Association of Engineering Geologists "Serving Professionals in Engineering, Environmental and Ground-Water Geology"

Southern California Section

# **NEWSLETTER-**September 1992

### Dinner Meeting Tuesday, September 8th

- The Quiet Cannon Restaurants 901 North Via San Clemente Montebello
- Cost \$20.00 (Full-Time Students Free)
- Make reservations by Friday September 4th!!! **URS Consultants 714-660-7676** (Leave Your Name & Number of People in Your Party)
- 5:30 Social Hour
- 6:45 Dinner

# **Program**

Fault-Surface Ruptures in the Landers Earthquake Area

A Slide Show Presentation and Discussion

Woody Higdon, Geo-Tech Imagery, International Gary Rassmussen, Rassmussen & Associates

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MAP to Meeting MONTEBELLO MUNICIPAL GOLF COURSE VIA SAN CLEMENTE GLENDORA CANNON RESTAURANT 710 CULVER CITY Quiet Cannon GARFIELD AVE

2550 Beverly Blvd. os Angeles, CA 90057

# PROGRAM Topic & Speaker

On June 28, 1992, two earthquakes measuring 7.5 and 6.6 hit the Landers and Big Bear areas, respectively. These earthquakes occurred within 3 hours and 22 miles of each other. Surface ruptures in the Landers area provided a windfall of data for geologists, engineering geologists, and seismologists. Initial review and evaluations indicated that a triangle shaped area was defined by possibly three fault systems; the Mission Creek splay of the San Andreas fault, a previously unmapped fault running from Yucaipa towards Big Bear, and the Landers fault zone consisting of the Johnson Valley Fault, the Homestead Fault, and the Camp Rock-Emerson Lake Fault.

Geologists and seismologists from local firms as well as scientists from CalTech, California Division of Mines and Geology, and the U.S.G.S. have been collecting and evaluating data in an attempt to characterize the nature of these faults and the related fault ruptures. Observations and conclusions based on these data may affect professional practices and scientific conceptions held regarding seismic safety and design parameters. Gary Rassmussen and Woody Higdon will present slides taken of the Landers area. Mr. Rassmussen and Mr. Higdon will present their observations, and discuss the possible significance of what they have concluded. After the presentation, they will lead an open discussion.

Mr. Gary Rassmussen is President of Gary S. Rassmussen & Associates, Inc. of San Bernardino, California. Mr. Rassmussen received his BS in Geology at the University of Arizona. He is a California state-registered geologist and certified engineering geologist. Most of Mr. Rasmussen's professional work has dealt with faults, seismic hazards, and landslides in the western United States. He has been guest lecturer at several Universities in southern California and has taught engineering geology at the University of California at Riverside.

Mr. Woodrow L. Higdon, President of Geo-Tech Imagery International, received his BS in Geology from California State University at Long Beach. Mr. Higdon boasts many talents including 30 years experience as a technical and commercial photographer, a geologist, a professional diver for 30 years, a helicopter pilot, darkroom specialist, is knowledgeable in computer graphic design and reproduction, and is an advanced skier.

# AEG Southern California Section Annual Field Trip Landers Earthquake Area

AEG, Southern California Section will conduct a field trip to the Landers Earthquake area on Saturday, October 10, 1992. Gary Rassmussen will be the field trip leader. Busses will depart promptly at 7:00 a.m., however, a departure location has not yet been determined. The cost of the trip is \$45.00/person and will include a trip guidebook. The guidebook and technical contributions are from scientists studying the Landers Earthquake at CalTech, California Division of Mines and Geology, and the U.S.G.S.

A registration form is provided in this newsletter. Registration forms along with a check or money order must be submitted to David Ebersold no later than September 15, 1992. Please send completed registration forms to:

Landers Field Trip c/o California GEO/SYSTEMS, INC. 312 Western Avenue Glendale, California 91201

If you have any questions contact Dave Ebersold at (818) 500-9533.

