

USEFULNESS AND SUCCESS... THE FIRST 100 YEARS

On December 30, 1862, MIT Founder William Barton Rogers filed a year-end report with Massachusetts Governor J.A. Andrew covering MIT's first full year of existence. He noted successes in securing funds and land for the fledgling Institute and commented: "From the favorable beginning already made... we have reason to anticipate a large measure of usefulness and success."

One hundred years later, at the end of 1962, MIT was able to look back and see Founder Rogers' anticipation fulfilled and the beginnings made toward even greater usefulness. For 1962 was the year that saw numerous important projects launched or completed, including several key objectives of the Institute's Second Century Program. Construction started under the Program on the Green Center for Earth Sciences and the new women students' residence. At the same time, planning neared completion for the Center for Materials Science and Engineering, scheduled to be started in February, 1963, and for the Center for Life Sciences and a Student Center, both to be started in 1963--all Second Century Program objectives. At year's end, \$5 million was yet needed to meet the objectives of the Second Century Program.

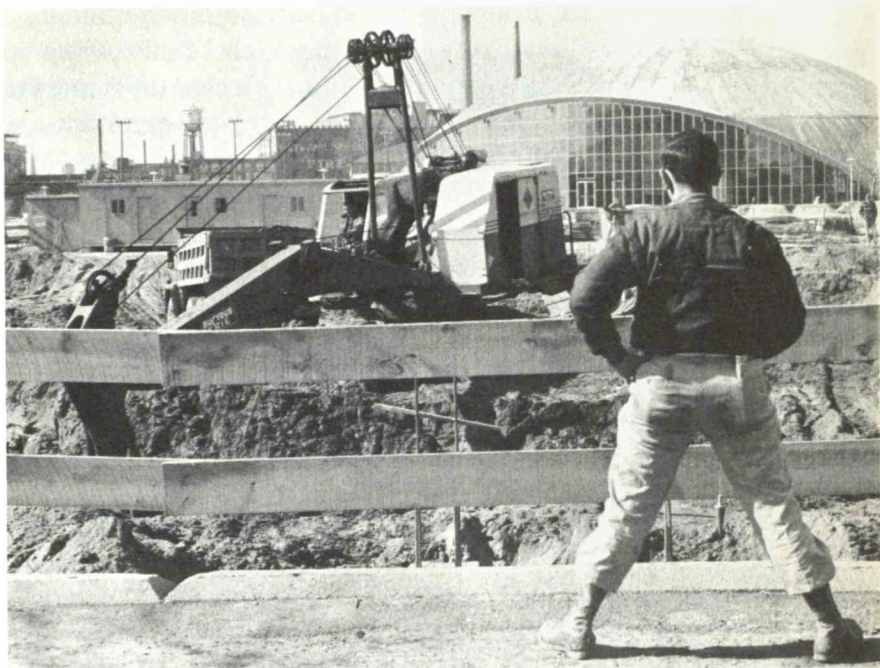
Also in 1962, a married students housing project was started, the new Psychology Bldg. was completed, and the Institute's new National Magnet Laboratory, a new Radiochemistry Bldg. and a new building to house the MIT Cyclotron all neared completion.

Indeed, it was a year of fulfilled anticipation.

A YEAR OF PEOPLE, PROGRAMS AND PROJECTS

Looking back, people, programs and projects made this news at MIT in 1962:

The Undergraduate Seminar Program entered its second year offering 42 seminars--research projects--to incoming freshmen. Some 325 freshmen--or more than a third of the entering class--are currently enrolled... Seven MIT fraternities participated in two public service projects in Boston--one a general cleanup in the Fenway area, the other a treeplanting project in Back Bay... Frank Kosdon, a senior and physics major, again collaborated with a Harvard senior, Ronald Winston, to win for the second year in a row the American Rocket Society's competition for producing the best undergraduate paper on the art of rocketry. (subject: rocket fuels)... 15-year-old Susan Hemley, a freshman from Forest Hills, N.J., became the youngest woman ever to enter MIT... In basketball, Techmen won the last 15 games straight, breaking a 1929 winning streak of nine games straight, and Captain Dave Koch, '62, set an individual scoring record--946 points... And the fall fad was tiddlywinks; MIT formed two teams, the MIT Undergraduate Tiddlywinks Society (MUTS) and the Tech Newspaper



A year of building...

