

**ASSOCIATION OF ENVIRONMENTAL & ENGINEERING GEOLOGISTS
Southern California Section**

"Connecting Professionals, Practice, and the Public."

NEWSLETTER – February 2008

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Visit the Southern California Section Website: www.aegsc.org

Newsletter Editor – Steve Varnell, svarnell@fugro.com, 805-650-7000

Meeting Date: *Tuesday, February 12th*****

- Location:** Steven's Steak House, 5332 Stevens Place, Commerce, California
- Time:** 6:00 p.m.-Social Hour; 7:00 p.m.-Dinner; 7:45 p.m.-Presentation
- Cost:** \$30 per person with reservations, \$35 at the door, \$15 for students with a valid Student ID
- Reservations:** Please call Peter Thams at 805-644-7976 or email pthams@wceviro.com.
- Speaker:** David L. Perry, C.E.G., Senior Engineering Geologist, MACTEC Engineering and Consulting, Inc.
- Topic:** "Locating the Raymond Fault at Two Developed Urban Sites in the Highland Park District of Los Angeles, California"

Abstract:

The Raymond fault extends 20 km across the densely populated San Gabriel Valley northeast of Los Angeles. Pioneering geologic studies prior to large-scale urbanization (Eckis 1934, Buwalda 1940) mapped the fault's geomorphologic features (south-facing scarps, pressure and shutter ridges, offset streams, and groundwater and vegetation lineaments). East of Arroyo Seco in Pasadena, the fault is expressed by a distinct topographic break in alluvium and differences in groundwater levels on opposite sides of the fault. However, in the Highland Park District west of Arroyo Seco, the fault is poorly expressed and published geologic maps (Lamar, 1970, Weber et al., 1980, Crook et al., 1987, Dibblee, 1989) are inconsistent with respect to the location of the concealed and inferred traces of the fault.

We studied two sites constructed in the 1930's and 1940's in the Highland Park area to determine whether they were transected by traces of the Raymond fault; these sites are located partly within an Alquist-Priolo earthquake fault zone. The first site is located within the floodplain of the Arroyo Seco. Site constraints and safety concerns precluded deep trench excavations through the Holocene alluvium and necessitated drilling continuous core borings with a Sonic drill rig to penetrate through recent alluvium containing cobbles and boulders. Two closely spaced fault traces were identified near the edge of the site by the coincidence of the juxtaposition of dissimilar alluvial subunits and abrupt groundwater level differences on either side of the interpreted fault traces. The fault traces identified at this site are probably the southern boundary of the Raymond fault zone.

The second site is located on a geomorphic surface about 30 feet above the modern Arroyo Seco floodplain. Site constraints (existing structures, buried utilities, locally thick fill) necessitated an investigation approach combining trench excavations, several transects of continuously cored hollow-stem auger borings, and seismic refraction methods. Groundwater level data obtained from borings on the site and an adjacent property was key to interpreting fault locations. We identified several fault traces on the property through detailed logging of over 900 lineal feet of trench, core from 25 borings, and interpreting two seismic refraction lines.

One trench exposed a near vertical fault juxtaposing dissimilar alluvial subunits and pedogenic (argillic and/or cambic) soil horizons on either side. This fault coincided with a west-trending zone of abrupt groundwater level differences and abrupt stratigraphic changes identified in boring transects located to the east and west of the trench. The fault location corresponds to a published geologic map (Dibblee, 1989) and appears to be the main Raymond fault trace. We also observed evidence for faults with minor apparent vertical separation in two trenches located about 100 feet south of the inferred main fault.

Stratigraphic and groundwater differences along a boring transect about 800 feet south of the main fault were interpreted to be a subsidiary fault. Its location and orientation across the site were evaluated with seismic refraction surveys employed in combination with the boring data. The subsidiary fault appears nearly coincident with a southerly trace shown by Dibblee (1989).

The combined approach (trenches, core borings, groundwater data, and geophysical surveys) to these investigations was useful in locating the inferred main and subsidiary traces of the Raymond fault on these sites.

