



\$100 Awarded In Princess Pic Tech Contest

Seven lucky people are receiving prizes in the California Tech's fabulous Princess Margaret picture contest. Four undergraduates share the \$100 in prize money with three Institute staff members.

By far the best photograph submitted was a captivating colour shot of Princess Margaret and Lord Snowdon with Dr. DuBridge just outside the Athenaeum, taken by Leo Bertolina, Physical Plant plumber supervisor. Other winners of single prizes, in alphabetical order, are: Terry Bruns, Ruddock; Elton Daly, supervisor of hydraulics and water resources in Keck; and John Williams, Blacker.

Double winners

There are three contestants with double prizes for two out of the top ten pictures. In alphabetical order: Birgit C. Dunn, secretary in data processing in Throop; Kim Gleason, Dabney; and Fred Hollander, Lloyd.

Winners may claim their prizes from Stu Galley, Tech business manager, extension 2154.

The California Tech wishes to thank those who entered the contest, and extends a hearty congratulation to the winners.

In contrast, the Tech-sponsored "What I Would Do With Thim Hindrixpons If I Had Him" contest was a dismal failure. Not one entry has yet been received. Therefore, the impartial judges (Bob Berry) have awarded Mr. Hindrixpons to Bob Berry. Hindrixpons has not been seen since.

SENIOR WRITEUP . . .

. . . must be turned in to Dave Shirley, Blacker, or the **BIG T** office by the end of the term (December 18). We may not be able to include any turned in after this date.



—by S. Claus

"But just what DID you want for Christmas, Dear?"

Tech Withstands High School Mob

by John McCord

The Institute opened its doors last Saturday to hundreds of visiting high school students and faculty members during the sixteenth annual Students' Day. These high-schoolers came from as far as three hundred miles to see science in action and gain insight into life here at Caltech.

In the morning the Institute guests were taken on various tours of science exhibits throughout the campus. These exhibits were generally well received by the visitors, most of whom appeared interested and asked many questions. However, certain complaints have been voiced by student guides and other observers. There appears to have been a

great deal of variation in the quality of the presentation, ranging from extremely good to very poor.

'Snow jobs

Many student guides also got the impression that some of the exhibits were too technically presented, snowing the high schoolers completely. Others have stated that the visiting faculty members would have preferred seeing another exhibit to eating coffee and donuts in Winnett.

At noon while their faculty ate in the Athenaeum, the visiting high school students ate in each of the seven undergraduate Houses. In this manner they were able to view close-up the life at Caltech.

Good ole Phlem

The Caltech undergraduates prepared for the high-schoolers in various ways. The Fleming House Mickey Mouse Club converted one of the clock faces on Throop into a Mickey Mouse Clock. A few of the undergraduate Houses made an effort to hold a special reception for their guests. For example, the following ceremony was witnessed at Blacker:

"There is an old Caltech tradition which we would very much like you to participate in," announced Ed Robertson to the hordes of high schoolers who had usurped the Blacker dining hall. "Does anyone have a birthday today?" Timidly one boy near the back of the room raised his hand. The group of upperclassmen who had congregated about Robertson descended on the unsuspecting lad, locked a full-nelson on him, and began hauling him into the lounge.

Amid the looks of horror and fear displayed by most of the guests, the intrepid Techmen navigated him to the showers. A few minutes later he emerged in the dining room slightly dampened, much to the merriment of

(Continued on page 6)

California Tech

Associated Students of the California Institute of Technology

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Pasadena, California, Thursday, December 9, 1965

Number 11

Fall Sports Banquet Honors Athletes

Caltech athletes enjoyed a steak dinner by going to the Fall Sports Banquet last Monday night in Page House. The food and the proceedings were fun for all, especially because the length of the event was held down to three hours.

Dr. Harvey Eagleson, a typical non-athlete, was the master of ceremonies. He started things off by telling a few dirty jokes, then introduced the coaches who later told their own. Following

tradition, the MC then introduced members of the varsity football teams of 10, 20, 30, and 40 years ago.

The major part of the evening was spent by coaches introducing their players and giving glowing reports about their abilities. In between the long lists of names resembling those in Genesis, jokes and stories livened up the proceedings.

