Gulf Coast Association of Geological Societies
and Gulf Coast Section of SEPM
65th Annual Convention
September 20–22, 2015—Houston, Texas

ANNOUNCEMENT

Www.gcagshouston.com
Hosted by the Houston Geological Society
We thank our generous diamond sponsors for supporting the

2015 Annual GCAGS/GCSSEPM Convention and Exhibition
As General Chairman and on behalf of the Houston Geological Society and the entire convention volunteer team (p. 40), I am honored to host the 65th Annual Convention of the Gulf Coast Association of Geological Societies in partnership with the Gulf Coast Section of SEPM. We invite you to join us September 20th – 22nd at this special and exciting anniversary event.

As we celebrate the 65th anniversary of GCAGS, we continue to honor the principles that the seven founding fathers created for this fine organization in the fall of 1950. These principles still apply today as we continue our ongoing quest to explore the geology of the Gulf Coast. Aided by technological advances, we can now see and unravel previously hidden structures at previously unreachable depths. For 65 years, GCAGS has witnessed and chronicled these advances, as has GCSSEPM for nearly as long.

Our theme for this year’s conference is **Discovery, Technology, Education, and Leadership**. I encourage you to explore the contents of this brochure, as I am certain you will find numerous social, educational, and technical opportunities for enhancing your knowledge, networking with the outstanding professionals of our member societies, and improving the odds for your next discovery.

Some of the highlights are:
- 9 Short Courses and Workshops
- 7 Field Trips
- 19 Technical Sessions Comprising of 94 Talks
- 2 Forums
- 3 Luncheons
- 86 Poster Presentations
- 1 Field Trips
- 19 Technical Sessions Comprising of 94 Talks
- 2 Forums
- 3 Luncheons
- 86 Poster Presentations

The GCAGS convention isn’t all seriousness; there are fun aspects as well with ample opportunities for renewing old friendships and making new ones. These start with the opening session Sunday evening, where we will recognize our awardees. Following that, the Icebreaker Party provides time for conversations and for viewing the offerings of the exhibitors. Other occasions for meeting your contemporaries and networking are the Young Professionals’ Reception, Monday’s Presidents’ Reception, where an award will go to the member who has the oldest GCAGS bag, and the Monday evening entertainment at Saint Arnold Brewery.

We are also excited about this year’s partnership with the AAPG-SEG Student Expo. The students will exhibit their research posters, and we will recognize the 1st, 2nd, and 3rd place winners at the Presidents’ Reception. We also provide opportunities for them to volunteer for various roles at the convention and encourage them to attend our technical sessions.

This announcement includes information on the technical talks, posters, short courses, field trips, host hotel, registration, luncheons, entertainment, and spouse activities. Those of you who register early are assured of the opportunity to attend the event(s) you wish, as some of them have limited seating. The information and registration form in this announcement and any future updates can be found at [www.gcagshouston.com](http://www.gcagshouston.com) and [www.gcags.org](http://www.gcags.org).

I wish to take this opportunity to thank our sponsors who in this year of limited budgets have once again graciously stepped forward to provide the funds required to hold this convention.

So, make plans to attend, register early, and participate in as many of our activities as possible. We are sure you will agree that this is an invaluable opportunity for you to expand your knowledge of the Gulf Coast, enhance your career, and help you make your next discovery.

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Larry Bartell, General Chair
**Special Events**

All events will be held at the George R. Brown Convention Center, 1001 Avenida De Las Americas, Houston, Texas, unless otherwise noted. Locations and times subject to change—consult the program book and convention application on your mobile device on site.

**YOUNG PROFESSIONALS’ AND STUDENTS’ ‘MEET & GREET’ (Sponsored by Chevron)**

3:30 pm–5:00 pm • Sunday, Sept. 20 • GRB CC Ballroom Pre-Function Area

This ‘Meet & Greet’ will provide an early opportunity for young professionals and students to start the convention with a get-together. Experienced professionals are also invited to participate in this intergenerational discussion on the things that change and the things that don’t in our profession. Drinks will be available. Following the reception, all are encouraged to attend the Opening Session and Awards Ceremony. For more information, please see page 33.

**OPENING SESSION (Sponsorship Available)**

5:00 pm–6:00 pm • Sunday, Sept. 20 • GRB CC 310ABC

Join GCAGS President Charles Sternbach, GCSSEPM President Thomas Hearon, and General Chair Larry Bartell in welcoming attendees to Houston. The program will include welcoming remarks, the GCAGS/GCSSEPM awards ceremony, and an opportunity to meet candidates for 2016 AAPG officer positions. For more information, please see page 9. Entrance by badge only.

**AWARDS CEREMONY (at Opening Session) (Sponsorship Available)**

5:00 pm–6:00 pm • Sunday, Sept. 20 • GRB CC 310ABC

The Awards Ceremony recognizes the 2015 recipients of GCAGS and GCSSEPM special honors, as well as the awardees of the best presentations and best published papers in the 2014 GCAGS Transactions and GCAGS Journal, all of whose works have made important contributions to GCAGS and the advancement of geosciences. For more information, please see page 9. Entrance by badge only.

**ICEBREAKER RECEPTION (Sponsored in part by Schlumberger; Additional Sponsorship Available)**

6:00 pm–8:00 pm • Sunday, Sept. 20 • Exhibit Hall (GRB CC Hall B3)

If you can find any serious ice in a Houston September, break it at the Icebreaker. Join your friends and colleagues (old or brand new) to enjoy the food and drinks, have your first look at the exhibits and posters, and participate in the Treasure Hunt. Come pass a good time and get ready for the upcoming Convention. Entrance by badge only.

**ALL-CONVENTION LUNCHEON (Sponsorship Available)**

11:45 am–12:50 pm • Monday, Sept. 21 • GRB CC Grand Ballroom B • $50

Convention attendees are invited to attend the All-Convention Luncheon, where Steve Thurston, Vice President, Chevron North America Exploration and Production Company, will speak on “Chevron's Key Discoveries and Developments in the Deepwater Gulf of Mexico, a Story of Steady Growth.” Space is limited, so purchase your ticket early. For more information, please see page 14.

**PRESIDENTS’ RECEPTION (Hosted by GCAGS President Charles Sternbach and GCSSEPM President Thomas Hearon) (Sponsorship Available)**

4:30 pm–6:00 pm • Monday, Sept. 21 • Exhibit Hall (GRB CC Hall B3)

Join Charles Sternbach, President of GCAGS, Thomas Hearon, President of GCSSEPM, and Larry Bartell, General Chair, for a reception in the exhibit hall. We will have light refreshments and a cash bar. We will also recognize the 1st, 2nd, and 3rd place winners selected by the judges of the student posters. And, we will have a special competition described below.

**OLDEST GCAGS BAG CONTEST! (at Presidents’ Reception) (Sponsorship Available)**

5:00 pm–6:00 pm • Monday, Sept. 21 • Exhibit Hall (GRB CC Hall B3)

As a celebratory event in observance of GCAGS’s 65th anniversary, we will honor the attendee who has the oldest GCAGS bag from previous conventions. If you are like most of us and you have a collection dating back further then we care to admit, bring your candidate to the reception, because you may have the winner in your collection.

**BBQ, BEER, and BYTES—An Evening at St. Arnold Brewery (Sponsored by Seitel, TGS, Subsurface Consultants & Associates, AAPG YP’s, and NeoGeos)**

6:30 pm–9:30 pm • Monday, Sept. 21 • St. Arnold Brewery (2000 Lyons Ave.) • $50

Most of us have known from our field camp days that beer has its place in our chosen field! Join your friends and colleagues for St. Arnold’s beer, Texas BBQ, door prizes, and both vintage and modern video games. Buses will provide transportation, with
Special Events

**GCAGS EDUCATION/LEADERSHIP FORUM 2.0: Foundational Talks for the Gulf of Mexico (Sponsorship Available)**

8:20 am–11:40 am & 1:15 pm–2:40 pm • Tuesday, Sept. 22 • GRB CC General Assembly A

The Gulf of Mexico is one of the richest hydrocarbon provinces in the world, a “fertile crescent” of resources, technology, and ingenuity. GCAGS President Charles Sternbach has recruited globally recognized experts on the Gulf of Mexico to present foundational and timely talks of great interest to experienced and young professionals alike. Topics include large scale thinking on: New rules in Mexico, turbidite reservoirs, mega-regional structure, deepwater depositional systems, a story of success and unconventional work flows in the Eagle Ford shale, and carbonate reservoirs from Florida to Mexico. Please see p. 16 for details.

**GCAGS SPECIAL BUSINESS FORUM: Geologists as Leaders in Finance, Banking, and A&D (Sponsorship Available)**

8:30 am–11:30 am • Tuesday, Sept. 22 • GRB CC 332DEF

The GCAGS Special Business Forum, “Geologists as Leaders in Finance, Banking and A&D – An Alternative to Traditional E&P Career Paths,” will be a moderated discussion with five geologists who also are industry leaders. Each panelist will give a short talk about their unique experience entering and adapting to the business and finance environment, followed by a lively round-table discussion, moderated by Steve Brachman and Jeff Lund, with audience participation. This will be an open forum. Topics will include, career opportunities, obtaining capital and cultivating relationships with capital providers (co-existing with MBA’s).

**WOMEN IN GEOSCIENCES TUESDAY MORNING BREAKFAST (Sponsorship Available)**

7:00 am–8:30 am • Tuesday, Sept. 22 • Cost and Location TBA

Join us in celebrating Gulf Coast Women in Geosciences in this special breakfast networking event. It is sure to be a memorable morning and a highlight of the conference! Keep an eye on the GCAGS Convention website and social media for more information on the event specifics, including the location, cost, and final agenda.

**EXHIBIT HALL ‘WALK & TALK’ BOX LUNCH (Sponsorship Available)**

11:45 am–12:50 pm • Tuesday, Sept. 22 • Exhibit Hall B3 • FREE for Professionals, Spouses, and Guests with your registration badge! Students may purchase lunch tickets ($15) through pre-registration.

A free lunch and a final opportunity to visit the offerings of our exhibitors and to learn from the posters and their authors. The exhibition hall closes at 1:30 pm, so hurry over following the close of the morning's oral sessions.

**DPA LUNCHEON: How to Survive and Thrive in Good Times and Bad (Sponsorship Available)**

11:45 am–12:50 am • Tuesday, Sept. 22 • GRB CC 360ABDE • $50

Charles Goodson, Chairman of PetroQuest, will share his strategies for navigating the up and down cycles in the industry, with words of wisdom gained from a 40-year career and experience gained from leading both publicly traded and private companies.

**GCSSEPM LUNCHEON: Model the Rock! Using Diagenesis Simulation for Rock Property Prediction (Sponsorship Available)**

11:45 am–12:50 am • Tuesday, Sept. 22 • GRB CC 360CF • $50

Rob Lander works to understand controls on diagenetic processes in clastic rocks. He will describe recent advances in these studies and how they improve models of the textures and geomechanical and fluid-flow properties of rocks from deposition to reservoir conditions.

**PANEL DISCUSSION: Geo Generations: 60 Years in the ‘Patch’ and Counting (Sponsored by AAPG Division of Professional Affairs) (Sponsorship Available)**

3:10 pm–4:30 pm • Tuesday, Sept. 22 • GRB CC General Assembly A

In the Tinker family, at least, a passion for geoscience is hereditary! C. N. “Tom” Tinker is a retiree following a successful 39-year career with Shell Oil Company; his son Scott is director of the Texas Bureau of Economic Geology; and his son Nathan is a graduate student in geology at the University of Texas at Austin. During this facilitated panel discussion, Tom, Scott, and Nathan will consider industry, technology, science, political, and economic trends that have impacted and will continue to impact geoscientists in the oil and gas industry. We expect that they will tell some interesting family stories along sharing their wise and highly informed views on the large-scale influences on our profession. For more information, please see page 12.
REGISTRATION (Hall B3)

Dates & Times:
Saturday, Sept. 19.......................3:00 pm–6:00 pm
Sunday, Sept. 20..........................7:00 am–8:00 pm
Monday, Sept. 21..........................7:00 am–6:00 pm
Tuesday, Sept. 22..........................7:00 am–12:00 noon

Instructions on how to pre-register, or register on site, are provided on page 38. For additional questions or information, please inquire with info@gemworldevents.net.

THE EXHIBITION (Hall B3)

Dates & Times:
Sunday, Sept. 20 (Icebreaker)............6:00 pm–8:00 pm
Monday, Sept. 21..........................8:30 am–6:00 pm
Tuesday, Sept. 22..........................8:30 am–1:30 pm

Explore the displays of scores of service companies, production companies, fossil and gem dealers, universities, research institutions, and publishers during the two and a half days of the exhibition. Is your company looking for a cost-effective face-to-face venue to market your products or services? Does your non-profit organization wish to promote your program to a broad cross-section of the geoscience community—at a reduced exhibit fee? See pages 10–11 for details!

