

## Dr. Sterling discusses PCC athletics at sports banquet

"Athletics builds character not only on the playing field but in its blending of cultural refinement and intellectual disease," stated Dr. J. E. Wallace (Wally) Sterling, President of Stanford University, at the fall sports banquet in the Athenaeum Tuesday evening. Dr. Sterling indicated that Caltech hasn't changed so much since he left the faculty. While teaching history here he served on the PE council and played baseball for the faculty before transferring to the Huntington Library and then to Stanford.

### Men are men

The after-dinner program was punctuated by laughter in an evening described by master of ceremonies Dr. Richard Jahns as one in which men could be men. Speakers included Dr. Lee DuBridge (another college president), and coaches and assistants of fall-sport teams.

### Pigskin pronouncements

While reminiscing about the 1956 season, football coach Bert LaBrucherie said that Tech was second in the league in yards gained, second in passing, and won more points this season (179) than any other. Russ Pitzer was awarded the Wheaton Trophy for his outstanding sportsmanship, team leadership, athletic ability, and scholarship.



Dr. Wallace Sterling

Ed Krehbiel was acclaimed as "the greatest fullback Caltech ever had" by Coach LaBrucherie. Ed led the league in rushing and was elected an all-conference back. Other awards went to all-conference tackle Larry Whitlow (honorary captain) and to Don Stocking (his second all conference award).

### Freshmen letter

Freshmen football coach Ed Preisler announced that letters were given to all players who finished the season. Captains were Walter Gottschall and Mel Holland.

Cross country coach Claude  
(Continued on page 4)

## 1000 hi-schoolers visit Tech to get inside look at science

### "Snowball" is dance theme

"Snowball," the annual ASCIT Christmas dance to be held Saturday in the Dabney Hall lounge, will climax the fall term social programs of the five student houses. The dance will last from nine to one o'clock, and, as in years past, the admission "charge" will be one toy per person.

The toys should be selected for children aged four to seven. They should not be giftwrapped, to facilitate distribution.

Music for the evening will be provided by the band of Irving Bush, a very fine dance band according to ASCIT First Rep Dave Leeson.

The individual social programs of the houses will end this Friday, with a mystery party at Dabney, an ice skating party at Blacker and a house dance at Fleming.

This Saturday we shall have a visitation. From the land of Presley and DA's will come about 1000 innocents to gaze with awe upon our ivory towers.

### Innocents arrive

At 8:30 the innocents, from high schools throughout the LA area, will sign in. At 9:00, laden with reams of appropriate literature, they will be led about the campus to sample tasty tidbits of scientific erudition. Each of the four houses and Throop club will provide nine guides to keep the innocents on the well-trodden path. In case someone should stray from the well-trodden path toward some pitfall, such as the subbasements of Robinson, hosts will be placed at various parts of the campus.

### Guests dine in houses

At noon the guests will convene in the student houses to partake of modern cookery. (The regular troops will already have eaten—about 11:30 or so.) The faculty members from the high schools will dine in the Athenaeum. After speeches, beginning on the Athenaeum lawn at 12:50, by Dr. DuBridge and other august personages, the innocents will split up and depart for the lectures of their choice.

### Lectures scheduled

The forty-five minute lectures will begin at 1:30, 2:30, and 3:30.  
(Continued on page 5)

## Announcements

### Asilomar meeting

The YMCA's Asilomar conference is being held the week from Dec. 26 to Jan. 1. All those planning to attend should be at the Asilomar delegation meeting tonight at 7:30 in the Y lounge.

### Placement information

Dr. Donald S. Clark, Director of Placements, will hold a general discussion of placement problems and interviews on Monday, December 3, in 206 Dabney at 7:15.

### Free clothes

The Caltech Service League announces that it is in the possession of a quantity of clothing which they wish to give away to Tech students. This is a miscellaneous assortment, consisting of slacks, sport coats, sport skirts, etc. It may be inspected in the wardrobe room of T2.

## Caltech's four senior Sloan scholars spend gala weekend in New York City - all free

by Dick Hundley

There are many interesting places to spend Thanksgiving vacation. One of the more interesting ones is New York City, and one of the best ways to see New York is on a free trip.

This was the happy state of affairs that confronted four Caltech seniors last weekend, as they were the guests of the Alfred P. Sloan Foundation for the four day holiday.

The four seniors—Dick Hundley, Joe Lingerfelt, Chuck Luke, and Marty Tangora—are all holders of Alfred P. Sloan National Scholarships, and were invited to New York by Mr. Sloan to have dinner with him and with the other 21 senior Sloan Scholars from MIT, Cornell and Carnegie.

This was the first trip to New York for three of the Techmen, and because of this fact much of the time was taken up with sight-seeing. It is hard to say what was the most thrilling sight in the big city, but one will always remember the boat trip to the Statue of Liberty, the guided tour of the NBC studios, the visit to the UN, and the magnificent view at night from the top of the Empire State building.

In the time they had left over from sight-seeing the four seniors amused themselves by attending TV shows, going to the Radio City Music Hall, seeing July Garland at the Palace Theater, walking around in the crowds on Broadway and in



Sloan scholars Marty Tangora, Chuck Luke, Joe Lingerfelt. Dick Hundley not shown.

Times Square, and going for rides on the subway.

For one of the luck seniors, Marty Tangora, this trip was something of a return home. Marty was born in New York, and left there at the age of 17 months. This was the first time he had ever returned, and one of the highlights of the trip for him was a chance to see the place where he came into the world.

In telling about the experi-

ences in New York one mustn't forget the dinner Saturday night at the Waldorf with Mr. Sloan. This, after all, was the reason for the trip to New York, and in many respects it was the high spot of the trip. As one of the students there remarked, the dinner was convincing proof that "capitalism is the greatest."

However, all was not perfect on this little jaunt to the big

(Continued on page 8)

## Fourth Tech grad gets Nobel Prize

Dr. William Shockley this year became the fourth graduate of Caltech to receive the Nobel Prize. The award was given for his work in the development of transistors.

Shockley was director of the transistor physics research group at Bell Labs between 1945 and 1954. He graduated from Tech in 1932, and obtained his doctorate at MIT in 1936.

He had previously received the Buckley Prize, awarded by the American Physics Society, and the Comstock Prize. He has served on a number of military research groups as well as actively in professional societies.

## Pauling to head radiation panel

Dr. Linus Pauling, Chairman of the Division of Chemistry and Chemical Engineering, will moderate and Dr. Franklin Stahl, research fellow in biology, will debate on a panel which will discuss "The truth about radiation damage with its significance to human beings, born and unborn." Friday evening, 8 o'clock, November 30 at the Los Angeles First Unitarian Church public forum.

The forum will be held in the church auditorium, 2936 West Sixth Street, Los Angeles. Audience participation is invited. Admission is 75 cents.

## Asilomar conference attracts students from 50 colleges

The annual YM-YW Asilomar conference will be held this year from December 26 through January 1 on the Monterey Peninsula south of San Francisco. Over 300 students from fifty colleges located along the coast, in Arizona and Hawaii will gather for a week of seminars, dancing, singing, volleyball, bull sessions and self-analysis.

