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The California Surveyor

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THE VOICE OF THE LAND SURVEYORS OF CALIFORNIA

NO. 41

SPRING/CONVENTION EDITION

1976

California Land Surveyors Convention — 1976

The Convention Division of the California Land Surveyor's Association has finalized plans for its Annual Convention on April 1-3, 1976 in Universal City. The convention, to be held at the Sheraton-Universal Hotel, is anticipated to be the largest in C.L.S.A. history.

On Thursday morning, the proceedings will begin with committee meetings being held in the Studio Suites. One of the more important meetings to be held will be the Status Improvement Committee, which will meet in Studio One to discuss the definition of Land Surveyor as it pertains to professional status. Other committee meetings will be announced by the Chairman.

At 1:30 pm on Thursday there will be a general membership meeting of the Association held in the East Ballroom. Members will be afforded the opportunity to question committee chairmen on the work they have been doing in the past and make suggestions for the future.

The exhibitors will sponsor their traditional cocktail hour on Thursday evening followed by a no-host cocktail party. Expectations are that about 35 exhibitors will be in attendance demonstrating the newest and finest equipment and services.

The main convention activities will commence on Friday morning, with the first technical session being given by John G. Gergen, Assistant Chief, Horizontal Network Branch, U.G.S. He will discuss the new adjustment of the North American datum.

The luncheon on Friday will feature a Keynote Address by William Hewlett of Hewlett-Packard, followed by a discussion of insurance. Marshall Ames of Victor O. Schinnerer and Co. Inc., will speak on Malpractice (errors and omissions) Insurance and its relationship to surveyors.

The final session on Friday will be a panel discussion of Environmental Impact Reports—Boon or Bane. It will feature Richard Wirth of the Building Industry Association, Brent Rushforth, attorney from the Center for the Study of Law in the Public Interest, and a member of the California legislature.

There will be a banquet in the East Ballroom on Friday

night. After dinner entertainment will be provided by a dance band.

Saturday will be the day that the NOAA Ship Fairweather will be held open for tour to registrants of the convention. Buses will depart convention headquarters at 8:45 and 11:45 for the tours.

(Continued on page 17)



Newly elected President A.E. Griffin (right) receives the gavel of office from outgoing President Joseph J. Scherf (left) in ceremonies at the C.L.S.A. Annual Meeting on January 24, 1976.

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The California Surveyor

is the quarterly publication of The California Land Surveyors Association and is published as a service to the Land Surveying profession of California. It is mailed to all Licensed Land Surveyors and Land Surveyors in Training in the state of California as well as to all members of California Land Surveyors Association. The California Surveyor is an open forum for all surveyors, with an editorial policy predicated on the preamble to the constitution of the California Land Surveyors Association and its stated aims and objectives, which read:

"Recognizing that the true merit of a profession is determined by the value of its services to society, the 'California Land Surveyors Association' does hereby dedicate itself to the promotion and protection of the profession of Land Surveying as a social and economic influence vital to the welfare of society, community, and state."

"The purpose of this organization is to promote the common good and welfare of its members in their activities in the profession of Land Surveying, to promote and maintain the highest possible standards of professional ethics and practices, to promote professional uniformity, to promote public faith and dependence in the Land Surveyors and their work."

Advertising

Commercial advertising is accepted by "The California Surveyor" and advertising rates and information can be obtained by contacting the Editor, P.O. Box 3707, Hayward, CA 94540.

Classified advertising is published at the rate of \$2 per line for members of C.L.S.A. and \$4 per line for non-members and should also be directed to the Editor of "The California Surveyor."

Sustaining Membership

Membership in the California Land Surveyors Association as a sustaining member is open to any individual, company or corporation who, by their interest in the Land Surveying profession, is desirous of supporting the purposes and objectives of this association. For information regarding sustaining membership, contact the Editor of "The California Surveyor."

Editorial Material

All articles, reports, letters and contributions are accepted and will be considered for publication regardless of the author's affiliation with the California Land Surveyors Association. Material should be sent to "The California Surveyor," P.O. Box 3707, Hayward, California 94540.

EDITOR: Michael S. McKissick, L.S.
P.O. Box 3707
Hayward, CA 94540 Phone 415-581-1070

DEADLINE DATES FOR THE CALIFORNIA SURVEYOR

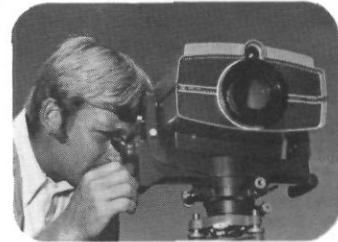
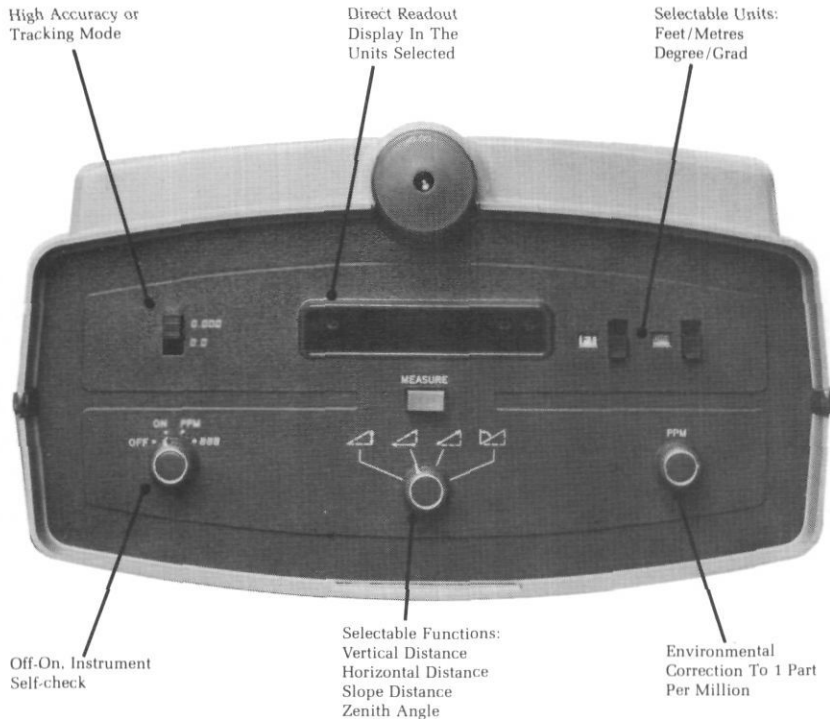
SUMMERMAY 15, 1976
FALLAUGUST 14, 1976

Articles, Reports, Letters, etc., received after the above mentioned date will be placed in the next edition.

Editor

New-Total Station.

Angle and automatic horizontal distance measurements from one instrument.