"Look out!"—thud . . .

One highlight of the night was the presentation of presents from the football team to their coaches. Sophomore Mike Brennan, giving a physical fitness pamphlet to coach Baldwin, explained how the coach had trained them to be so agile that they could dispense with ordinary blocking techniques. Instead, a blocker could use a "look-out block" which consists of turning from the path of the rusher, wheeling around, and yelling "Look out!" to the quarterback.

Several special awards were made during the course of the evening. Outstanding frosh lineman and back awards went to end Lonnie Martin and quarterback Tom Burton, respectively. John Frazzini and Lee Myers won the Wheaton trophy. Most valuable players were John Walter and Rich Nielsen of the water polo team and Mike Hunsaker of the soccer team.

The speeches were concluded by soccer coach Lee Andrews, whose witty remarks had the audience in tears. He mentioned the famous Ace Rabinowitz's remark that sometimes you look like you're losing when you really are winning.

Math 2: Logical and Intuitive

Math 2, a course noted for its endearing notebook problems, will be split into two sections for the remaining two terms of this scholastic year. As of Dec. 3 14 sophs and the frosh in the course have chosen the course to be taught by Dr. E. C. Dade, current lecturer, and the rest (about 140) have chosen the course to be taught by Dr. H. F. Bohnenblust, Dean of Graduate Studies.

Bohnenblust's section (B) is designed for those students interested in the computational and intuitive aspects of mathematics. The material to be covered during the second term will include the chapters on multiple integration, scalar fields and line integrals of Apostol's **Calculus II**.

Dade's section (D) will use his notes on compact sets, integration and partial derivatives and is designed for those interested in the logical structure of mathematics.

Students may change over between the two sections any time during the second and the first part of the third term. After that time, the two courses will be too far disjoint to allow such flightiness. During the third term, section B will cover the chapters on line integrals, probability, and numerical analysis (time permitting) in Apostol's Second Testament. Dade's section will tackle k-dimensional subspaces of n-dimensional space using part of Fleming's **Functions of Several Variables**.

Merry Christmas

and Happy Hanukkah

from your jolly Techstaff

(Ho-ho-ho . . .)

US Africa Policy

United States foreign policy in Africa was outlined by Wayne Fredericks, Secretary of State for African Affairs, in Beckman Auditorium last Thursday as "supporting the principle of self-determination," yet "heeding United States interests." Fredericks, the latest in a long line of speakers on Africa who have been invited to address the campus, noted that although the US encourages African unity, its overall goal is a group of stable, viable nations in Africa, a goal of African nationalism.

Cool, bwana, cool

Quoting Julius Nyerere's recent speech to the Tanzanian Parliament at several points in his address, Fredericks asked his audience to try to think as Africans. He stressed the goals of the African nations and their need for American aid. He showed how American aid tries to reflect African needs, but is concentrated in the most favorable locations. Two-thirds of American aid goes

to only seven countries in Africa.

The southern tip of the continent, which contains five problems, is seen by Fredericks as the most explosive area of Africa. Of the five problems—South Africa, Southwest Africa, Angola, Basoutoland, and Rhodesia—he classified the Rhodesian Unilateral Declaration of Independence last month as the most dangerous of all. He noted the grave consequences that UDI might bring to Zambia, Britain, and to the United Nations. Zambia's economy is affected by Rhodesia's to a large extent, as is that of the United Kingdom, but the most awful danger is that of renewed racism.

Zambia is ruled by its black majority, but Rhodesia's white minority has illegally seized power recently. Racial harmony in neighboring Zambia, which until 1964 was federated with Rhodesia, may easily be upset, not to mention race relations in the rest of Africa.

Editorials

Discussion Wanted

At the Faculty-Student Relations Committee meeting last Wednesday, discussion centered around one question: **How can student life be improved?**

The students present—the ASCIT president and secretary, the YMCA president and the **Tech** editors—expressed the view that while Caltech offers an excellent scientific education, student life leaves something to be desired in promoting the individual's growth as a person.

Discussion then included: Were the students present representative of the student body? (One answer was that for every vocal, dissatisfied student there is a silent, contented one.) Could the students there state explicitly what they felt the problem was? (No.) And, assuming there is a problem, whose responsibility is it to attempt a solution?