# AEG NATIONAL MEETING VOLUNTEER OPPORTUNITY

Joseph Cota, Publications chairman is asking for volunteers to man the AEG booth at the AEG National Meeting October 3 through October 9th. This is an opportunity for many of you to meet other members and help our local section at the same time. Booth responsibilities are to answer questions about our local or national AEG activities and to sell our local publications. As many of you may know, our local Southern California Section makes money from the sale of these guidebooks and technical publications. Each of these publications contain valuable geologic information specific to areas that are of interest regardless of whether you are conducting a geotechnical or environmental investigation. If you are willing to donate a couple hours to help, please contact Joseph Cota at (818) 785-2158.

#### CHAIRMAN'S COLUMN

by Kelly E. Rowe

Hello to everyone in southern California from Seattle, Washington. My firm has me here for a couple of months doing environmental work for the Navy at several of their bases in Puget Sound. This is a fascinating area of volcanoes (Mt. Rainier and Mt. Baker) sticking above the horizon on the east, the Olympic Mountains rising high to the west, and the glacier deposits scattered between. The local Washington section of the AEG holds their meetings in Seattle the third Thursday of the month. I plan to attend their meeting while I'm here and to compliment the authors on their fine publication "Geology of Seattle" (AEG Bull. August 1991).

Although I'm away, committee members planning the AEG Annual Meeting are continuing to run the show. The annual meeting in the first full week of October is a key event this year for the Southern California Section and for the entire association. We hope that you plan to attend and to invite your friends to attend also. For the meeting to be a success, we need you to participate. We need you to attend the field trips, the short-courses, and the technical sessions. We need you to invite other interested professionals to attend.

Last month, Mr. Phil Chandler, senior engineering geologist from the Los Angeles Regional Water Quality Control Board (RWQCB), discussed the board's newly created Well Investigation Program guidelines for conducting soil-gas surveys. the guidelines are rather detailed, however, Phil Chandler provided background information on the process of their development. The guidelines are a basis for conducting soil-gas surveys and were developed in conjunction with the EPA, the RWQCB staff, especially Alex Carlos, and soil-gas survey vendors. According to the RWQCB, only two local vendors presently possess suitable equipment for doing these surveys. The RWQCB is open to constructive suggestions regarding the guidelines, their content, or implementation. Phil Chandler proposed to have a workshop in the next few months which would include environmental consultants, soil-gas survey vendors, RWQCB staff, and other interested parties. Feel free to call the RWQCB (213-266-7500) to be on the list of people notified for participation in this workshop.

The officers of the Southern California Section met before the August meeting to discuss the plans for the upcoming year. We are planning to hold several of the upcoming monthly meetings at locations other than the fine Quiet Cannon Restaurant. In October, we will not hold a section meeting. Rather we will be attending the Annual Meeting in Long Beach. November and December meetings are tentatively scheduled to be held in the San Fernando Valley and possibly Orange County

as a joint meeting. We will be back to the Quiet Cannon Restaurant in January 1993. For your reference, the locations for the future meetings and the affiliates for the joint meeting will be advertised in the newsletter. It should be fun.

In addition to the changes in meeting venues planned, we have proposed a goal for the upcoming annual meeting to more actively participate in the education of geology and engineering geology in local classrooms. We have targeted the elementary, intermediate, and high school levels rather than college level for our efforts. We are hoping to find volunteers to assist teachers in turning-on students to the challenge and fun of sciences and engineering. We need more scientists and engineers in the future workforce. It is obvious that there is and will continue to be a lack of qualified people in our society to perform this work. The October annual meeting provides us, as geologists and engineers, an opportunity to interface with the 150+ invited science teachers from southern California. Our contacts at this meeting can improve the relationships we have with local science teachers and from these relationships, begin a program of involvement with science education and mentoring. We encourage you to meet the teachers, and to become involved. Please contact me or Dorothy Stout to find out more about the science education events that will be conducted at the annual meeting. Through the efforts of many people over the last couple of years, the Southern California Section of the AEG has several hundred interesting slides that may be used to discuss geology and engineering.

Lastly, remember the most important goal for us to achieve this year is the success of the October annual meeting. It can only be a success if you help. Make copies of your meeting registration form before you fill it out and send it in. Send them to friends and associates and encourage each of them to fill it out and send it in as well.