--TT photo by Bob Lyon

Tiddlywinkers (TNT's)...MIT played host to some 660 foreign short-term visitors who came from 70 different foreign countries during the year.

In addition there were meetings... In May, some 400 leaders in industry, business and education attended the 10th biennial Convocation of Alumni of the School of Industrial Management graduate program for executive development. At the Convocation SIM alumni established the Sloan Fellow Professorship which is currently occupied by Dr. Douglas McGregor... MIT and the National Aeronautics and Space Administration jointly sponsored a two-day conference for New England business, industry, government and university leaders on Science, Technology and Space... And over 50 countries were represented at the Ninth International Congress of Linguists when more than 1000 language experts met on the MIT campus and at Harvard this summer.

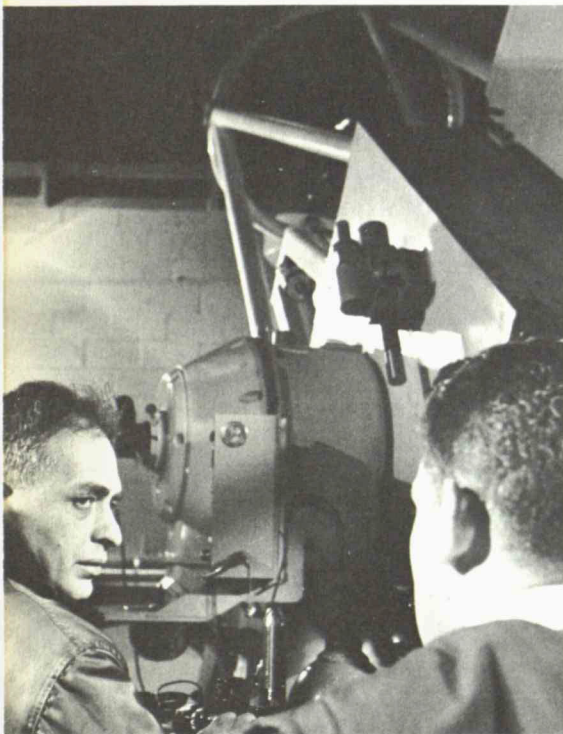
MIT was called upon to help in 1962... Members of the MIT community passed goals in both the Annual Blood Drive donating 1168 pints of blood and in the 1962 United Fund Campaign when they contributed \$75,321.75... At the request of the Indian government, MIT joined eight other American universities to assist in developing the Indian Institute of Technology at Kanpur, India. Presently working in Kanpur are Professor of Mechanical Engineering Norman Dahl and Assistant Professor of Aeronautics and Astronautics Myron A. Hoffman.

In 1962, five Ford Professors were selected. Dr. Morris Cohen of the Department of Metallurgy was made Ford Professor of Materials Science and Engineering. Drs. Robert M. Fano and David C. White (both of Electrical Engineering), Dr. Harold S. Mickley, of Chemical Engineering and Dr. Ascher H. Shapiro of Mechanical Engineering were all made Ford Professors of Engineering. The Ford Professorships were made possible under a grant from the Ford Foundation in 1959... At the Students Award Convocation last May, Dr. Stratton presented Jim Murphy--Kresge's manager since 1955--with a check and silver tray inscribed "In appreciation for dedicated service to the students and staff at MIT."... Dr. Arthur R. von Hippel, Professor of Electrophysics in the Dept. of Electrical Engineering, was made an Institute Professor... Professor of Metallurgy John Wulff was awarded the Class of 1922 Professorship, which was set up at Alumni Day functions in June, in honor of the 40-year reunion. Alice Browne was made an honorary member of the Class of 1928 whose members she first came to know when she joined MIT in 1926. Miss Browne retired in 1961 after 35 years of service as a nurse in the Medical Dept. Associate Director of Admissions Paul Chalmers was made an honorary member of the Alumni Association that same day... Among medal winners was Dr. Harold L. Hazen, Dean of the Graduate School at MIT. Dr. Hazen was awarded the Lamme Medal, the nation's highest award in engineering education.

And there were new publications. Safe Talk--published by the Safety Offices at MIT and Lincoln Lab--made its debut in June... The MIT Associates Program--geared to companies and individuals interested in communicating with the Institute on recent technological advances--also found its start in 1962... The MIT Press begins the new year on its own after a 25-year-old cooperative publishing program with John Wiley & Sons, Publishers of New York.