During the week leading faculty members from the participating universities will lead discussion groups on subjects ranging thru "Love and marriage," "Campus intellectual trends" and "The fine arts and religion." Last year the delegates found time to write and stage a play, publish a daily newspaper, and organize camp-wide activities such as a carnival and New Year's eve party.

Last year twenty-five Techmen attended the conference. Almost as a man they say that

the camp was one of the two or three best spent weeks of their lives. As of Monday eighteen Techmen had signed the delegation list just inside the entrance to the Y. This year there is a scholarship fund of \$500 to help those who would like to attend but are short of cash.

Tonite at 7:30 there will be a meeting in the Y lounge for everyone interested in the conference. For more information drop over to the Y office or see any Y officer.

## California Tech

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## Action on meals plan urged

As pointed out in a letter to the editor in the November 8 issue, the increasing out-of-town enrollment has made it impossible for the student houses to feed or house every student. Since this trend will probably continue for at least several years, and since the proposed two new student houses will not be ready before September, 1959, at the earliest, some action is necessary if an increasing number of students are not to lose the benefits of house living. Assuming that sufficient off-campus housing can be found and that Throop Club can provide for most of the social needs of these students, some kind of common meal plan needs to be developed to provide these students with companionship and a further introduction to the social graces.

Several suggestions have been made for effecting this procedure. The first, and most obvious, was the use of the coffee shop in the evening hours. A study conducted by Mr. George W. Green, vice-President for Business Affairs, revealed, however, that this plan was not economically feasible. Another idea was to have the Athenaeum serve these meals. An Athenaeum committee felt that it would be more appropriate if the student houses handled the matter. Then it was suggested that student house food might be served at the coffee shop, but this suggestion did not meet with the approval of the coffee shop management and also raised the question of how the food could be transported and served while still hot. Finally, the football team agreed to move to the help's dining room in order that the off-campus students might use the training table in the evening. However, by this time, late in October, when a meeting of off-campus freshman was called to put this plan into operation, too few (seven) showed up to make the extra cost of waiters and clean-up worthwhile. The small turnout was probably due to a failure of the off-campus students to understand the value of such group associations, to the relatively high cost of the meals (\$1.15, \$0.25 greater than that charged in the houses), to the short notice on which the meeting was called and to the fact that not everyone was free during the hour when it was called (4 pm).

We recommend that the problem be reviewed at the beginning of next term, at which time some of the 41 students now desiring non-resident membership in the student houses will have been admitted to fill places vacated by men who have left. If sufficient off-campus students remain unaccommodated, we suggest that they petition for a reinstatement of the training table plan. Dr. Du Bridge told the Tech that he would view the project with favor if at least 20 boys were interested, and that the Institute would be willing to renegotiate the price if it is a stumbling block. Further, we recommend that definite plans be made to put such a plan into operation at the start of school next fall, as the Faculty Committee on Student Houses has discussed doing, regardless of what action is taken next term.

## Campus Brewins

"Well, I read 'em, and Torillo reads 'em, and the guy at Pacific Jazz who gives me a discount reads 'em, so by God we'll keep on printing 'em."

—The Chief

### Sloan Scholar Speaks

Mister Sloan is a wealthy man who gives loot to selected troops so that they may get an Education. Mister Sloan summoned unto him in New York the Troops, to bask in their gratitude, at a great feast. Sloan Scholar Hundly basked not. S. S. Hudley became gassed, and was borne away by S. S. Tangora and others.

### Several Sensually Soak

Phlegmingoes left this beloved sink trap to go to an Off-campus party. The troops and

their dates drank nearly as much as the three bartenders, who were borne home in a basket. One Phlegm achieved the ultimate by drinking his date under a Japanese coffee table. The host's mother came home in the middle of the festivities. She disappeared into an unoccupied bedroom. Returning, she handed her son a blanket.

"Better give this to those two kids under the bushes out there," she said. "They're going to catch their death of cold."

### Sage stops son's sin

Dedicated Athlete Bruce "Alley Oop" King called his father long distance.

"Pop, I don't think I'll come

(Continued on page 8)

## Honor system is important factor in turning boys into men

A great deal is said to the Caltech undergraduate during his four years of paid purgatory with regard to his becoming a "mature" individual before he enters the "outside world." To a great extent, the philosophy of educational policy at the Institute seems to be that if a boy is treated like a man, he becomes a man that much sooner.

The cold, hard world expects of the mature scientist or engineer complete honesty in his technical work; if a man fails to abide by this standard, he very soon finds himself unable to progress in the field. The Honor System here provides the means by which the student can be treated as an adult in receiving his education in the merit of honesty. Consequently, the Honor System is a great deal more than a way of doing things on the campus; rather, it sets the pattern for a man's character and way of life for the rest of his career.

Honesty is not a part-time thing. Either a man possesses honesty as a characteristic, or he does not. Just as surely as this is true, the spirit of honor in the Caltech community is not limited to specific areas, but covers all conduct of the Techman. It is assumed by faculty and students alike that a man is honest in all things, not just exams or a respect for the property of others.

It is a real challenge to live up to and to abide by the trust of another person. If any policy of the California Institute reflects its philosophy of education, certainly the Honor System does. The Honor System treats a man as an adult, for not only is he charged with living by the standards of the society, but with protecting the system as well. And certainly, no other policy better prepares an immature individual for maturity than the complete faith and trust of others.

What we call the Honor System has a limited scope. The Board of Control, whose responsibility is the maintenance of the Honor System, is also limited in its workings. However, the spirit generated by the Honor System extends into far wider fields than merely personal property or academic affairs. If Honor is defined in this way, then a question such as, "Is this covered by the Honor System?" seems to be in violation of the whole purpose of education here, and is an unnecessary question for the man who really believes in Honor, as such.

As the Little T states, "The Honor System shall be the fundamental principle of conduct of all members of this corporation. . ." No one is so well educated or informed that he cannot benefit from a re-evaluation of whether he really abides by the trust of others and lives Honor.

Rube Moulton  
ASCIT Vice President

## Secretary's Report

**CORRESPONDENCES** Rube Moulton showed us the letter which the World University Service sent ASCIT to thank us for the \$1000 donation for the Hungarian refugee students. Elliott agreed that money from schools in southern California is beginning to mount up, with Chapman contributing \$1000, also, and USC putting on a drive. Along another line, Elliott showed a letter from the Swiss Federal Institute of Technology (probably Caltech's counterpart there). They wished to exchange information about our engineering program and student government. The only trouble was that the booklets they sent us were written in German.

**BEVERLY HILTON** Leeson has everything arranged for second terms gala events (he says), with five social events—dances after three home league basketball games, the ICC Dance to be held Friday, February 2, after all, at Ontario, and finally the **ASCIT Winter Formal** which will be held at the Beverly Hilton on Friday, March 1.

