

## Institute Will Train 20 Reserve Pilots In C.A.A. Program

### Definite Scholastic Requirements Are Set

Twenty Technology students will receive ground instruction and flight training in the Civil Aeronautics Authority's trial project. President Karl T. Compton announced recently.

The C.A.A. has established experimental programs at eight colleges, of which Technology is one, in order to determine the long-range possibilities of President Franklin D. Roosevelt's plan to train 20,000 pilots a year. The project is financed by a \$100,000 allotment from funds of the National Youth Administration.

The Institute will make an initial selection of seventy students and out of this group the Civil Aeronautics Authority will choose the final twenty. Technology is to provide ground school training through the department of Aeronautical Engineering.

(Continued on Page 4)

Air Training

## Tech Man Wins Meisinger Prize

### Weather Forecasting Work Gets \$100 Award For Graduate Student

Jerome Namias, research assistant at Technology, has been awarded the Meisinger Award of \$100 for an outstanding contribution to the science of weather forecasting, it was announced by the American Meteorology Society.

Namias' research consists of a new method of analyzing the temperature, pressure, and humidity measurements made by means of airplane flights and instrument-equipped balloons. The method makes it possible to follow air currents from day to day by means of the temperature and humidity characteristics. This is accomplished by drawing weather maps representing, not fixed horizontal surfaces in the atmosphere, but surfaces along which air is constrained to flow. Such surfaces, while nearly horizontal, are

(Continued on page 2)

Meteorology

### Biography Changes To Be Made At Technique Office

Seniors who are desirous of making any changes in or additions to their biographies for the 1939 Technique should do so immediately. These alterations can be made in the Technique office, Room 309, Walker Memorial, after 2 P.M. during this week only.

## T.C.A. Sponsors Occupation Study With Talk Today

### Professor Alexander Magoun Will Address Freshmen In Room 6-120

"To give the student a scientific technique which will be a good method for determining where his true abilities lie will be the main purpose of my talk," stated Professor F. Alexander Magoun regarding his lecture to freshmen on "How to choose a career" at 4 and 5 o'clock this evening in Room 6-120.

Professor Magoun will not compare the relative merits of the courses offered by Technology but will approach the subject from the fundamentals, trying to break down the many prejudices surrounding various occupations. He said that men fail because of a combination of ignorance of self and ignorance of what a job requires; the problem is to find a satisfactory means of self inventory.

#### Magoun Well Qualified

Many year's experience with Technology men and contact with leaders in industry who have expressed their opinions as to what qualities a man should have to make a success in industrial positions will serve as a basis for this talk, which is similar to one presented by Dr. Magoun to the student body at Cooper Union in January. The address will be illustrated by examples of many prominent people who have had difficulty in choosing their life's work.

This talk, the first activity sponsored by the T.C.A. Course Counseling Committee this year, is intended to be of interest not only for the student who has not yet chosen his course but also for the student who would like to learn more about his chosen field.

## Dorm Dinner Dance Friday

### Open House Till Midnight And Early Morning Breakfast

Swinging to the strains of Don Gahan's orchestra, dormitory residents and their guests will enjoy the annual dinner dance to be held in the Main Hall of Walker Memorial this Friday evening. In keeping with the custom of previous dances, Open House will be observed in the dormitories from 5:30 P.M. until midnight, while after 12 the Burton Room and the Crafts Living Room will be open until 3:30 A.M.

An unusual feature of the evening will be an early-morning breakfast to be held at 2:00 A.M.

#### Well Known Here

Well known locally, Gahan's Band is no newcomer to Technology, having played at the Open House all last spring, and at other Technology dances.

Among the guests who have been invited to attend are Mr. and Mrs. Delbert L. Rhind, Professor and Mrs. Leicester F. Hamilton, Mr. and Mrs. Horace Ford, President and Mrs. Karl T. Compton, Dean Harold E. Loddell, Professor Avery A. Ashdown, and Mr. Jack Wood.

The committee in charge of the dance is as follows: Harold J. Muckley, '39, Chairman; L. Hurley Bloom, '40; Robert Grosselinger, '40; Edward M. Wallace, '40; James L. Hall, '41; G. Willard Mott, '41; and Thurston S. Merriman, '39.

## Burchard Speaks On Life Housing

### Addresses Shelter Conclave At Yale University February 1

At the Yale-Life Magazine Conference on House Building Techniques, Professor John E. Burchard, director of the Albert Farwell Bemis Foundation, delivered an address entitled "Research Programs for Shelter". The purpose of the meeting was to bring together prominent technicians and men interested in the field to exchange ideas and develop constructive programs. The paper, given at Yale University on February 1, deals mainly with the creation of a council

(Continued on Page 3)

Housing

## Members of '40 Buy Every Dance Option; General Sale Is Off

### Refugee Committee Asks Volunteers To Aid Work

According to William G. Hagenbach, '40, chairman of the Refugee Committee, volunteers are wanted to aid in the program to assist refugees who have been awarded scholarships at the Institute. The only requirements are that the volunteer be genuinely interested in the work. Interested men are invited to sign up in the T.C.A. office as soon as possible.