IN THE LABS...

In MIT's laboratories, these were some of the stories that made science and engineering news in 1962... Research Laboratory of Electronics scientists beamed light from an optical maser to the moon and detected reflections back to



--TT photo by Bob Lyon

MOONBOUNCERS. Prof. Louis Smullin (left) of RLE and Stanley Kass (right) of Raytheon Co. Prof. Smullin headed group that flashed light to moon in 1962. Raytheon supplied optical maser for experiment.

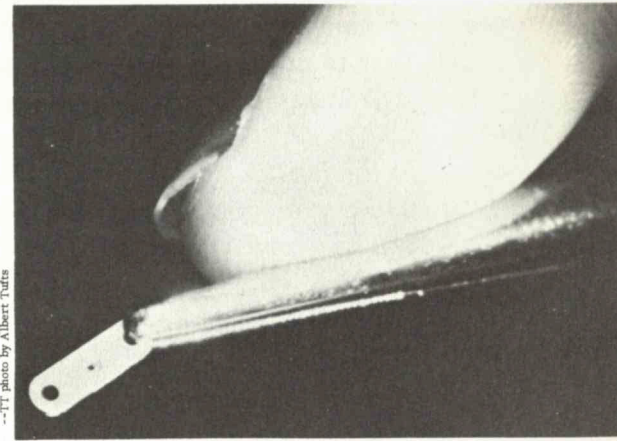


Prof. Barrett

--TT photo by MIT Portrait Studio

earth... Instrumentation Laboratory's Mark 2 for the advanced 2,500-mile Polaris missile worked perfectly in its first test flights... Harvard and MIT physicists at the jointly-operated Cambridge Electron Accelerator got their powerful new instrument for probing the nucleus of the atom into operation... RLE's Professor Alan Barrett saw a radiometer experiment he helped conceive and design journey to the planet Venus aboard the Mariner II space probe and send back to earth data (yet to be analyzed) about the Venusian temperature... and at Lincoln Laboratory, experimenters succeeded in transmitting the first television picture (it said

MIT") and was sent from California to Massachusetts via a communications satellite (Echo I), developed a low noise helium-cooled parametric amplifier, and used a beam of infrared radiation generated by a gallium arsenide diode for communications.



--TT photo by Albert Tutis

Gallium arsenide diode in close-up view

AND THERE WERE STATISTICS...

MIT population grew to a near 14,000 with research staff, administrative staff and employees totaling 6,000, instructing staff including faculty and others totaling 2441 (some 1167 of these part-time students) and the undergraduate and graduate enrollment at 6,695 (804 students are from 75 foreign countries, and 19 of them are women)... The January, June and September degrees totaled 1,798; awarded were 776 bachelor degrees, 695 masters, 84 engineers and 243 doctorate degrees. 20 women received degrees in 1962, and a record number --35 graduates--went on to study medicine and become physicians... The Class of 1966 contains 892 freshmen who came to MIT from more than 681 secondary schools and represent all states except Nevada and 18 foreign countries.

Physical Plant reported using 418,930,250 lbs. of steam; 218,510,000 cu.ft. of gas; 2,330,411 gallons of oil; 31,175,000 kilowatt hours of electricity and 485,242,500 gallons of water... The MIT Safety Office estimates that MIT now has 18 miles of corridors in operation and campus acreage stands at 115 acres... Fire extinguishers of all types total 2675 after 225 additions this year... The MIT Credit Union had 400 new members making the total 4,500. The CU loaned \$2,100,000 last year, and its assets stand at \$2,500,000 and shares at \$2,400,000.

Visits to the Medical Department for the fiscal year (1961-62) were upwards of some 4,000 over the previous year with the total at 34,771. X-ray exams totaled 6,334, and 780 electrocardiograms were given. Lab tests totaled 16,362... MIT's Patent Office handled 127 actions on MIT inventions, 23 applications were filed on MIT inventions and 10 patents were issued... The MIT Chapel was the scene of 51 weddings.

Last June, five MIT employes graduated from Lowell Institute School and this fall 47 MIT employes --nearly twice that of last year--began night classes at the tuition-free school... In 1962, 392 MIT employes studied under the Tuition Assistance Plan... And, 120 first-line supervisors and foremen studied the course "Principles of Supervisory Management."