Angle and distance measurements couldn't be easier. Or faster. The new HP3810A Total Station lets you read and lay out horizontal distances automatically. It also gives you combined angle and distance measurements. The secret? A built-in vertical angle sensing device, a microcomputer, and a horizontal angle base.

Point the HP Total Station, press one button, and it quickly measures your slope distance, zenith angle, corrects for curvature and refraction and automatically computes and displays your horizontal distance. This time and money saver also has a tracking mode that drastically shortens layout time—making readings every three seconds to speed you from point to point.

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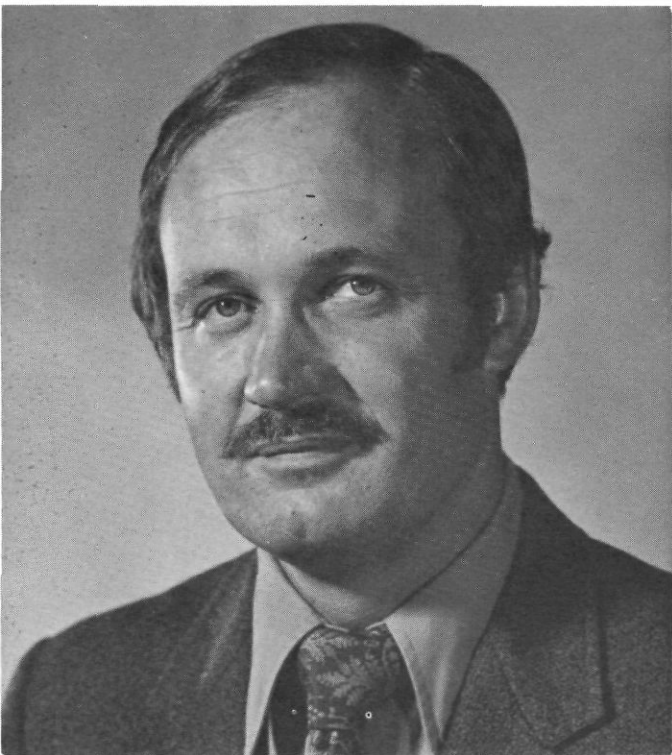
Signature: _____

HP
NEW C.L.S.A. MEMBERS



President
A.E. Griffin, L.S.—Fair Oaks

Education: B.A. from San Francisco State University.
Current Position: Chief, Branch of Cadastral Surveys, California State Office of the Bureau of Land Management.
Professional Organizations: Previous Legislative Coordinator and Past Chairman of Legislative Committee C.L.S.A.; two terms on the Board of Directors C.L.S.A.; Past President of East Bay Chapter C.L.S.A.; member of A.C.S.M. and C.S.P.E.; senior member of American Right of Way Association

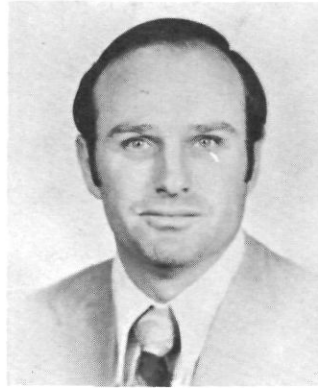


Vice President
Michael K. Welch, L.S.—Santa Maria

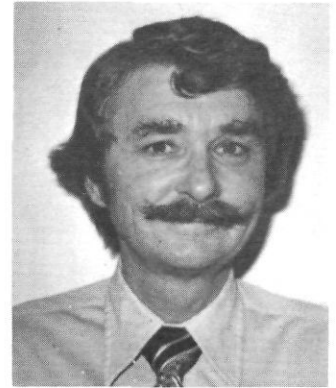
Current position: Owner-private firm in Santa Maria, California and teaching land surveying at Allan Hancock Community

College.

Professional Organizations: Past Secretary of C.L.S.A.; member of Ad Hoc Committee on Professional Development C.L.S.A.; member of Ad Hoc Committee on Accreditation of Curricula and Curricula Study C.L.S.A.; as Chairman of Historical Committee C.L.S.A., is currently forming the California Land Surveyor's Historical Society, Inc., was the first President of Central Coast Chapter C.L.S.A. and later Secretary-Treasurer of that Chapter. Member A.C.S.M.



Donald E. Bender



Paul Lamoreaux

Secretary
Donald E. Bender, L.S.—Sherman Oaks

Education: Graduate of Pasadena City College. Continuing Education courses at Ft. Belvoir, Virginia, East Los Angeles City College, U.C.L.A. and University of San Fernando Valley College of Law.

Current position: Assistant Survey Supervisor of Los Angeles Department of Water and Power.

Professional Organizations: Previous Treasurer and member of Legislative Committee C.L.S.A.; past Treasurer and member of F.A.M. and Education Committees C.L.S.A.; past Chairman of Status Committee C.L.S.A.; member of A.C.S.M., A.S.P., C.I.S., N.S.P.E. and C.S.P.E.

Treasurer
Paul W. Lamoreaux, Jr., L.S.—San Carlos

Education: B.S. from San Diego State.