## Vannevar Bush Awarded \$2500 For Achievement

### Develops Computing Device At The Institute To Win Recognition

An award of \$2500 in recognition of distinguished scientific achievement was presented to Dr. Vannevar Bush, former vice-president of Technology, and president of the Carnegie Institution of Washington, by the Research Corporation last Thursday night.

Professor Hugh S. Taylor, head of the department of Chemistry at Princeton University, was also awarded \$2500 for his work in the field of chemical catalysis.

#### Bush Honored for Analyzer

Dr. Bush was honored for the development of a group of mathematical computing machines at Technology, including the now famous differential analyzer. The presentations were made at a dinner of the Board of Directors of the Research Corporation at the Faculty Club of Columbia University.

Presentation of the award to Dr. Bush was made by President Karl T. Compton of the Institute. Speaking of Dr. Bush's contribution to the solution of complicated mathematical problems, Dr. Compton said: "Machines have taken much of the burden of manual labor from mankind and have enabled him to perform feats which would have been utterly impossible without mechanical aid."

Dr. Compton continued by stating that labor-saving devices are useful not only in the field of manual labor, but also in the fields of scientific research.

## Juniors Only Buyers For First Time In History

Snapping up every one of the 450 options for the Junior Prom to be held in the Imperial Ballroom of the Hotel Statler, March 3, the class of '40 drained the available supply, making it necessary to call off the general sale which had been scheduled for this month.

This is the first time in the history of Technology Junior Proms that the entire sale has been bought by the sponsoring class, according to the Prom committee.

#### Breaks Record

This breaks the previous record set last year when all the tickets placed on sale to the general public were sold eleven minutes after the sale opened.

The options may be redeemed for tickets sometime near the middle of this month, a definite date being an-

(Continued on Page 4)

Junior Prom

## Refugee Aid Drive Commences Soon

### Yearly Living Expenses Set At Five Hundred Dollars For Each Man

The Technology Refugee Committee's drive for funds will start officially next Tuesday, February 14, with the distribution among the students and Faculty of the Institute, of printed matter describing its aims.

The Corporation has voted scholarships for five German refugee students provided that outside aid could be secured for their living expenses. The Committee hopes to secure the total amount through student and faculty support. If, however, enough is not received, as many of the five students are to be taken care of as will be possible.

Unsolicited contributions of over \$100 have already been received by the Committee as have been promises of jobs for the foreign students. It

(Continued on Page 4)

Drive

## Plan To Establish "Center Of Mathematical Analysis" Will Put Famed Differential Analyzer To Practical Use

That differential analyzer is here again. But this time it appears in a new role. It is no longer to be merely an interesting topic for bull sessions and newspaper feature stories. No more is it to be an Open House curiosity, its operation restricted to a handful of mathematical wizards who understand its intricate mechanism. The differential analyzer is henceforth to be put to practical use in solving the complicated problems of industrial engineering.

President Compton last week announced the plans for putting the analyzer to work. A grant of \$45,000 by the Carnegie Corporation of New York will make possible the establishment of a center of mathematical analysis at the Institute to direct the use of new types of highly comprehensive calculating machines, including the analyzer, for industrial purposes.

#### Staff To Be Formed

Recommended by the Committee on Scientific Aids to Learning of the National Research Council, the project includes the organization of a staff to operate the various machines developed at the Institute to implement the mathematical work of scientists and engineers.

#### To Aid Industry

According to present plans, the center of analysis is being founded for the purpose of encouraging and assisting technological work in all industrial fields by making available to institutions and industry itself the means of carrying out intricate mathematical processes economically.

The center, however, also desires to carry out a program of active development on new machines and the corresponding analytic methods of using them.

#### Many Machines Available

Besides the original differential analyzer, equipment which will be available through the center of analysis will include a new, larger, faster and more accurate analyzer which is now under development at Technology, both of which make possible the solution (although only to those who know how) of many difficult problems involving differential equations and integrations; the cinema-integraph; the nth work analyzer; the simultaneous calculator; a group of punched-card machines; and miscellaneous types of intricate calculating machines.

The organization of the center of analysis will be started at once. It is expected, furthermore, that by next fall the analyzers and calculators will be clicking away, solving industry's mathematical problems mechanically, swiftly, economically.

## European Architect Will Speak Tomorrow Night

Antonin Raymond, European architect who has just arrived from Japan where he has practiced for many years, will address the students of the School of Architecture of the Massachusetts Institute of Technology tomorrow evening, in the William Emerson Room.

During his career in Japan, Mr. Raymond developed a number of important buildings, including the residence of Viscount Saito, the Toyko Country Club, the embassies of France and Russia, and a number of commercial buildings for large oil companies of the East. He has developed a style of architecture to meet the requirements of Japanese life, including those imposed by earthquake hazards.

## Military Society To Hold Annual Pinning Ceremony

Scabard and Blade, honorary military fraternity, will conduct its colorful Pinning Ceremony at its annual Military Ball, scheduled for February 21, at the Hotel Commander in Cambridge. The central figure of the ceremony is to be Miss Elizabeth Kearns, who will decorate the 18 Juniors and 3 Seniors recently elected to the society.