In an attempt to answer these questions, the Committee is presently seeking more student opinion, not just from student politicians but from everyone; i.e., **you**, damn it!

We would like to suggest that you seriously discuss this among yourselves. Try to determine if there is a problem with your life here. We don't even know if we are representative in feeling that there is one. And if you do decide that there is one, try to pinpoint causes and find practicable solutions. **Let people know what you think.** Write letters to the editors; buttonhole faculty, bring them to dinner, and see if they agree with you. They've shown they're interested; now we must show we are.

—Editors:

Tim Hendrickson
Bob Berry
Norton Greenfeld

Debaters Travel to Albuquerque

Over the Thanksgiving Holiday, November 21-26, top debate teams from Colorado to California and Montana to Arizona converged on Albuquerque, New Mexico, for the annual Western Speech Association Tournament. Approximately 350 teams from more than 60 schools participated in Oxford and cross-examination debate, extemporaneous and expository speaking, oratory, and oral interpretation.

Cowards! No results

Debating the effects of recent court decisions on crime, Caltech's entry, Dave Close and Fred Lamb, defeated the University of Puget Sound, Occidental, and New Mexico Highlands in the Senior Men Division. In extemporaneous speaking, Close and Lamb each gave speeches on three different topics concerning United States policy in Southeast Asia and the Indian sub-continent.

Next on the Caltech calendar is the Winter Alternate at UCLA, December 10 and 11.

Summer Jobs

The Civil Service Commission has announced openings for summer jobs with the Federal Government. Employment is available in such positions as student assistant, engineering aid, physical science aid, biological aid, and mathematics aid in pay grades GS-1 through GS-4 (annual salary \$3,507 to \$4,641).

Keep reading

If such work looks lucrative, rush down to the post office, get a Civil Service Form 5000-AB, and mail it to the Civil Service Commission in Washington before January 3. Then, on some as yet to be named Saturday in late January, a 2.5 hour qualifying

(Continued on page 6)



by Mit Nhoj

Alirio Diaz, brilliant virtuoso of the classical guitar, delighted a large audience in Beckman last Friday night with a selection of works ranging from the baroque guitar of the 16th century to the modern classical guitar of the 20th century. A student of Segovia, Diaz was called back for no less than three encores.

The selections played came in rough chronological order, beginning with the "Romanesca" and "Fantasia" of Alonso Mudarra and the "Salterello" and "Ballo" of Simone Molinaro. Mudarra was a 16th-century Spanish composer; Molinaro was one of his Italian contemporaries.

Versatility of the guitar

The third and fourth pieces played by Diaz were "Three Studies" and "Menuet and Rondo" by Fernando Sor. One of the most important figures in Spanish music, Sor wrote a large number of pieces for the guitar. In these and other numbers Diaz demonstrated the versatility of his instrument with Mudarra's two numbers written for the vihuela and Molinaro's "Salterello" originally written for the lute.

The "Sontaina," composed by Federic Moreno Torroba, followed Sor's works with its many enchanting Iberian rhythms which endeared the work to Maurice Ravel. Torroba is probably best

known for his popular Spanish "zarzuelas."

With "Three Catalan Songs" by Miguel Llobet, based on several traditional songs from Catalonia, Diaz opened the second portion of the concert. Then he tantalized the audience with "Four Studies" taken from a group of twelve by the Brazilian composer Heitor Villa-obos.

The works of the recent Spanish composers, E. and R. Sainz de la Maza rounded off the end of the program with "Bolero and Bells at Dawn" and "Three Spanish Pieces: Rondera, Petenera, and Zapateado." Inspired by the popular and traditional music of Spain, these two composers in particular made use of a wide spectrum of guitar techniques, including pizzicato (plucking), percussion, harmonics, vibrato, cadences (a musical sequence of chords moving to a harmonious close, or point of rest), chords, and melodic themes — all of which Diaz handled with consummate artistic virtuosity.

The encores performed by Diaz included two dance melodies, one of Venezuelan origin and the other of Paraguayan stock. All three, though shorter than some items on the regular program, were well worth a place in this delightful concert.