SPEAKERS’ & POSTER PRESENTERS’ BREAKFAST (Sponsored by Amshore)

7:00 am–8:00 am • Monday & Tuesday, Sept. 21 & 22 • GRB CC Ballroom B

All session chairs, speakers, and poster presenters are invited to attend this complimentary breakfast on the day of their presentations. Reminders will be given regarding session timing, audiovisual equipment, how speakers will be introduced, and when poster presenters must be in their booths, followed by a Q&A session.

JUDGES’ BREAKFAST (Sponsored by Amshore)

7:00 am–8:00 am • Monday, Sept. 21 ONLY • GRB CC Ballroom B

All judges are invited to attend this complimentary breakfast on Monday. Information will be provided as to judging criteria and regarding which sessions to attend, and instructions and judging forms will be available at both the breakfast and in the Speakers’ & Poster Presenters’ Room/Judges’ Tally Room.

SPEAKERS’ & POSTER PRESENTERS’ ROOM & JUDGES’ TALLY ROOM (Sponsorship Available)

Dates & Times:
Sunday, Sept. 20..........................1:00 pm–5:00 pm • GRB CC 330AB
Monday, Sept. 21..........................7:00 am–6:00 pm • GRB CC 330AB
Tuesday, Sept. 22..........................7:00 am–5:00 pm • GRB CC 330AB

STUDENT ACTIVITIES (Sponsored by Five States Energy)

In addition to specific student activities, including the ‘meet & greet,’ and Imperial Barrel Award short course, this year’s convention coincides with the AAPG-SEG Student Expo, at which students will present posters of their research. Students may also register for participation in conference activities, including service as student volunteers. See page 32 for details.
TEACHER ACTIVITY (Sponsorship Available)

The highly-regarded workshop “More! Rocks in your Head!” is designed to support grade 3–12 educators by giving each teacher a greater personal knowledge of the Earth sciences along with a package of hands-on materials to promote understanding of the sciences in the classroom. See page 33 for details.

SPOUSE & GUEST ACTIVITIES (Sponsored by Auburn Energy and Exama Oil Company)

A variety of special activities have been arranged for spouses and guests, including a Hospitality Suite with interesting speakers and a walking tour that will explore the fascinating tunnel system of downtown Houston. For more information, please see page 34.

POSTER SESSIONS (Sponsorship Available)

The GCAGS 2015 poster sessions will take place in the Exhibit Hall (Hall B3) on the third floor of the George R. Brown Convention Center. Over 60 student research posters and 20 professional posters covering a diverse range of topics will be on view for the entire meeting (Sunday evening – Tuesday morning). Authors will be available for discussion during the coffee breaks on Monday morning (9:50 am–10:20 am) and afternoon (2:50 pm–3:20 pm). Student poster judging will occur on Monday and winning posters will be acknowledged at a special student awards ceremony in the Exhibit Hall on Monday evening. Everyone is invited to come help us celebrate all the students’ hard work! For more information, please see page 22–25.

Register Soon! Early bird discount ends July 31, 2015!

GCAGS in the Digital Realm

- Visit the convention website, www.gcagshouston.com, for details and continual updates.
- Have a smart phone or tablet? Scan the QR code at left and go directly to the convention website.
- Connect with the Gulf Coast Geo-Community!

Like us on Facebook at https://www.facebook.com/GCAGS

Follow us on Twitter at https://twitter.com/GCAGSorg or via username @GCAGSorg (Use #GCAGS, #GCAGS2015, or #GCAGSHouston in all your conference posts!)

You can also find us on LinkedIn in the group named “Gulf Coast Association of Geological Societies (GCAGS)”
### Schedule of Events

**Thursday, Sept. 17**

<table>
<thead>
<tr>
<th>Time</th>
<th>Event</th>
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<tbody>
<tr>
<td>7:00 am</td>
<td>Field Trip #2, Eagle Ford Unconventional Reservoir Field Seminar, departure and return at Hilton, p. 30</td>
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<tr>
<td>3:00 pm</td>
<td>Field Trip #1, Upper Cambrian Microbial Carbonate Mounds in Central Texas, departure and return at Hilton, p. 30</td>
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**Saturday, Sept. 19**

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<thead>
<tr>
<th>Time</th>
<th>Event</th>
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<tr>
<td>7:30 am</td>
<td>Field Trip #4, Spindletop Oil Field–Gladys City Boomtown Museum, departure and return at Hilton, p. 30</td>
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<tr>
<td>8:00 am</td>
<td>Field Trip #5, Galveston and the Brazos Delta as Reservoir Analogs, departure and return at Hilton, p. 31</td>
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<tr>
<td>8:30 am</td>
<td>Field Trip #3, Geology of Canyon Lake Gorge, departure and return at Hilton, p. 30</td>
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<tr>
<td>8:30 am–3:30 pm</td>
<td>Teacher Workshop (More! Rocks In Your Head), Region 4 Dev. Center, The Woodlands, p. 33</td>
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<tr>
<td>9:00 am–3:30 pm</td>
<td>Short Course #1, Geosteering for Young Professionals, Hilton 335A, p. 26</td>
</tr>
<tr>
<td>9:00 am–3:30 pm</td>
<td>Short Course #2, Gulf of Mexico Primer—Regional Overview of the U.S. Deepwater Gulf of Mexico, Hilton 336AB, p. 26</td>
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<tr>
<td>11:30 am–1:30 pm</td>
<td>Short Course Participant Lunch, Location TBA</td>
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<tr>
<td>3:00 pm–6:00 pm</td>
<td>Registration Open, GRB CC Hall B3, p. 38</td>
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**Sunday, Sept. 20**

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<th>Time</th>
<th>Event</th>
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<tr>
<td>7:00 am–8:00 pm</td>
<td>Registration, GRB CC Hall B3, p. 38</td>
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<tr>
<td>8:00 am</td>
<td>Field Trip #6, Hands-On Geophysical Data Acquisition: Characterizing Shallow Gulf Coast Sediments Using Cuttings, Well Logs, and Seismic Surveys, departure and return at Hilton, p. 31</td>
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<tr>
<td>8:00 am</td>
<td>Field Trip #7, Field Work on Active Faults in Houston, departure and return at Hilton, p. 31</td>
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<tr>
<td>8:00 am–2:00 pm</td>
<td>GCAGS Board Meeting, Hilton 339AB, p. 5</td>
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<tr>
<td>8:00 am–5:00 pm</td>
<td>AAPG ExComm Meeting, Hilton 338</td>
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<tr>
<td>9:00 am–12:30 pm</td>
<td>Short Course #8, Introduction to Reservoir Fluid PVT Analysis for Geologists, Hilton 335A, p. 28</td>
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<tr>
<td>9:00 am–3:30 pm</td>
<td>Short Course #5, IBA Training Session (Students Only), Hilton 336AB, p. 27</td>
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<tr>
<td>9:00 am–3:30 pm</td>
<td>Short Course #6, A User’s Guide to Exploration and Production Biostratigraphy, Hilton 335C, p. 27</td>
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<tr>
<td>9:00 am–3:30 pm</td>
<td>Short Course #7, Handheld X-Ray Fluorescence (XRF) Chemostratigraphy: Theory and Application to Mudrock Drill Core and Cuttings, Hilton 337AB, p. 28</td>
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<tr>
<td>11:30 am–1:30 pm</td>
<td>Short Course Participant Lunch, Location TBA</td>
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<tr>
<td>12:00 noon–4:00 pm</td>
<td>Spouse Hospitality, Hilton 340AB, p. 34</td>
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<tr>
<td>1:00 pm–5:00 pm</td>
<td>Speakers’/Judges’ Room, GRB CC 330AB, p. 4</td>
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<tr>
<td>3:30 pm–5:00 pm</td>
<td>Young Professionals’ &amp; Students’ ‘Meet &amp; Greet,’ GRB CC Ballroom Pre-Function Area, p. 2</td>
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<tr>
<td>5:00 pm–6:00 pm</td>
<td>Opening Session/Awards Ceremony, GRB CC 310ABC, p. 9</td>
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<tr>
<td>6:00 pm–8:00 pm</td>
<td>Icebreaker in Exhibit Hall with Poster Session, GRB CC Hall B3, p. 10</td>
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**Monday, Sept. 21**

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<th>Time</th>
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<tr>
<td>7:00 am–8:00 am</td>
<td>Speakers’ &amp; Poster Presenters’ Breakfast, GRB CC Grand Ballroom B, p. 4</td>
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<tr>
<td>7:00 am–8:00 am</td>
<td>Judges’ Breakfast, GRB CC Grand Ballroom B, p. 4</td>
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<tr>
<td>7:00 am–6:00 pm</td>
<td>Registration, GRB CC Hall B3, p. 38</td>
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<tr>
<td>7:00 am–6:00 pm</td>
<td>Speakers’/Judges’ Room, GRB CC 330AB, p. 4</td>
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<tr>
<td>7:30 am–8:30 am</td>
<td>AAPG House of Delegates’ Breakfast, Hilton 337AB, p. 5</td>
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<tr>
<td>8:00 am–4:00 pm</td>
<td>Spouse/Guest Hospitality, Hilton 340AB, p. 34</td>
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### Monday, Sept. 21, Continued

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<tr>
<td>8:30 am–9:50 am</td>
<td>Oral Session: Gulf Mega-Regional Seismic Interpretation, GRB CC Grand Ballroom A, p. 18</td>
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<tr>
<td>8:30 am–11:35 am</td>
<td>Oral Session: Caribbean and Colombia Exploration, GRB CC Grand Ballroom C, p. 18</td>
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<tr>
<td>8:30 am–11:35 am</td>
<td>Oral Session: Extracting Hydrocarbons from Source Rocks, GRB CC 320ABC, p. 18</td>
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<tr>
<td>8:30 am–6:00 pm</td>
<td>Exhibitors/Posters Open, GRB CC Hall B3, p. 10</td>
</tr>
<tr>
<td>8:55 am–11:35 am</td>
<td>Oral Session: Salt Tectonics—Gulf of Mexico and the World, GRB CC 310ABC, p. 18</td>
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<tr>
<td>10:00 am–11:00 am</td>
<td>Oral Session: U.S. Gulf Deepwater Fields I, GRB CC Grand Ballroom A, p. 18</td>
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<tr>
<td>11:45 am–12:50 pm</td>
<td>All-Convention Luncheon, GRB CC Grand Ballroom B, p. 14</td>
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<tr>
<td>1:00 pm–2:00 pm</td>
<td>Oral Session: Rock Samples and Reservoir Analysis, GRB CC 320ABC, p. 20</td>
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<tr>
<td>6:30 pm–9:30 pm</td>
<td>BBQ, Beer, and Bytes—An Evening at St. Arnold's Brewery, p. 13</td>
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### Tuesday, Sept. 22

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<tr>
<td>7:00 am–8:00 am</td>
<td>Speakers’ &amp; Poster Presenters’ Breakfast, GRB CC Grand Ballroom B, p. 4</td>
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<tr>
<td>7:00 am–12:00 noon</td>
<td>Registration, GRB CC Hall B3, p. 38</td>
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<tr>
<td>7:00 am–5:00 pm</td>
<td>Oral Session: Global 3D Seismic Studies (GCSSEPM), GRB CC 310ABC, p.19</td>
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<tr>
<td>8:00 am–4:00 pm</td>
<td>Oral Session: Advanced Studies of Petroleum Systems, GRB CC 320ABC, p. 20</td>
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<tr>
<td>10:00 am–2:30 pm</td>
<td>Oral Session: U.S. Gulf Deepwater Fields II, GRB CC Grand Ballroom A, p. 19</td>
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<tr>
<td>11:45 am–12:50 pm</td>
<td>Oral Session: Groundwater Environmental Case Studies, GRB CC 332ABC, p. 20</td>
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<td>11:45 am–12:50 pm</td>
<td>Oral Session: New Ideas in Mapping and Exploration, GRB CC 332ABC, p. 22</td>
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<tr>
<td>11:45 am–12:50 pm</td>
<td>Oral Session: Chemostratigraphy and Paleontology, GRB CC 332ABC, p. 22</td>
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We extend a very special thank you to our sponsors for supporting the 2015 GCAGS/GCSSEPM Annual Convention and Exhibition. Their continued support is fundamental to having a successful meeting.