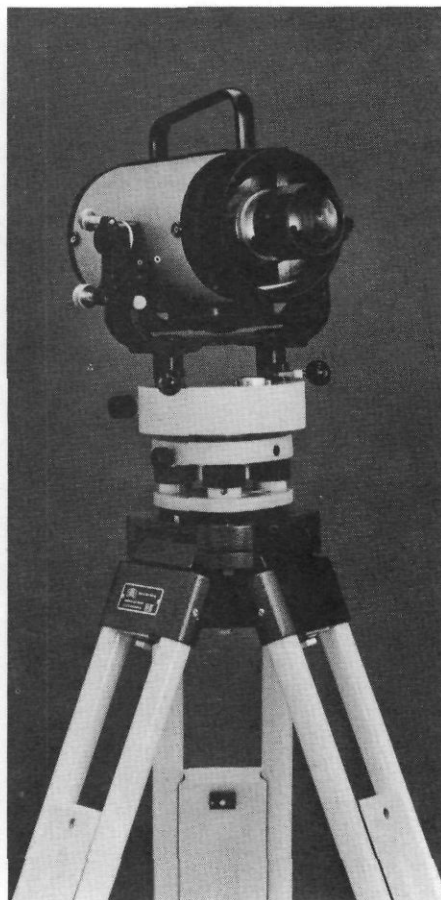
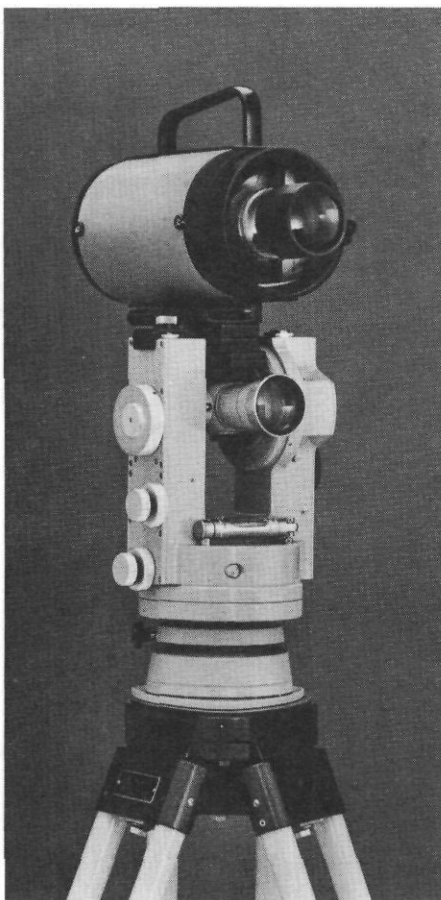
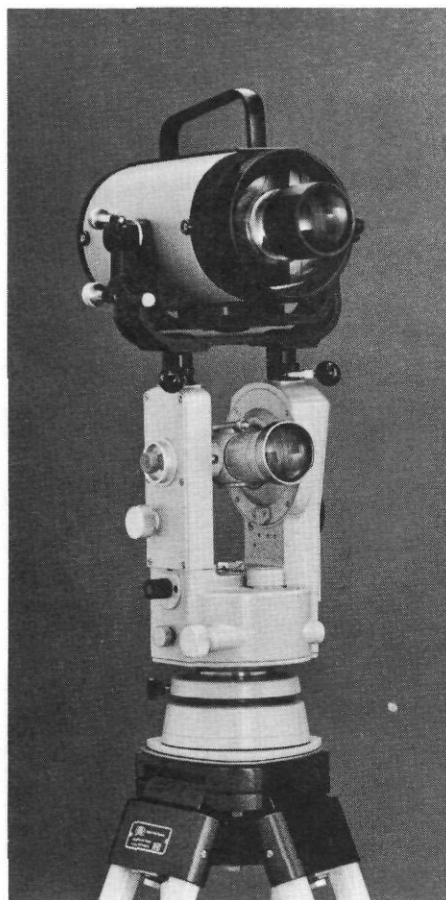
Current position: Real Estate Engineer for BART—administering consulting land surveyor contracts.

Professional Organizations: C.L.S.A. Director at Large (3 years); C.L.S.A. Legislative Committee (6 years); Convention Division Coordinator (current); Chairman C.L.S.A. Status Improvement Committee; Past President of San Mateo-Santa Clara Chapter C.L.S.A. (2 years); Vice Chairman of 1973 C.L.S.A. convention; C.L.S.A. Chapter Representative (3 years); Member of A.C.S.M.—Land Survey Division, East Bay Council on Surveying and Mapping, American Right-of-Way Association—Chapter 2, Commonwealth Club of California.

Director at Large
 James N. Dowden, L.S.—Carmichael

Education: Graduate of Fullerton College

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PROPOSED LADIES ACTIVITIES

What better way to celebrate the Bicentennial year than to have the Hospitality Room located in the magnificent Presidential Suite of the Sheraton-Universal. Relax and enjoy complimentary refreshments and friendly conversation in an atmosphere of luxury and spacious surroundings. To further insure your comfort, a Hospitality Hostess will be available from 9:00 a.m.



A full schedule begins Friday morning with coffee and donuts served in the Hospitality Room. At 10:30 a.m., private trams with tour guides will leave for Universal City, where a luncheon will be served in the glamorous Studio Commissary. Then on to a tour of Universal where fun, action and excitement are guaranteed to make you smile. Linger at the Live Entertainment Area or return to the hotel at your convenience aboard shuttle buses. Perhaps a quick visit to the Hospitality Room before preparing for the evening festivities.

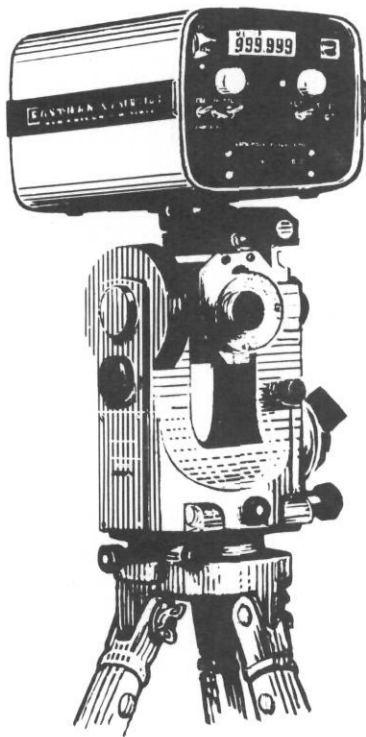
Saturday morning, pre-tour coffee and refreshments will be served in the Hospitality Room. Chartered buses will leave at 10:00 a.m. for a scenic ride to the famous Huntington



Library—Art Gallery and Botanical Gardens. The Art Gallery was originally the Huntington residence and has such notable works of art as Gainsborough's "Blue Boy," Lawrence's "Pinkie," plus one of the richest assemblages of furniture, tapestries, porcelain, sculpture, ceramics and silver in America. The paintings are displayed in domestic settings similar to those for which the art was created. Docent guides will take us through the spectacular Botanical Gardens where an extensive collection of plants, shrubs and trees are arranged in breathtaking displays. Better bring your camera, plenty of film and walking shoes as we continue after a short ride to the stately old Huntington-Sheraton Hotel for lunch. Before boarding the buses for the return trip, take a leisurely stroll through the gardens and grounds which make this beautiful establishment so very well known. Time permitting, we invite you to again make use of the Hospitality Room where you will always receive a cordial welcome.



For those who prefer to explore on their own, many small shops are available a short distance from the Hotel and the Hospitality Room will remain open throughout the day. ▲



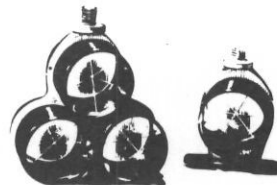
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NEWS FROM THE BOARD

by Ray Thinggaard

At the January meeting the Board held a public hearing and adopted the following rules to conform to recent legislation:

1. Amend Section 407(c) to read:

407(c). ~~The following is the prescribed four-year renewal fee for:~~

(1) Authority to use the title "structural engineer"	\$20	\$40
(2) Registration as a professional engineer	\$20	\$40
(3) License as a land surveyor	\$20	\$40
(4) License as a photogrammetric surveyor	\$20	\$40
(5) Authority to use the title "consulting engineer" pursuant to Sections 6732.1 and 6732.2	\$20	\$40

Such four-year renewal fees shall become effective on July 1, 1976. Prior to June 30, 1976, the board shall divide the list to active registrants and licensees alphabetically into 16 groups corresponding to the 16 quarters in the quadrennial renewal period and renewal notices shall be sent to all registrants based on the following pro rata schedule:

Group	Interim expiration date	Renewal fee
One-eighth	December 31, 1976	\$ 5.00
One-sixteenth	March 31, 1977	7.50
One-sixteenth	June 30, 1977	10.00
One-sixteenth	September 30, 1977	12.50
One-sixteenth	December 31, 1977	15.00
One-sixteenth	March 31, 1978	17.50
One-sixteenth	June 30, 1978	20.00
One-sixteenth	September 30, 1978	22.50
One-sixteenth	December 31, 1978	25.00
One-sixteenth	March 31, 1979	27.50
One-sixteenth	June 30, 1979	30.00
One-sixteenth	September 30, 1979	32.50
One-sixteenth	December 31, 1979	35.00
One-sixteenth	March 31, 1980	37.50
One-sixteenth	June 30, 1980	40.00

On July 1, 1976, as certificates of registration are renewed, new receipts shall be issued indicating the interim expiration date. As interim expiration dates come up, certificates of registration shall be renewed for the full four-year period and new receipts issued indicating the next quadrennial expiration date.

2. Amend Section 407(e) to read as follows:

407(3). Renewal applications filed with the Sacramento office more than thirty (30) days after 12 p.m., ~~on the expiration date and~~ not accompanied by the prescribed delinquent penalty fee equal to the lesser of \$25 or 50% of the renewal fee shall be returned by the executive secretary

with a statement of the reason therefor.

(Statutory authority for above change is Section 163.5 of Business and Professions code as well as AB 1798.)

3. Amend Section 407(f) to read as follows:

(407(f). Refund of fees submitted to the board shall be made only as follows:

- (1) Any application fees or penalties imposed and collected illegally, by mistake, inadvertence or error shall be refunded in full.
- (2) An applicant for registration as a professional engineer, for license as a land surveyor, or for permission to use the title "structural engineer," for certification as an engineer-in-training or for certification as a land surveyor-in-training found not eligible for admission to the examination requested *may* have one-half his application fee refunded.

~~Except as provided in (f)(1) above, no portion of any application fee for certification as an engineer-in-training or land surveyor-in-training, or for granting of any title or authority without examination may be refunded.~~

4. Add Section 418(b) (7) to read:

418(b)(7). Evidence of any act(s) committed subsequent to the suspension or revocation which would be grounds for suspension or revocation of the registration, license, certification or authority.

5. Amend Section 427(b) to read:

427(b). Nothing herein contained shall be construed to limit authority of the board to seek such other information pertinent to the character, education and experience of the applicant as may be required to verify his qualifications.

6. Repeal Section 429.1: Denial for Lack of Good Moral Character.

7. Repeal Section 429.2: Suspension or Revocation Because of Conviction of a Crime.

8. Amend Section 441(b) to read as follows:

441(b). Any applicant who, in the opinion of the board, lacks the qualifications for admission to the examination required by Section 6736, 6751 or 8742 of the code and rules of the board shall be declared ineligible; he shall have his application denied without prejudice and his application fee ~~shall~~ may be partially refunded in accordance with provisions of Section 6763.5 or 8748.5 of the code.

You will note that the Board is going to a staggered renewal as D.M.V. has done.

New officers ofr 1976 were elected as follows:

Roy Johnston C.E., President (continuing)

William Battersby M.E., Vice President

The Board now has available, for the asking, booklets containing the Engineers' Act, Land Surveyors' Act with the Board Rules and Regulations. For your copy, write:

Board of Registration
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“The name is what they do!” may not be grammatical, but it pretty well describes the activities of Surveyors Service Company of Costa Mesa, one of CLSA’s sustaining members.

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As distributors for the world-renowned line of fine surveying equipment produced by Wild-Heerbrugg, Surveyors Service Company’s staff takes pride in their record of assisting California licensed land surveyors in upgrading their professional competence and skill with modern equipment and instrumentation.

Whether it be plumb bobs or vertical collimators; precise leveling rods or folding rules; pocket tape-rules, chain tapes or electronic distance measuring systems; transits or theodolites, CLSA members will find SERVCO’s representatives competent and courteous and ready to serve you. ▲

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surveying equipment

Lewis & Lewis Company was originally started by Mr. R.B. Lewis as a locally oriented Civil Engineer-Land Surveyor Company in Ventura, California. During 1953, a partnership was formed by Mr. R.B. Lewis and his son, Mr. R.T. Lewis. In 1953, Mr. Robert T. Lewis took over active management of the firm. During the next few years, “Bob” Lewis became one of the first to actively pursue the burgeoning offshore and navigational work. Using the most modern electronic equipment and survey techniques, the Company became world-wide in scope and operation, sending men and equipment to wherever the need arose.

In the natural course of events, another facet of the business was born. Because much of the precision equipment used by the firm was too costly for many individuals and companies to

own, a rental division was started and has grown to include most types of survey equipment.

In conjunction with the Rental Division, the firm of Lewis & Lewis has recently begun sales of selected quality surveying equipment. One of the first items distributed on a national scale was the Retro-Ray line of retro-reflectors—originally used and tested in the operational side of the business. A rental/purchase plan for Distance Measuring Equipment and related survey equipment has also been created.

Future plans include a broadening of the marketing base of Lewis & Lewis. As more equipment is tested and added to the line, the Company will continue to offer the options of Lease, Rental, Purchase or a combination of these plus full service capability anywhere there is a need.

The company has recently moved to new headquarters at 1600 Callens Road, Ventura, CA 93001 (telephone 805/644-7405). ▲



Hewlett-Packard—“Creators of Working Tools for People Who Measure and Compute”—is one of the world’s leading designers and manufacturers of electronic measuring and test instruments and systems; electronic calculators, computer and computer systems; medical instruments and systems; instruments and systems for chemical analysis; and high-technology, solid-state components.

Founded in 1939, with headquarters in Palo Alto, California, the company is an international organization with some 29,000 employees. Hewlett-Packard produces more than 3,000 products at 22 domestic divisions in California, Colorado, Oregon, Idaho, Massachusetts, New Jersey and Pennsylvania and at eight overseas plants located in the German Federal Republic, United Kingdom, France, Japan, Singapore, and Malaysia. These products are marketed throughout the world, primarily through the company’s own network of 172 sales and service offices in 65 countries.

A large share of Hewlett-Packard’s resources are devoted to the design and manufacture of distance/angle measuring systems, programmable desk-top calculators and peripherals, and powerful pocket-sized calculators for the surveyor.

The latest contribution from HP’s Civil Engineering Division is the new HP3810A Total Station. Now, for the first time, a low cost surveying instrument is available that allows the surveyor to measure horizontal, vertical and slope distances, plus vertical and horizontal angles from a single cable-free instrument. This instrument also incorporates a tracking mode which is ideally suited for layout and location surveys.