Speaker:

David L. Perry is a Senior Engineering Geologist at MACTEC Engineering and Consulting, Inc. in Los Angeles. He has 24 years of diverse experience on geologic investigations for design and construction monitoring of infrastructure projects throughout California. A majority of these projects have been applying engineering geology for dams, tunnels, water storage reservoirs, water and sewer pipelines, highway and subway-rail structures, educational institutions, commercial facilities, sanitary landfills, and land development. Major infrastructure projects include the light rail/subway tunnel for the Red-Line of the Los Angeles Metropolitan Transit Authority and the Emergency Water Storage Reservoir Project (Olivenhain Dam) for the San Diego County Water Authority.

He has performed numerous fault-rupture-hazard studies in southern California and Washington; most recently at a site in the Highland Park district of Los Angeles across suspected traces of the Raymond fault. Mr. Perry received his Bachelors degree in Geological Sciences from the University of California at Santa Barbara and completed post-graduate studies in geology at Cal State Los Angeles.

Chair Column

Roz Munro

I look forward to seeing everyone at Tuesday's meeting.

Reminders:

BGG meeting is Friday, Feb. 8 in Sacramento.

Our March meeting will be the annual joint meeting with ASCE.

The Shlemon Conference, "The Geological Assessment of Naturally Occurring Hazardous Substances" will be held June 4-6 in Folsom, CA. Go to www.aegweb.org for more information.

The 2008 AEG Annual Meeting will be held September 15-20 in New Orleans, LA. Abstracts deadline is May 1. Go to www.aegweb.org for more information.

Public Service Announcement

Charles Nestle

ZIP-A-DIPs Are Still Available!

How many of you have given up trying to find replacement for your faded and warped Zip-A-Dips? Zip-A-Dips are available from Don and Jeannine Lamar, who have lived in retirement in Reno for the past six years. Jeannine said that they don't plan on having any more made when they exhaust the present supply of Zip-A-Dips. She said, "It sure is nice to know that some geologists are still using ZADs."

Order your Zip-A-Dip by phone: (775) 322-5344. The price for 1 is \$4.00, or order 2-10 for \$3.50 ea., 11-49 for 3.00 ea., and 50+ for \$2.50 ea.



SHLEMON CONFERENCE SCHEDULED

The Geological Assessment of Naturally Occurring Hazardous Substances

June 4 – 6, 2008

Folsom, California, USA

Conference Organizers:

David W. Bieber, Geocon Consultants,
Inc, Rancho Cordova, CA,
bieber@geoconinc.com

David Sederquist, Youngdahl Consulting
Group, Inc., El Dorado Hills, CA,
dcs@youngdahl.net

Jim Brake, Geocon Consultants, Inc,
Rancho Cordova, CA,
brake@geoconinc.com

Shlemon Conferences are sponsored by the AEG Foundation and the Association of Environmental & Engineering Geologists, and follow procedures typical of the Geological Society of America *Penrose Conferences* and the American Geophysical Union *Chapman Conferences*. The conferences are intended to promote and disseminate practice and research results, and to foster the improvement and understanding of applied geology.

The third Shlemon Conference will include keynote presentations by invited experts, volunteered poster presentations by conference attendees, a field excursion, and ample time for informal conversations.

Naturally occurring hazardous geologic substances include arsenic, mercury, uranium and other heavy metals, radon, and asbestos. The

conference will focus on the geologic assessment of these substances including the strategies for sampling and problems with the current analytical methods. However, we will also discuss the interactions between the geologic community and the risk assessment and toxicology communities with regards to the collection of data and inter-professional communication. The conference will emphasize those principles common to the investigation of naturally occurring hazardous geologic substances in general, using the substances listed as examples. Topics covered will also include those characteristics and concerns unique to the assessment of naturally occurring particulates, heavy metals, and gases. Examples will be presented from throughout the United States, as well as from other countries. Key-note presenters have been selected based on topic and diversity of experience, and additional presenters will be selected to enhance the conference content.

The field trip held in conjunction with the conference will visit the Motherlode region of the central Sierras in El Dorado and Amador Counties to view and discuss exposures of asbestos-bearing rock; view areas where elevated metals including arsenic, nickel and chromium occur, including the site of a United States Environmental Protection Agency arsenic cleanup action; and visit an area where naturally occurring radon gas associated with regional granitic rocks occur. Sites visited will include areas of historic mining where we will discuss the role of mining in providing a preferential exposure pathway.