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For more information about sponsorship opportunities for GCAGS 2015, please contact:

Jeff Lund, 713–253–7481 or jeff.lund@corridoroilandgas.com
OPENING SESSION AND AWARDS CEREMONY • 5:00 pm–6:00 pm • Sunday, Sept. 20 • GRB CC 310ABC

GCAGS President Charles Sternbach, GCSSEPM President Thomas Hearon, and General Chair Larry Bartell will welcome attendees to the 65th annual GCAGS Convention. They will also honor individuals for exemplary service, presentations, and papers at the Awards Ceremony. Entrance by badge only.

The Awards Ceremony recognizes the 2015 recipients of GCAGS and GCSSEPM special honors, as well as the awardees of the best presentations and best published papers in the 2014 GCAGS Transactions and GCAGS Journal, all of whose works have made important contributions to GCAGS and the advancement of geosciences. Entrance by badge only.

**2015 GCAGS Transactions Dedication** – John Amoruso

**2015 GCAGS Distinguished Service Awards** – Dallas Dunlap, Mike Quinn, and Mike Fein

**2015 GCAGS Honorary Membership** – Steve Hill

**2015 Owen R. Hopkins Outstanding Earth Science Teacher Award** – Ilena Krupala

**2015 GCSSEPM Doris Curtis Malkin Medal** – Paul Weimer

**2015 GCSSEPM Distinguished Service Award** – Rick Beaubeouf

**2015 AAPG Gulf Coast Section Imperial Barrel Award** – 1st Place, University of New Orleans; 2nd Place, University of Louisiana at Lafayette; and 3rd Place (tie), University of Texas at Austin and Stephen F. Austin State University

**2014 AAPG Gulf Coast Section A. I. LEVORSEN MEMORIAL AWARD** – John Snedden, Ian O. Norton, Gail L. Christeson, and Jason C. Sanford, “Interaction of Deepwater Deposition and a Mid-Ocean Spreading Center, Eastern Gulf of Mexico Basin, USA”


The Exhibit Hall (GRB CC Hall B3) will be the host area for a number of events, so there will be plenty of opportunities to explore all that the exhibitors have to offer, see old acquaintances, and forge new ones.

- The traditional Icebreaker cocktail party held on Sunday in the hall;
- The Presidents’ Reception will be held in the Exhibit Hall from 4:30 pm to 6:00 pm on Monday;
- Extended breaks in the morning and afternoon oral sessions will permit in-depth discussions with the poster presenters; and
- A free ‘walk-and-talk’ box lunch on Tuesday.

Show hours are:
- Sunday, 20 September (Icebreaker) .......... 6:00 pm–8:00 pm
- Monday, 21 September ....................................... 8:30 am–6:00 pm
- Tuesday, 22 September ........................................... 8:30 am–1:30 pm

Please note that children under the age of 13 will not be allowed in the exhibit hall anytime during exhibit setup or teardown.

During exhibit hours, children not of school-age will not be allowed into any activities within the exhibit hall, including the Icebreaker reception, unless they are young enough or small enough to be confined to a stroller, backpack, or front pack.

School-age children will be allowed to attend the exhibition during regularly scheduled hours if they are properly registered (as students) and they wear their badges at all times.

Current List of Exhibitors

AAPG
Advanced Geosciences Inc.
ALS Corpro
ALS Ellington
ALS Empirica
ALS Reservoir Laboratories
Bruker Elemental
CGG
Chemostrat
Corpus Christi Geological Society, host of the 2016 GCAGS Annual Convention, Sept. 18–20, ABC Center
Core Mineralogy
DownUnder GeoSolutions
FairfieldNodal
GCAGS Bookstore
Gems & Crystals Unlimited
GeoCare Benefits Insurance (AAPG member program)
GeoFrontiers
Geomap Company
Geophysical Insights
GETECH
Gulf Coast Section SEPM Foundation
Horizon Well Logging
Horizontal Solutions International
iBall Instruments
Integrated Geophysics Corp.
ION Geophysical
Lumina Geophysical
Lynx Information Systems
MICRO-STRAT
National Association of Black Geoscientists (NABG)
Interested in Exhibiting?

Space is still available! For a downloadable sales flier, floor plan, exhibitor list and space application form, go to www.gcagshouston.com and click on “Exhibition” at the top of the landing page, then “Reserve a Space at the Exhibition.” Simply download the application form to begin the process. For an up-to-date exhibitor list or floor plan showing what booths are open, contact Bruce Lemmon, GCAGS Exhibits Manager, at 918–585–1004 or bruce@gemworldevents.net. Join the growing list of exhibiting companies, agencies, universities, and associations that include those listed above (current as of press time).

The Exhibition

Neuralog
Paleo Data Inc.
Rock Solid Images (RSI)
Seismic Exchange

Task Fronterra Geoscience
TGS
Thompson Solutions / Gravity Map Service
Weatherford Laboratories

ion

→ Charged to innovate. Driven to solve.™

BE A JUDGE! VOLUNTEERS NEEDED!

The recognition of outstanding technical presentations is fundamental to the advancement of geological ideas and concepts. GCAGS and GCSEPM need your help in judging oral and poster sessions. All judges will be invited to a complimentary breakfast and asked to provide input to determine award winners. All that is required is observation of oral and poster sessions with grading based on standardized scorecards.

The awards committee will compile the scores, with winners honored at next year’s convention. The student poster award winners will be announced Monday evening of the convention.

Please volunteer by checking the appropriate box on your registration form or on the GCAGS website, or contact Sandy Rushworth or David Risch by sending an email to socialmedia@gcags.org.

You will be contacted to determine your preference for session(s) you are interested in judging. Your participation will be both rewarding and appreciated.
When C. N. “Tom” Tinker graduated from the University of Michigan in 1955 with an M.S. in Geology, he went to work for Shell Oil Company, retiring from Shell 39 years later after a full and satisfying career. “Old wireline logs. Low-resolution 2D seismic. Slide rulers. Oil was hard to find in those days,” Tom said, “but easy to produce!”

When Scott W. Tinker graduated from the University of Michigan in 1985 with an M.S. in Geology, he had little expectation that he would work at the same company, or even in the same industry, for his full career. He worked for three oil and gas companies before joining the University of Texas at Austin in 2000. “In my industry years, computer technology exploded and we were making some of the first 3D computer reservoir models integrating core, log, and seismic data,” recalls Scott. “It was a blast!”

Today, Nathan S. Tinker is working toward an M.S. degree in Geology at the University of Texas at Austin. “We are gathering massive amounts of digital outcrop data using drones; conducting full-basin analyses on integrated computer systems; and bringing in chemistry, physics, biology, and nanotechnology. Unconventional reservoirs are pretty easy to find, but really hard to produce!” laughs Nathan. “Who knows where my career will take me? But it will likely be around the world.”

During their facilitated panel, Tom, Scott, and Nathan will consider industry, technology, science, political, and economic trends that have impacted and will continue to impact geoscientists in the oil and gas industry. And, of course, share a few fun stories along the way!
Oldest GCAGS Convention Bag
Monday Evening during our Presidents’ Reception, Exhibit Floor (Hall B3)

At our Monday evening Presidents’ Reception on the Exhibit floor in observance of GCAGS’s 65th anniversary, we will have as a celebratory event for this milestone a contest of who has the oldest GCAGS bag from previous conventions. If you are like most of us and have a collection dating back farther then we care to admit, bring your candidate to the reception, because you may have the winner in your collection. At the same time we recognize the oldest GCAGS bag, we will also recognize the first, second, and third place winners of the student poster presenters.

BBQ, Beer, and Bytes—An Evening at St. Arnold Brewery
Monday Night, 6:30 pm–9:30 pm • St. Arnold Brewery (2000 Lyons Ave.) • $50
(Sponsored by Seitel, TGS, Subsurface Consultants & Associates, AAPG YP’s, and NeoGeos)

Join your friends and colleagues for St. Arnold’s beer, Texas BBQ, and both vintage and modern video games. Buses will provide transportation, departing from Avenida de las Americas adjacent to the Hilton Americas Houston Hotel, starting at 6:15 pm Monday night, with last return at 9:40 pm. Prizes will be raffled during the festivities. This event is limited to adults 21 and over.

Women in Geosciences
Tuesday Morning Breakfast, 7:00 am–8:30 am • Cost and Location TBA

Join us in celebrating Gulf Coast Women in Geosciences in this special breakfast networking event. It is sure to be a memorable morning and a highlight of the conference! Stay tuned to the GCAGS Convention website and social media for more information on a special Tuesday morning breakfast networking event!

United Airlines Discount Information

United Airlines is pleased to offer special discounts in connection with GCAGS/GCSSEPM 2015, with service to and from George Bush Intercontinental Airport (IAH) between the dates of September 15th and 26th. Simply book online at www.united.com and enter ZUXD412208 in the Offer Code box when searching for your flights. If booking through a travel professional or United Meetings at 800-426-1122, please give them the following information: Agreement Code: 412208 and Z Code: ZUXD. Outside of the United States, please call your local United Airlines Reservation Office. Experience dependable, first-rate service and earn miles in MileagePlus®, United’s award-winning frequent flyer program. To enroll in MileagePlus®, log on to www.united.com.
ALL-CONVENTION LUNCHEON (Sponsorship Available)
“Chevron’s Key Discoveries and Developments in the Deepwater Gulf of Mexico, a Story of Steady Growth”
– Steve Thurston, Vice President, Chevron North America Exploration and Production Company
11:45 am–12:50 pm • Monday, Sept. 21 • GRB CC Grand Ballroom B • $50

Abstract: While Chevron was a “late entrant” into the Deepwater Gulf of Mexico with participation in our first deepwater lease sale in 1995, we were an “early entrant” into the deepwater subsalt trends. Since 1995, Chevron has been a major participant in every deepwater lease sale, and that 20-year commitment to the deepwater has delivered a portfolio of conventional deepwater fields, but more importantly a significant portfolio of subsalt Miocene, and subsalt Lower Tertiary, prospects, discoveries, and producing fields. When you look back, more than two-thirds of the resources discovered to date in the deepwater Gulf have come from “subsalt” fields, and most of the future discoveries will also be “subsalt.”

Chevron currently produces oil and gas from ten deepwater fields, and we operate six of them including Blind Faith, Tahiti, and Jack / St. Malo. Chevron also has eight discovered fields in deepwater, in various stages of appraisal and pre-development, such as Big Foot, Buckskin, Moccasin, Anchor, and Guadalupe, as well as a portfolio of over 30 high-quality deepwater exploratory prospects.

The above mentioned developments boosted Chevron’s share of deepwater production to nearly 150,000 BOPD by 2010, and with our current portfolio of deepwater developments, Chevron will continue to grow its deepwater production profile significantly throughout this decade.

The U.S. Gulf of Mexico is a “World Class” petroleum basin with significant remaining oil and gas resource potential, but with many technical challenges. This presentation will describe why the deepwater Gulf is so attractive, where Chevron is active, and the technologies we are deploying to enable development of such a significant petroleum system. The recent Jack / St. Malo development will be highlighted as an example of overcoming the challenges and delivering a world class project in the subsalt Lower Tertiary trend.

Biography: Stephen P. Thurston (Steve), a native of Denver, Colorado, has a master’s degree in geology from the University of Washington, and is currently Vice President of Chevron North America Exploration and Production Company in charge of the Deepwater Exploration and Projects Strategic Business Unit, responsible for all of Chevron’s exploration and project development work in the Deepwater Gulf of Mexico.

Steve has held a variety of leadership positions throughout his career with Chevron since 1982, including Exploration Supervisor for all of California’s Coastal Basins, Exploration Supervisor for the Gulf of Mexico Shelf, and Profit Center Manager for the Eastern Gulf of Mexico. More recently Steve has served as Country Manager for Chevron upstream in Brazil and as General Manager of Strategic Planning for Chevron Corporation before starting his current assignment in January 2008.

DPA LUNCHEON (Sponsorship Available)
“How to Survive and Thrive in Good Times and Bad”
– Charles Goodson, CEO of PetroQuest
11:45 am–12:50 pm • Tuesday, Sept. 22 • GRB CC 360ABDE • $50

Abstract: Throughout Mr. Goodson’s almost 40 year career he has witnessed numerous commodity price downturns in the oil and gas industry. The majority of these downturns occurred while he was running various private and publicly traded E&P companies. Each of these cycles were unique in their cause and duration. As a result, Mr. Goodson has used certain strategies and techniques to navigate through both the good and bad times in the industry.