**DISCOUNT CARDS** Board members are selling for \$0.25 student discount cards to Fox West Coast Theatres.

HERB RAUCH  
ASCIT Secretary

## Letters to the Editor

Associated Students  
California Institute of  
Technology

Dear Friends:

Your speedy response to our special emergency appeal for funds to aid Hungarian student refugees is, indeed, commendable. Your contribution of \$1,000 not only is providing immediate material assistance and hope to these destitute and demoralized fighters for freedom, but is also calling to the attention of other students throughout the region the urgency of the present situation.

I am happy to report that the response to our special emergency appeal is exceeding our fondest expectations. You may feel proud of your role in securing these results.

Sincerely,  
Morrie K. Blumberg  
Regional Executive  
World University Service

## Tech glee club plans for year

The Caltech glee club has released its concert program for this year. During this term, a concert will be given on December 5 at the Athenaeum for the faculty wives. Second and third terms will include concerts at the First Presbyterian Church in Hollywood, the Westminster Church, Immaculate Heart College, Scripps, and the Intercollegiate Festival at Pomona. The interhouse sing and the spring concert will both highlight the glee club's yearly activities. An assembly will also be presented on campus.

There are 65 members of the glee club under the direction of Olaf Frodsham. In its 45 years it has become one of the best glee clubs in Southern California and has received many honors.

A special record, featuring the Alma Mater, as well as religious and semi-classical music, has been made by the glee club.

## Fisher's

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and

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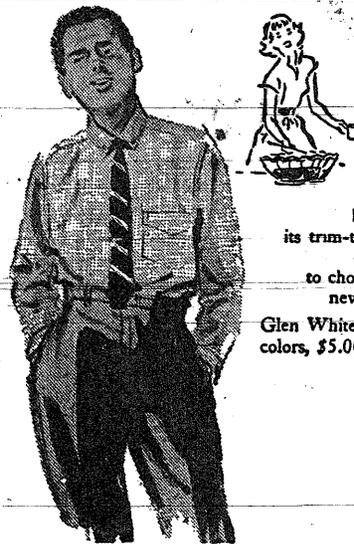
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These days, it's very often that you find a guy wearing this Arrow *Glen* button-down. It rates plenty of praise for its trim-tailored collar and harmonizing colors (newest is a subtle blue). There are a dozen shades to choose from in oxford or broadcloth . . . and a new Arrow silk striped tie to top it off.

Glen White shirt, \$3.95; patterns and solid colors, \$5.00; tie, \$2.50.

## ARROW

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SHIRTS • TIES

# DOUBLED AND REDOUBLED

by C. S. Bitchard

To start this series, the authors thought that we'd deal a hand that every bridge player dreams about getting but never does, i.e., a thirteen card suit. However, just to rack him when he thinks he has the perfect hand, we gave the opponents a better one.

North  
S-A K Q J 2  
H-  
D-A K Q J  
C-7 6 5 3

West  
S-  
H-A K Q J 10 9 8  
7 6 5 4 3 2  
D-  
C-

East  
S-10 9 6 5 3  
H-  
D-10 8 7 3 2  
C-K J 9

South  
S-9 7 4  
H-  
D-9 6 5 4  
C-A Q 10 8 4 2

The bidding with east dealer, went:

East	South	West	North
Pass	1 club	7 hearts	?

North had what is commonly known as a "rock" and decided that with a fit, they might make seven spades. He did not have any room for any information bids so after a great deal of thought bid an exciting seven no-trump.

He figured that if his partner opened, he must have at least thirteen points. Also this genius decided that west must have thirteen hearts to bid seven of that suit since he could "see" all the aces. (South had to have the missing ace for his "opener!") After South had finished panicking, he laid his hand down, apologizing to his partner that he didn't quite have the values indicated in his opener, or what is more commonly known as a "S—bid." North, playing it extremely well, calmly said, "Nice hand partner," mentally noting to emasculate

his partner (who in this case was Ed Krehlel) at the first opportunity. The play is rather straightforward once you know that west had nothing but hearts, triple finessing the club suit, and using the diamond suit for entries.

## Debate team will compete this weekend

Caltech's award-winning debate team will compete with 30 other schools in the Western States debate tournament at Stockton this weekend.

Mike Bleicher, Rube Moulton, Tom Gunckel and Jon Wright will compete in upper-division debate, with John Lango, Ken Scholtz, Tom Morton and Alan Porush forming lower-division teams. Mike Thomas will enter lower-division interpretation and discussion.

Last year Tech placed fourth in upper division and second in lower division.

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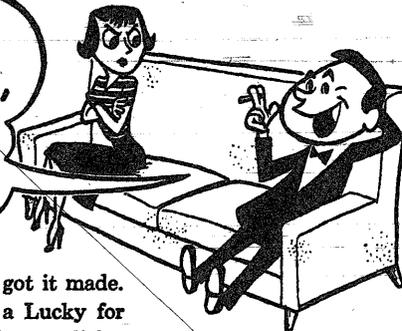
Name \_\_\_\_\_ Size \_\_\_\_\_ Length \_\_\_\_\_  
Address \_\_\_\_\_ Business Sheer   
Dress Sheer   
City \_\_\_\_\_ State \_\_\_\_\_  Beige  Taupe

DENISE HOSIERY, BOX 227, READING, PA.

## Stop everything—start laughing!

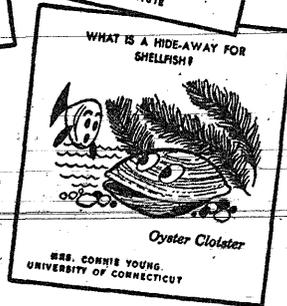
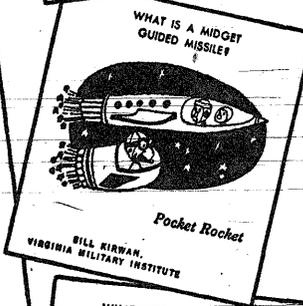
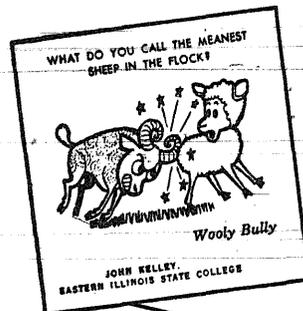
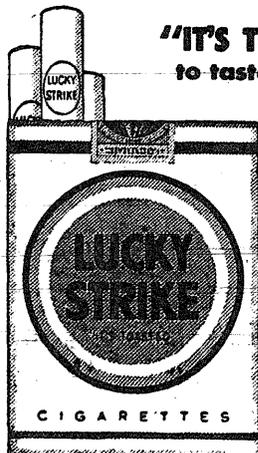
# Sticklers!