Two days of technical sessions are planned. Each session will include invited keynote speakers who will be followed by brief oral abstracts and poster presentations contributed by conference participants. The one-day field excursion will be conducted on the second day of the conference.

Small specialty conferences such as this one depend on volunteered presentations and active participants!

All attendees are strongly encouraged to contribute to the program by offering a poster presentation.

Conference attendance will be limited to 75 participants. The registration fee of \$325 U.S. will cover technical sessions on Wednesday, June 4, and Friday, June 6, the field trip on Thursday, June 5, lunches on Wednesday and Thursday, and a dinner on Thursday. Participants will be responsible for transportation to Folsom, California; transportation from the airport to the hotel; and lodging costs. The conference hotel, Lake Natoma Inn, is in the historic mining town of Folsom, California, located adjacent to the foothills of the Sierra Nevada, and is within convenient walking distance of historic downtown Folsom.

Registration Payment Due:

April 1, 2008 (form coming soon)

For detailed information and the application form, visit www.aegweb.org or contact the conference organizers by phone or e-mail.



AEG•2008

Laissez Les Bon Temps Rouler (Let the Good Times Roll!)

New Orleans, Louisiana

September 15-20, 2008 ~ JW Marriott Hotel

CALL FOR PAPERS
ABSTRACTS DEADLINE:
MAY 1, 2008
 PLEASE SEND TO JULIE KEATON
 E-mail: aegjuliek@aol.com
 Or see www.aegweb.org

Technical Program

- Coastal/Floodplain Processes
- Construction Geology
- Dams/Levees
- Environmental Geology
- Forensic Geology
- Geophysics
- Geotechnics
- Groundwater
- Landslides/Slope Stability
- Professional Practice
- Remote Sensing/GIS
- Rock/Soil Mechanics
- Seismic Hazard
- Site Characterization
- Subsidence
- Tunneling

Symposia

- Hurricane Katrina and Mechanism of Failure
- New Madrid Earthquakes
- Coastal Geology and Coastal Hazards
- Environmental Remediation
- Coastal Protection – New Orleans
- Tunneling

Field Trips

- Slope Stability – Mississippi River Bluffs
- Hurricane Katrina Devastation Area
- Avery Island Salt Dome & Tabasco Tour
- Civil War Military Geology – Vicksburg Campaign
- Coastal Geology – Barrier Islands
- NASA – Stennis Space Center

Short Courses

- GIS
- OSHA 8-hour HAZWOPR Refresher
- Technical Photography

Special Event

Mardi Gras Parade and Reception through the French Quarter – with the procession led by a traditional N'awlins jazz group.

Guest Tours

- Good Morning New Orleans Walking Tour
- River Road Journey – Antebellum Life
- Garden District Tour with Lunch at Commander's Palace
- Honey Island Swamp – Eco Tour

COMMITTEE CHAIRS

General Chairs: James May (jmay1942@bellsouth.net)
 Darrel Schmitz (schmitz@ra.msstate.edu)
Field Trips: Michael J. Wright (mwright@mdot.state.ms.us)
Field Trip Guidebook Editors:
 Joel S. Kuszmaul (kuszmaul@olemiss.edu)
 Robert M. Holt (mholt@olemiss.edu)
Finance: Darrel Schmitz (schmitz@ra.msstate.edu)
 Colin McAneny (mcanenyd@bellsouth.net)
Hospitality / Guest Affairs:
 Peggi May (jmay1942@bellsouth.net)

Local Liaisons:
 Tom Westbrook (tmwklf@bellsouth.net)
 Burton Kemp (kaims@bellsouth.net)
Moderators / Keynote Speaker:
 Mike Seal (michael.c.seal@usace.army.mil)
Outstanding Environmental & Engineering Geologic Project:
 Evelyn Villanueva (Evelyn.Villanueva@erdc.usace.army.mil)
Publicity: Jay Ferris (jferris@earthcon.net)

Short Courses: Chris Saucier (csaucier@cee.msstate.edu)
Special Event: Donna Schmitz (donnas@ext.msstate.edu)
Sponsors: Ken Ruckstuhl (kruckstuhl@env-mgt.com)
Student Coordination: Greg Easson (geasson@olemiss.edu)
Symposia:
 Wayne Ispording (wisphord@jaguar1.usouthal.edu)
Technical Program:
 Dave Patrick (david_patrick@comcast.net)
 Don Banks, Vice Chair, donbanks@canufly.net
Meetings Manager / Registration and Exhibitors:
 Julie C. Keaton (aegjuliek@aol.com)

Chapter Meetings

Inland Empire:

For the latest information and updates, please visit <http://www.aegsc.org/chapters/inlandempire/>

Central Coast:

Monthly meetings will take place on the last Wednesday of every month at Rusty's Pizza in Goleta. Social hour begins at 6 pm, the meeting begins at 7pm.