Miss Kearns will be dubbed "honorary colonel", the title traditionally bestowed upon the partner of the presiding officer of the M.S. Corps, this year Michael V. Herasmichuk, '39.

Ken Reeves and his orchestra have been engaged to provide music for the occasion.

# The Tech

Vol. LIX Tuesday, February 7, 1939 No. 1  
 MASSACHUSETTS INSTITUTE OF TECHNOLOGY

**Managing Board**  
 General Manager ..... William S. Kather, '40  
 Editor ..... John G. Burr, Jr., '40  
 Managing Editor ..... Phelps A. Walker, '40  
 Business Manager ..... J. William Blattenberger, '40

**Editorial Board**  
 Robert K. Deutsch, '40 ..... Wylie C. Kirkpatrick, '40  
 Russell T. Werby, '40

**Associate Board**  
**Assistant Editors**  
 Clayton K. Baer, '41 ..... Frank J. Jerome, '41  
 Adolf Bertsch, '41 ..... Raymond F. Koch, '41  
 Harold E. Dato, '41 ..... Martin Mann, '41  
 Howard J. Samuels, '41

**Business Associates**  
 Donald B. Cameron, '41 ..... Ben K. Duffy, '41  
 Cranmore W. Cline, '41 ..... Howard A. Morrison, '41  
 Staff Photographer ..... Robert K. Prince, '40

**Offices of The Tech**  
 News and Editorial—Room 3, Walker Memorial, Cambridge, Mass.  
 Telephone KIRKland 1882

Business—Room 301, Walker  
 Telephone KIRKland 1881

SUBSCRIPTION, \$1.50 Per Year  
 Published every Tuesday and Friday during College Year,  
 except during College vacation.

Entered as Second Class Matter at the Boston Post Office  
 REPRESENTED FOR NATIONAL ADVERTISING BY  
**National Advertising Service, Inc.**  
 College Publishers Representative

420 MADISON AVE. NEW YORK, N. Y.  
 CHICAGO · BOSTON · LOS ANGELES · SAN FRANCISCO

1938 Member 1939  
**Associated Collegiate Press**

Distributor of  
**Collegiate Digest**

Night Editor: Edward F. Thode, '42

ent, the estimated number of prospective refugees in Europe is several millions; and the number now attempting to re-establish themselves in other parts of the world is not more than a few hundred thousands.

Compare those numbers with the ten million or so destitute in this country, and the plight of those in Europe becomes a little less pitiful.

Gigantic efforts are being made to relieve the situation of our own ten million, but what part of these efforts are being directed towards giving them a better chance at higher education—and there are thousands within our own boundaries who want it and are worthy of it.

In these days of depression when most colleges are reducing scholarship aid to native Americans, why are so many of them bending over backwards to extend that aid to unfortunate foreigners? It is a truly Christian act to support these refugees until they are able to get on their own feet, but it is mistaken charity to extend to these unfortunates benefits which we are backward in offering our own.

There is no need to go so far afield to find people to help. Consider the plight of those students here at the Institute who are financially just barely able to get by, even with the assistance of part time work; students who are driven by a great enough enthusiasm for their field to suffer considerable privation and hardship in order to get into it. These students have proved that they can appreciate and make the best of professional training—not everyone can. Would it not be far better to devote the efforts now going to the benefit of refugees of naturally doubtful ability and interest to those of our student body who have proved their need and capacity for making the best use of assistance.

Refugees of recognized merit—teachers, scientists, musicians and the like—who have proven their value to the world, should most certainly be taken to our collegiate bosom. They are a potent weapon in the hands of democracy. But we have no ethical right to assume that refugee students are more deserving of professional training in our colleges than needy students of the same educational plane from this country.

The point pertinent to this discussion is not that of offering help to the refugees, but the degree of help which we offer. We should not hand them benefits which we do not offer to our own unemployed.

## SCIENCE IN BRIEF

By ARTHUR M. YORK, '38  
 Fluorescent Tubes

About the greatest thing in modern lighting is just hitting the market in the form of fluorescent tube lamps. Since, at 32 to 35 lumens per watt, they have approximately twice the efficacy of the best incandescent bulbs now in use, they are expected to receive ready acceptance and approval for many lighting purposes. Because they emit light nearly equivalent to sunlight in composition, there are many locations in which they have already become indispensable. Simple in construction, with no filaments to burn out, these lamps are simply mercury arc lamps with the interior of the tubes coated with a fluorescent material. The light from the mercury arc, much of which is ultraviolet, causes the coating to fluoresce and emit light in the visible region. By varying the composition of the coating, many different colored lights suitable for decorative and ornamental purposes may be obtained. The green light is the most economical with an efficacy of about 75 lumens per watt. (1)

### Microfilm for Notes

One of the many uses for the newly-developed microfilm will be the recording of scientific papers to serve as references for scientific research workers. Thus much of the tedious labor and inconvenience of taking notes will be eliminated. Likewise, errors which are now occasionally incurred during the transfer of information by notes will be done away with and direct comparison of various works will be easily possible. (2)

### Newspaper by Air

The day when we shall no longer even have to go to the door to pick up the paper left by the newsboy seems to be in sight. The method of transmitting facsimile newspapers by radio is rapidly becoming more and more practical. The St. Louis Post Dispatch has already inaugurated a regular facsimile newspaper service which employs an ultra-high frequency radio station and transmits a nine page paper at the rate of four pages an hour. (3)

For more complete discussion of the above items, consult recent periodicals as follows: (1) Boston Globe, Feb. 5, 1939, p. 40; (2) Science, Jan. 13, 1939, p. 32; (3) Technology Review, Feb., 1939, p. 157.