HERE'S A STICKLER!  
IF YOU HAVE A LUCKY,  
WHAT ELSE DO YOU NEED?  
(SEE PARAGRAPH BELOW)



IF YOU'VE GOT a Lucky, you've got it made. That's 'cause you just can't beat a Lucky for taste. Luckies are made of fine tobacco—light, naturally good-tasting tobacco that's TOASTED to taste even better. In fact, you'll say Luckies are the best-tasting cigarette you ever smoked. What more could you want? Oh, the answer to the Stickler! If you're in a light plight, what you need is a *Match, Natch!*

"IT'S TOASTED"  
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## Luckies Taste Better

CLEANER, FRESHER, SMOOTHER!

### YMCA News

"The philosophy of religion: some basic concepts" will be the topic of a seminar led by Dr. Hunter Meade next Monday. The group will meet at 7:30 p.m. in the Y lounge.

This seminar and two others held earlier in the term were organized by the Religious Inquiry Committee of the Y.

#### Salesman showing

Death of a Salesman, starring Frederick March and Cameron Mitchell, will be shown at 7:30 in Culbertson Hall this Sunday. This film, an Academy Award winner, will be the last film of the present series. The admission price will be 45 cents or a series ticket.

#### NATO discussion

Walter P. Coombs, the executive director of the Los Angeles World Affairs Council, will speak at the Athenaeum on Wednesday noon for the grad-faculty lunch forum. "NATO and the crisis in Europe" will be his topic. Mr. Coombs has just returned from three months in Europe, which included a lengthy stay with Alfred Guenther, the retiring NATO commander-in-chief.

### Learn French from records!

Proficiency in French or German may be obtained by using the language records now available in the Humanities Library. The records were first developed by the armed forces during World War II. The recorded conversational method has since been used by prospective tourists and backwoods pedants alike, permitting them to learn almost as much as can be learned from a one-year course in the language.

**PCC ATHLETICS**

(Continued from page 1)  
Fiddler introduced the team and their season record. Reed Saunders was varsity captain and Jon Uncapher, freshmen

captain. Varsity soccer coach Chuck Miller awarded the plaque for most outstanding player jointly to Larry Tenn and Phil Thacher. He mentioned that standing

room only was available at most soccer games. Captain was Bob Norton.

J. V. Soccer coach Lee Andrews introduced the team.

Water polo coach Warren Emery introduced the award winners from both varsity and freshmen squads.

Present at the banquet were

members of Tech teams from 1926, 1936, and 1946. The evening was concluded with the presentation of appropriate gifts.

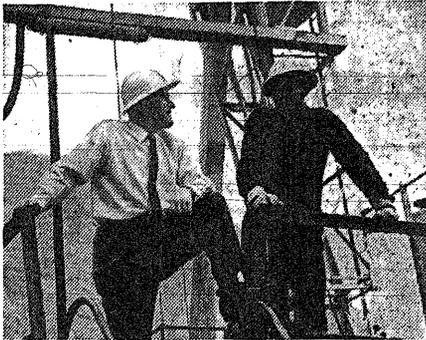
# Clarence Froome

## Or how to reduce your tax bill

"There used to be a saying back in 1921 when I joined Union Oil. It was 'The less government, the better.' We believed it, too.

"Today it's the other way 'round. People seem to think that more and more government can solve more and more of their problems.

"They look to government for pensions, for unemployment insurance, for federal housing,

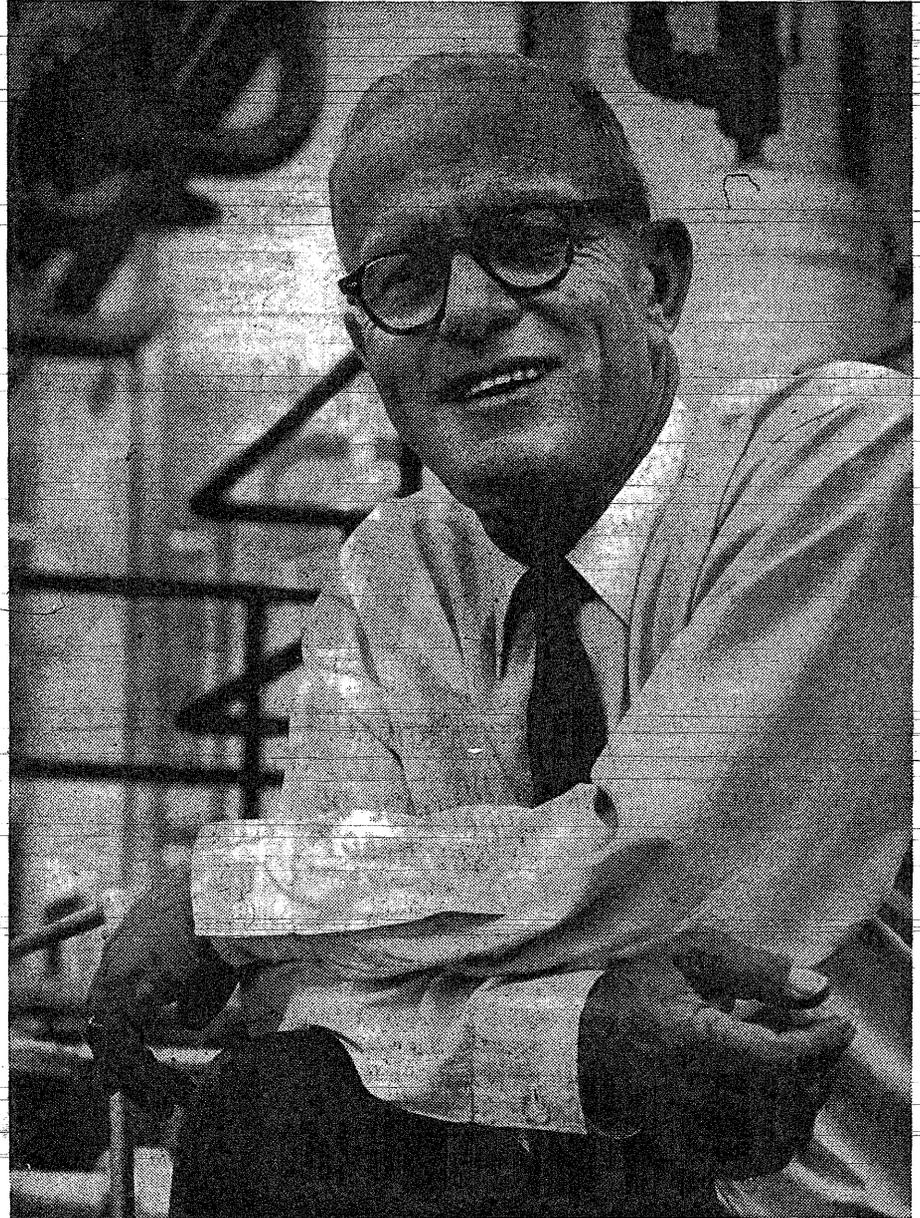
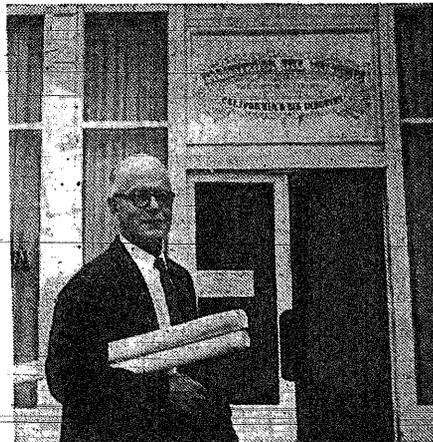


for medical aid—for all kinds of securities we used to depend on ourselves for.