In the expanding programmable calculator line, the latest contribution is the new HP9815A Surveying Calculator. The HP9815A is almost as portable as HP’s hand held calculators, but has the problem solving power of a mini-computer.

Complete information on Hewlett-Packard Surveying Products is available from local HP Sales and Service Offices in Sacramento, Santa Clara, Fullerton, North Hollywood, Los Angeles, San Diego, or from Hewlett-Packard Civil Engineering Division, P.O. Box 301, Loveland, Colorado 80537, (303) 667-5000. ▲



In 1882, Adolph Lietz founded the company bearing his name which is now the oldest manufacturer of surveying instruments in the western United States. Lietz instruments played a significant part in the "building of the West" having been used on major engineering projects throughout the state of California including the construction of the Golden Gate Bridge. Lietz theodolites were used on many of the primary triangulation projects throughout the state.

Now one of the major suppliers of surveying instruments and equipment in the United States, Lietz products are available from more than 150 Authorized Distributors nationwide. As the exclusive importer of Sokkisha surveying instruments, Lietz is able to offer everything from builders instruments to sophisticated theodolites including the unique digital theodolites which display vertical and horizontal angles electronically and instantaneously. EDM Equipment and Laser Instruments are also part of the broad range of Lietz Products.

Headquartered in Carson, California. Lietz maintains a sales and service office in Burlingame in the Bay Area and an eastern warehouse and service facility in Cinnaminson, New Jersey. Expert repair and maintenance service on all makes of instruments is provided at each location and a staff of friendly, helpful employees stand ready to serve all members of the California Land Surveyors Association. ▲



KEUFFEL & ESSER CO.

The Keuffel & Esser Company of Morristown, New Jersey, maintains a full line of quality geodetic instruments, field equipment and map-making materials. In addition to the standard line of transits and levels, K&E is the exclusive distributor in the United States for Zeiss (West Germany) geodetic and photogrammetric instruments. Among the items offered in the Zeiss line is the Th2 One-Second Theodolite, the Th43 Optical Scale Repeating Theodolite, the SM 11 and Reg Elta Electronic Recording Tacheometers and the famous Ni1 and Ni2 Self-Leveling Levels. Also available in the K&E line are other electronic distance-measuring instrumentation covering distances from 1 to 40 miles. K&E offers its line of STABILENE Films for map making in applications of precision cartography. This wide variety of proven products includes sensitized as well as unsensitized materials in peelable and scribable forms. For additional information contact Keuffel & Esser Company, 1327 South Olive St., Los Angeles, Calif. 90015 (telephone 213/747-7601) or Keuffel & Esser Company, 223 Lawrence Ave., South San Francisco, Calif. 94080 (telephone 415/873-6850). ▲

(More Sustaining Members on page 14)

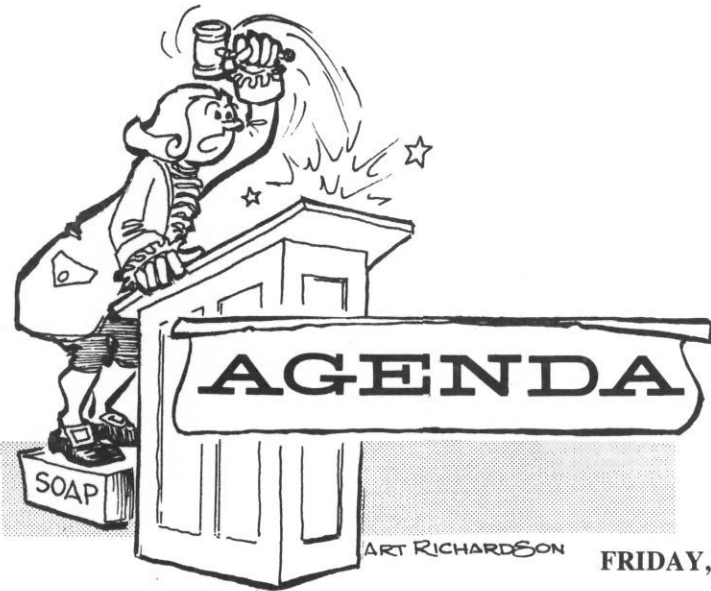
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CALIFORNIA LAND SURVEYING CONVENTION



THURSDAY, April 1, 1976

9:00 A.M.	Committee Meetings
12:30 P.M.-5:00 P.M.	Registration desk open
1:30 P.M.	General Business Meeting
5:30 P.M.	Exhibitor Hosted Cocktail Party
6:30 P.M.	No Host Bar Opens

FRIDAY, April 2, 1976

8:00 A.M.	Registration opens. Exhibits open—West Ballroom. (Coffee and Rolls in Exhibit Area.)
9:00 A.M.	Opening Ceremonies—East Ballroom.
9:45-10:15 A.M.	Break in Exhibit Area. (coffee)
10:15 A.M.	Discussion of the New Adjustment of the North American Datum—John G. Gergen, Assistant Chief Horizontal Network Branch N.G.S.
11:45 A.M.	Attitude Adjustment Bar opens—Exhibit Area.
12:30 P.M.	Luncheon—Studio Suite Keynote Speech—William Hewlett, Hewlett-Packard
2:00 P.M.	Discussion of Malpractice (errors and omissions) Insurance—Marshall Ames, Victor O. Schinnerer and Co., Inc.
3:00 P.M.	Break in Exhibit Area (coffee and drinks)
3:30 P.M.	Panel Discussion of Environmental Impact Reports—Richard Wirth, Building Industry Association, Brent Rushforth, Attorney from Center for the Study of Law in the Public Interest and a member of the Legislature.
6:30 P.M.	No Host Cocktail Party—Assembly Foyer
7:30 P.M.	Banquet and Dance—East Ballroom.

VEYORS ASSOCIATION

ON - 1976

SATURDAY, April 3, 1976



- 8:00 A.M. Registration opens
Exhibits open
(coffee and rolls in Exhibit Area)
- 8:45 A.M. First bus departs for *NOAA Ship Fairweather*
- 9:00 A.M. Discussion of Satellite Mapping and Geodetic Distance Measuring—Peter MacDoran, Aries Project Manager, Cal. Tech. Jet Propulsion Lab.
- 10:00 A.M. Break in Exhibit Area (coffee).
- 10:30 A.M. Discussion of Surveying in the year 2000—Speaker from U.S.G.S., Research Branch.
- 11:45 A.M. Attitude Adjustment Bar opens—Exhibit Area.
Second bus departs for *NOAA Ship Fairweather*.
- 12:15 P.M. Luncheon—Studio Suite.
Leonard S. Baker, Director N.G.S. and President of A.C.S.M.
- 1:30 P.M. Discussion of Research Material available from District Courts (Land Courts) of the U.S. which relate to all patents in California—Robert Becker, Bancroft Library, University of California at Berkeley.
- 2:45 P.M. Coffee Break.
- 3:00 P.M. Discussion of the Economic Outlook for California for the Next Five Years—Stanford Goodkin, Goodkin Research.
- 6:30 P.M. No Host Cocktail Party.
- 7:30 P.M. Boston Bean Buffet and Square Dance.