## Reviews and Previews

**SYMPHONY HALL**—The Boston Symphony Orchestra, after devoting the coming week to a visit to New York, will give the next regular pair of Symphony concerts in Symphony Hall on Friday afternoon and Saturday evening, February 17 and 18. Serge Koussevitsky will then present for the first time here the Second Symphony of William Schuman, a native of New York City, who has composed a number of chamber works. The Third Symphony of Sibelius, in C major, will also be played, and the third piano-forte Concerto of Beethoven, in C major. Myra Hess will be the soloist for this programme.

Miss Hess will likewise appear as soloist at the fourth pair of concerts of the Monday evening and Tuesday afternoon series to be given on February 20 and 21.

**COPLEY**—Entering its second week here is the latest presentation of the Federal Theatre, *Macbeth*. Shakespeare's classic has been streamlined by Elliot Duvy and stars Glenn Wilson in the title role. Elsa Taschko is featured as Lady Macbeth, Basil Burwell as Macduff, Harry E. Lowell as Banquo, and William Warren as Duncan. Your reviewer recommends *Macbeth* as the sort of drama you'll really like.

**FINE ARTS**—Grand Illusion is probably the finest World-War motion picture yet made, more truthful than any other, more intimately revealing human nature, and nobler in spirit. This is a picture that does not minimize the brutalities of war, and yet it has an infinite sympathy and tenderness that one feels as he does the overtones in music, so that it is quite true to say that Grand Illusion has a soul.

**KEITH MEMORIAL**—Gunga Din with Victor McLaglen, Cary Grant, and Doug Fairbanks, Jr., ranks as one of the most pretentious screen spectacles of recent years. Joan Fontaine has the principal feminine role, with Sam Jaffe, Edouard Cianolli, Robert Coote, Montague Love, and Abner Biberman heading the huge supporting cast.

**RKO BOSTON**—Stardust Revue of 1939 Benny Davis' new show starts here Thursday. The Long Shot with Gordon Jones and Marsha Hunt, and Tough Kid starring Frankie Darre are the screen attractions.

**EXETER**—Bette Davis and Errol Flynn in *The Sisters*. Also Glenda Farrell and Otto Kruger in *Exposed*.

## Meteorology

(Continued from Page 1)

continually shifting in position and the air particles tend to move along them.

From a knowledge of the moisture content of such surfaces meteorologists are able to distinguish the moist and dry tongues of air which are continually curling around one another, forming flow patterns and eddies of different size similar to the eddies formed in streams of water. Information of this nature greatly increases the accuracy of weather forecasting.

### Namias Long Interested in Meteorology

Namias has been interested in the subject of weather forecasting ever since he graduated from the B.M.C. Durfee High School in Fall River, Mass., and has been a member of the research staff of the Institute meteorological laboratory for several years. He has devoted himself to the studies of the atmosphere which resulted in his important contribution to weather forecasting.

### First Meisinger Award

The Meisinger Award, presented for the first time this year, was established in memory of Dr. Clarence Leroy Meisinger, a pioneer in the use of balloons to study the nature and behavior of the upper atmosphere. Dr. Meisinger was unfortunately killed when his balloon was ignited during a thunderstorm in 1924.

American Meteorology Society has set up an annual award of \$100 each year, to be made to outstanding workers in the field of weather forecasting. The award is open to all citizens of countries in the western hemisphere, but preference is given to younger workers in this field.

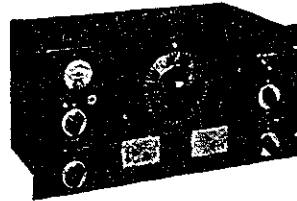
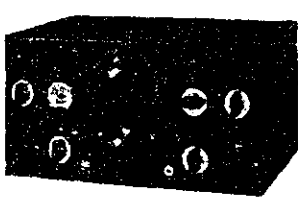
## Just across the way

Students, we serve  
**Special Hot Luncheons**  
 As Low As 25c  
 All Home Cooking  
 Done by Women  
 "You will like our food!"  
**CORNER TEA ROOM**  
 136 Mass. Ave. at Vassar Tel. Kir. 9693

**Boit, Dalton, and Church**  
 89 BROAD STREET  
 BOSTON  
 INSURANCE  
 OF  
 ALL KINDS

**ELIOT FLOWER SHOP**  
 Specializing in  
 Corsages  
 Special Rates to Tech Students  
 87 MASS. AVE., BOSTON  
 KEN 6470

**COMMUNICATION RECEIVERS**

 NATIONAL HRO The choice of the discriminate operators \$179.70 and up. Request Literature.	for COMMERCIALS HAMS and BROADCAST LISTENERS	 NATIONAL NC101X A distinctive ham receiver of outstanding fine quality \$129.00 complete Folder on Request
HOWARD Sensational Model 430 6-tube set only \$29.95 438—8 tubes — \$49.95	NATIONAL NC100 Complete frequency range. \$120.00. An exceptional value.	NATIONAL Newest NC44 Economy Model \$44.50 complete.