"Now there's nothing wrong with taxes that pay for defense, and other necessities. But we're kidding ourselves if we think Uncle Sam is a rich relative with an inexhaustible supply of cash we can tap whenever we need it.

"Fact is, government is more of a poor relation. It produces nothing. It pays no taxes. Anything you or anyone else gets from it first has to be taken away from you and somebody else.

"So, obviously, the more you let the government do for you, the more it's going to cost you."



CLARENCE FROOME: "THE MORE YOU LET GOVERNMENT DO FOR YOU, THE MORE IT COSTS YOU."

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Admittedly, there's a bigger job to be done today. But the danger of a constantly enlarging

government goes far deeper than its cost to the citizen.

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\* \* \* \* \*

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# Service League's unsung heroes labor long to make life bearable for weary Techmen

A number of people have been working enthusiastically but unobtrusively for several years to make life easier and more pleasant for the students at Caltech. These people call themselves the Caltech Service League. They are parents and friends of the students and friends of the Institute, "persons who," in the words of the League president, Mrs. Nellie M. Cobb, "recognize (Caltech) as a tremendous cultural and educational force in industry, health and national safety."

Every year since the Service League was organized nine years ago, it has managed to spend a surprising \$2,500 to \$3,000 on Tech students, in addition to the countless hours of work and worry spent by many members on projects for the benefit of Techmen.

To cite some examples, the Service League has traditionally provided the decorations for the spring Dinner Formals; it has supplied soups and fruit juices to supplement meals for the infirm; it has maintained the useful Wardrobe and it has cheerfully offered up its members for the thankless task of chaperoning the Lost Weekend.

The list of the League's accomplishments for last year alone is impressive: the League presented the Health Center with six much-needed 7-foot beds, some over-bed tables, and 18 pairs of pajamas; it outfitted the basement of the Student Houses with a photographic

darkroom; it bought draperies and upholstery for the YMCA lounge and for the Health Center waiting room; and it footed the bill for sending Caltech's student delegation to the Model U. N. convention.

Each year the Service League recruits new members from among the parents of the new

freshmen. While a majority of the membership of about 500 are parents of present undergraduates, a great many of the leading members are faculty members and their wives, and charter members who maintain an interest in the League although their sons graduated Tech several years ago.

# Palomar sky survey reveals small planet "Geographos"

Palomar Observatory astronomers have named a recently discovered small planet "Geographos," the geographer, in honor of the National Geographic Society, Dr. Ira Sprague, director of the Mount Wilson and Palomar Observatories announced recently.

Geographos is of great interest to science, Dr. Bowen said, because, with the exception of the moon, it comes closer to the earth than any other celestial object having a known orbit. Geographos' elliptical orbit around the sun actually cuts across the earth's orbit, and in 1969 the little planet or asteroid will be less than four million miles away.

**Sky survey discovery**  
"The name is especially appropriate for two reasons," Dr. Bowen said. "First, Geographos was discovered on photographic plates made through Palomar's big Schmidt telescope during

production of the National Geographic Society-Palomar Observatory Sky Survey. The Survey, now completed after seven years of work, maps the sky visible from Palomar out to approximately one billion light years.

"Secondly, Geographos, coming as close to the earth as it does, undoubtedly will be an important help to astronomers and map-makers in charting distances in the solar system. It may well be a primary tool in pursuing the cartography of the sky."

Geographos was discovered on the night of August 31, 1951, by Dr. Randolph Minkowski and Dr. Albert G. Wilson. Dr. Minkowski, then as now, was in over-all charge of the Palomar Sky Survey. Dr. Wilson, then chief astronomical observer for the Survey, has since become director of the Lowell Observatory in Flagstaff, Arizona.

## STUDENTS DAY

(Continued from page 1)

There will be an average of 5.33 lectures given during each hour. At 3:30, goodbye.

Dr. Thad Vreeland is the faculty chairman for this year's effort. Howard Bloomberg is the student counterpart. Hugo Fischer is in charge of arranging the tours, and Brent Banta will be in charge of the hosts.

### Demonstrations readied

The morning exhibits will be prepared by each department with the cooperation of various Tech students. The afternoon lectures are under the jurisdiction of the participating departments.

The afternoon lectures should afford the guests many enlightening and snowy experiences. The mechanical engineering department is going to discourse about "The automotive power plant—the next 20 years," "Nuclear power production," and "The strength of metals." The electrical engineering department will sling electrons in the high voltage lab, and will also do a little talking about the relative merits of transistors and tubes. The civil engineers will bemoan the water supply problem in Southern California. The aeronauticists will say some-

thing about the problems of high-speed flight, photoelasticity, the jet propulsion lab, and the Southern California Cooperative Wind Tunnel. The geologists will talk about the geology of an icecap. The biology department will talk about fertilization, the beginning of life. The chemists will put in their bit about "Nuclear radiowaves and electronic microwaves in chemistry." And lastly, the physics, mathematics and astronomy department will talk on "Elementary problems of topology," "Origin of the elements," and experiment with liquid air.