Biography: Charles T. Goodson is Chairman and CEO of PetroQuest Energy, Inc. He began his career in the oil and gas industry in 1978 with Mobil Oil Corporation in New Orleans, Louisiana, as a Landman. In 1980, he joined Callon Petroleum Company in Natchez, Mississippi, as a Landman and was promoted to Regional Land Manager in 1983 and Land Manager in 1984. In 1985, American Explorer, Inc. was formed with Mr. Goodson as the President of the company. It was an exploration and production company located in Lafayette, Louisiana. In 1995, American Explorer, LLC was formed with Mr. Goodson as a partner. The main focus of the company was exploration in the Gulf Coast region of the southern United States and the central and western Gulf of Mexico. In 1998, American Explorer, LLC merged with PetroQuest Energy, Inc. and Mr. Goodson became its President and Chief Executive Officer. The company’s offshore exploration office
Abstract: We have an unprecedented ability to depict realistically the spatial distributions of lithofacies in the subsurface thanks to developments in sequence stratigraphy, sedimentology, structural geology, geostatistics, and geophysics. As important as these developments have been, however, they in themselves have a limited ability to accurately predict rock properties—particularly in regions with high thermal exposures and restricted well control. This limitation arises because the geomechanical, petrophysical, and fluid-flow properties of clastic rocks are strongly affected by diagenetic processes (i.e., biological, physical, and chemical processes that occur after burial). For instance, the mechanical nature of a sand deposit may change with diagenetic alteration from a quasi-liquid (think quicksand) to a rigid material suitable for building gothic cathedrals. Likewise, permeability may decline by as much six orders of magnitude as the sediment compacts and is subject to geochemical alteration.

Recent breakthroughs in sedimentary petrology have led to improved understanding of compaction and quartz cementation in sandstones. Our group has built process models that build on these advances and developed additional models for grain-coating chlorite formation from volcanic rock fragment alteration, illite formation from the reaction of kaolinite and K-feldspar, and mechanical compaction, among others. Additionally, we use an a posteriori procedure that relies on analog sandstones to consider the effects of diagenetic processes for which accurate process models have yet to be developed. We combine these diagenetic models to predict the composition, texture, and porosity of sandstones through geologic time given the depositional composition and texture of a sand and its burial history. These results, in turn, serve as input for models that predict permeability and seismic velocities.

Accurate subsurface rock property models can be developed when this diagenetic modeling system is integrated with methods that describe the spatial distributions and depositional characteristics of lithofacies and petroleum system models that reconstruct sediment thermal and stress histories. This integrated approach has proven to be useful for reservoir quality risk assessment in a broad range of geologic settings, including some with considerable complexity. For instance, it has been used for accurate pre-drill prediction of reservoir quality in regions affected by thermal anomalies associated with salt structures.

To take this methodology a step farther and to constrain better rock physics, geomechanics, and fluid-flow properties of rocks in undrilled areas, we are developing a next-generation modeling platform that rigorously simulates processes in 3D at the grain scale. This 3D approach has the potential to provide unique predictive models of pore network geometries and grain contact properties for rocks in undrilled areas. The system considers thousands of grains with realistic shape and size variations and simulates deposition and rearrangement with Newtonian physics and brittle and ductile deformation of solid components with continuum mechanics. It also considers geochemical processes including quartz cementation and contact dissolution (“pressure solution”).

Biography: Rob Lander’s primary interest is in understanding the controls on diagenetic processes in clastic rocks and using this understanding to develop accurate models of rock properties away from well control and through geologic time. He is the inventor or co-inventor of several simulation systems for diagenesis and reservoir quality prediction including Touchstone, T>Map, T>Earth, Prism2D, Exemplar, and Cyberstone.

Rob co-founded Geocosm LLC and co-directs the company’s Consortium for the Quantitative Prediction of Sandstone Reservoir Quality (RQC), which was established in 2001 and currently has 23 members. He also is a Research Fellow with the Bureau of Economic Geology and collaborates with the Fracture Research and Applications Consortium at the University of Texas at Austin. Rob established Geocosm in 2000 after a stint as Technical Director of Geolica AS in Stavanger, Norway. Prior to his time in Norway, he was a Senior Research Geologist at Exxon Production Research in Houston, Texas.

Rob has published a number of papers on topics involving diagenesis and reservoir quality prediction (including several notable papers in the AAPG Bulletin) and received the Wallace E. Pratt Memorial Award for best paper published in the AAPG Bulletin in 2010. He has a Ph.D. in Geology from the University of Illinois at Urbana-Champaign and a B.A. in Geology from Knox College.
GCAGS EDUCATION/LEADERSHIP FORUM 2.0
Foundational Talks for the Gulf of Mexico
(Chaired by GCAGS President Charles Sternbach)
8:20 am–11:40 am & 1:15 pm–2:40 pm • Tuesday, Sept. 22 • GRB CC General Assembly A
(Sponsorship Available)

The GCAGS Education/Leadership Forum 2.0 continues and expands on last year’s Education Forum. Globally recognized big picture experts on the Gulf of Mexico will address key geoscience elements with mega-regional scale implications.

The speakers will be:

- **Scott Tinker** – Texas State Geologist & Director, Bureau of Economic Geology (BEG),
- **John Dribus** – Global Geosciences Advisor, Schlumberger,
- **Brian Horn** – Vice President, ION Geophysical,
- **John Snedden** – Director, Gulf Basin Depositional Synthesis Project,
- **Richard K. Stoneburner** – Past President and COO, Petrohawk & AAPG Distinguished Lecturer, and
- **Charlie Kerans** – Professor and R. K. Goldhammer Chair of Carbonate Geology, UT Austin.

Speakers will address foundational insights over broad Gulf of Mexico geography. Experienced and entry level geoscientists alike will benefit from broad perspectives. Leading Gulf of Mexico geoscientists will share hard won expertise gained over long and distinguished careers. Forum Chairman Charles Sternbach will guide the discussion. The audience will have many opportunities to learn from and question the best and brightest thought leaders on core topics of great importance to the Gulf of Mexico.

GCAGS SPECIAL BUSINESS FORUM
Geologists as Leaders in Finance, Banking, and A&D—An Alternative to Traditional E&P Career Paths
(Moderated by Steve Brachman and Jeff Lund)
8:30 am–11:30 am • Tuesday, Sept. 22 • GRB CC 332DEF
(Sponsorship Available)

The GCAGS Special Business Forum, “Geologists as Leaders in Finance, Banking and A&D—An Alternative to Traditional E&P Career Paths”, will be a moderated discussion with five distinguished geologists who also are industry leaders.

The panelists will be:

- **Stuart Burbach** – Nautilus Energy,
- **Andy Clifford** – Saratoga Resources,
- **Jeff Jones** – Van Operating,
- **Dick Stoneburner** – Pine Brook Partners, and
- **Tom Wilker** – Carlyle Group.

Each panelist will give a short talk about their unique experience entering and adapting to the business and finance environment, followed by a lively round-table discussion, moderated by Steve Brachman and Jeff Lund, with audience participation.

The purpose of this forum is to show the different, less traditional avenues that geologists may take in their Energy careers – colorfully illustrated by five experts who successfully made the journey. This will be an open forum. Several topics will be discussed, including entering, surviving and prospering in the business world as a scientist, what type of career opportunities are available to the geologist, the nuts-and-bolts of obtaining capital and cultivating relationships with capital providers (or, co-existing with MBA’s).
Diamond Sponsors
ORAL SESSIONS

Monday AM

GULF MEGA-REGIONAL SEISMIC INTERPRETATION • Barbara Radovich and Ed Haire, Session Chairs • Ballroom A
8:30 OPENING REMARKS
8:35 Ed Haire, ION: Onshore Florida Interpretation Utilizing Composited PSDM Seismic integrated with a Mega-Regional Basin wide Gulf of Mexico PSDM Seismic Program
9:00 Barbara Radovich, ION: Correlation of Events for Jurassic, Cretaceous of Northern Gulf of Mexico Margin Using Mega-Regional Onshore/Offshore, Composited PSDM Seismic Grid
9:25 James Pindell, ION: Crustal Framework of the Gulf of Mexico Based on Deep Image Seismic Reflection Data, a New Reflection-Refraction Profile, and a Regional Aeromagnetic Map

U.S. GULF DEEPWATER FIELDS I • Clint Moore and Justin Vandenbrink, Session Chairs • Ballroom A
10:15 OPENING REMARKS
10:45 Frank Evans, Chevron: Advances in the Tahiti Field Subsalt Seismic Imaging and Interpretation: Utilizing Seismic Attribute Analysis and Offset/Azimuth Partitions for Imaging and Interpreting Deepwater Subsalt Structure and Facies
11:10 Pilar Rojas, Shell: The Road to Shell's Appomattox Discovery

SALT TECTONICS—GULF OF MEXICO AND THE WORLD • Rachelle Kernan and Aubrey Collie, Session Chairs • Room 310
8:55 OPENING REMARKS
9:00 Shankar Mitra and Pierre Karam, University of Oklahoma: Controls of the Salt Geometry and Evolution: Experimental Models
9:25 Abah Omale and Juan Lorenzo, Louisiana State University: Using Fault Kinematics to Evaluate the Relationship between Cenozoic Fault Activity, Sedimentation Rates and Salt Movement in the Gulf of Mexico—A Comparison between Southwestern and Southeastern Louisiana
9:50 BREAK
10:20 Aubrey Collie, University of Texas at El Paso: Facies Distribution and Halokinetic Sequence Stratigraphy of Lower Cambrian Carbonate Strata adjacent to Wirrealpa Diapir, a Secondary Salt Diapir in the Central Flinders Ranges, South Australia
10:45 Joshua McFarland, University of Texas at El Paso: Structural and Stratigraphic Development of a Salt-Diapir Shoulder, Gypsum Valley Salt Wall, Paradox Basin, Colorado
11:10 Constantin Platon, Shell: Salt-Sediment Interaction and Passive Diapirism: A Field-Based Story of La Popa Salt Diapir Rise, Coeval with Deposition of the Viento Formation, La Popa Basin, NE Mexico

CARIBBEAN AND COLOMBIA EXPLORATION • Robert Erlich and Paul Mann, Session Chairs • Ballroom C
8:30 OPENING REMARKS
8:35 Robert Erlich, Pan Atlantic: Petroleum Potential of the Florida-Cuba-Bahamas Collision Zone
9:00 Brian Ott, University of Houston: What Lies Beneath the Tip of the Iceberg? Late Cretaceous to Recent Tectonic Evolution of Jamaica and the Nicaraguan Rise with Implications for a Widespread Eocene Petroleum System
9:25 Carlos Sanchez, University of Houston: Cenozoic Structural, Deformational, and Erosion Events Observed along a 400 km Long Onshore to Offshore Regional Transect across Northwestern South America
9:50 BREAK
10:20 James Pindel, Tectonic Analysis: Role of Caribbean Tectonics in the Tectono-Stratigraphic Evolution of Southern Mexico and the Gulf of Mexico
10:45 Stephen Leslie, PanAtlantic: Petroleum Systems of the Tayrona-Rancheria Basin, Offshore Guajira Peninsula, Colombia
11:10 Rocío Bernal Olaya, University of Houston: Tectonostratigraphic Evolution of the Lower Magdalena Basin, Colombia: An Example of an Underfilled to Overfilled Forearc Basin

EXTRACTING HYDROCARBONS FROM SOURCE ROCKS • Gary Hansen and Robert Reed, Session Chairs • Rm. 320
8:30 OPENING REMARKS
<table>
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<tr>
<th>Time</th>
<th>Speaker and Affiliation</th>
<th>Presentation Title</th>
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<tbody>
<tr>
<td>9:00</td>
<td>Manas Pathak, University of Utah</td>
<td>Examination of the Generation of Overpressure in Eagle Ford Strata</td>
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<tr>
<td>9:25</td>
<td>Rick Schrynemeeckers, AGI</td>
<td>Optimizing Lateral Placement and Production while Minimizing Completion Costs: An Eagle Ford Case Study</td>
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<tr>
<td>9:50</td>
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<td>BREAK</td>
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<tr>
<td>10:20</td>
<td>Gary Hanson, Louisiana State University</td>
<td>Evolution of Challenges to the Development of Unconventional Oil and Gas Resources</td>
</tr>
<tr>
<td>10:45</td>
<td>Tom Arnold, Paladin</td>
<td>Case Study: Woodford Shale Source Rock Characterization by Geochemical and Petrologic Evaluation in a Horizontal Well</td>
</tr>
<tr>
<td>11:10</td>
<td>Robert Reed, BEG</td>
<td>Low Thermal Maturity Pore Systems: Mississippian Barnett Shale, Southern Fort Worth</td>
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**Monday PM**