Letters

Go Race Elephants

Editors:

The Associated Students of California State College at Fullerton cordially invite Caltech to participate in the fifth annual running of the world's only intercollegiate Elephant Race. The race will be held on Saturday, April 30, at 2:00 p.m.

Elephant heats

The race is in the form of 100 yard heats. Winners of the heats then participate in the sweepstakes race. Heats are divided into a freshman, a junior varsity, and a varsity division, depending on the size of the elephants. Previous sweepstakes winners have been Long Beach State College, Harvard, Air Force Academy, and Northrop Institute of Technology.

Rent-a-Pachyderm

You are required to reserve your own elephant, at a cost from \$150 to \$300, depending on the size of the elephant. There are three primary sources of elephants in Southern California:

Jungleland, Thousand Oaks; Nature's Haven, Saugus; and Holtzer's Animal Farm, Colton. Caltech is urged to reserve an elephant as soon as possible, as the demand exceeds the supply. You must also supply your own transportation; insurance and housing will be provided by the sponsors of the race.

Participating in the biggest of all intercollegiate sporting events will bring glory for your Alma Mater. We last saw you here in 1963 — good luck in the coming year.

Penny Proud
President, Elephant
Racing Club

Editors' Note:

As we pointed out in last year's **Hot Rivet**, the Elephant Racing Club is a real great bunch of guys. The elephants have won 48 straight races, but the club members haven't yet given up hope and are expected to do well this year.

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Liberal Arts Undergraduate Program for Spring 1966 Semester On Board the Floating Campus: m.s. Seven Seas Sailing Around the World



ITINERARY

Spring 1966 Semester (126 days) leaves Los Angeles on February 10, 1966. Ports of call are: Tahiti, Wellington, Sydney, Perth, Singapore, Madras, Colombo, Tamatave (Madagascar), Dar es Salaam (Tanzania), Djibouti (Somaliland), Ethiopia, Suez, Alexandria, Beirut, Haifa, Piraeus (Athens), Naples (Rome), Tunis, Casablanca, Funchal (Madeira). Arriving New York June 17, 1966.

RATES, TUITION AND FEES

Minimum rates for ship accommodation, meals and all service from \$1,690.00 plus tuition, orientation, field trip and visa fees totaling \$800.00. Scholarships, loans and deferred payment plans available.

ACCREDITATION

Chapman College is fully accredited by the Western Association of Schools and Colleges and by the California State Board of Education for Elementary and Secondary Teaching Credentials. Chapman College holds membership in appropriate professional and educational associations.

ADMISSION

The academic program aboard the floating campus and all other educational aspects

of the overseas program formerly conducted by the University of the SEVEN SEAS has become an integral part of Chapman College.

Our students, admitted to the program must meet regular admission standards of Chapman College and upon fulfilling its requirements, will receive grades and credits in accordance with its regularly established standards. Transcripts of grades, therefore, under normal admission policies, should entitle the student to transfer credits to colleges that accept accreditation standards of the Western Association of Schools and Colleges.

OPTIONS

Students may enroll for a single semester or for a full academic year with one semester on the floating campus and the other at Chapman College in Orange, California or for transfer to another college.

INQUIRIES

Catalog listing courses for the Spring 1966 semester available upon request. Address all enrollment inquiries to: Director of Admissions, Chapman College (Seven Seas Division), 333 N. Glassell Street, Orange, California 92666. Telephone (714) 633-8821.

m.s. Seven Seas under West German registry.

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President's Report

Campus Overrun by Grads

by Jeff Hecht

Caltech's 1964-65 **President's Report** reveals an alarming fact: Caltech is being overrun by multiplying hordes of grad students. In 1957, the ratio of undergraduates to graduates was 1.40; after registration in 1964 the ratio was only .915. We are, gentlemen, simply outnumbered. This is not a temporary quirk, but part of a general, and lamentable, trend.

Sex
For the desperately horny, however, there is some consolation. Now on campus are some 30 women graduate students, a record high. Good luck . . .

It will cheer up freshmen (especially the bottom 8 percent on the last Ma 1 test) to learn that the no-grades policy resulted in

only 7 formal failures among last year's freshmen. No other Frosh Class back to 1957 had fewer. Of course, this does not mean that all of this year's sophomores will make it back next year (or next term, for that matter). Also the total number not returning as sophomores was not that much smaller than previous years: 15 percent of the class is gone, as opposed to a record attrition rate of 19 percent the year before.