Our Liberal Time Payment Plan Is Available  
**H. JAPPE COMPANY**  
 46 CORNHILL · BOSTON, MASS.  
 TEL. LAF. 0510-0511-0518  
 Where You Can Purchase With Confidence

## RING IN THE NEW

"The old order changeth . . ." and with this issue, the first of Volume LIX, a new order begins. It is a new order, however, only superficially; since in the course of years the background built up by The Tech becomes less susceptible to change. The imponderable influence of tradition sits invisibly on the masthead indifferent to changing names written thereon.

But constant as the general policy of The Tech may be, naturally with the flux of the staff members comes a change in the expression of that policy, a flow of comment and interpretation.

And so we renew the age-old pledges of the newspaper to its public: to present information clearly and impartially; to comment on that information in the most logical and sane light at our command; not to remain neutral on all questions, but to fight fairly and with all the power we possess what we consider wrong; never to prostitute these columns to the services of malice and personal venom; to carry out our duties in such a way that we may think and speak of them proudly always; to serve as a standardbearer for those forces which make for a cleaner and saner world; and to put forth a publication which is all the above and at the same time readable and interesting.

It is inevitable that we shall make errors to a great or small degree during the coming year, but those errors will always be ones of ignorance, never of intent; errors demanding correction and regret, but never shame.

## DON'T STARVE PETER

TO FEED PAUL

The man who neglected his family to feed the beggars on the street would not be held up as a hero. By his marriage vows he has contracted to provide for his family before all, before himself.

And yet the recently established Refugee aid committee is attempting just that sort of thing. Our government is contracted to provide for our people before all others, and those of our people who are in the position to extend aid must remember that they are a part of our government, and that the plight of our people is their problem before and above the plight of the people of any other nation.

There can be very little doubt of the genuine humanitarianism in the plan of providing a sanctuary for a few of the unfortunate souls now being hustled out of Europe. However the startling unusualness of the reasons for their exodus tends to exaggerate the absolute magnitude of their trouble. At pres-

# M. I. T. Varsity Takes Second At Millrose; Frosh Win At K. of C.

## Varsity Wins Over Syracuse And Columbia

Technology crossed the finish line ahead of Syracuse and Columbia but bowed to Colgate in a one mile college relay at the 32nd Annual Millrose Games in Madison Square Garden last Saturday night.

One week earlier at the Knights of Columbus meet in Boston, Tech freshmen outran Tufts and Boston University in another mile relay while the varsity dropped its race against Yale by only an inch!

### Tech Third at Three Quarters

George Clark, Lewis Jester, Toivo Kyllonen, and William Wood ran for Tech in the Millrose Games. Syracuse and Colgate took the lead at the start with Tech and Columbia trailing. For about six laps that order prevailed, but at the three quarter mark Kyllonen had nearly pulled Tech into second position as he passed the baton to Wood.

They went into the last quarter—Colgate, Syracuse, M.I.T., Columbia. Going into the gun lap Wood began to pull up on the leaders and with a final burst of speed passed Syracuse but was unable to make up for Colgate's lead. Time for the race was comparatively slow — 3:30.6. Tech's time was 3:31.8 with quarters of 54.2, 53.2, 52.4 and 52 flat.

### Tech Sprinter Pulls Muscle

Rudolph Hensel, '41, was all set to run in the first heat of the 50 yard handicap dash when he pulled a muscle while practicing starts. There is some satisfaction in the fact that he was given only two foot handicap while Columbia, St. Anselm, and Millrose sprinters had at least five.

In the Knights of Columbus meet freshmen Smith, King, Gow, and Brady, running in that order, defeated Tufts and B. U. in 3:41.2. Gow and Brady slipped as the baton was being passed to the anchor man but Brady turned in a beautiful quarter and was yards ahead of Tufts at the tape.

### Yale Wins By Inch

Wood opened up a lead for Tech in the Yale race, but the team from New Haven gradually crept up on Jester and Kyllonen and were even with Clark as in the final quarter. Yale's anchor man sprinted into the lead on the last backstretch and fought off Clark's finishing spurt to win by an inch in 3:31.6.

## Housing

(Continued from Page 1)

for the investigation of the housing problems of the lower bracket income level.

### Outlines Problem

"Shelter research needs a coordinated program with specific objectives . . . attainable in a reasonable space of time and without fantasy", declared Professor Burchard. He also stated that the research project was becoming more and more needed and would take many years to solve. Though there has been constant demand, no one has developed a cheap and efficient type of house to meet incomes less than \$1,200, he pointed out.