WOMEN'S PROGRAM

THURSDAY, April 1

- 5:30 P.M. Exhibitor Hosted Cocktail Party—Sky Room.

FRIDAY, April 2

- 10:30 A.M. Tour of Universal Studios with lunch in the Studio Commissary "with the stars"
- 7:30 P.M. Banquet and Dance—East Ballroom.

SATURDAY, April 3

- 10:00 A.M. Tour of Huntington Library, Art Gallery and Botanical Gardens. Luncheon at the Huntington-Sheraton.
- 8:45 or 11:45 A.M. Bus departures for tours of the NOAA Ship Fairweather.
- 7:30 P.M. Boston Bean Buffet and Square Dance.



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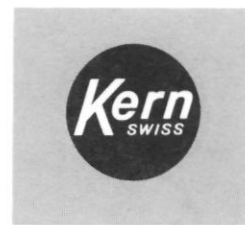
The name *Geodimeter* is a registered trademark of AGA and represents the ultimate in distance measuring instruments. The Geodimeter Division has just introduced two new Models, the 12 which is a very easy to use "mount-on" with a range of over a mile, and the 78 which is a further development of the Model 76 extending the range to 6 miles. Together with the combined function Model 710 offering automatic recording on paper tape and the 12-mile range Model 6 BL, AGA offers the most complete line of EDM Equipment. Sales and Service is offered in California through Zena Co. of California, 80 Mark Drive, San Rafael 94903 (415) 479-3816. U.S. Headquarters is AGA Corporation, Geodimeter Division, 550 County Ave., Secaucus, New Jersey 07094 (201) 866-3344. ▲

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C.L.S.A. MEMBERSHIP

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Regular Members	386
Associate Members	114
Affiliate Members	28
Student Member	27

New C.L.S.A. Members—Last Quarter of 1975

Regular

John M. Peterson, LS
 Hugh H. Haennelt, LS
 Gale W. Hurni, LS
 Fenton G. Jones, LS
 Harold D. McClard, LS
 John Wilhelm, LS
 Alvin Christensen, LS
 Ralph N. Scheel, Jr., LS

Associate

Adrian D. Davis
 Michael E. Smith
 Michael S. Berry
 Willard E. Colson
 Terence A. O'Neill
 James H. Pritchett
 Mark Trimble
 John C. Spencer
 Billy J. Tucker

Affiliate

John J. Cunningham
 Walter Cook
 Marion E. Malamma



Student

Dennis J. Katanik

1976



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PRESIDENT'S CORNER

by A.E. Griffin, L.S.

It is indeed an honor to be chosen as president of the California Land Surveyors Association for its tenth year. Yes, it was ten years ago that two small new surveying groups came together to form CLSA. I think that it was significant that one of these groups represented government employees while the other was composed mainly of surveyors engaged in private practice.

The last ten years have been exciting years for the land surveyor. The association was formed to stop a proposal to do away with the land surveyor in California. We have been successful in stopping this proposal. We then tried to settle the problem by proposing the separation of land surveying and civil engineering. In this we have not succeeded.

We have worked with the colleges to up-grade the education available to the future land surveyor. Degree programs have been established at Fresno State College and at Oregon Technical Institute during the past ten years. Across the country many new degree programs have been set up in land surveying. Some of these courses have too much engineering and not enough boundary law or theory of measurement, but time will correct these shortcomings. Our Board of Registration has indicated that it will engage in a program of evaluation and accreditation of land surveying curriculum. When this happens, another big step forward will have been taken.

There have been many other forward steps during the last ten years: changes in the Land Surveyors Act, changes in our relationship with the Board of Registration, creation of local chapters within the association which help land surveyors to get to know each other, and many more.

Nationally, the land surveyors have made great strides in the last ten years. Forty-two states now have separate areas of practice for the land surveyor. Would you believe that the land surveyor and the civil engineer even cooperate with each other in these states? The land surveyor now has a registration law in each of the fifty states. There are now forty state land surveyors associations and twenty-four sections of the American Congress on Surveying and Mapping which are working hard to advance the surveying and mapping profession.

With all of these gains, there is still a long way to go. Where do you want your association to go from here? What do you want us to do now? I will not attempt to tell you what we should be doing. It is up to you to give your association your ideas of where we should be headed. Go to your local chapter meeting and let your chapter representative know where we should be moving; tell him what you want. Your representative is your link with CLSA's Board of Directors. Join one of the association's committees and you can have a big voice in your association. The direction of CLSA for the near future will probably be set this year or next. If you want to help set this direction let us have your ideas.

I am asking your Vice President, Mike Welch, to chair a committee on objectives. He will review our present position and recommend new goals to the association's board of directors. If you have any ideas or suggestions on what CLSA should be doing make sure that you get the word to Mike. Remember the future of CLSA is in your hands, if you don't get your proposals to Mike they may never be considered. ▲

REUBEN HURD RETIRES

Reuben Hurd, Supervising civil engineer in charge of the Survey Section of the Alameda County Surveyor's Office, retired this past January after more than twenty-seven years of solving surveying problems for the county of Alameda. Reuben is an affiliate member of the California Land Surveyors Association, a Past Director of the American Congress on Surveying and Mapping, Northern California Section, and a very active member of the East Bay Council on Surveying and Mapping.

Since beginning work with Alameda County, Reuben has supervised both field and office work on the recovery and filing of records of survey on several county roads, county boundary line survey, township boundary survey, camp parks and Russell City boundary, and streets in the *Hayward Homestead Union Tract*, all of which were tied to the California coordinate system. Reuben supervised both field and office work on the horizontal and vertical control for a contracted aerial topographic mapping program of the unincorporated portion of Alameda County.



Reuben Hurd and Family

Reuben also set up a program to index and microfilm all of the old county records and maps in the files to preserve originals and develop available space for the present county working drawings and maps.

Reuben Hurd began his career as an elementary school teacher in Middlefork, Idaho after graduating Albion State Normal School in 1938. Uncle Sam interrupted Reuben's teaching by requesting his services in September, 1941. While serving in the Army, Reuben attended a special surveyors school after a few weeks of basic training. By July 1942, he was promoted to Staff Sergeant and sent to another surveying school for three months. In October, 1942 Master Sergeant was in charge of an army survey section stationed in Oakland, California. When the work was slack, he took the survey section to the University of California campus, laid out survey problems and recorded field data, then he returned to the office to compute closures and analyze the work.