HELP GIVEN

Last Friday (December 28), 45 people at Instrumentation Lab rallied to give blood to replace that used by Sandra Dantona Williams (IL Personnel Office). Sandra was in serious condition at the Massachusetts General Hospital after a bad automobile accident, Dec. 20.

IRELAND-BOSTON HEART STUDY

If you are an Irish-born male between the ages of 30 and 65 --and have a brother living in Ireland--you could be of help to a cooperative project concerning heart disease. Joint sponsors of the project--the Department of Nutrition of the Harvard School of Public Health and Trinity College in Dublin, Ireland--are looking for Irish brothers (one who came to this country 15 years or so ago, the other still in Ireland) in order to continue their work.

All that is required of the volunteer is a 90 minute examination, and all information is confidential. In return, the examining physician will share results of the exam with the volunteer's own personal physician if he desires. For further information, please call John Carley (Office of Personnel Relations) at Ext. 4271.

This experiment which compares the ways of life in Ireland and America on the heart is considered a very important heart study. So far some 20 sets of brothers here and in Ireland have been studied.

FOR SALE ETC.

One Garrard type A turntable, one Shure M7D cartridge, one GE cartridge and walnut box. Roper, 237-0067.

Will sell or trade: 1 boy's 2-wheel bicycle, 18" diameter wheels. Will trade for same size girl's bike. S. Hensel, ext 7422.

Complete dance band drum set "Slingerland" brand, 3rd hand, \$125. Dudley Shepard, ext 4015.

Heathkit model FM4-AM tuner recently aligned and in perfect working order. Heathkit model ACL1 multiplex adapter for above tuner. Very reasonable. Contact 662-8630 evgs after 6pm.

Beautiful strand, larged matched Baroque pearls from Japan. Worth \$250, real bargain, for willing to sell for \$150. Please call Mrs. England, CLearwater 9-8197.

2 Holiday dresses, one red, one gold, size 7, worn once. Call A. Koso, ext 3584 or WA6-1528.

21" Zenith console TV, walnut cabinet, exc cond. 766-6483.

Mahogany bookcases, sectional 7-pieces; 2 left-end, 2 right-end, 2 corner, 3 straight piece, exc cond. \$18.50 each. Mahogany leather top coffee table (20"x38"x17"), \$25. 944-2906.

800x15 snow tires used 2 mos. \$20. Also humidifier used but 2 weeks for only \$35. KI7-1082.

Olds Ambassador trombone, exc slide, relaquered, 1 owner. \$50, will barter. Richard Orr, ext 4970.

Port motorola stereo, 3 channel, 44 watt, 4-speed changer, \$85. Howes, ext 3724.

Encyclopaedia Britannica, last edition. Deluxe (heirloom) binding, perfect condition. WA6-1103 or ext 130.

Gibson classic guitar, Model C-1, exc cond, 6 mos. old. Call Midge Sayward, ext 2917.

Maytag wringer washer all porcelain exc cond. D. Rotondi, Lincoln ext 5782. \$40.

Ironing board, \$1; lady's ski pants size 12-14 navy blue, \$6; lady's ski sweater, handsome & handmade in Switzerland, lovely bright yellow w/cable stitch throughout, \$15. Call Jean, ext 3636 or 3610 days.

1 pair A&T shasta skis w/bindings. 7', \$18. Call Bob Zimmermann, ext 708 or TR6-3876 evgs.

Gulf snow tires, 710x15, exc cond, \$20/pair. Peter Katona, ext 2598 or 491-3893.

Record player, Garrod model 88/4, 4 speeds, never used, perfect cond, \$40. Call Col. Finberg, ext 4471.

'49 Chrysler, 6 cyl, 4-dr sedan in very good cond. Best offer. Call Klaus Scherrer, ext 1726 or TR6-1514 after 7pm.

'50 Chevy, 4 good tires, body rough, black 4-door, make an offer. Jane, ext 5362.

'53 Olds '98 4-dr sedan, 2 fairly new tires. Reasonable running cond, \$65. John Harris, Lincoln ext 2801.

'55 VW sedan, black, new tires & battery, good cond. \$475. Call Paul, Lincoln ext 7726 or JU3-8936.