### Proposes Possible Solution

Professor Burchard suggested, "Such programs can only be developed through a controlling mechanism . . . already proved effective in other research problems . . ."

**New Clothes for Rental**  
**READ & WHITE**  
 111 Summer St. BOSTON

## Hedlund Predictions Come Close In Most Events

BY LESLIE CORSA, '41

We met Oscar Hedlund down in New York before the Millrose Games last Saturday and asked him what he thought would happen in the major events. Without even batting an eyelash he reeled off his predictions in nine events.

Tech's mile relay team followed its coach's forecast to the dot by taking second place in a race against Colgate, Syracuse and Columbia. Colgate won in 3:30.6.

### Beetham Falls

Only a tragedy prevented Oscar's prediction for the 880 from coming true. He forecast that Charlie Beetham would breeze across the tape in 1:54.6 and sure enough Charlie was well ahead at the final turn when he slipped and fell on the new gray and red Millrose boards and looked up bewildered as Francis Slater of Fordham tore past him to win in 1:54.7.

Oscar was no more surprised than most of the other 16,000 fans in the Garden when Roy Staley of Southern California A.A. sped over the 60 yard high hurdles three times in 7.3 seconds for a new world's record. Allan Tolmich for whom Oscar had predicted victory equalled the old record of 7.4 set at Millrose last year but was unable to beat Staley.

### Oscar Misses

Cagle was going to win the Millrose 600 in 1:11 according to Oscar, but Wesley Wallace, another Fordham boy, took the race in 1:12.3.

Glenn Cunningham outkicked Chuck Fenske on the home stretch of the Wanamaker Mile just as Oscar predicted but his time, 4:13, was 2.6 seconds slower than the forecast.

### Tragedy Intervenes Again

Accident upset Oscar in the two mile event as Don Lash, coming up the backstretch so fast that the rest of the field appeared to be standing still, collided with Dodds on the final turn and was only able to push into second place behind Gregory Rice of Notre Dame.

John Borican of New Jersey came through in the two-thirds run in 2:39, 3.8 seconds faster than Oscar expected him to. As forecast, he broke the world's record of 2:43.6 established at the Millrose Games of 1923.

Oscar predicted results of only two field events—Warmerdam to win the pole vault at 13' 9" and Albritton and Walker to tie for the high jump. Ganslen of Columbia and Earle Meadows of Southern California A.A. outvaulted Warmerdam while Walker triumphed over Albritton by 3/8th inch.

## SHORTS ON SPORTS

HOWARD J. SAMUELS, '41

### IN THE FIRST TEN

Each year before the basketball season has even a chance to get into swing, basketball experts come out with ratings such as those picking the first ten football teams in the United States. The experts from the Boston papers were busy during vacation making the basketball ratings for the teams in New England. Each rating put the Tech team in the first ten New England teams. The closest the Tech team came to the top was when they were given second place to Rhode Island State by one of the papers. Next week, which throws the quintet against two of New England's strongest teams, Boston University on Wednesday and Brown on Friday, will show just how deserving the quintet was of their high rating.

### THE 1933-1934 SEASON

The rating of the Tech team behind Rhode Island State brings memories of the 1933-1934 season when the Tech quint hung up the amazing record of ten wins and two losses. It was in that year that a Rhode Island State team came to Tech as an undefeated team which had been gaining All American recognition. Much to the dislike of the Rhode Island Coach and much to the delight of the Tech fans, the Rhode Islanders came out on the smaller side of the 40-32 score.

That, however, was a banner year for Tech sports, as a Tech man set a record in winning the seventy yard dash in the I. C. 4-A meet. The same year two Tech men won titles in the New England Wrestling meet, while a Tech cross country man placed second in the New England and seventh in the National Harrier meets. To top this off, the crew and soccer team had very successful years.

### OSCAR'S NEW RECIPE

From the congenial track coach comes the newest plan on "HOW NOT TO FLUNK OUT OF SCHOOL." "Never in my coaching career at Tech have I had a varsity man leave school because of scholastic difficulty. The reason for this probably lies in the healthy bit of exercise that each track man gets every day," said Coach Hedlund. After the success of his teams so far this year it looks as though Oscar's success runs in more than one field.

### THE CRUCIAL WEEK

Next week might well be called the "Crucial Week" in the sport calendar at Tech. The basketball quintet plays the first games in the toughest part of their schedule, the wrestlers have two meets which will decide the success of their season, the hockey team continues its league schedule, and the gym and rifle teams both see action.

## Army Crowds Out Hockey Team, 4-2

## Ice men Will Battle Boston U. At Boston Arena On Next Tuesday

Fighting a fast and tough battle on ice, the hockey team lost out to Army with a final score of 4-2, last Saturday night. The mid-season game was played on Army's indoor rink at West Point.

Held scoreless for three quarters by the Army ice men, the team broke through and piled up two goals in the last few minutes of play. Both points were made by John Neil, '41, assisted by Drury and Hilliker. The game marked the first appearance of Jim Gordon as goalie.