For the latest information and updates, please visit <http://www.aegsc.org/chapters/centralcoast/>

For more information or to be added to the CA Central Coast Chapter email list, please contact Robert Urban via email at robert_urban@urscorp.com.

San Diego:

For the latest information and updates, please visit <http://www.aegsc.org/chapters/extremesocal/>

National Business Donation

- **Platinum** - \$1,000
- **Gold** - \$500
- **Silver** - \$250

Company name, address and contact information are presented in AEG News and section receives 10% of donation. A national donation does not yield a line in our local section newsletter.

Company & Employment Advertising Newsletter (includes SoCal website posting)

	<u>Month</u>	<u>Year</u>
▪ Business Card	\$10	\$100
▪ ¼ Page	\$20	\$200
▪ ⅓ Page	\$30	\$300
▪ ½ Page	\$35	\$350
▪ Full Page	\$50	\$500

SoCal website posting only

\$20/month

* The deadline for submitting an advertisement for next month's newsletter is Friday, February 29th.

YEAR 2008 CONTRIBUTORS NEEDED

Contributions from corporations and individual members are greatly appreciated. Contributors will be listed in our newsletter throughout the year and can post their logo or business card in the newsletter if so desired. Please mail contributions made out to **AEG** to our section treasurer, Peter Thams.

2008 MEMBERSHIP RENEWAL

For those of you who have not yet renewed (**the deadline was November 1**), are unsure about your membership status, or did not receive your membership dues statement, please contact AEG Headquarters at www.aegweb.org. You can renew your membership online. Please update your membership if you wish to continue to receive future issues of the newsletter.

*****NOTICE: Proposed New AEG Publication*****

WHO'S WHO in SO CALIFORNIA ENGINEERING GEOLOGY
The Evolution of Engineering Geology in Southern California

Have you ever wondered "Whatever happened to___?" or "I've heard of ___, who is he?"

The undersigned have decided to try to prepare an internet publication with the above title, which will include biographies of engineering geologists in southern California. We would like you to share your biography (autobiography) with other EGs. If you have worked on an interesting project, others would like to know about it.

If we limit each autobiography to 3 pages of text, plus photos, this publication would be more than 1,000 pages long. Therefore, we plan to utilize a proposed new AEG Foundation internet website, where there is no limit to total pages, and we can use color photos. Also, this new website will be available for no-charge access, worldwide, thus spreading the word on the history and evolution of engineering geology, and southern California's immense contribution.

We suggest (not require) three criteria for inclusion: 1. That you are a CA licensed CEG; 2. That you are now or once were a member of AEG; 3. That you have enough years of professional experience to relate one or more significant projects you have worked on. We believe there are more than 250 such EGs in southern California. This will be an evolving internet site where new autobiographies can be added.

We will also include Memorial biographies of past notable geologists in southern California. So far, we have identified 30, including John Buwalda, Ian Campbell, Tom Dibblee, Rollin Eckis, Perry Ehlig, Richard Jahns, John Mann, F.L. Ransome, Charles Richter, Dottie & Marty Stout, Gene Waggoner. Biographies of 14 of these notable geologists were published for the recent AEG Annual Meeting, in "History of the Association's First 50 Years," available from AEG HQ, contact Julie Keaton or Becky Roland.

Here is a CHECKLIST FOR YOUR AUTOBIOGRAPHY:

Complete NAME, address, phone, email; BIRTH DATE and place; UNIVERSITY(s) attended, major(s), degree(s), year(s); MILITARY service; FIRMS/AGENCIES you worked for; up to 3 significant PROJECTS you worked on; possibly relate a serious or humorous INCIDENT; a MENTOR you may wish to acknowledge; professional SOCIETIES, HONORS, AWARDS; HOBBIES; up to 5 PUBLICATIONS; PHOTOS of yourself and of projects (scanned images preferred).