'56 Buick, perf cond, looks & runs like new. 1 owner. Sale due to death in family. New battery, muffler, tires, wall to wall carpet, \$475. Bill Baynes, Lincoln ext 7559 or 148 Brattle St., Arlington. MI3-5947.

'56 Ford, automatic, R&H, exc mech cond. Leaving MIT, \$200. Ext 2517 or 864-3843.

'57 Hillman 4-dr sedan, R&H, clock, 5 seat belts, blue & cream, \$350. Ext 2276.

'57 Dodge convertible, 2-tone blue, exc cond, a cream puff new vinyl top, power steering. Best offer under \$800. Pete Gordon, ext 3531 or RE4-0525.

'59 Fiat 600. May be seen at 329 Harvard St., Cambridge in back yd. Only 24,000 mi, easy to park. Mrs. Marland, UN8-6215 after 5pm.

'62 Ford conv., black, V8 engine, auto trans, power steering & brakes, vw's, getting married, best offer. Keith, Lincoln ext 5703.

Apt for rent, available Feb. 1. Furn, 4 BRs & bath including lg K. Garage. 93 Hammond St., close to Harvard Sq. \$135/mo. KI7-6382 after 6pm.

New home for rent in West Peabody, 6 rms & 1 1/2 baths, gas heat. \$175/mo. 2 min to Rt. 1. Call MI8-7534.

Ranch home, all improvements on finished street & sidewalks. Large 35,000 sqft lot, 6 rms, 1 1/2 baths. West Peabody, \$18,500. MI8-2700.

Apt for rent, Winchester, unfurn, 3 rms, all util, \$85/mo. Call PA9-0962, evgs.

4 BR house, Concord, 2 1/2 acre lot on Sudbury River. Feb. '63-Feb. '64 rental. Seymour Edelberg, EM9-3995 or Lincoln ext 5308.

In Watertown, 2 rms & kitchenette, clean furn apt for 1 or 2 persons at \$95/mo. If interested call after 6pm at WA4-3848.

Burlington Colonial, 3BRs, 1 1/2 baths, playroom, shelter, 1/2 acre, newly renovated. \$18,000. BR2-2266. Avail in January.

Furn apt for rent in Belmont. 2 BRs, LR-DR-K comb. Bath. 1st floor yd for child. Near stores, schools & transportation. \$160 incl. util. Call exts 2310 or 4774 or IV4-3017 early morn. M. Freeman.

Beautiful, reasonable, convenient apt to share in Brookline w/female. Call Helen, RE4-1798 after 9:30 pm.

Farm for sale, Vermont. Own ski slopes, near Mt. Snow & Hogback. 140 acres mostly wooded and rentable pastures, large "sugar bush" adapted to tapping. 9 rm Colonial, barns & shed. Mod oil heat, forced hot air system. House insulated, slate roof, heatilator fireplace. Glorious, majestic shade maples. 2 brooks & private pond, stocked. David Bobroff, HI3-2919 (Sudbury).

Unusual furn duplex apt in Newton Ctr., on bus line, knotty pine LR, fieldstone fireplace, mod K, 1 BR, garden, country atmosphere. \$135 incl all utilities. LA7-1159.

Unfurn apt for rent, 3 RMs, Cleveland Circle area. LO6-9584.

3BR, 2 1/2 bath Colonial home on private street on West Newton hill. Call ext 726 or BI4-5788 evgs.

Female rmmate wanted (22-26 yrs) to share Harvard Sq. apt. Diane or Corinne, TR6-4826 evgs.

Wanted: Girl to share attractive Bay State Road apt, 23-25, 2 other girls. Call CO2-1217 after 6pm.

Wanted: Baby crib (std size) in good cond, w/mattress. Call UN4-4732 evgs.

Wanted: A parking space in vicinity of Post Office, Mt. Auburn St., Cambridge. Ext 3210 days or EL4-3238 evgs.

Wanted: 4th rmmate (female) for spacious Beacon Hill apt. Avail Jan. 1. CA7-8692 evgs.

Tutor wanted, college algebra & trigonometry. Call Surge Dumanian after 6pm Tues., Wed or Thurs. MI8-8393.

Ride wanted from No. Wilmington to MIT. Bob Mills, ext 2193.

Wanted: Thesis typing. Mary, ext 2169.