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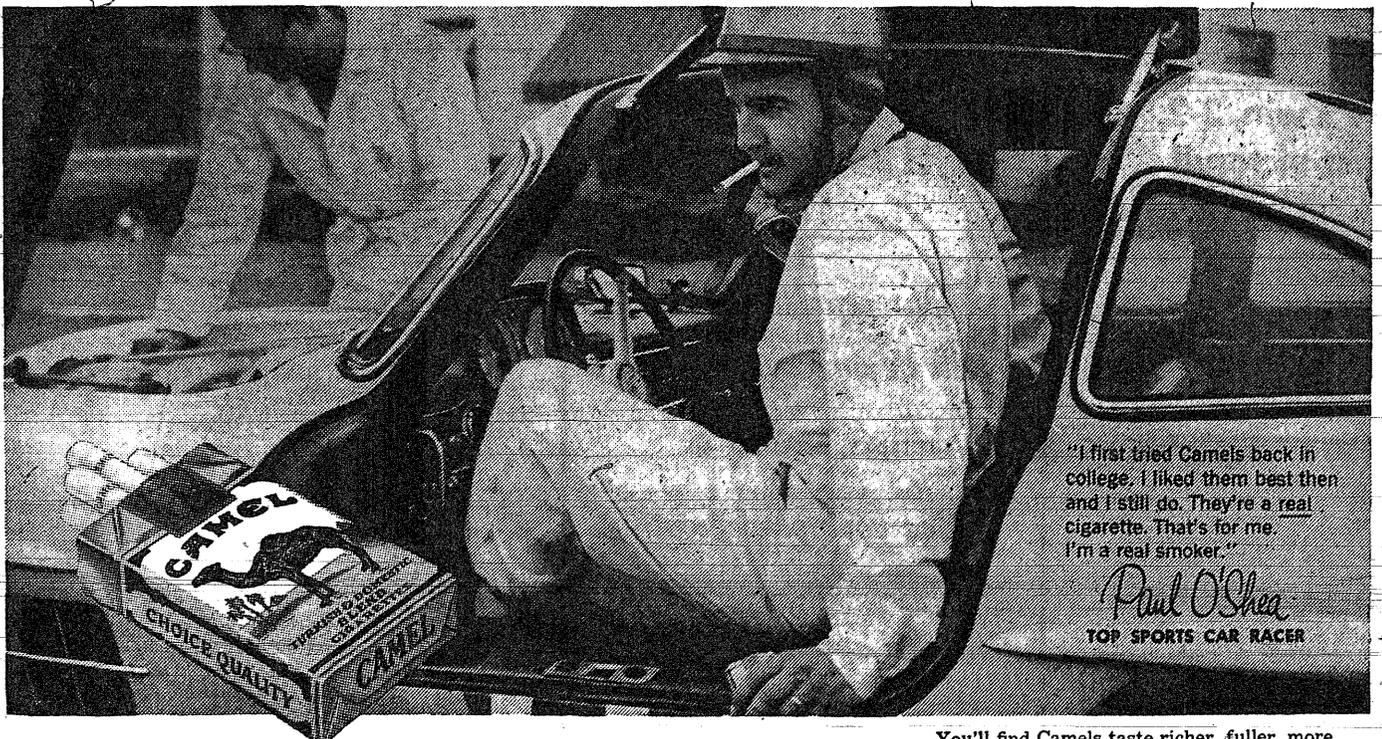
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# Gridders whip La Verne to climax "best" season

Coach Bert LaBrucherie's varsity footballers copped a better-than-average season by whipping LaVerne 45-7, November 17 on the losers' field. The win left Caltech with a 3-5 season record, marking the first time since 1931 that a Caltech football team had won three games.

### Leopards score

LaVerne scored first in the contest, as an intercepted pass set up a scoring drive for the Leopards, with Jim Milhon pushing over from the one yard line late in the first period and kicking the extra point to give LaVerne a 7-0 first quarter lead.

### Tech retaliates

Caltech exploded for 20 points in the second quarter to put the game on ice. Early in the period halfback Charley Malone took a pitchout from Dick Van Kirk, Beaver quarterback, and skirted 31 yards around left end for the Beavers' first tally.

### 6 for Krehbiel

With less than ten minutes remaining in the period Van Kirk picked off one of LaVerne's pass attempts and returned the ball to the Leopard 19 yard line.

He then passed for 16 yards to Malone, putting the ball on the three. Fullback Ed Krehbiel slanted over to give Caltech a 13-7 lead.

### LaVerne fumbles

After the kickoff Ken Colbert, LaVerne quarterback, hit Milhon with a swing pass. Milhon was hit by two or three Caltech tacklers, and Don Stocking, Beaver halfback, ran into the pile and emerged carrying the ball. He scooted 26 yards to rack up Caltech's third TD and give the Beavers a 20-7 half-time lead.

Fairly early in the third period Stocking swept around right end and a 35 yard scoring play, and Dick Gustafson, sophomore fullback, plunged 5 yards to give the Beavers a 33-7 advantage at the end of the third quarter.

### Van Kirk runs 167

Van Kirk made the longest play of the game in the fourth quarter, as he intercepted another of Colbert's passes on the LaVerne 46 yard line and cake-walked down the sideline to

score. Stocking added the final tally on another reverse around right end, going 13 yards for the TD.

### Krehbiel gains 97

Krehbiel was Caltech's leading rusher for the game, with 97 yards in 18 carries. Stocking picked up 81 yards in 10 plays and Malone had 72 yards in 10 attempts.

Playing their final game for Caltech were seniors Jim Workman, Ed Nelson, Bill Moeur, Larry Whitlow, Jim Snyder, Joe Lingerfelt, Charley Malone and Marty Tangora.

Looking forward to next season are underclassmen Ed Krehbiel, Don Stocking, Larry Berry, Lance Hays, Dick Van Kirk, Gene Belsman, Tim Harrington, Tony Howell, Dick Baron, Gene Stanley, Larry Rhodes, Dick Herlein, Bob Ingram, Hal Forsen, Tony Leonard, John Conover, Russ Pitzer, John Kelley, Frank Childs and Dick Gustafson.

# The Sports Corner

by Dick Van Kirk

How's this for finding a real corner for the ol' sports corner? Thought I'd take this opportunity to tell you all that this year's varsity football team posted the best win-loss record in 2 years at Caltech, excluding the V-12 teams of World War II. I would also like to put in a plug for the varsity basketball team, which opens its season tomorrow against the LaVerne Leopards. Be sure to see the game.

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Water Polo Statistics			
Player	Att.	Scored	Pct.
Blandford	43	7	.163
Brown	20	3	.150
Konrad	1	0	.000
Lewyn	2	0	.000
Martin	16	4	.250
Milder	6	0	.000
Pallthorp	19	1	.053
Park	1	0	.000
Rees	217	30	.161
Smoak	3	1	.333
Taylor	59	6	.102
Thomas	4	1	.250
Velinty	19	3	.158
Goalies	Saves	Opp.	Pct.
		Goals	
Owings	10	25	.715
Wiberg	203	77	.275
Team Totals:			
Scored—71			
Opp. Scored—102			
Won 3, Lost 10			

## JV's win, 3-2, first victory!!

by Brent Banta

Whether or not most students are aware of it, J. V. soccer is a fast rising sport at Caltech. Started only three years ago as a training ground for the future varsity athletes, it followed the usual trend of new Caltech teams, i.e., going winless. This year, things changed.

Under the leadership of coach Lee Andrews, the J. V. team won its first game in its short history by defeating Webb School 3-2 in a wild, seesaw battle at Tournament Park last week. This win was due in part to coach Andrews' strong belief that there is nothing good about losing.

Andrews, who played soccer for UCLA and is now working for Merrill Lynch, Pease, Fenner & Beane, declares, "Soccer is a sport in which fierce determination and hard spirited play for the entire game is absolutely necessary for victory."

The J. V.'s, instilled with this doctrine, intend taking it up to the varsity next year in an effort to bring back the great Caltech soccer teams of the early fifties.

# Hoopsters to open season against visiting Leopards

Caltech's basketball season begins tomorrow, as the Beavers meet the LaVerne Leopards in Scott Brown gymnasium at 8:00 p.m. The Beavers will sport a short squad this year. What they lack in height will have to be made up in hustle and accuracy from the field. For over a month Coach Carl Ghy and team aspirants have been trying to develop these attributes.