Shekles for scholars

Another bit of encouragement to students of all classes: over the past 10 years 63 percent of the entering freshmen have graduated after only 4 years.

Other general trends in such things as scholarship aid to students are revealed in the **Report**. The scholarship aid has been (except for last year) steadily going up in total quantity and size of average grant, and the percent of students receiving aid has been going up constantly. Now 71 percent of all under-

graduates are receiving financial aid. Last year nearly \$600,000 was given on a scholarships to Techmen.

Institute assets have increased from \$58.3 million in 1955 to \$149 million in 1965. One element of this gain was an increase in tuition from \$900 to \$1800 over the same period.

Notices

SENATOR MORSE SPEAKS

A foreign policy address will be given by Senator Wayne Morse January 8, 8:15 p.m. at the Pasadena Civic Auditorium. Tickets are available at the Y office and Beckman ticket office at \$1.00 for students, \$1.50 for non-students.

BUCKLEY VS LOMAX

William F. Buckley Jr. and Louis Lomax will debate world affairs at 8:00 Friday night out at San Fernando Valley State College. Limited tickets available at \$1.00.

See Caltech YR's or call LA Republican HQ at 483-9550.

From Other Campuses

by Smutty

The pages of the Rutgers **Observer** carry the story of a running battle of sorts between the Student Council and the **Observer**. The prime source of friction seems to be the fact that, to quote the ASB treasurer, "not one stinking word about the last Student Council Dance got in the paper before the dance." The struggle wagheth with the paper hacking away in its editorial columns and the Council in its chambers. "We have in the past suggested the failings of the Council as a representative body of legislators. We have even graver doubts as to their ability as journalists." The ASB President maintained that "the **Observer** is a generally bad paper." Etc. Not since the little t waged its daring expose on the **Tech** has this campus seen any like excitement. Ah, for some good mud-slinging.

Snooty compute

The American University in

Washington, in attempting to deal with its increasing parking problems, has computerized the system of dealing with maldoers. Pernicious parkers are fed into a computer live, which cranks out a detailed breakdown of what was parked where and by whom, when it shouldn't have been. With the aid of this copper and silicon fink the University can mail out disciplinary notices within twenty-four hours after the crime. Presumably so they won't go around feeling smug about getting away with anything. Look sharp, Fig. You can be replaced.

Go, ASCIT!

The UCR **Bulldog** has pictorial news of the new, improved, and official Associated Women Student Nightie. Described as "red V-neck, knee length nightshirts," they carry a picture of a coed wearing one, except that hers isn't exactly knee-length since some clever devil has rolled it up a few turns. Maybe that's to emphasize how fast it comes off in case, say, it catches fire or something. For a mere \$2.50 any desirous coed can spend the night safe and secure that the Redlands Bulldog will watch over her; in fact, he'll be plastered across her chest. Without delving into the Freudian significances of the matter, we note that the neck of the nightie is about as V as a turtle-neck sweater and, judging from the picture, it would be just barely possible to tell Cassius Clay from Mamie Van Doren in one of the things. Well, into your ASCIT PJ's boys, the RA's coming around for a room-check.

69ers sure are a great class

In the letter pages of **The Santa Clara** we find another manifestation of student dissatisfaction in the letter of Larry Pischoff, '69: "The recent rash of promiscuity on campus has pointed up a continuing need that, like sewage, has long been neglected: creation of rules. I have found through experience that a large number of strong rules is the only way to keep people in line. And the violation of the rules by the confused and blind must be remedied by more rules. These problems can be discussed and sneered at ad infinitum but the only way to remove them is with rules. What I want to see is more rules!" We bet he's cool. We all have our crosses to bear, and it looks like Santa Clara has Larry Pischoff, '69.



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TECH Sports



—by Gleason

Jim Stanley launches a high shot toward the basket in the game against Biola, as Jim Pearson (50) moves in for the rebound and Terry Bruns watches. Beavers won 65-62.