#### SECTION COMMITTEE CHAIRS

Professional Registration: Bob Hollingsworth (818) 889-0844

Public Relations: Robert Ruff (714) 549-8921

Legislative Affairs: Hugh Robertson (818) 373-0057

Field Trips: David B. Ebersold (818) 500-9533

Short Course: Dave Grover (818) 889-0844

#### NEWS FROM THE BOARD OF GEOLOGISTS AND GEOPHYSICISTS

The following are excerpts from a letter to licensees from Mr. Frank Dellechaie, Executive Officer, Board of Geologists and Geophysicists:

The board of Registration for Geologists and Geophysicists (board) conducts both licensing and enforcement programs for Geologists, Engineering Geologists and Geophysicists. The board provides a tested and proficient pool of geoscientists for the people of California through the licensing program. Through the enforcement program, California geoscientists who are found to be deficient or unlicensed are engaged into the complaint/enforcement process.

The Legislature attempted to abolish the board in 1986 through Senate Bill 87. The Legislature believed that the board was not conducting enforcement activity at a level that justified the boards existence. Senate Bill 87 failed. Senator Boatwright and other legislators helped the board pass Assembly Bill 469 that allowed the board to raise its fees, and hire enforcement staff and equipment. Had the board not raised fees and instituted an effective enforcement program, the board would have been abolished by subsequent legislation.

The board processed approximately 200 application for licensure in 1980 and approximately 1200 last year. We forecast approximately 1500 applications in 1992. the board also became less active in enforcement because of the dramatic increase in licensing activity. The

board stopped administering examinations twice per year, as had been the tradition, in 1988. The board has instructed the Executive Officer to begin administering the examination twice per year. The target date for the next spring examination is currently 1994.

The board has recently raised fees for applications (\$100) and license renewal (\$200) for license renewal for every two year period. As a result of the fee increase, the board has increased its staff by two one for enforcement and one for licensing and is implementing program wide computer automation. The board has commenced operation of a main-frame enforcement tracking computer program that targets and tracks enforcement activities. The cost for processing a licensed case can range from \$5,000 to \$10,000.

The board has instructed the Executive Officer to begin to again produce a number of publications; a current roster of licensees, copies of the Geologist and Geophysicists Act, an information brochure describing the duties of geologist, geophysicists, and engineering geologist, and an annual newsletter.

Next month: Goals for 1992/1993 - Frank Dellechaie, Executive Officer, Board of Geologists and Geophysicists.

| LANDERS FIELD TRIP REGISTRATION FORM   |
|--|
| NAME   |
| COMPANY NAME   |
| ADDRESS  |
|  |
|  |
| PHONE NUMBER   |
| NUMBER OF PARTICIPANTS   |
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| Landers Field Trip<br>c/o California GEO/SYSTEMS, INC.                                 |

312 Western Avenue Glendale, California 91201

#### ANNUAL AEG MEETING 1992 WE NEED YOUR HELP!

The committee is soliciting contributions from engineering geology and geotechnical consulting firms in the Southern California area. Three levels of sponsorship are planned: Gold -\$1,000 contribution, Silver - \$500 contribution. and Bronze - \$250 contribution. All sponsors will receive recognition in the section newsletter, the meeting bulletin, and posters at the meeting. Sponsors at the \$500 level will receive a framed. signed, numbered print of the artist aift which will be given to all registrants. Sponsors at the \$1,000 level will receive the signed print and special recognition at the awards dinner. We are happy to accept a contribution of any amount to help with fundings. And, if things get better, you can always up your contribution!

#### **AEG 1992 DONATION LIST**

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#### **Miscellaneous Contributions**

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#### Contributions to Date: \$17,095.00 THANK YOU ONE AND ALL

Send Donations to: Robertson Geotechnical, Inc. 2500 Townsgate Road, Suite E Westlake Village, CA 91361

# AEG NATIONAL MEETING COMMITTEE NEWS

Field trips are planned and ready, Technical sessions and short courses have been set., Final preparations are being made for the 35th Annual AEG Meeting to be held from October 2 - 9, 1992 in Long Beach, California. There is still time to actively promote our National Meeting by encouraging fellow professionals, clients, and vendors to attend. The success of this meeting depends as much on each individual effort as it does on the enormously successfulc effort being given by the members of the Annual Meeting committee and the various subcommittees. Funds are still coming in, and we wish to thank the many people and organizations that have contributed. We are greatful for the corporate support, but also wish to thank each of the individuals that gave their share.