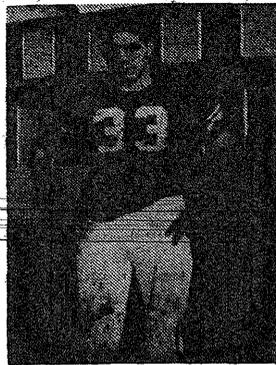
There has been quite a scramble for starting positions, and a starting first team can only be guesswork. Vying for the forward spots are Glenn Converse, Bill McClure, Howie Bloomberg, Dick Van Kirk, Don Wiberg, and Jack Conway. Larry Krause and Herb Rauch are filling in the center spot, with Krause probably getting the starting nod for the LaVerne game. Captain Jim Welsh has sewn up one starting guard post. Fred Newman might well start at the other guard, though he has been out only this week.

Ray Magdalena, Jim Work-

man, Harry Patapoff, Mike Duke and Jack Bass may see action at the guard spot.

Caltech's winning hopes suffered a jolt when it was learned that junior forward Sonny Nelson will not be able to play till second term because of a recurring knee injury.

Next week the Beavers travel to Redlands for the annual Redlands tourney.



Meet Ed Krehbiel, husky Beaver fullback, who led the SCC in rushing for the 1956 season with 672 yards in 142 carries. Ed was picked on the first all-conference team.

## All-conference squad selected

Four Caltech gridders were selected to the all-conference first and second teams for the largest Caltech delegation since the post-war advent of one platoon football.

Tackle Larry Whitlow and fullback Ed Krehbiel, 1956 SCC rushing leader, were named to the all-conference first squad, while center Joe Lingerfelt and halfback Don Stocking were second team selections.

Other first team picks were: Ends, Jack Crowder, (R) and Jim Mora, (O); tackle, Paul Downer, (W); guards, Hugh Martin, (PC), and Stan Friedman, (O); center, Dean Westguard, (R).

## Football trophy goes to Pitzer

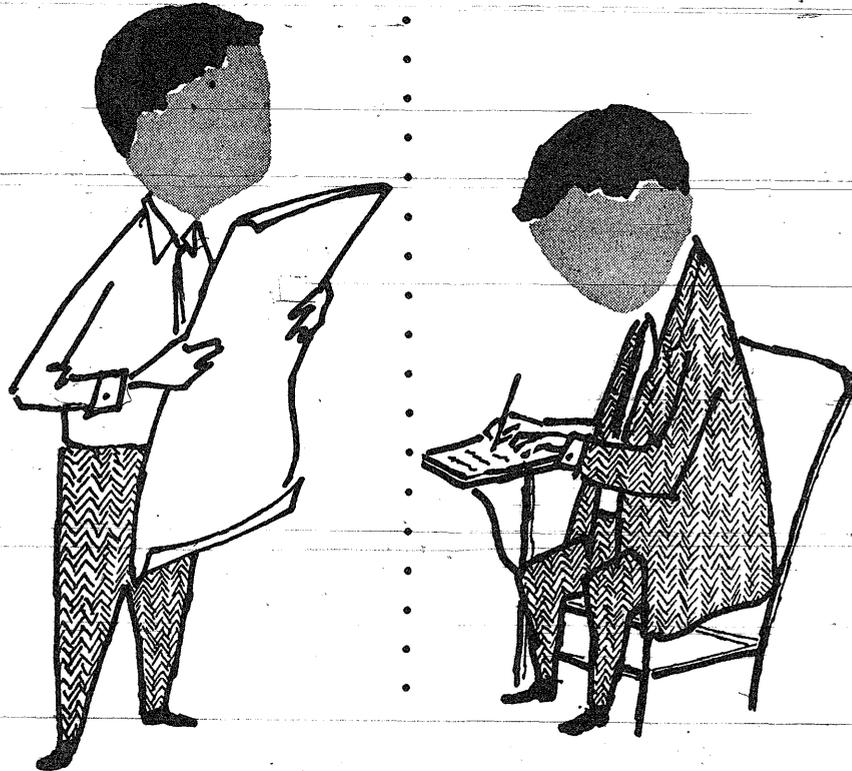
Russ Pitzer, sophomore guard, was awarded the Wheaton Trophy Tuesday night at the fall sports banquet, held in the Athenaeum.

Pitzer, who was the regular left guard on the Beaver grid squad last season, was also the recipient of the Tau Beta Pi freshman of the year award last spring, and co-captain of the frosh football team during the 1955 season.

The Wheaton trophy is awarded annually to the member of the varsity football team who has contributed most to the team in sportsmanship, moral influence and scholarship. Kyle Bayes was the winner of the award last year.

# What's doing...at Pratt & Whitney Aircraft

Nov. 30	La Verne	here
Dec. 6	Rerlands Tournament	there
Jan. 5	Cal Poly (SD)	there
Jan. 8	Chapman	here
Jan. 11	Occidental	there
Jan. 15	Pomona	there
Jan. 19	Redlands	there
Jan. 22	Pasadena College	here
Jan. 26	Whittier	here
Jan. 29	Cal Poly (SD)	here
Feb. 1	Redlands	here
Feb. 2	UC, Riverside	here
Feb. 4	LA State	here
Feb. 8	Whittier	there
Feb. 9	LaVerne	there
Feb. 13	Occidental	here
Feb. 16	Chapman	there
Feb. 19	Pasadena College	there
Feb. 23	Pomona	here



## Mermen bow to Occidental

On Friday, November 16, the Caltech waterpolo team closed out its season by giving league-leading Occidental quite a battle before losing 6-7. With this loss the squad finished third in the league, posting a two-four record.

In the third quarter it looked like Oxy was off to the races as Calderwood scored and Contreras hit two. Tech fought back in the next two quarters as Clarke Rees sank three, Vince Taylor one, and Bob Blandford one. However, Oxy's hard shooting Contreras had hit two more and the game went into the final period knotted at five all.

After two minutes had passed Contreras got his fifth goal of the afternoon, but a little later Rees tied it up with his fourth. This set the stage for Oxy's Kahkonen to throw a lightning fast shot into the high corner of the net, spelling defeat for Caltech's determined mermen.

## Working engineers . . .

## may continue study to earn Master's degree

Ambitious young engineering graduates today want to be in two places at the same time. They want to be employed as quickly as possible, working daily at a job that offers promise of a rewarding career. They also want to be in the classroom, pursuing advanced studies they know to be so essential to real professional achievement.

Recognizing the many significant benefits to be gained by that two-fold ambition — benefits that accrue both to the individuals, personally, and to the company employing them — Pratt & Whitney Aircraft has developed an extensive graduate fellowship program. Within easy commuting distance of P & W A facilities, working arrangements have been established with graduate schools at Rensselaer Polytechnic Institute, University of

Connecticut, Trinity College, Yale University, Northeastern University and New York University. Similar arrangements with several other universities are pending final approval.

At each school, the qualified Pratt & Whitney Aircraft employee is able to take courses — within specified areas — leading to a Master's degree. A tuition-refund plan makes it possible for successful degree candidates to obtain this advanced education tuition-free.