Basketball Team Edges Biola; Then Crushes Pacific Christian

started its season off on the right foot by winning its first two games, played last week. Against Biola on Friday, the Beavers built up an early 10 point lead and hung on in the final period to win their opener 65-63.

Early trouble

First game jitters were evident as the Beavers fell behind early in the first quarter 10-7. An inspiring full court press led by Jim Stanley and Jim Pearson turned the tide in the latter part of the first half as Caltech went ahead to stay. Some fine shooting by Terry Bruns helped to build a 37-27 lead at intermission.

The pace quickened considerably in the second half. Early in the final period the Teckers led by as much as 12 points, but with only five minutes remaining the Beavers suddenly turned cold. The lead dwindled rapidly. With 1:29 remaining the difference was only one point at 59-58. Bruns tipped in a rebound, then Pearson hit a long jumper to increase

the margin to five. Biola, however, refused to give up and closed the gap to 63-62. Pearson hit two free throws with 40 seconds remaining to reach the final score of 65-62. The Beavers controlled the ball for most of the final 30 seconds to put the game away.

It was a magnificent team effort. The team did not look too polished at times, but none could equal their hustle and winning spirit. They had some foul trouble as Bruns, Stanley, and Doug Holford all fouled out late in the game. Also, Pearson managed to play with four fouls all throughout the second half. But they had a good enough team on the court at all times to win.

Experienced Strength

On Saturday, the Beavers rolled over Pacific Christian 105-52 at Long Beach. Caltech never trailed. Some fine outside shooting by Stanley, Don Blair, and Ed Hsi obliterated a zone defense early, while Bruns was dominat-

ing the offensive board. After a big second-quarter spurt, the Beavers led by 44-23 at halftime. In the second half the cagers ran away from their opponents with a full court press to break the century mark. Again the front line was superb. Bruns and Pearson controlled both backboards completely. Five players were in double figures as the team hit a blistering 49.4 percent from the floor and 15 of 17 from the free-throw line.

As shown by the first two games, this year's success will come from a sound front line and an abundance of guards. Games yesterday and today at the Scott Brown Gym against Life College finish off the first term schedule. The games are at 8:00 p.m., so here's your chance to see a Caltech team win.

Score by Quarters

BIOLA	16	11	19	16	62
CALTECH	16	21	17	11	65
CALTECH	19	25	26	35	105
PACIFIC-CHRISTIAN	15	8	15	14	52

Final Football Fleming Wins

by Kahuna

Led by the great white hunter from the Northwest, merciless killer of innocent squirrel and deer, the men (?) of Fleming regained possession of the wandering Discobolus, defeating the surfers of Lloyd 637 to 623 in a rifle shooting match held last Saturday at the Civil Defense range in Altadena.

The great white hunter, Walt Davis, carded a high score of 135. Second for Big Red was future Viet Cong fighter, the pride of the Caltech ROTC (builds men), Dennis Weaver with a 131. An expatriate Norwegian resistance leader, Erik Storm, followed close behind with a boss 128. "Twitch" Tichenor managed to steady himself long enough to plunk out a 127. Rounding out the team, fresh from the Commanche wars, was noted Okie-Bill Owens with a 116. The Big Red machine, having destroyed the myth of Lloyd invincibility, eagerly awaits its next victim next term.

Although the Caltech football team had a miserable season overall, there were several outstanding individual performances. Four men — tackle Andy Kampe, fullback-end John Frazzini, end Lonnie Martin, and quarterback Tom Burton — got honorable mentions on the all-conference team. The latter two are only frosh.

Quarterback Burton did a fantastic job directing the offense and passing, although hampered by a lack of adequate blocking protection. He was fourth among the conference quarterbacks with 57 completions out of 134 attempts for a .425 average. In seven games he passed for 528 yards and two touchdowns, while having only nine passes intercepted.

John Frazzini was fifth in the SCIAC in punting. Although he had a few bad punts near the end of the season, he finished with a fine 34.8 yard average for 43 punts. He also led the Caltech pass receivers with 16 receptions.

Leading scorers on the Caltech team were Lonnie Martin with two TDs and 12 points, Burton with a TD and two extra points for eight points, Frazzini and Mike Brennan each with one TD for six points.