Wanted: Ride from Arlington, either morning only or morning and evening. I live on Hayes St., which runs from Medford St. to Mystic Valley Pkwy, near lower Mystic Lake. Please call ext 669, Mrs. Edwardson.

Wanted: A free, late-model, Baldwin Spinnet piano. However, will settle for reasonably small piano free in good playing cond. Will pay all moving expenses of course. Call ext 4014 or DA6-3206.

Wanted: Furn apt for British graduate & wife, for 6/7 wks from Jan. 14th. Prefer LR, BR, K & bath, w/parking. Please call P. Redpath, ext 2942 after Jan. 7. Thank you.

Expert typist avail. Any kind of typing wanted. Hildred, Lincoln ext 7713 or 7317 for further details. Thesis typing--a speciality.

LOST: A box of colored slides on Mass. Ave., between Central Sq. & MIT. Sandy, ext 2168.

IT CAN BE DONE

Pat Youtz' Group 24 (Vacuum Tube Engineering) at Lincoln Lab's Lexington Field Station are firm believers in good housekeeping as one of the paramount rules of safety. Ever since the group moved from the Barta Building to the Lexington Field Station in 1960, it has maintained a model laboratory. One can enter the converted bomb-proof flight control center of World War II vintage at any time and find unobstructed corridors, good work practices, adequate safety equipment and a neat workplace as a matter of everyday routine.

The use of hazardous materials and equipment is commonplace in this lab. Such things as large quantities of hydrogen, chemicals, high temperature furnaces, vacuum equipment, glassware and machine tools are in use constantly. However, due to insistence on safe laboratory conditions and work practices, the group has compiled an excellent safety record with a few injuries over an extended period of time.

With a little effort and cooperation of all members of a group, almost any laboratory or work area can be converted to the high standards set by the Lexington Field Station.

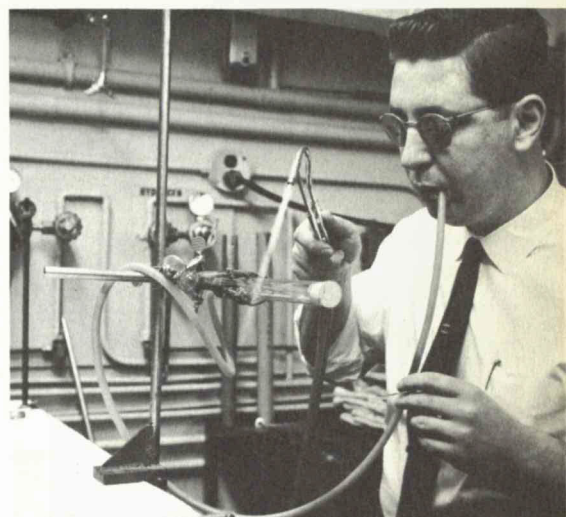
M.I.T. SAFETY POLICY

It is the policy of the Institute to provide a safe working, teaching, and recreational environment for the M. I. T. community.

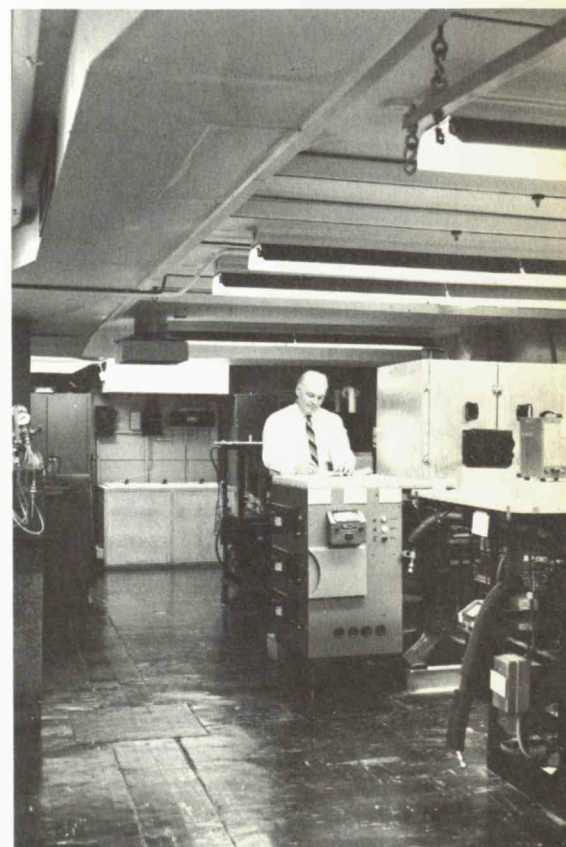
Faculty, administration, and research and supervisory personnel are responsible for safe practices and for providing safe equipment and facilities for members of the staff, students, and visitors.