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**CAMPUS BREWINS**  
(Continued from page 2)

home for Thanksgiving."  
"Oh? What do you have in (sigh) mind?"

"I've been invited to stay at this kid's house. We'll have turkey and all the fixings. Then we'll play keen games. Then perhaps we'll take a trip to Sunny Old Mexico."

Pause.

"I've been to Sunny Old Mexico, son. You come home for Thanksgiving."

**Speech sans sense**

Then spake drubnoid M. D. V. Lango, saying words of no wisdom about Drubney freshmen.

"What a crazy guy. He'll drink anything you give him," quoth he. "I've seen him drink a whole vanilla root beer. And he also walks along the alley walls. What a crazy guy."

**Swine blank scribe**

Yea, but no Blackah boyth spoke unto the Beak. Not Tal/cott. Not Good/man. So the Beak in his wrath cursed the Blackah boyth, and called his plagues down upon them, for they come not to the Office which is in lower Fleming on Monday nights.

**Baxter offers \$250 prize for chem study**

The Division of Chemistry and Chemical Engineering has announced that a grant from Don Baxter, Inc. will be used to establish two prizes, of \$150 and \$100, respectively, for research in chemistry by undergraduates.

To compete for the prizes a student in the Chemistry or student in the chemistry or applied chemistry option is to Monday, May 20, 1957, describing an original piece of research performed by him. This report is to be prepared independently by the student, without editing by a staff member, and is to describe the research and its significance in clear, concise language and with discrimination as to what is essential in scientific reports. A student may enter the competition even though the research he is doing is not yet completed.

Judging will be done by a committee appointed by the chairman of the division. The basis of judgment will be the quality of the research work and the quality of the report.

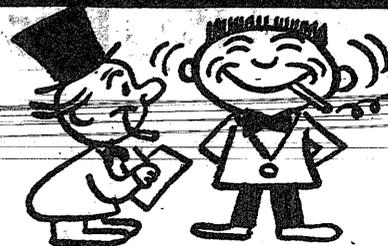
**SLOAN SCHOLARS**  
(Continued from page 1)

city. There was always the weather to contend with, and New York winter weather is not quite up to southern California's standards. For the first three days it was just cold and, although all four Techmen were originally from places that are blessed with brisk winter weather, it was still somewhat of a shock.

The snow that was promised never came to New York (although it seems to have fallen every place else on the East Coast), but mother nature finally caught up with the Techmen Sunday evening. At this time a freezing rain started falling. The rain made the seniors almost glad to be returning home to Pasadena.

All in all, the trip was very pleasant. It provided a welcome relief from smog, studying, and student house food. (Yes, the food at the Waldorf is better than student house food.) Undoubtedly the thought on the minds of all four seniors during the plane trip back to Los Angeles was, "How soon can I finagle another free trip to New York."

**IT'S FOR REAL!** by Chester Field



**PHILOSOPHY FOR TODAY**

"You ask me why I smile," he said,  
"When H-Bombs hang above my head,  
My car's a wreck . . . my gal has fled  
My money's gone . . . I'm in the red . . .  
Why do I smile? . . . You ask me why?  
**CHESTERFIELDS! THEY SATISFY!"**

**MORAL:** Everything looks bright with your Chesterfield aight! Cheer up every-smoking moment with more real flavor, more real enjoyment. Smile, friend . . . with the smoothest-tasting smoke today, packed more smoothly by ACCU-RAY!

**Like your pleasure big? . . .  
Smoke for real . . . smoke Chesterfield!**

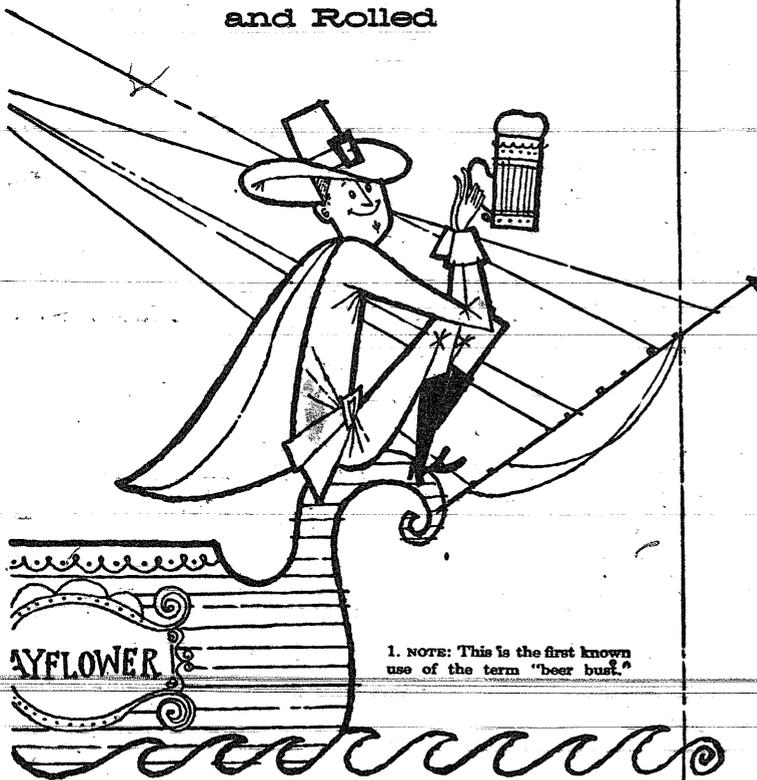
© Liggett & Myers Tobacco Co.



**the First Beer Bust**

or

**Why Plymouth Rocked and Rolled**



1. NOTE: This is the first known use of the term "beer bust."

Once upon a time there was a group of cats who really went far out on a one way excursion canoe called the Mayflower. Now they were a mighty cool combo, but they had to go on tour because a square from Goonville who billed himself as King James I gave them the heel and they had to cut out on merry old England.

Anyway, they finally got a booking on the New World circuit in a spot called Virginia, named in honor of Elizabeth I for some reason or other.

This particular day some of the boys were cooling it on deck, quaffing a few tankards of brew when it was John Alden's turn to go for refills.

When he got below none other than a screen-tester named Priscilla Mullins was running the spigot.

"Make with the suds for Myles Standish," says John.

"I'll clus you, Dad," says Priscilla. "There's exactly one tankard left. Speak for yourself, John."

They split the tankard and John returned topside.

"Sires, I wish to report the beer is gone."

"Nutty, man!" they replied. "That beer is real gone. Give us another chorus on it!"

"But, you don't dig me, Sires" said J. A., "the barrels are empty. This bit is over!"

"WHAT?!" shouted the elders. "OUR BEER IS BUST!! Turn this raft around and make it to Plymouth Rock. We're cuttin' out on this date as of now!"

And that's the story of how the Pilgrims landed at Plymouth Rock instead of Virginia. And if you don't believe it you can take it up with our agent.

**MORAL:** You're missing the boat if you haven't tried the greatest. Next time you order beer, speak for yourself and specify Budweiser. Man, it's the most!

**Budweiser**  
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