The team only started to concentrate on passing about midway through the season, but then the bombs began to fly. Martin scored on the longest pass of the season, a 55 yarder against UCR.

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BASKETBALL STATS

CALTECH	G	FT-A	T	BIOLA	G	FT-A	T
Yudelson	3	0-5	6	Watson	0	0-0	0
Potter	2	1-1	5	Owens	0	0-0	0
Pearson	7	6-11	20	Thune	5	6-7	16
Bruns	8	4-6	20	Cobbett	3	2-2	8
Holford	0	3-4	3	Paterson	8	3-7	19
Blair	1	1-1	3	Barbour	3	1-4	7
Stanley	3	2-5	8	Croze	0	0-2	0
Hsi	0	0-1	0	Grant	3	6-8	12

TOTALS 24 17-34 65 TOTALS 22 18-30 62

CALTECH	G	FT-A	T	PAC-CH.	G	FT-A	T
Yudelson	8	2-2	18	Douglas	5	3-8	13
Pearson	10	1-1	21	Walker	0	0-0	0
Ma	0	0-0	0	Henderson	1	2-2	4
Bruns	10	4-6	24	Foote	5	2-3	12
Firestone	1	0-0	2	Root	1	4-7	6
Holford	0	0-0	0	Admas	1	2-5	4
Blair	3	1-1	7	Clapman	1	0-1	2
Stanley	4	2-2	10	Thickens	0	0-0	0
Hsi	6	3-3	15	Lockwood	3	5-8	11
Potter	4	0-0	8				

Totals 46 15-17-105 Totals 17 18-30 52

Mobil Economy Run

The Office for Industrial Associates is looking for a **21 year old senior** who would like to be Chief Observer for the 1966 Mobil Economy Run. Applicants must have participated as observers in previous runs, live on campus, and be clean-shaven; a car is not required.

Interested students should submit their names to the Industrial Associates Office, Room 7 Throop, no later than December 15.

Soccer Teams End Season

The soccer season came to a magnificent close with two games between Caltech and UCLA last Saturday. After that, everything was capped off with an All-Star game. The first game to be played was the undergraduates' contest. UCLA had overwhelmed the Beavers in a previous game at the beginning of the season. But by the second game most of the inexperience had worn off the Teckers. The contest was extremely close throughout, the ball going into both sides of the field instead of being confined to one end. The Tech offense suffered from the absence of star center-forward Mike Hunsaker. Although they were able to take the ball near the Bruin goal, they weren't able to push it in. At the end of the half UCLA led 1-0, but in the second half they were able to capitalize on a couple of defensive lapses, and finally won 4-0.

The game of the graduate students came next, and this turned out to be an almost completely even match. At the end of the

half the score was tied 1-1. John Trischuk had scored the first goal for Caltech, taking a beautiful pass from Willie Behrens in front of the goal and kicking it in. In the second half two gross defensive errors gave the game away. A penalty kick resulting from a "hands" call in the penalty area plus a goal kicked into his own goal by a Tech defensive man lost the game 3-1.

Next year though . . .

The varsity has high hopes for next year, with most of this year's players returning; the open team is losing very many of their starting players and will have to reform next year.

The All-Star game was played between the open league all-stars and the undergraduate (NCAA) league all-stars. Five graduate students, Willie Behrens, Dick Wade, Ed Cline, Vasilio Kerdelidis, and Eberhard Mahn (better known as Mix) made the team, while only one undergraduate, Mike Hunsaker, played in

the game. It was a beautiful and exciting game to watch, as every player was an expert kicker and ball handler. The grads from UCLA and CIT, the stalwarts of their teams were tired from their just-completed game, so the undergrads managed to make the game close. The grads managed to prevail, though, by a score of 3-2.

IH Swimming Preliminaries

Interhouse swimming got underway with preliminaries held last Tuesday. The results of the heats show that Fleming and Ruddock will be fighting it out for the top position. Blacker has an outside chance of upsetting one of the top two, but will probably come in third. The other four houses are closely grouped together, and it is almost impossible to predict their final positions.