Some say that Reuben is currently sleeping late and soaking up the sun on the beautiful island of Puerto Rico where he meets his wonderful wife, Mary during World War II. But one should not be surprised if Reuben is seen wandering around the Government Surveyors Office or observing survey crews on the shores of the Caribbean Sea. ▲

1976 CONVENTION

(Continued from page 1)

Saturday morning's technical session will include a discussion of the use of Quasars in geodetic distance measuring and the potential for earthquake prediction. This discussion will be presented by Peter MacDoran, Aries Project Manager at the Jet Propulsion Lab of Cal Tech.

Also on Saturday morning will be a presentation on surveying in the year 2000, by a speaker from the U.S. Geological Survey followed by a luncheon. Featured guest at the luncheon will be Leonard S. Baker, Director of U.G.S. and President of A.C.S.M.

Saturday afternoon will feature Robert Baker from Bancroft Library, U.C. Berkeley. He will discuss the files from the District (land) Courts of the U.S. which relate to all patents in California, and the microfilmed dockets of cases which contain maps and other materials not in the regular files.

The final session will analyze the economic outlook for California over the next five years. The presentation will be by Sanford Goodkin, Goodkin Research, who has done extensive economic research throughout California as it relates to the building industry and general economic growth.

The final convention activity will be a Boston Bean Buffet and square dance. Featured will be an excellent buffet dinner, topped off with some dancing. A square dance teacher-caller will be present and promises to have everyone dancing in 1/2 hour.

The Convention Division has planned full convention schedule and to facilitate everyone's arrival, will provide bus service to the Hotel from the Hollywood-Burbank Airport.

Registration material will be mailed to all members of C.L.S.A. Those persons not members will be able to register by using the forms provided in this issue of the California Surveyor. ▲



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California State University, Fresno

15th Annual

SURVEYING and PHOTOGRAMMETRIC CONVENTION

(Formerly, San Joaquin Valley Surveyor's Conference)

APRIL 16 - 17 1976

For General Information, Contact:
Professor E. F. Kulhan
California State University, Fresno
School of Engineering
Fresno, California 93740

Exhibitors Contact:
Dr. F. Nader

CLSA
ACSM
ASP
ASCE



Speakers Contact:
Dr. K. Jeyapalan

C.L.S.A. OFFICERS

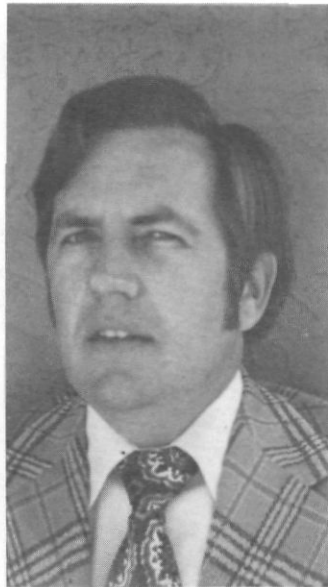
(Continued from page 4)

Current position: Boundary Determination Offices for the State Lands Commission.

Professional organizations: Member Board of Directors, C.L.S.A.; Chairman Ad Hoc Committee on Metrification of Survey Measurements and Mapping and Graphical Standards, C.L.S.A.; Chairman Special Committee on Readjustment of the North American Datum, C.L.S.A.; past Chairman of Committee on Liaison with A.C.S.M., C.L.S.A.; past Chairman of Special Committee on Liaison with Government, C.L.S.A.; past member Convention Committee C.L.S.A.; Editor of the California Surveyor 1967-68; past Director at Large C.L.S.A.; one of the original founders of C.L.S.A.



James Dowden



Ray Thinggaard

Director at Large

Raymond B. Thinggaard—Newark

Education: Currently attending college working toward a B.S. in Business.

Current position: Property Engineer for Leslie Salt Company.

Professional Organizations: Currently Director at Large and Coordinator of Professional Matters Division, C.L.S.A.; Chairman of Board of Registration Liaison Committee, C.L.S.A.; member of Ad Hoc Committee for Accreditation of Curricula and Curricula Study, C.L.S.A.; member of L.S. License Examination Committee, C.L.S.A.; member of Committee on Readjustment of North American Datum, C.L.S.A.



Director at Large

Samuel L. Taylor, Sr., L.S.—Arroyo Grande

Education: B.S. from University of California

Current position: Vice President and Office Engineer of his own private firm.

Professional organizations: Currently Director at Large, C.L.S.A.; member of A.C.S.M. and C.S.P.E. ▲

NEWS BRIEFS

... Earlier this year the North Carolina Legislature rewrote the law governing registration of engineers and land surveyors and, according to B.A. Saholsky, executive secretary of the board, the two most important of many important changes include the separate registration of engineers and land surveyors and the abolishment of the requirement of U.S. citizenship.

Under the new law, separate registration is required by a professional engineer to perform certain land surveying functions. The law provides, however, that engineers now registered in the state and competent to practice land surveying can be licensed to practice land surveying if they apply prior to June 19, 1976.

The law also provides that a surveyor-in-training program somewhat similar to the engineer-in-training program be established.

... Planning has begun for the Fresno State University 15th Annual Surveying and Photogrammetric Convention (formerly called the San Joaquin Valley Surveyors Conference).

This convention which deals with modern techniques of surveying and photogrammetry is sponsored by the various professional societies such as, CLSA, ACSM, ASP, and ASCE and also the School of Engineering as represented by the Surveying and Photogrammetry Club of California State University, Fresno (CSUF) which is comprised of student chapters of CLSA, ACSM, and ASP.

The convention will be held April 16 and 17, 1976 on the CSUF campus in Fresno, California. For general information please contact Professor Edward F. Kulhan, persons interested in presenting papers please contact Dr. K. Jeyapalan, and those firms interested in obtaining booths for exhibiting please contact Dr. Fareed Nader at California State University, Fresno, School of Engineering, Fresno, CA 93740.

... C.L.S.A. now has available the revised "Supplement to the Manual of Instructions for the Survey of the Public Lands." It is reported that they are now "out of stock" to public request.

C.L.S.A. is selling the Supplement at a price of \$0.75 each to Chapters in bulk, \$1.00 each to individual C.L.S.A. members, and \$2.00 each to non-members.

... The Central Coast Chapter of the California Land Surveyors Association met in Goleta on Wednesday, January 14, 1976 and toured the map section of the U.C.S.B. library. The tour was most interesting and there is no doubt that the map room will be an asset to local surveyors for projects requiring intensive research.

... James E. Adams, L.S. was retained by the Board of Directors as Executive Secretary for 1976. ▲

C.L.S.A. LEGISLATIVE COMMITTEE REPORT

by Richard Fultz, L.S.

The C.L.S.A. Legislative Committee met December 13, 1975 to review current legislation, decide the committee chairman for 1976 and discuss the 1976 program.