If you want information or promotion material, please contact Kim Corpuz of Rosenberg and Risinger. They are handling all PR details and have been a tremendous help in promoting and organizing this meeting. Once again, with one month left, we hope that each of you will do what you can to make this meeting a success. See you there!

#### **BOOK SALE**

#### Association of Engineering Geologists, Southern California Section

- Blake, T., and Larson, R.A., Eds., 1991, <u>Engineering Geology along the Simi-Santa Rosa fault system and adjacent areas. Simi Valley to Camarillo, Ventura County, California</u>: Guidebook for the Southern California Section of the Association of Engineering Geologists Annual Field Trip, August 24, 1991, volumes 1 and 2, 383 pgs., 4 map sheets. **\$40.00**
- Buckley, C.I., and Larson, R.A., Eds., 1990, <u>Geology and Engineering Geology of the western Soledad Basin.</u>
  <u>Los Angeles County. California</u>: Guidebook for the Southern California Section of the Association of Engineering Geologists Annual Field Trip, November 3, 1990, 185 pgs., 2 map sheets. **\$25.00**
- Buesch, D., Ed., 1979, <u>Geomorphic Applications in Engineering Geology: A State-of-the-Art Short Course</u>: Short course held at California State University at Los Angeles, November 10-11, 1979, reprinted by the Southern California Section of the Association of Engineering Geologists, 145 pgs. **\$11.00**
- Byer, J.W., Ed., 1975, <u>Sycamore Canyon Fault, Verdugo Fault, York Boulevard Fault, Raymond Fault, and Sierra Madre Fault Zone</u>: Guidebook for the Southern California Section of the Association of Engineering Geologists Annual Field Trip, September 27, 1975, 68 pgs. \$ 8.00
- City of Los Angeles, 1982, <u>Geologic Maps of the Santa Monica Mountains</u>. <u>Los Angeles, California</u>: 333 map sheets at 1" = 400', compiled by the Bureau of Engineering, Department of Public Works, City of Los Angeles, reprinted by the Southern California Section of the Association of Engineering Geologists, 342 pgs. **\$26.00**

Books are available from: Joe Cota, Publications Chairman, AEG Southern California Section, c/o GeoSoils, Inc., 6634 Valjean Avenue, Van Nuys, California 91406, (818) 785-2158. Make checks payable to AEG Southern California Section. Please add 8.25% sales tax and the following postage/handling charges: \$2.50 for the first book and \$0.50 for each additional book.



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#### Seminars/Meetings/Field Trips

#### SEPTEMBER 1992

16-18 Digital Geographical Information Systems, Washington D.C., Continuing Engineering Education Program, George Washington University, Washington D.C. 20052 Toll Free (800) 424-9973

#### OCTOBER 1992

- **2-9 National AEG Meeting,** Long Beach, California. "Engineering Geology into the 21st Century" CONTACT
- **Landers Earthquake Field Trip**, Southern California Section, CONTACT Dave Ebersold, Field Trip Chairman (818) 889-0844
- 17-18 Underground Technology Research Council Annual Meeting, Las Vegas, NV. CONTACT Frank Kendorski (708) 968-7666
- 16-22 American Institute of Hydrology 1992 Annual Meeting, "Interdisciplinary Approaches in Hydrology and Hydrogeology", Portland, Oregon.

#### DECEMBER 1992

7-11 American Geophysical Union, Fall Meeting, San Francisco, California.

#### Kathleen R. Williams

AEG Newsletter Editor c/o GeoResearch 3960 Gilman Street Long Beach, CA 90815

Annual AEG Meeting in Long Beach OCTOBER 1992









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