Fleming is led by Ralph Kimbrell who took firsts in the 50 and 100 yd. freestyle races and Richard Wright who took seconds in the 50 yd. freestyle and the individual medley. Ruddock had Van Stoecker place first in the individual medley, and they also had a couple of seconds. They are relying more on their depth to pick up many points in lower places.

The one outstanding performance of the afternoon was turned in by freshman John Healy of Page who broke the Interhouse record in the 50-yd. breaststroke with an amazing time of 32.8 seconds. This was more than two and a half seconds better than the second place finisher and a half a second below the record.

The diving competition took place yesterday. Today at 4:30 the finals of all the races, plus the relays, will be swum. House spirit makes everyone's attendance mandatory.

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Brewins



In the day of Saturnalia last, there was occurring in the land of those who consume it more leisurely than the Flemings, one commemoration of the holiday season. Upon the conclusion of masticating the offerings of MamaS, two yet unbearded ones of the order of '69, Laze Fellas and Spong Durtin, requested of one having sufficient age to choose party hacks, Superbawls, that he purchase a quantity of nectar. This was done and the now gleeful ones proceeded to wrap themselves about the aforementioned nectar.

Snake!! whap, whap, whap . . .

After several turnings of the time-wheel, the unbearded ones visited the den of the superbawls, intent upon replenishing their supply of nectar. However, 'bawls, who was studying (?) with a wench, was not to be moved. The pair repaired to the Powerful One and obtained salvation, which was duly put away. Somewhat before the witching hour, the Alley Mother, one Most Holy, was required to bed down a pair of striplings, from the Land of Way Under.

Having practiced the skill, the Holy One proceeded to assay his technique using his date for subject, with some large amount of success. However, yet another member of the order of '69, whose bearing is not keen, attempted to question the Holy One with

regard to his motherly activity. He, clad only in his leggings, conversed at the mouth of his cave for over 4/10 of a standard milliperiod.

The unkeen one, finally receiving divine revelation, when his visual sense (which is acute in a generally obtuse universe) informed him of a wench sandwich standing on four legs in the cave, bid the chilly Holy One a good night. However, as for the Alley Mommy, he was seen soon after leaving his pad with recent third subject in tow.

The evening before Students' Day, Fleming House Mickey Mouse Club leaders were seized with the notion of MMingThroop's timepiece. Swift preparations ensued in secret factories, and at midnight a task force drifted off piecemeal to the west, bearing strange objects, chortling in expectation of the outrageously unexpected rodent's appearance Saturday sunrise, hung onto Lee's exceedingly salient clock.

Fool's gold

Of nine FHMMC operatives united near decrepit Throop Hall, eight levitated over unfathomable vertical reaches, expertly positioned prefabricated rodent components, and rapidly descended; the ninth snapped photos from below. All vanished like vapors before the guard's pitifully belated flashlight beam. Next morning, the world stood confounded.

High School Hordes

(Continued from page 1)

those guests who found the situation highly humorous.

The executioners then returned and repeated their request. A few others raised their hands, saying "He does!" and pointing to a hapless high-schooler, who fortunately was spared the showers.

Blacker predicts a record low number of applicants from those who do not know the high school boy was Blacker freshman Jim Leininger. Leininger was congratulated that evening for the success of his mission — again in true Tech fashion.

The students who managed to

survive the ordeal of lunch attended a series of lectures in the afternoon. These lectures were all extremely well-presented and easily comprehensible; however, many complained that the lectures tended to be too lengthy.

Editorializing

In any event the Institute guests were able to see what a scientific institute is really like. Hopefully this visit will aid many of the high school students in determining their future careers. Certainly Students' Day 1965, has made a lasting impression upon most of the visitors' minds.

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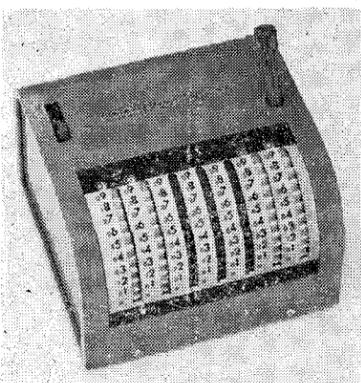
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Beer on the
rocks?

(Oh, no!)

The other day, for the first time, our brewmaster heard of "beer-on-the-rocks." He fell apart.

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