Richard Fultz, from the Central Valley Chapter, agreed to assume committee chairman duties for 1976. The proposed program for 1976 includes:

1. Continue to screen all legislation and monitor legislation relative to the Land Surveyors Act, the Subdivision Map Act, land use planning, Consumer Affairs (Board of Registration reorganization), public employees (collective bargaining, etc.) and other legislation of concern to land surveyors.
2. Initiate legislation to amend Section 3507.3 of the Government Code to include land surveyors in the section defining "Professional Employees."
3. Review the Land Surveyors Act and determine revisions to improve the Act which could be introduced next year. The committee has received some input from chapters suggesting legislation. These proposals will be studied and the entire Act reviewed during 1976.
4. Review the various codes containing mapping provisions to determine whether they can be combined in a single code and which code would be appropriate.
5. Continue efforts to achieve passage of C.L.S.A.'s bill to revise educational requirements, AB 1511.

AB 1511 was approved by the Assembly Committee on Finance, Insurance, and Commerce on January 21 and sent to the floor for its final Assembly reading. Ed Griffin and Richard Fultz appeared as expert witnesses in support of the bill. Also on hand at the hearing were Ray Peters and Ed Kulhan, who were prepared to testify if needed.

The bill has been substantially amended since its original introduction, but as currently written the measure would do the following:

1. Provide that the Board of Registration may, by regulation, require qualifying education or experience for the LSIT exam, not to exceed two years experience or two years of post-secondary education.
2. Define the minimum qualifications for the second division examination as:
 - (a) Graduation from a four-year curriculum, approved by the Board, with emphasis on land surveying; and two years experience including one year of responsible field training and one year of responsible office training; or . . .
 - (b) At least six years experience, including one year of responsible field training and one year of responsible office training.

One year of approved education in land surveying is counted as equivalent to one year of experience, up to four years, provided that the applicant graduated from the course . . . without graduation, one year of education is counted as one-half year of experience. ▲

A THOUGHT

"The California Surveyor" has been authorized to expand its mailing list in order to insure that anyone interested in the surveying profession in California will receive a copy. In the past we have restricted our mailing to our membership, plus all other licensed land surveyors and land surveyors in training in California.

In a move that will hopefully broaden our base of support and promote a better understanding of C.L.S.A., it was decided to send the "Surveyor" to civil engineers practicing land surveying, title officers and plant managers of title companies, city engineers and any other persons or entities connected with the surveying profession.

This new policy came about as an effort to insure that misunderstandings and misrepresentations that resulted from poor communication in the past would be avoided or at least minimized in the future. The editorial staff of "The Surveyor" is endeavoring to provide a medium by which all surveyors can reach an understanding not only of C.L.S.A., but of their profession in general.

It must be noted once again that the burden of this effort now, as well as efforts in the past, rests on the shoulders of those persons who are members of C.L.S.A. To those surveyors who have received "The Surveyor" these past years, it is imperative that we have your support in order to continue. Your membership would be most appreciated.

An invitation is also extended to those persons receiving this publication for the first time to join us and contribute to our efforts on behalf of the surveying profession in California. ▲

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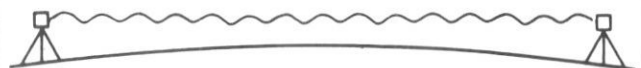
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CALIFORNIA LAND SURVEYORS ASSOCIATION



CONVENTION - 1977

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New AGA Instrument

AGA Corporation has added to its Geodimeter product line a distance measuring meter that is so easy to use that it makes practical the measuring of short distances electronically.

The new unit is designated the Geodimeter Model 12. It weighs just 6 pounds and has a combined transport case and back-pack.



To use the Model 12, the company says, you follow four simple steps:

1. Point the Model 12 at the prism.
2. Check the illuminated display.
3. Touch the measure button.
4. Wait about 15 seconds.

After these four steps, the distance is displayed. The unit has a range of 6000 feet.

The Model 12 mounts on a theodolite telescope to measure angle and distance at the same time. The theodolite adaptors clamp on and do not have to be shop-fitted.

A unique tracking feature gives a continuous display of distances up to a speed of 16 feet per second. This means, the company says, that setting out is fast and moving targets can easily be tracked.

Pointing is done with the help of an audio signal that gets louder as the target prism is brought into alignment.

Each Model 12 is tested in a climate chamber and on field baselines.

It is best suited, the company says, for:

1. Setting out lots, roads and buildings.
2. Traversing, general land surveying and construction surveying. ▲

C.L.S.A. 1976 FINANCIAL STATEMENT

INCOME

Regular Dues	\$17,570.12
Associate Dues	1,060.22
Misc. Dues	1,556.50
Entrance fees	1,323.35
Registration	19,794.91
Exhibitor fees	2,770.00
Advertising	2,549.00
Interest	215.18
Lapel pins	90.00
Misc.	261.16
	<hr/>
	\$47,190.44

EXPENDITURES

Meetings	\$13,993.87
Composition & Printing	6,700.14
Travel	4,735.63
Secretarial Services, Supplies, etc.	6,063.85
Postage & Mailing	3,297.87
Legislative Consultant	4,200.00
Telephone	3,204.90
Professional fees	2,419.74
Copying	1,345.92
Refunds	1,253.74
Subscriptions	386.38
Scholarships	—
Lapel pins	—
Misc.	325.34
	<hr/>
	\$47,927.38

NET INCOME

— 736.94

BALANCE FROM PRIOR YEAR

6,179.51

NET WORTH

\$ 5,442.57

CENTRAL VALLEY CHAPTER

by Ralph Scheel, Jr., L.S.

About a year ago, while returning to Modesto from a Mother Lode Chapter meeting, a discussion of the formation of a valley chapter began. Problems of our area are unique and it was felt that a local chapter would serve our needs best.

Richard Fultz and Duane Andrews began modifications of existing constitution and by-laws to our needs.

The first meeting, in Duane Andrews' home, was called in October, 1975. The constitution and by-laws were discussed and a nominating committee was formed.

Our second meeting was in November and nominations were presented. Names for the chapter and goals were discussed.

In December, officers were elected for 1976. President, Richard Fultz; Vice President/Chapter Representative, Ralph Scheel Jr.; Secretary/Treasurer, Duane Andrews. The name "Central Valley Chapter" was adopted and the constitution and by-laws were ratified. There were nine members present.

Chapter dues are \$10.00 per year. Meetings will be held on the second Thursday of each month.

A membership of twenty, including Associates and Affiliates is anticipated. ▲

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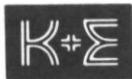
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- ASSOCIATE MEMBER GRADE: Work in land surveying and be recommended by a member.

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Name of Firm or Agency _____

e. Signature and L.S., P.S./or C.E. No. _____

f. Recommended by (Associate & Affiliate Grade Only) _____

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