**U.S. GULF DEEPWATER FIELDS II • Clint Moore and Justin Vandenbrink, Session Chairs • Ballroom A**

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<thead>
<tr>
<th>Time</th>
<th>Speaker and Affiliation</th>
<th>Presentation Title</th>
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<tbody>
<tr>
<td>1:05</td>
<td></td>
<td>OPENING REMARKS</td>
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<tr>
<td>1:10</td>
<td>Paul Jaeger, Anadarko</td>
<td>The Lucius Exploration Story: An Ultra-Deepwater Subsalt Pliocene Discovery</td>
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<tr>
<td>1:35</td>
<td>Shawn Kushiyama, Shell</td>
<td>Stones Field—Deep and Distant</td>
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<tr>
<td>2:00</td>
<td>Christopher Walker, BP</td>
<td>Compartmentalization between the GC0738–1 Mad Dog North Wellbores—Evidence for Post-Sedimentary Slumping in the Early Miocene Reservoirs of Southern Green Canyon, Gulf of Mexico</td>
</tr>
<tr>
<td>2:25</td>
<td>V. Nekhorosheva and Amanda Ardill, Shell</td>
<td>Streamlined Modeling and Simulation Approach to Evaluating Waterflood Potential in Ursa Princess Field, Mars Basin</td>
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<tr>
<td>2:50</td>
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<td>BREAK</td>
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<tr>
<td>3:20</td>
<td>Cynthia Blankenship, BP</td>
<td>From Moratorium to 10 Rigs—BP in the Deepwater Gulf of Mexico 2010 to 2015</td>
</tr>
<tr>
<td>3:45</td>
<td>Clint Moore and Mike Neese, Gulfslope</td>
<td>Deepwater Slope Sands and Reservoirs: Their Potential Oil and Gas Fields</td>
</tr>
<tr>
<td>4:05</td>
<td>Wesley Cantwell, Schlumberger</td>
<td>Redefining Geological Evaluation in Deepwater using New High-Resolution Borehole Imaging Technology</td>
</tr>
<tr>
<td>4:35</td>
<td>Oluwayomi Oyedele, GEMS</td>
<td>Seismic Facies Analysis and Age Dating of Mid-Pleistocene Channel-Lobe Deposits, Mad Dog Field</td>
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**GEOPHYSICAL PROBLEM-SOLVING TECHNOLOGY • Selim Shaker and Steve Getz, Session Chairs • Room 310**

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<th>Time</th>
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<tr>
<td>1:05</td>
<td></td>
<td>OPENING REMARKS</td>
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<tr>
<td>1:10</td>
<td>Selim Shaker, GAS</td>
<td>Prediction of Seal Failure and Reservoir Breaching in Deepwater</td>
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<tr>
<td>1:35</td>
<td>Yogesh Agnihotri, CGG</td>
<td>Salt Delineation Using Vector Offset Output of Full Azimuth Data</td>
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<td>2:00</td>
<td>Nicholas Brooks, READ</td>
<td>Defining a Steeply Dipping Salt Flank in Mississippi with a New High-Certainty 3D Method</td>
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<tr>
<td>2:25</td>
<td>Laurence Corbett, Schlumberger</td>
<td>Dynamic Datasets using Forward Modeling to Reduce Uncertainty and Improve Recovery</td>
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**GLOBAL 3D SEISMIC STUDIES (GCSSEPM) • Erik Scott and Thomas Hearon, Session Chairs • Room 310**

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<tr>
<th>Time</th>
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<tbody>
<tr>
<td>3:15</td>
<td></td>
<td>OPENING REMARKS</td>
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<tr>
<td>3:20</td>
<td>Erik Scott, Talisman</td>
<td>Integration of Core and Seismic Data for 3D Depositional Environment and Reservoir Architecture Interpretation—Example from the CRD Field, Offshore Vietnam</td>
</tr>
<tr>
<td>3:45</td>
<td>Jacob Covault, Chevron</td>
<td>Reservoir Architecture and Stratigraphic Evolution of Channelized Deepwater Depositional Systems, Angola</td>
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<tr>
<td>4:10</td>
<td>Tom Wooltorton, ffA</td>
<td>Shallow Hazard and Gas Escape Systems Modeling Using 3D Seismic from the Taranaki Basin, New Zealand</td>
</tr>
<tr>
<td>4:35</td>
<td>Sasha Gumprecht, University of London</td>
<td>Tectono-Stratigraphic Evolution of the Centaur 3D Survey, Exmouth Plateau, North West Shelf, Australia</td>
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**MEXICO EXPLORATION AND OPPORTUNITIES • Ricardo Padilla y Sanchez and Anthony Rodriguez, Session Chairs • Ballroom C**

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<th>Time</th>
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<tr>
<td>1:05</td>
<td></td>
<td>OPENING REMARKS</td>
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<tr>
<td>1:10</td>
<td>Ricardo Padilla y Sanchez, Nacional</td>
<td>The Early Mesozoic Rocks of Mexico Revisited</td>
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<tr>
<td>1:35</td>
<td>Edgar Rangel-German, NHC</td>
<td>Energy Reform in Mexico</td>
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<tr>
<td>2:00</td>
<td>Craig Davis, INEXS</td>
<td>Overview of the Petroleum Basins of Mexico</td>
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<tr>
<td>2:25</td>
<td>Paul Mann, University of Houston</td>
<td>New Insights into the Mesozoic Evolution of the Gulf of Mexico Basin from Gravity and Deep-Penetration Seismic Reflection Data</td>
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<td>2:50</td>
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<td>BREAK</td>
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ROCK SAMPLES AND RESERVOIR ANALYSIS • Robert Merrill and Dallas Dunlap, Session Chairs • Room 320

1:05 OPENING REMARKS

1:10 Robert Merrill, Catheart: Visual Rock Characterization can Benefit Reservoir Analysis

1:35 Konstandinos Zamfes, PSI: Drilling Cutting Analysis and Geo-Algorithim Conversion to Petrophysics

2:00 Harry Rowe, University of Texas at Austin: Chemostratigraphic Applications of Handheld X-Ray Fluorescence to Mudrock Plays: Methods, Pitfalls, Limitations, Aspirations, and a Good Example

2:25 Konstandinos Zamfes, PSI: OPAL: On Surface Petrophysical Analytical Logging: New Petrophysical Measurements on Drilling Cuttings While Drilling

ADVANCED STUDIES OF PETROLEUM SYSTEMS • Dallas Dunlap and Robert Merrill, Session Chairs • Room 320

3:15 OPENING REMARKS

3:20 Gary Rice, GeoFrontiers: The Vertical Migration Model and Recent Advances in Geochemical Exploration

3:45 Richard Bishop, Consultant: Implications of Source Overcharge for Prospect Assessment

4:10 Rick Schrynemeeckers AGI: Improving Petroleum System Identification in Offshore Salt Environments: Gulf of Mexico and Red Sea Case Studies

4:35 Jeffrey Nunn, Louisiana State University: Spatial Variations in Pore Water Salinity: Implications for Fluid Flow Pathways and Reservoir Compartmentalization in a Deepwater Gulf of Mexico Field

Tuesday AM

GCAGS EDUCATION/LEADERSHIP FORUM 2.0: Foundational Talks for the Gulf of Mexico I • Charles Sternbach, Forum Chair • Assembly Area A

8:20 Charles Sternbach: Introduction

8:30 Scott Tinker, BEG: Pemex Reform: Expanding Role of the Gulf of Mexico in Meeting our Energy Needs

9:10 John Dribus, Schlumberger: Reservoir Characteristics of Turbidite Depositional Facies and Key Risks for Basin Floor Fan Turbidite Reservoirs

9:50 BREAK

10:20 Brian Horn, ION: Regional Mapping Across the Entire Gulf of Mexico Basin—New Plays and New Perspectives

11:00 John Snedden, GBDSP: Comparison of Cenozoic and Mesozoic Deepwater Fans: Depositional Systems from Source to Sink

ONSHORE GULF OF MEXICO EXPLORATION I • Tim Rynott and Tom Ewing, Session Chairs • Assembly Area B

8:30 OPENING REMARKS

8:35 Tom Ewing, Frontera: Opening of the Gulf of Mexico and Origins of the Gulf Coast Basin: Review and a Revised Working Model

9:00 Art Donovan, BP: Chronostratigraphic Relationships of the Woodbine, Eagle Ford, and Austin Groups across Texas


9:50 BREAK

10:20 Shirley Dutton, BEG: Factors Controlling Permeability Variation in Paleogene Wilcox Sandstones with the Same Burial and Temperature History, Texas and Louisiana Gulf Coast

10:45 William Ambrose, BEG: Facies Variability and Reservoir Quality of Incised Valley Fill and Highstand Shallow-Marine Systems in the Upper Cretaceous (Cenomanian) Tuscaloosa Formation, Louisiana, U.S.A.

11:10 Tom Ewing, Frontera: Finding New Oil and Gas Reserves in Fluvial Systems using AVO: The Upper Frio in Wharton County, Texas

GROUNDWATER ENVIRONMENTAL CASE STUDIES • Matt Cowan, Session Chair • Room 332A

8:30 OPENING REMARKS

8:35 Robert Dedoes: Geoscience-Based Management of Soil during Oil and Gas Development: A Study Conducted in the Eagle Ford Oil and Gas Production Area
9:00  Scott Hamlin, University of Texas at Austin: Using Electric Logs to Estimate Groundwater Salinity and Map Brackish Groundwater Resources with an Example from the Carrizo-Wilcox Aquifer in South Texas
9:25  Ezat Heydari, Jackson State University: Variations in Shallow Groundwater Composition in Hinds and Madison Counties, Mississippi
9:50  BREAK
10:20  H. C. Clark, Rice University: Springfield Spring, Drought Stress, and Aquifer Recovery: A Central Texas Case Study with Implications for Small Town Water Future
10:45  Mary Barrett, Consultant: Historic Oilfield Arsenic Usage and Pit Groundwater Models: An Example from Lake St. John Field, Louisiana
11:10  Douglas Carlson, Louisiana State University: The Environmental Impact of No-Till Farming on Lower Mississippi River Quality

GCAGS SPECIAL BUSINESS FORUM: GEOLOGISTS AS LEADERS IN FINANCE, BANKING, AND A&D • Steve Brachman and Jeff Lund, Forum Chairs • Room 332B
8:30 to 11:30
Andy Clifford – Saratoga Resources
Dick Stoneburner – Pine Brook Partners
Tom Wilker – Carlyle Group
Jeff Jones – Van Operating
Stuart Burbach – Nautilus Energy

Tuesday PM

GCAGS EDUCATION/LEADERSHIP FORUM 2.0: Foundational Talks for the Gulf of Mexico II • Charles Sternbach, Forum Chair • Assembly Area A
1:15  Charles Sternbach: Opening Remarks
1:20  Richard Stoneburner, BHP: The Discovery, Reservoir Attributes, and Significance of the Hawkville Field and Eagle Ford Shale Trend, Texas—A Giant North American Gas Discovery
2:00  Charles Kerans, University of Texas at Austin: Cretaceous Carbonate Oil and Gas Fields in the Gulf of Mexico, Sequence Setting, Reservoir Architecture, and Future Potential

PANEL DISCUSSION, hosted by Charles Sternbach and Scott Tinker • Assembly Area A
3:10 to 4:30  Scott Tinker, Tom Tinker, and Nathan Tinker: Geo-Generations: 60 Years of Family Fun in the Patch

ONSHORE GULF OF MEXICO EXPLORATION II, Tim Rynott and Tom Ewing, Session Chairs • Assembly Area B
1:05  OPENING REMARKS
1:10  Larry Baria, Jura-Search: Relatively Large Mid Ramp, Highstand, Microbiolite Patch Reefs: A New Exploration Play for South Alabama
1:35  Robert Karlewicz, RFH: The Cotton Valley Limestone Pinnacle Reef Trend, 20 Years Later, East Texas Basin
2:00  Charles Goodson, PetroQuest: Cris R: Prolific Onshore Louisiana Discovery
2:25  Tim Rynott, Ridge Resources: Onshore Lower Wilcox and Cretaceous: Plays and Potential
2:50  BREAK
3:20  Martin Cassidy, University of Houston: The Norphlet Desert and its Sand Dunes: In a Subaerial Environment, but below Sea Level
3:45  Jeff Spencer, Amromco Energy: The 40th Anniversary of South Louisiana’s Lower Tuscaloosa Trend—Recollections and Early Media Coverage
4:10  Peter Rose, Rose and Associates: Late Cretaceous and Tertiary Geologic History, Edwards Plateau, Llano Uplift, and Hill Country, Texas

