Catalog!!

CouncilTravel

MIT Student Center, W20-024  
Cambridge  
225-2555

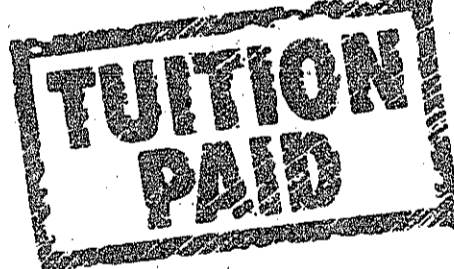
Harvard-Epworth  
United Methodist  
Church

1555 Massachusetts Ave.  
opposite Cambridge Common

Sunday Worship: 9 and 11am

Undergrad Forum: 5:30 PM

# GO TO MEDICAL SCHOOL



Find out how you can have your medical school tuition, required books and fees paid in full—plus earn more than \$700 a month while you attend school.

Clip and mail the coupon below, and we'll send you full details on the Armed Forces Health Professions Scholarship Program.

We'll tell you how you could qualify for a Physician's Scholarship from the Army, Navy or Air Force.

If selected, you'll not only beat the high cost of medical school, you'll also gain valuable medical experience serving on active duty 45 days each school year as a commissioned officer in the Reserves.

After graduation, you'll serve three years or more—depending on the Service you select and the level of scholarship assistance you receive—as a respected Armed Forces physician. You'll also get good pay, regular hours, great benefits and the chance to work with a variety of patients and the latest medical technology.

If you meet the age requirements noted below for the Service of your choice—and want to cut the expense of medical school—send for more information today.

YES! Send me full details on how the Armed Forces Health Professions Scholarship Program can help cut my medical school expenses. I meet the age requirements noted below. I understand I am under no obligation.

Mail this coupon to: Armed Forces Scholarships, P.O. Box 2865  
Huntington Station, NY 11746-2102

9015

Check up to three:  Army (18-35 years of age)  Navy (21-36 years of age)  Air Force (18-34 years of age)

Please print all information clearly and completely.

Name: \_\_\_\_\_  Male  Female  
First Middle Initial Last

Address: \_\_\_\_\_ Apt. # \_\_\_\_\_

City: \_\_\_\_\_ State: \_\_\_\_\_ Zip: \_\_\_\_\_

Phone: \_\_\_\_\_ Soc. Sec. No. \_\_\_\_\_  
Area Code Number

College: \_\_\_\_\_ Birth Date: \_\_\_\_\_  
Mo. Day Year

Field of Study: \_\_\_\_\_ Graduation Date: \_\_\_\_\_  
Mo. Day Year

The information you voluntarily provide will be used for recruiting purposes only. The more complete it is, the better we can respond to your request. (Authority: 10 USC 503)