For its next game the team will meet Boston University at 8:00 P.M. next Tuesday night at the Boston Arena. In light of past experience, the game should give the Tech men some stiff competition since in a previous tangle, B. U. led out Tech with a margin of 8-3. With a much improved team, though, the Beavers are out to win.

## Required Textbooks Are In Demand, Says T.C.A.

The Technology Christian Association announces that there is a great demand for required textbooks, and that any person wishing to sell his old books can find many prospective buyers through the medium of the T.C.A. Book Service. M.I.T. students have long enjoyed the benefits of this branch of the association, and its popularity is increasing greatly year by year. This Service is conducted in the outer T.C.A. office.

## CORNER COFFEE HOUSE

86 Mass. Ave. Boston

Breakfast 20c and up  
 Luncheon 35c and up  
 Dinner 50c and up

Also a la Carte

Counter & Dining Room Service  
 Open 7:30 A.M. to 3 P.M.  
 Closed Sundays

## FLY WITH WIGGINS AIRWAYS

At Two Conveniently-Located Airports  
 MODERN PLANES — VETERAN INSTRUCTORS  
 Municipal Airport East Boston EAST Boston 2030  
 Metropolitan Airport Norwood CANTON 0210

## Ski Team 3rd In N. H. Meet

## Aschaffenburg Garners Individual Honors At Carnival

Competing in the University of New Hampshire Carnival a greatly improved Tech skiing team placed third in the downhill and slalom skiing events, which were held at Gilford, N. H.

Placing behind only Dartmouth and the University of New Hampshire, the team was paced by Hans Aschaffenburg, '42, who placed second in the Slalom event and eighth in the downhill event. Most consistent man on the team was Olaf Rustad, '40, who placed under the first twelve in all events.

### Spend Week in N. H.

The ski team was part of an aggregation of forty Technology skiers, members of the M.I.T. Outing Club,

(Continued on Page 4)

Outing Club

## Walton Lunch Co.

Morning, Noon and Night  
 You will find All Tech at  
 78 Massachusetts Avenue  
 CAMBRIDGE

QUICK SERVICE  
 APPETIZING FOOD  
 POPULAR PRICES  
 Quality First Always

THAT'S  
 WALTON'S

1080 Boylston Street  
 Convenient to Fraternity Men

## Special Discount to Tech Students

SHELL GAS

at 3c Discount

ALSO ON

Motor Tune Up, Delco  
 Batteries and Ignition

## Superior Electric Service

266 MASS. AVENUE  
 CAMBRIDGE  
 TEL. TRO. 5009

## HARVARD AUTO CO.

\$550. 1937 FORD CONVERTIBLE SEDAN

Like New. Very low Mileage 30 Day Guarantee.

1230 MASSACHUSETTS AVENUE CAMBRIDGE  
 SEE MR. BRIGGS TRO. 9460 OPEN EVENINGS

## FENNELL'S

Est. 1878

Imported and Domestic

WINES, LIQUORS, ALES  
 CHAMPAGNES & CORDIALS

59 Massachusetts Avenue, Boston  
 NEAR COMMONWEALTH AVENUE

Free Delivery Service

KEN. 0222

CERTIFIED S. S. PIERCE CO. RETAILER

**FOOD**  
*you will really*  
**ENJOY**

*The SMART*  
**Latin Quarter**  
 in  
**the TOWNE CLUB**  
 46 WINCHESTER ST.  
 LIB. 3286  
 Open 5 P.M. to 2 A.M.

# CALENDAR

## TUESDAY, FEBRUARY 7

4:00 and 5:00 P.M. Lecture by Professor Magoun—Room 6-120.

## WEDNESDAY, FEBRUARY 8

12:30 P.M. Luncheon, Mr. Tallman—Silver Room.  
6:30 P.M. Submaster's Association Dinner—Faculty Room.

## THURSDAY, FEBRUARY 9

6:30 P.M. A.S.M.E. Dinner—North Hall.

## FRIDAY, FEBRUARY 10

7:00 P.M. Dorm Dinner Dance—Main Hall.

### Air Training

(Continued from Page 1)

while flight instruction will be given under C.A.A. supervision by a school at a local airport.

#### Freshmen Excluded

Participation in the government program at the Institute is limited to Sophomores, Juniors, Seniors, and graduate students whose scholastic records indicate their ability to take the aeronautical training in addition to their formal courses.

After a preliminary physical examination by the medical staff of the Institute, students will submit themselves to exacting physical tests by a surgeon appointed by the C.A.A.

Applicants must be between eighteen and twenty-five years old and unmarried. Preliminary selection of the students will be based on interest in aviation, health, and scholastic standing. All applicants must be more than five feet, four inches in height, and vision and hearing must meet the high standard maintained for commercial pilots.

#### Parents' Permission Needed

Permission of parents will be required before any student is allowed to participate in the training program.

The only expense to participants will be twenty dollars for personal insurance. Application blanks are available at the Information Office, Room 7-111.