ENVIRONMENTAL AND COASTAL GEOLOGY • Jeff Paine and Kathleen Haggar, Session Chairs • Room 332A
1:05  OPENING REMARKS
1:10  Joseph Carlin, California State University: Shoreface Sedimentation along a Transgressive Barrier Island: Understanding the Interplay between Short-Term Events, and Long-Term Sea Level Rise, Processes in Shaping these Dynamic Coastal Environments
1:35  Jeff Paine, University of Texas at Austin: Airborne Lidar and Near-Surface Geophysics: A New Approach to Discriminating Quaternary Depositional Units on the Texas Coastal Plain
2:00  Kathleen Haggar, Dynamic Measurement: Analysis of the Goose Point area near Lacombe, LA, Area Validates New Geophysical Data Type—Natural Source Electromagnetism (NSEM) for Detection of Lineaments Associated with Faults and Sedimentary Features

2:25  Bruce Hart, Statoil: Why the Greenhorn Cyclothem of Utah/Colorado/Kansas Helps Us to Understand Better Eagle Ford Stratigraphy

CHEMOSTRATIGRAPHY AND PALEONTOLOGY • Clement Bataille, Session Chair • Room 332A

3:15  OPENING REMARKS

3:20  Clement Bataille, Chevron: Chemostratigraphy Based Age Model for the Black Peaks Formation: Implications for Early Paleogene Paleoclimate in Sub-Tropical North America

3:45  Malcolm Hart, UK: Palaeoecology of Cretaceous Foraminifera: Examples from the Gulf of Mexico Region

4:10  Ali Somarin, Thermofisher: Chemostratigraphy and Identification of Fine-Grained Sedimentary Rocks Using Portable XRF

4:35  Juan Carlos Silva Tamayo, University of Houston: Sedimentologic Expression of the Cretaceous Oceanic Anoxic Events along Eastern and Northern Colombia

SEISMIC ATTRIBUTES AND GEOPHYSICAL TECHNOLOGY • Sharon Cornelius and Don Van Niewenhuise, Session Chairs • Room 332B

1:05  OPENING REMARKS

1:10  Andreas Laake, Schlumberger: Understanding Deepwater Transport Systems through Processing and Interpreting Seismic Data in Color

1:35  Deborah Sacrey, Auburn Energy: Geological Interpretation using Pattern Recognition from Self-Organizing Maps and Principal Component Analysis

2:00  Sharon Cornelius, University of Houston: Extraction of Seismic Attributes for Reservoir Characterization in Subsalt Environments, Keathley Canyon and Walker Ridge Areas, Gulf of Mexico


NEW IDEAS IN MAPPING AND EXPLORATION • Sharon Cornelius and Don Van Niewenhuise, Session Chairs • Room 332B

3:15  OPENING REMARKS

3:20  Selim Shaker, GAS: Exploring the Missing Reflectivity Blind Zone on the Gulf of Mexico Shelf

3:45  Paul Comet: The Sulfur to Nitrogen Ratio as an Aid in Mapping the Petroleum Producing Trends of the Contiguous U.S. 48 States Using the USGS Database

4:10  Ibrahim Cemen, University of Alabama: Along Strike Structural Variations in the Frontal Ouachitas–Arkoma Foreland Basin Transition Zone

POSTER SESSIONS

Posters Sessions will be in the George R. Brown Third Floor Exhibit Hall during the Sunday Icebreaker, All Day Monday, and Tuesday Morning. See over 60 Student and 20 Professional Posters!

SESSION 1 • PROFESSIONAL • Meredith Faber, Session Chair

MEXICO AND CARIBBEAN PLAYS
Erik Medina Romero, Universidad Nacional Autonoma de Mexico: Regional Study to Find Prospects for Geological Storage of CO₂ in the Burgos Basin
Juan Carlos Silva Tamayo, University of Houston: CO₂ Storage Capacity in Deep Saline Aquifers of Hosston Formation in Coahuila Province, Mexico
Jazmin Mota, SENER: Changes in Eocene-Miocene Shallow Marine Carbonate Factories along the Tropical SE Circum-Caribbean Responded to Major Regional and Global Environmental and Tectonic Events
Keith James, Aberystwyth University: Geology without Limits—Investigation of Lithosphere Deep Structure of the Caribbean by Seismic Methods

COASTAL GEOLOGY AND SURFACE IMPACT
Douglas Carlson, Louisiana State University: Changes of Global Sea-Level Rise and Relative Sea-Level Rise in Coastal Louisiana in the 21st Century
Kelly Haggar, Riparian, Inc.: Geology, Law, and Coastal Change
GOM SHELF AND ONSHORE PLAYS


Paul Heinrich, Louisiana Geological Survey: Late Quaternary Stratigraphic Evolution of the Southwestern Louisiana Inner Continental Shelf: Paleolandscape Preservation Potential and Implications for Offshore Sand Resources

Benjamin Rendall, ExxonMobil Upstream Research Company: Impact of Microporosity-Dominated Carbonate Pore System on Production in the Edwards A. Word Field, Central Texas

PORTFOLIO MANAGEMENT

Thomas Lacombe, Louisiana State University: The Importance of Translation Services and the Energy Sector

James MacKay, Rose and Associates: Comparing the Results of the Kelly Criterion and Risk Aversion: Quick Look Practical Alternatives to Portfolio Optimization

GULF OF MEXICO DEEPWATER

Alessio Checoni, TGS: Post Well Analysis of Gulf of Mexico: A Multidisciplinary Approach for a More Confident Understanding of this Complex Petroleum System

Yangyang Li, C&C Reservoirs: Natural Hydrocarbon Seeps: Toward Understanding a Complex Natural System

Victor Jones, Exploration Technology Inc: Reducing Uncertainties and Risks in Exploration and Development in the Gulf of Mexico Basin: Insights Gained from Analysis of over 100 Reservoir Analogs

Selim Shaker, G.A.S.: A New Approach to Pore Pressure Predictions: Generation, Expulsion, and Retention Trio—Case Histories from the Gulf of Mexico

TECHNOLOGY

Harry Rowe, University of Texas at Austin: Strategy for Developing and Calibrating Shale and Mudstone Chemostratigraphies Using Handheld X-Ray Fluorescence Units and its Use on an Automated Core Scanner

Selim Shaker, G.A.S.: New Perspective to SWF (Shallow Water Flow) and Sinking Wellhead Prevention

Mike Sheahan, Summit Discovery Resources: Understanding Well Performance by Using Elemental Ratios in the Wolfcamp Formation, Midland Basin

Thomas Yancey, Texas A&M University: Rates of Sediment Deposition during the Late Eocene of Central Texas Based on $^{40}$Ar/$^{39}$Ar Dating of Volcanic Ash

Sharma Dronamraju, AKD Professional Solutions: A Success Case of Revival of an 80 Year Old Oilfield through New 3D Seismic Interpretation and Reservoir Modeling, Lak Ranch, Weston County, Wyoming, USA

SESSION 2 • STUDENT • Meredith Faber, Session Chair

MEXICO AND CARIBBEAN PLAYS

Luis Carlos Carvajal, University of Houston: Western Caribbean Structural Provinces Based on 2D Kinematic Restorations of the Lower Nicaraguan Rise and Colombia Basin

Shenelle Gomez, University of Houston: Tectonic Evolution and Hydrocarbon Prospectivity of the Tobago Forearc Basin, Barbados Ridge, and Barbados Accretionary Prism

David Lankford-Bravo, University of Houston: Influence of Basement Dip on Morphological and Structural Characteristics of the Perdido–Port Isabel and Northern and Southern Mexican Ridges, Western Gulf of Mexico

Usama Yarbuh L., CICESE: The Interplay between Deformation, Erosion, and Sedimentation in the Deepwater Mexican Ridges Fold Belt, Western Gulf of Mexico Basin

Gift Ntuli, Baylor University: Ps Receiver Function Imaging of the Northeast Caribbean Plate Boundary

Patrick Loureiro, University of Houston: Hydrocarbon Potential of Hispaniola and Puerto Rico Based on Combining Depth to Basement and Maturity Information from Previous Wells

CARBONATES

Khaled Amrouni, Texas A&M University: Sequence Stratigraphy, Chemostratigraphy, and Diagenesis of the Cyrenaican Miocene Carbonate-Evaporite Successions, NE Libya

Khaled Amrouni, Texas A&M University: Sedimentology, Sequence Stratigraphy, and Diagenesis of Late Miocene Carbonate-Evaporite Sequence of Wadi Yunis Member, Al-Khums Formation, Sirt Basin, Central Libya

William Bailey, University of Oklahoma: Fault Plane Geomorphology and Structural Analysis of a Middle Eastern Giant Carbonate Oil Field

Derek Sullivan, Stephen F. Austin University: Megaporosity Development within the Central Tennessee Basin: A Comparative Study of Karst in Middle-Upper Ordovician Strata
Technical Program

**2015 GCAGS/GCSSEPM**

**65th Annual Convention & Exhibition**

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**Michelle Rimmell, Stephen F. Austin University:** Stratigraphy, Sedimentology, and Diagenesis of Ordovician Carbonates in Maury County, Tennessee

**Ashley Landers, Stephen F. Austin University:** Karst Development within the Salado Creek Watershed, Williamson and Bell Counties, Central Texas

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**COASTAL GEOLOGY/SURFACE IMPACT/ENVIRONMENTAL GEOLOGY**

**Nur Ahmed, Auburn University:** Mixing Mechanism and Salinity Ingression at the Coastal Aquifers of the Bengal Delta

**Chang Liu, Louisiana State University:** Monsoon Intensity and its Impact on the Chemical Weathering during Glacial Cycles in South China Sea

**Yuting Li, Louisiana State University:** Sediment Flux through the Indus Submarine Canyon, Arabian Sea

**Pankaj Khanna, Rice University:** Modeling Upper Cambrian Microbial Reefs: Bridging the Gap from Outcrops to Reservoir Scale

**Lu Zhu, Southern Methodist University:** Early Permian Paleosol Morphologies and Paleo-Atmospheric $pCO_2$ Estimates, North-Central Texas

**Ashley Ramsey, Baylor University:** Assessing the Radiocarbon Landscape Reservoir Effect of Gastropods from Central Texas to Increase the Accuracy and the Precision of Radiocarbon Dating of Past River Systems

**Drew Daymond, Auburn University:** Trace Fossil Origin for Pervasive Pyritized Films in the Estuarine Ingersoll Shale, Cretaceous Eutaw Formation, Eastern Alabama

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**SEDIMENTOLOGY**

**Kyle Ayers, Stephen F. Austin University:** Geochemical Analysis of Stanley Shale Concretions in Southern Oklahoma

**Matthew McCarter, University of Tulsa:** Permeability Anisotropy Study of the Bluejacket Sandstone at OK–20 Roadcut in Eastern Mayes County, OK

**Kivanc Biber, University of Houston:** Quantitative Characterization of Shale Drapes within the Tidally-Influenced Fluvial Valley Fill Deposits of the Ferron Sandstone, Utah: Implications for Subsurface Exploration

**Stevenson Bunn, University of Texas at Austin:** Toward an Accurate Reservoir Model of Heterolithic, Tidally-Influenced Deposits: An Ongoing Case Study in the Sego Sandstone Member of the Mancos Shale through Second-Generation, Outcrop-to-Subsurface 3D Modeling

**Kyle Deatrick, The University of Texas at El Paso:** Depositional Facies and Geometry of an Exposed Megaflap: Pennsylvanian Honaker Trail Formation, Gypsum Valley Salt Wall, Paradox Basin, Colorado

**Shazia Hart, University of Texas of the Permian Basin:** Study of the Ramsey Sandstone in the Bell Canyon Formation of the Delaware Basin: Paduca Field, Lea County, New Mexico

**Wesley Turner, Stephen F. Austin University:** Quantitative Mineralogic Analysis of Wolfcamp Shale in Crockett County, Texas through X-Ray Diffraction

**Ramsey Kweik, Southern Methodist University:** Thermal and Mass History of Fairway Field in East Texas

**Caitlin Leslie, Baylor University:** Reservoir Characterization and Petrofacies Model for the Devonian Grosmont and Upper Ireton Formations, Northeastern Alberta, Canada

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**STRATIGRAPHY**

**Maria Gutierrez, Texas A&M University:** Study of the Spatial Variations in Aeolian Stratigraphic Architecture in the Norphlet Formation, Southwestern Alabama

**Ziaul Haque, Auburn University:** Detrital History of the Conglomerate Measures of the Pottsville Formation in the Cahaba Synclinorium, Southern Appalachians, Alabama

**Jason Fisher, Auburn University:** Stratigraphy of the Toledo Formation, Belize Basin, Southern Belize

**David King, Auburn University:** Stratigraphic Correlation of Cretaceous-Paleogene (‘KT’) Boundary Sections, Northern Belize