Each person using the equipment and facilities of the Institute is expected to follow proper and safe procedures, to report accidents promptly, and to bring to the attention of supervisors and faculty members any unsafe conditions or practices.

J. A. Stratton
President



Jim Blasi, a technician at the Lexington Field Station, prepares a tube for a T connection.



Ted Clough of Group 24 makes an entry in the experiment notebook. All is clean and neat.

DISPOSAL SERVICE FOR CHEMICAL WASTE

A disposal "pick-up" service for hazardous chemical waste is now available (on a trial basis) to all laboratories utilizing chemicals. Persons desiring assistance in disposing of these chemicals may call MIT extensions 762 or 736, giving name, room number, type and volume of chemicals. Arrangements will be made to collect and assist in packaging all chemicals to be discarded.

BOSTON POISON INFORMATION CENTER

While fatal accidents to children under five years of age are due largely to motor vehicles, fires, and drownings, there are still too many deaths (463 reported in 1955) due to accidental poisonings. As one authority puts it (referring to your child), "He will taste, touch, chew, bite, and swallow every article he can reach-- and he can reach them all." Also, "Remember your child can't read poison labels any better than a rat can," and furthermore, "You have probably taught him that he can win approval by putting anything in his mouth except his thumb... so he reaches ant-paste, sprays, lye or medicine."

It is reliably reported that about 250,000 products used in American homes and industries are potentially harmful if not used properly. As technical refinements unfold, these household products are increasingly complicated so that identification becomes difficult. Certain laws protect our competitive economic system so that trade names are used, adding to the problem of knowing what precisely is in a given material. It is true that other laws require careful labelling when certain poisons are ingredients. A curious aspect of human nature is disregard of warning labels and failure to lock harmful materials away from children.

What to do in the event of accidental ingestion or exposure, suspected or witnessed, with or without ill effects? Originally, the American Academy of Pediatrics, now acting with the Department of Public Health, and here in Boston, with the Department of Legal Medicine of the Harvard Medical School and the Massachusetts College of Pharmacy, developed what is known as the Poison Information Center. There are 30 such centers in the United States. The Boston Poison Information Center is located at the Children's Hospital Medical Center at 300 Longwood Avenue in Boston. Service is on a 24-hour basis for your physician or community hospital. Among others in this area the MIT Occupational Medical Service of the Medical Department helps answer unusual questions for the Poison Center. So in the event you need help call your doctor first, and if he is not available, the nearest hospital for advice as to what to do. You will know that every doctor in the state knows of the Poison Center. And you may phone directly for advice (BEacon 2-2120). The only charge is the cost of long distance phone calls.

The best advice of all is for you to be wise and far-seeing in preventing accidental poisonings in your home.

HANDY BOOKLET

Information about flash points, explosion limits, autoignition temperature, and other related data concerning fire and explosion hazards of flammable liquids, solids and gases, is now available in handy compact form. The Safety Office has obtained a limited number of reprints of the chapter on flammable liquids, gases and solids from the Handbook of Industrial Loss Prevention, and will distribute them on request. This booklet gives properties of over 800 hazardous chemicals, as well as explanations of the various terms used. Anyone desiring this pamphlet should call the Safety Office.

Safe Talk is published by the MIT Safety Office, Campus Exts. 736, 5246 and Lincoln Lab Ext. 7886.

EMERGENCIES

Write in the telephone numbers you will need in case of emergency

POLICE _____

FIRE _____

AMBULANCE _____

DOCTOR _____

COAST GUARD (Search and Rescue) _____ 227-3710

POISON INFORMATION CENTER _____ 232-2120

RESCUE INC. (devoted to the prevention of suicide) _____ 426-6600

OR dial Operator, and say, "I want to report a fire in (town name)," or "I want a policeman in (town name)," etc.

IF you cannot stay at the telephone, tell the operator the exact location where help is needed.

F. B. I. Federal Bureau of Investigation, call 542-5533

From the first page of your Telephone Directory