So, if you wish to be included in this new internet publication, prepare your autobiography and email it with photos to: allen@hatheway.net and in the Subject box, type: So. Cal. Geologist. Or mail it to Allen Hatheway, 10256 Stoltz Dr., Rolla, MO 65401. Please, no more than 3 pages of text, single-spaced, Times New Roman, 12 pt.

Please pass this notice on to those you may know who no longer get this Newsletter.

In the spirit of camaraderie, we thank you,

Richard Proctor
 Allen Hatheway
 David Rogers
 Larry Cann
 Bob Lynn

EMPLOYMENT OPPORTUNITIES & ADVERTISING



LGC Valley, Inc.

LGC Valley, Inc.

2045 Royal Avenue, Ste. 125

Simi Valley, CA 93065

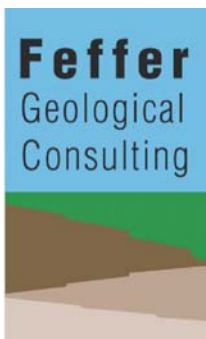
Tele: (805) 579-3434 Fax: (805) 579-3435

Email: kesmond@lgcgeo.com

Website: www.lgcgeo.com

Please look to our website for the latest opportunities. All inquiries will be held in the utmost confidence. We look forward to hearing from you.

For Sale: Aerial Photo collection accumulated over a period of 25 years in Geotechnical business. Mostly San Diego, Orange and Los Angeles, counties. 1,600+ photos from 1929 through 1980's. Fully indexed/cataloged. Also includes Sokkisha MS 27 stereoscope with 3x and 8x lenses. \$20,000. Dave @ Evans, Colbaugh & Associates, Inc 760-510-9686 ecageo@aol.com



Feffer Geological Consulting Inc.

Feffer Geological is interested in purchasing used laboratory testing equipment. All equipment used in a soils laboratory considered.

Please call (310) 207-5048

JOIN NINYO & MOORE

Company Profile

Since 1986, clients have turned to Ninyo & Moore for complex geotechnical and environmental challenges. As a leading geotechnical and environmental sciences engineering and consulting firm, Ninyo & Moore provides specialized services including evaluations for airports, bridges, commercial developments, dams, educational facilities, harbor and offshore structures, highways and roadways, hospitals, industrial developments, landfills, light rail transit lines, pipelines, power stations, railroads, residential developments, reservoirs and tanks, transmission lines, tunnels, water and wastewater treatment plants to clients in both the public and private sectors. With offices in Colorado, California, Nevada, Arizona, and Texas, the firm is fully committed to being responsive, cost-efficient, and thorough in meeting its clients' project needs and objectives.



Available Positions:

- ✓ **DENVER:** *Project Engineer/Geologist, Senior Environmental Professional, Senior Geotechnical Engineer, Staff Engineer, Staff Environmental Scientist, and Staff Geologist.*
- ✓ **IRVINE:** *Asbestos & Lead Professional, Environmental Engineer/Scientist-Air Quality Specialist, Environmental Project Manager, Project Engineer/Geologist, Senior Staff Engineer/Geologist, Senior Environmental Engineer, Senior Staff Environmental Scientist, Staff Engineer/Geologist, and Staff Environmental Scientist.*
- ✓ **LAS VEGAS:** *Asbestos & Lead Professional, Construction Field Technicians & Inspectors, Geotechnical Engineer, Project Engineer/Geologist, Senior Project Engineer, and Staff Engineer/Geologist.*
- ✓ **OAKLAND:** *Entry-Staff Level-Project Engineer/Geologist/Environmental Specialist, Field Special Inspectors, Environmental Project Manager, Materials Project Manager/Supervisor, Project Environmental Geologist, Scientist or Engineer, Senior Geotechnical Engineer, Senior Project Geotechnical Engineer, and Staff Geotechnical Engineer.*
- ✓ **PHOENIX:** *Construction Field Technician, Geotechnical Engineer/Engineering Geologist, Project Environmental Scientist, Project Manager-Construction Materials Testing, Senior Environmental Professionals, and Senior Staff Environmental Scientist.*
- ✓ **SAN DIEGO:** *Project Engineer/Geologist, Senior Geotechnical Engineer, Staff Engineer, Construction Field and Laboratory Technicians, and Information Systems Specialist.*

Successful candidates should have a BS or MS degree for staff-level positions and five years or more of experience for project to senior-level positions. The candidates should be detailed oriented and have excellent verbal and written communication skills. Professional Engineer (PE) and/or Professional Geologist (PG) registrations are preferred for project or senior positions.