**Mindye Shaw-Faulkner, Stephen F. Austin University:** Paleostratigraphic Bio- and Lithofacies of the Owl Mountain Province, Fort Hood Military Installation, Bell and Coryell Counties, Texas

**Rachel Petit, University of Oklahoma:** Analysis of Structural and Stratigraphic Characteristics of Post Mississippian Age Sediments within the Northeastern Fort Worth Basin, Texas, and their Basin Scale Significance

**Ahmed Shehata, and Ahmed Hussein, Texas A&M University:** Upper Cretaceous Formation Lithostratigraphic Correlation Study for Madison and Leon Counties, East Texas Basin

**Adewale Amosu, Texas A&M University:** An Angular Unconformity between the Woodbine and Eagle Ford Formations in Delta and Hunt Counties of the East Texas Basin

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**STRUCTURAL GEOLOGY**

**Meredith Bush, University of Texas at Austin:** Laramide Deformation along the Southern Rocky Mountain Front: Provenance Record from the Raton and Galisteo–El Rito Basins of Colorado and New Mexico
Alexander Cheney, University of Houston: Foreland Deformation Related to Precambrian Features of the Permian Basin of West Texas and New Mexico

Brady Nock, University of Texas at San Antonio: Comparison of Permeability Calculated from Geophysical Logs, Aquifer Tests, and Grain-Size Distribution at SAWS Aquifer Storage and Recovery Site, Bexar County, Texas

Ingrid Eckhoff, Stephen F. Austin University: Structural Control on Fluid Migration in the Northern Segment of the Edwards Balcones Fault Zone Aquifer, Central Texas

SALT TECTONICS AND TRAPS
Derek Scott, University of Houston: Controls of Salt Tectonics and Shortening on Hydrocarbon Prospectivity in Passive Margin Fold Belts of Offshore Gabon

Allison Mast, University of Texas at El Paso: Petrographic, Halokinetic, and Structural Analysis of Permian-Age Carbonate Caprock at Gypsum Valley Salt Wall: Paradox Basin, Colorado

Elizabeth Heness, University of Texas at El Paso: Salt Tectonic Controls on Facies and Sequence Stratigraphy of the Triassic Chinle Formation, Gypsum Valley Salt Wall, Colorado

GEOLOGY-GEOPHYSICS-ENGINEERING
Brandon Rasaka, Baylor University: Correlation of Earthquakes with Seismogenic Faults, Central Oklahoma

Kenton Shaw, Baylor University: Geodetic Constraints on Deformation and Earthquake Focal Mechanisms in the Dominican Republic

Matt Worrell, Stephen F. Austin University: Seismic Reconstruction and Petroleum System Analysis of the Norphlet Formation in Mississippi Canyon, Gulf of Mexico, Using 3D Seismic Data

Yiduo Liu, University of Houston: Slab Tearing Triggered the Cretaceous Igneous Activity in the Northern Gulf of Mexico Region

GEOPHYSICAL TECHNOLOGY
Kevin Worley, Stephen F. Austin University: Spatial Delineation and Classification of Surficial Karst Manifestations Utilizing LiDAR, Fort Hood Military Installation, Central Texas

Lei Sun, University of Houston: Ground-Based Hyperspectral Remote Sensing and Terrestrial Laser Scanning of the Eagle Ford Formation

Kyle Altamore, Stephen F. Austin University: Delineation of Surficial Karst Manifestations Using LiDAR and Pictometry in Ordovician Carbonates, Central Texas

Garrett Harris, Stephen F. Austin University: Evaluation of Groundwater Quality in Paleozoic Aquifers Using GIS Techniques, Central Texas


Brittany Gregory, Louisiana State University: Trials of Near-Surface Geophysics at Archeological Sites in SE Louisiana

Mohit Agrawal, Baylor University: Receiver Functions and Surface Wave Dispersion Modeling of the Crust and Upper Mantle beneath the Texas Gulf Coast

Mason MacPhail, Southern Methodist University: Seismic Source Characterization of Small-Scale Contained Explosions Utilizing Near Source Empirical Data

UNCONVENTIONAL PLAYS
Samira Naseem, Louisiana State University: Wavelet Transformation as a Reservoir Characterization Tool in Shale Plays

Ryan Feiner, University of Alabama: Well Log Clustering Analysis and Upscaling Procedure of the Tuscaloosa Marine Shale, Mississippi and Louisiana

Shanna Mason, University of Louisiana at Lafayette: Structural Characterization of the Eagle Ford Formation, Val Verde County, Texas

Kaytan Kelkar, Texas A&M University: Thickness Variation of the Eagle Ford and Adjacent Strata in Burleson, Lee, and Washington Counties, Texas

Joseph Sortore, University of Texas at Arlington: Fracture and Pore Network Connectivity in Shales Related to Increased Hydrocarbon Production


Talban Kantala, Stephen F. Austin University: Exploring the Weches Formation as a Potential Unconventional Oil and Gas Resource in Sabine County, Texas

Sarah Beers, Texas A&M University at Kingsville: Evidence of Precambrian Organic-Rich Shales in a Granitic Pegmatite, Llano County, Texas
COURSE #1: Geosteering for Young Professionals

Instructors: Sarah Stanley (IHS Energy)
9:00 am–3:30 pm • Saturday, September 19th
Houston Hilton Americas – Room 335A
$150 per person (cost includes refreshments, lunch, and all course materials)
Maximum 25 participants

Geosteering for Young Professionals will include an overview by Sarah Stanley on the fundamentals of directional drilling and include powerpoint documentation. The course will include a panel of five experienced geologists, from independent oil companies, who will show case studies of geosteering in fault zones and geosteering using mudlogging tools. A question and answer session at the end of the day with the professionals will help attendees apply the class exercises to their daily work in unconventional plays.

COURSE #2: Gulf of Mexico Primer—Regional Overview of the U.S. Deepwater Gulf of Mexico

Instructors: Gary Steffens, Steve Barker, and Mike DiMarco (Shell Exploration and Production)
9:00 am–3:30 pm • Saturday, September 19th
Houston Hilton Americas – Room 336AB
$150 per person (cost includes refreshments, lunch, and all course materials)
Maximum 70 participants

This one day short course is designed for geoscientists new to the U.S. Gulf of Mexico deepwater offshore who need to get quickly up-to-speed on:

1) the Gulf of Mexico stratigraphic and structural framework,
2) the exploration and production history of the deepwater environment,
3) the latest plays and discoveries (e.g., subsalt and Jurassic Norphlet plays), and
4) the regulatory and business aspects of operating in the Gulf of Mexico deepwater region.

The goal of the class is to give geoscientists who are not familiar with the deepwater Gulf of Mexico, a point by point understanding of how to approach exploration and development of hydrocarbons in one of the most prolific petroleum basins in the world.

COURSE #3: Introduction to Regional and Play-Based Exploration

Instructor: Frank Love (Ecopetrol – America)
9:00 am–3:30 pm • Saturday, September 19th
Houston Hilton Americas – Room 337AB
$50 per person (cost includes refreshments, lunch, and all course materials)
Maximum 60 participants

This course will introduce the regional PBE methodology. In particular, the course focus will be on:

1) Fundamentals of a Regional Project,
2) Regional verses Field Scale Insights and the Path to Innovation,
3) Defining a Play: The Vertical and Lateral Extents,
4) Understanding Basin Types and their Impact on Play Types,
5) Petroleum Systems and Plays,
6) Common Risk Segment Maps and Play Definition,
7) Play Risk verses Prospect Risk, and
8) Play Creation and Moving from Ideas to Discovery and Production.
COURSE #4: Core Workshop: Woodbine Sand and Eagle Ford Shale

**Instructors:** Bob Loucks and Bill Ambrose (Bureau of Economic Geology)
9:00 am–4:00 pm • Saturday, September 19th
BEG Houston Research Center • 11611 W. Little York • Houston, TX  77041
$195 per person (cost includes transportation from George R. Brown Conference Center to the BEG Houston Research Center, lunch, and all course materials)
Maximum 40 participants

This workshop will provide an in-depth study of the sequence stratigraphy, depositional systems, and petrography the Woodbine Group of the East Texas Field, as well as that of the Eagle Ford shale in South Texas, based on detailed analysis of over 600 logs and 30 cores. Throughout the workshop it will be demonstrated that the depositional framework of the Woodbine Group of the East Texas Field is more complex than described from previous studies, with implications for incompletely swept, bypassed, and deeper pay in the field.

We will commence with a review of Woodbine sequence stratigraphy and depositional systems, followed by a review of diagenesis, reservoir quality, and strategies for additional recovery. The highlight of the program is a three-hour core workshop, during which attendees can get a hands-on view of key cores with a detailed review of depositional and reservoir facies. Participants will review a variety of significant sequence-stratigraphic surfaces. A wide range of deltaic and fluvial facies will also be covered, together with a review of recognition criteria for each facies and a discussion of reservoir quality.

COURSE #5: AAPG Imperial Barrel Award Competition Training (Students Only)

**Instructors:** Larry Garmezy and Steven Bloemendaal (Shell Exploration and Production); with additional past competition participants
9:00 am–3:30 pm • Sunday, September 20th
Houston Hilton Americas – Room 336AB
$50 per person (cost includes refreshments, lunch, and all course materials)
Maximum 70 students

This course is designed to introduce the participant to the fundamentals of basin analysis, the evaluation of petroleum systems, and quantitative prospect assessment (risk and volumes). Following brief lectures, the students will work in teams to evaluate, delineate, and describe the critical elements of a working hydrocarbon province. They will learn about the variety of maps needed to produce an evaluation, how to build play element maps on a specific reservoir interval, summary play maps that describe how the play works, and where sweet spots are located. This is followed by a hands-on suite of exercises that emphasize practical, simple principles for carrying out a quantitative prospect assessment. In addition, this year's course will include insight from past participants who will share their own IBA experiences, and will also assist with the course.

COURSE #6: A User’s Guide to Exploration and Production Biostratigraphy

**Instructors:** Art Waterman and Ryan Weber (Paleo-Data)
9:00 am–3:30 pm • Sunday, September 20th
Houston Hilton Americas – Room 335C
$150 per person (cost includes refreshments, lunch, and all course materials)
Maximum 50 participants

This 6-hour short course will introduce the concepts of micropaleontology, biostratigraphy, biofacies analysis, and chronostratigraphy to those who may need to work with biostratigraphic data, but may not have the background to work competently with it and utilize it to its full potential. This course is designed for the industry professional to gain a full appreciation of how these topics contribute to, and are integrated together, in petroleum exploration. The basic concepts will be developed together with the essential vocabulary necessary to understand and communicate with specialists in those fields.
Practical application of this knowledge will be developed through the use of examples, case histories and hands-on exercises. The overall intent is to develop the geoscientist's capability to competently and confidently employ paleo information in exploration and production.

**COURSE #7: Handheld X-Ray Fluorescence (XRF) Chemostratigraphy: Theory and Application to Mudrock Drill Core and Cuttings**

**Instructors:** Harry Rowe (Bureau of Economic Geology) and Alexander Seyfarth (Bruker Elemental)

9:00 am–3:30 pm • Sunday, September 20th
Houston Hilton Americas – Room 337AB
$150 per person (*cost includes refreshments, lunch, and all course materials*)
Maximum 60 participants

This course will:

1) Provide a theoretical background for using XRF,
2) Develop participant experience with XRF scanning of mudrocks and other geological materials,
3) Evaluate the strengths and limitations of being quantitative with handheld XRF instrumentation, and
4) Demonstrate how handheld XRF-based chemostratigraphic techniques can be utilized to strengthen hypotheses and interpretations of mudrock successions.

The course will be aimed at geologists who study mudrocks, but the general knowledge base will be applicable to many different aspects of chemostratigraphy, mineral chemistry, and trace element geochemistry. The course will provide basic x-ray theory and general use/applications content, and will touch on advanced theory, instrument calibration, and additional applications to mudrock studies.

**COURSE #8: Introduction to Reservoir Fluid PVT Analysis for Geologists**

**Instructor:** Toddy Guidry (Core Laboratories)

9:00 am–12:30 pm • Sunday, September 20th
Houston Hilton Americas – Room 335A
$100 per person (*cost includes morning refreshments and all course materials*)
Maximum 50 participants

The need for representative reservoir fluid samples is critical to the effective design and operation of any development project. The decision to build and deploy production facilities can expose producers to billions of dollars of investment risk, and a solid understanding of formation fluids plays an essential part in mitigating that risk. Whether obtaining wireline formation test tool samples from 20,000 feet in deepwater environments or surface separator samples in Louisiana, fluid analysis provides the ammunition needed for more efficient use of assets.