Ground instruction, which will include training in civil air regulations, navigation, and meteorology, is to be given by members of the Institute staff in the department of Aeronautical Engineering.

#### 35 Flying Hours

Flight training would include eight hours of dual instruction and twenty-seven hours of dual observation and solo flying, during which students will solo one hour for every half hour of dual operation. Successful completion of the training program will entitle students to take examinations for licenses as civilian pilots.

In charge of the program at the Institute will be a committee of three faculty members from the department of Aeronautical Engineering—Professors Richard H. Smith, chairman, Charles S. Draper, and Otto C. Koppen.

The seven other schools having training programs similar to the one here are Purdue University, Indiana University, University of Alabama, University of Minnesota, University of Washington, Texas A. and M. and Georgia Tech.

### Junior Prom

(Continued from Page 1)

nounced later. Available tables may also be reserved at the same time.

#### Clinton to Play

Larry Clinton and his broadcasting orchestra, featuring Beatrice Wain and Ford Leary at the vocals, will furnish the music, having won the student popularity poll by a large majority over such name bands as Tommy Dorsey, Artie Shaw, and Benny Goodman.

Clinton, now a composer-conductor at the age of 28, began his musical career in 1933, as a trumpeter for Ferde Grofe. He soon entered the field of orchestration, arranging songs for Glen Gray, Isham Jones, Tommy and Jimmy Dorsey. Now he orchestrates every song that his own orchestra plays. The finding of a census taken recently showed that Larry had arranged more than one fourth of all the dance songs published in the last few years.

#### Broke Casino Records

Last summer Clinton's band smashed all attendance records at the Glen Island Casino, drawing gate proceeds of over a quarter million dollars in less than fifteen weeks.

Clinton has acquired national repute as a song writer, many of the hit tunes coming from his pen. His "Abba Dabba," "Midnight in a Madhouse," "My Reverie," "The Devil with the Devil," and "Satan Takes a Holiday" all became best sellers. He also wrote his opening and closing theme songs, "Dipsy Doodle" and "Study in Brown."

The arrangement of classical music to popular dance style is another phase of Clinton's orchestration, "Martha," "Dance of the Hours," "My Heart at Thy Sweet Voice," "Gavotte," and "I Dreamt That I Dwelt in Marble Halls" achieving fame with swing fans.

### Outing Club

(Continued from Page 3)

who spent a week of skiing and skating at Intervale Inn, Intervale, N. H. Also entered in the Carnival were the skiing teams, of Maine, Vermont, and Princeton. This Thursday the skiing team will leave for competition in the events of the annual Dartmouth Carnival.

#### Ten Guests of Dartmouth

A group of ten members of the Outing Club were guests at the Cloudland Cabin of the Dartmouth Outing Club at Woodstock, Vermont, from Monday till Friday, Jan. 30 through Feb. 3. Perfect skiing conditions prevailed.

The individual places garnered by the M.I.T. skiers at the University of New Hampshire Carnival were: Downhill—H. Aschaffenburg, 8; O. Rustad, 9; N. Rosenberg, 11; and F. McClintock, 17. Slalom—H. Aschaffenburg, 2; O. Rustad, 9; F. McClintock, 12; N. Rosenberg, 14. Cross-country—N. Rosenberg, 8; O. Rustad, 12; and H. Aschaffenburg, 20.

Jumping—O. Rustad, 6; F. McClintock, 7. Combined (Jumping and Cross-country)—O. Rustad, 7.

### Colgate Will Battle Tech Debaters Next Saturday

Colgate debaters will meet the Institute team next Saturday at 8 P.M. in Eastman Lecture Hall in an Oregon style meet, which provides for cross-examination.

The question deals with the "Pump-priming" problem and is "Resolved: That the United States should cease using public funds for the purpose of stimulating business."

### Drive

(Continued from Page 1)

is estimated that at least \$500 per year will be necessary to support each man.

According to the circular which is to be distributed by the Committee: "These students, to be selected by the scholarship board, will not be of any particular creed, race, or religion. Adding these scholarships to the long list of those already granted each year by the Institute to American students would have no appreciable effect. But, as a demonstration of Technology's convictions, they become invaluable when granted to refugees."

**The WALKER CAFETERIA**

*Offers You The Best In*

**FOOD, CLEANLINESS, SERVICE and QUALITY**

• • •

**Complete Dinners .50**

WIDE SELECTION

• • •

**SAVE 10% BY USING COUPON BOOK**

*The RIGHT COMBINATION is Chesterfield*

*when you're bidding for More Smoking Pleasure*

By combining (blending together) the right kinds of mild, ripe American and aromatic Turkish tobaccos, Chesterfield brings out all their fine smoking qualities and gives you a cigarette that's outstanding for mildness... for aroma... for taste.

*When you try them you will know why Chesterfields give millions of men and women more smoking pleasure... why THEY SATISFY*

**Chesterfield**

...the blend that can't be copied  
...the RIGHT COMBINATION of the world's best cigarette tobaccos

The colorful P. HAL SIMS, master bridge authority and player says, "It's the right combination of keen bidding and skillful play of the hands that takes the tricks".