Ninyo & Moore offers excellent benefits and great opportunities for professional growth. Please visit our website for complete and detailed job descriptions and to submit your resume in confidence at www.ninyoandmoore.com/careers.html or mail to our corporate office at 5710 Ruffin Road, San Diego, CA 92123, Attention: Human Resources. EOE

www.ninyoandmoore.com

Ninyo & Moore is an equal opportunity employer.



A SHORT COURSE ON Geotechnical CONE PENETRATION TESTING

Gregg Drilling & Testing, Inc. is pleased to announce the scheduling of our 2008 short course on cone penetration testing (CPT) in geotechnical site investigations.

COURSE CONTENT

Geotechnical Site Investigation

- Liquefaction Evaluation
- Shallow Foundation Design
- Pile Design
- Other In Situ Tests
- Field Demonstration

COURSE FORMAT

The course has been designed to illustrate the principles of cone penetration testing through the evaluation of case histories and worked examples. Our new format will allow for frequent opportunities for audience participation and open discussions of technical methodologies as they apply to project scenarios.

COURSE PURPOSE

Site characterization is the basic first step for any geotechnical study. This short course will provide engineers and geologists with the knowledge and background to plan and supervise site investigations and to interpret CPT data.

COURSE ATTENDEES

The courses are intended for Geotechnical Engineers and Engineering Geologists working with liquefaction evaluation, foundation design, and geotechnical site investigation. Each attendee will earn eight (8) Professional Development Hours (PDH's) for participation in the short course.

NOTE: Environmental short course available in Concord only, visit our web site for more information.

COURSE INSTRUCTOR:

Peter Robertson, Ph.D.

Friday - MARCH 7, 2008

HYATT REGENCY - HUNTINGTON BEACH

21500 Pacific Coast Hwy.
Huntington Beach, CA 92648

8:30 a.m. to 5:00 p.m.

Registration/continental breakfast at 8:00 a.m.

Presented by:
Gregg Drilling

Phone: (562) 427-6899
Fax: (562) 427-3314



www.greggdrilling.com

ADDITIONAL COURSE LOCATION/DATE -- CONCORD: MARCH 17, 2008 (Note: Both geotechnical & environmental courses offered)
Visit our web site at www.greggdrilling.com/seminars.htm for further details and alternate registration forms.

2008 SHORT COURSE REGISTRATION FORM — HUNTINGTON BEACH

Payment must be received by FEBRUARY 15, 2008 to qualify for early registration. Mail/Fax your completed registration form to:
\$195.00 - early registration fee OR \$270.00 - late registration fee
(Make checks payable to: Gregg Drilling & Testing, Inc.; If faxing please include a copy of check)

COURSE DATE: MARCH 7, 2008

Geotechnical Site Investigation

GREGG DRILLING ATTN: Maryann Keating
2726 Walnut Ave. **E-MAIL: mkeating@greggdrilling.com**
Signal Hill, CA 90755

Attendee Name: _____ Title: _____ Company/Agency: _____

Address: _____ City, State, Zip: _____

Phone: _____ E-Mail Address: _____

Payment information must be completed for processing: (Check one) My check # _____ in the amount of \$ _____ is enclosed.

Charge my credit card in the amount of \$ _____ AMEX VISA M/C Card number: _____ Exp. Date: _____

Card Holder Name: _____ Billing Address: _____

Registration fee includes seminar, reference materials, continental breakfast, lunch, break refreshments, and hotel parking. Class size is limited; early registration is advised. On-site registration will be on a space available basis. Gregg Drilling & Testing, Inc. reserves the right to cancel any seminar. If a course must be cancelled, a full refund will be issued. If registrant is unable to attend, a charge of \$75.00 for any cancellation within 10 business days of the seminar will be assessed. No refund for cancellation within three business days of the seminar will be offered.

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Ventura, CA 93003
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svarnell@fugro.com