The "big picture" may include many separate investigations, including determining drive mechanisms, formation rock properties, geophysical properties, and formation fluid properties. Fluids analysis provides data critical to predicting well and reservoir performance, surface and subsurface facilities design, and fluid quality assessment for determining market price. These data also can provide vital information on what hardware will be needed, including metallurgy for wells and production facilities, valve sizes and type, maximum flow line length, and optimum diameters for subsea tiebacks, as well as a host of other factors in development.

This ½ day short course will take a look at fluids behavior, sampling, analysis, and production trends and cover experimental methods performed as part of the blueprint for a comprehensive fluids program.

**Gifts for speakers, poster presenters, and judges provided at generous discounts by Katy Rock Shop.**
Field Trips

Overnight Trips:

**TRIP #1: Upper Cambrian Microbial Carbonate Mounds in Central Texas**

**Leaders:** André Droxler (Rice University Earth Science), Bill Morgan (Consultant), and Dan Lehrmann (Trinity University Geosciences)

- Start, 3:00 pm, Thursday, September 17th • Return, 3:00 pm, Sunday, September 20th • Departure and return at Hilton Americas
- $750 per person; $325 for students (*cost includes transportation, guidebook, kayak rental, and hotel; does not include meals or refreshments*)
- Maximum 20 participants; 4 student spots available

The field trip to Cambrian microbial facies in the Mason, Texas, area will highlight several aspects of microbialite reservoirs, including their composition, size, and geometry. The occurrence of the Mason, Texas, microbialites will be placed in a sequence stratigraphic framework and their specific depositional setting will be discussed and compared to known microbialite reservoirs. The Mason, Texas, outcrops afford spectacular views of both cross-section and plan views of microbialite facies, offering an opportunity for a truly 3D view of the architecture.

**TRIP #2: Eagle Ford Unconventional Reservoir Field Seminar**

**Leaders:** Art Donovan (BP), Mike Pope (Texas A&M University), and Rand Gardner (BP)

- Start, 7:00 am, Thursday, September 17th • Return, 2:00 pm, Sunday, September 20th • Departure and return at Hilton Americas
- $900 per person; $425 for students (*cost includes transportation, guidebook, hotel, and some meals*)
- Maximum 30 participants; 4 student spots available

**NB:** This fieldtrip includes day-long hikes up to 6 miles in length. Delegates need to be in sound physical condition to partake in this field seminar.

The entire vertical succession of the Eagle Ford Group can be seen at numerous spectacular cut-bank exposures within Lozier Canyon and its tributaries located in Terrell County, in West Texas. Within a 50 square mile region of this canyon system, tens of Eagle Ford outcrops, each with thousands of feet of lateral continuity and hundreds of feet of vertical relief, provide an unparalleled opportunity examine the facies, key stratal surfaces, and lithostratigraphic units, as well as the lateral continuity and vertical variability of an unconventional mudstone reservoir from the completion to field scale. Many of the localities that will be visited during this field seminar are on private property with restricted and proprietary access. Thus, this seminar provides a unique opportunity to visit some of the classic Eagle Ford localities in West Texas which have been inaccessible to over a generation of geoscientists.

Saturday Trips:

**TRIP #3: Geology of Canyon Lake Gorge**

**Leader:** Joel Saylor (University of Houston Earth and Atmospheric Sciences)

- 8:30 am–6:30 pm • Saturday, September 19th • Departure and return at Hilton Americas
- $100 per person; $25 for students (*cost includes transportation, lunch and refreshments, guidebook, and admission fee*)
- Maximum 21 participants; 4 student spots available

Participants will visit incredible stops near Canyon Lake, Texas. The outcrops are exposed in the Texas Hill Country near Canyon Lake dam about 20 miles northwest of New Braunfels, Texas. The 115–105 million-year-old limestone was deposited in a shallow marine to shoreline paleo-environment. Participants will see track ways of two different dinosaur species, marine fossils including bivalves, corals, large foraminifera, echinoderms, gastropods, and rudists. Structural geology stops will show Miocene-age normal fault features related to the Balcones fault zone.

**TRIP #4: Spindletop Oil Field–Gladys City Boomtown Museum**

**Leader:** Rosemary Laidacker and Robert Pledger (Ashford Oil & Gas Company)

- 7:30 am–5:30 pm • Saturday, September 19th • Departure and return at Hilton Americas
- $125 per person; $25 for students (*cost includes transportation, lunch and refreshments, guidebook, and admission fee*)
- Maximum 43 participants; 4 student spots available

Relive the days of the discovery of the Lucas Gusher on January 10, 1901. Visit the Texas Energy Museum, Gladys City, and the original Lucas Gusher site in Beaumont, Texas. This trip is to the site of the discovery at Spindletop that gushed 100,000 barrels per day and changed the economy of Texas, helping to usher in the modern petroleum age.
TRIP #5: Galveston and the Brazos Delta as Reservoir Analogs

**Leaders:** John Anderson and Jeff Nittrouer (Rice University Earth Science)

8:00 am–5:00 pm • Saturday, September 19th • Departure and return at Hilton Americas

$100 per person; $25 for students (*cost includes transportation, lunch and refreshments, and guidebook*)

Maximum 21 participants; 4 student spots available

This field trip focuses on the late Quaternary depositional systems of the upper Texas coast, including the Brazos River and its wave-dominated delta, the Oyster Creek meanderbelt, Follets Island, the San Luis Pass tidal delta, and Galveston Island. The trip will emphasize the physical processes associated with shaping these various depositional environments, and will discuss the stratigraphic occurrence of sand bodies associated with these coastal systems. There will be a focus on linking physical processes to the geological record, and also describing the sequence stratigraphic framework of the upper Texas coastal systems.

Sunday Trips:

TRIP #6: Hands-On Geophysical Data Acquisition: Characterizing Shallow Gulf Coast Sediments Using Cuttings, Well Logs, and Seismic Surveys

**Leader:** Rob Stewart (University of Houston Earth and Atmospheric Sciences)

8:00 am–4:00 pm • Sunday, September 20th • Departure and return at Hilton Americas

$250 per person; $50 for students (*cost includes transportation, lunch and refreshments, and guidebook*)

Maximum 20 participants; 4 student spots available

This hands-on course will introduce participants to the methods of subsurface imaging and geologic integration using two shallow test wells drilled near La Marque, Texas at the University of Houston's Coastal Center. The two wells penetrate 425 ft of Quaternary sediments, including several sand aquifers. Cuttings, recovered from the wells, will be viewed. Participants will log one of these wells with sonic, resistivity, and gamma ray tools. We will also conduct a vertical seismic profile (VSP) survey in the other well using an impact surface seismic source. A vibroseis truck will be used to acquire seismic data with geophones planted on the surface.

TRIP #7: Field Work on Active Faults in Houston

**Leader:** Shuhab Khan (University of Houston Earth and Atmospheric Sciences)

8:00 am–4:00 pm • Sunday, September 20th • Departure and return at Hilton Americas

$100 per person; $25 for students (*cost includes transportation, lunch and refreshments, and guidebook*)

Maximum 18 participants; 4 student spots available

The northern Gulf of Mexico is home to numerous faults and salt domes, and many of the faults are active. Several new techniques are used for quantitative assessment of movements along these active faults in Houston and surrounding areas, including InSAR, LiDAR, terrestrial laser scanner, GPS, ground penetrating radar, electromagnetic induction, resistivity, seismic, and gravity. This fieldwork will introduce current state of research on these faults and techniques. Trip will include visits to key locations of active fault scarps and monitoring sites (GPS and extensometer) on west side of the Houston. We will also acquire 3D point cloud data over faults using terrestrial laser scanner and geophysical data (GPR and EMI) at these locations.

Thanks to Weatherford Laboratories for Sponsorship of the 2015 Field Trips!
STUDENT PARTICIPATION

We offer a special registration fee (only $35) to facilitate student participation. Students may also register as a Student Volunteer, and if selected as a volunteer and work the required half day as assigned, will receive a refund of their registration fee. This fee allows entry to the Opening Session, Icebreaker, Exhibition, all technical sessions, all coffee breaks, the Presidents’ Reception, and receipt of a digital copy of the 2015 GCAGS Transactions.

STUDENT VOLUNTEERS

Half-day volunteers are needed beginning Thursday, Sept. 17th, through Tuesday, Sept. 22nd. Volunteers will earn full-paid student registration for students or new grads that have not yet accepted employment offers. Assignment preferences will be weighed on volunteer date, and registration fees will be refunded on site upon completion of a half day’s work. Possible responsibilities include serving as short course assistants or technical session ‘runners,’ ticket-taking, checking in field trip participants, manning registration, preparing pre-convention packets, and judges’ room.

For more information, contact Jim Grubb, Volunteers Chair, at jamesmgrubb@yahoo.com.

Volunteers Needed during these Times and Dates

<table>
<thead>
<tr>
<th>Date</th>
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<tbody>
<tr>
<td>Thursday, September 17</td>
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<td>Tuesday, September 22</td>
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Support your colleagues and network with fellow students and professionals by attending the poster sessions in the Exhibit Hall (Hall B3) on the third floor of George R. Brown Convention Center. Posters on wide-ranging topics including Deepwater Gulf of Mexico, unconventional plays, portfolio management, sedimentology, and geophysical technology will be available for viewing from Sunday’s Icebreaker through Tuesday morning. Poster sessions are an excellent opportunity to expand your knowledge and meet other researchers in your field. Student poster awards will be presented at a special ceremony in the Exhibit Hall on Monday evening.

AAPG IMPERIAL BARREL AWARD COMPETITION TRAINING (Students Only)

- **Instructors:** Larry Garmezy and Steven Bloemendaal (Shell Exploration and Production); with additional past competition participants
- **Time:** 9:00 am–3:30 pm • Sunday, Sept. 20th
- **Location:** Houston Hilton Americas – Room 336AB
- **Cost:** $50 per person (cost includes refreshments, lunch, and all course materials)
- **Maximum:** 70 participants

This course is designed to introduce the participant to the fundamentals of basin analysis, the evaluation of petroleum systems, and quantitative prospect assessment (risk and volumes). Following brief lectures, the students will work in teams to evaluate, delineate, and describe the critical elements of a working hydrocarbon province. They will learn about the variety of maps needed to produce an evaluation, how to build play element maps on a specific reservoir interval, summary play maps that describe how the play works, and where sweet spots are located. This is followed by a hands-on suite of exercises that emphasize practical, simple principles for carrying out a quantitative prospect assessment. In addition, this year’s course will include insight from past participants who will share their own IBA experiences, and will also assist with the course.

(continued on p. 33)
TEACHER ACTIVITY (Sponsorship Available)

GCAGS and the Houston Geological Society recognize the value of helping primary and secondary teachers effectively convey earth science information to their students. We are pleased to present the following course for teachers at minimal cost for participants.

More! Rocks in Your Head – Workshop and Field Experience (Grade 3–12 Teachers Only)

Instructors: Janie Schuelke (consultant), Erik Scott (Talisman Energy), and Angela Scott (teacher)

8:30 am–3:30 pm • Saturday, Sept. 19

Talisman Energy USA, Inc. • 2445 Technology Forest Blvd., Suite 1200 • The Woodlands, TX 77381 • Panther Creek

$50 per person (cost includes lunch, all course materials, and take-home items for the classroom)

Maximum 45 participants (open to teachers only)

Workshop: This national acclaimed workshop covers a full scope of earth sciences with comprehensive materials enabling full or partial incorporation into curriculum. This workshop empowers educators, regardless of scientific expertise. Topics and hands-on projects covered during the workshop: Earth’s Structure; Igneous, Sedimentary, and Metamorphic Rocks; Soil; Caves; Erosion and Deposition; and Minerals.

Field trip: Just south of The Woodlands is the Montgomery County Preserve—a greenway preferred by local residents for its natural beauty. The preserve also holds a natural laboratory to explore a meandering creek system. We will spend part of the day along Panther Creek to investigate its numerous features as well as interact with the processes that form and continually modify them. We will visit a number of locations and discuss the processes that are occurring and the resultant features. Participants will be able to experience the dynamic nature of river systems and expand their understanding of the world in which we live.

(continued from p. 32)

YOUNG PROFESSIONALS’ AND STUDENTS’ MEET & GREET (Sponsored by Chevron)

3:30 pm–5:00 pm • Sunday, Sept. 20

Ballroom Pre-Function Area

In addition to all young professionals and students, we strongly encourage all interested professionals to attend this function. This is a great opportunity for the new and upcoming professionals to network with one another and to interact with seasoned industry veterans. Drinks will be available, and following the reception all are encouraged to attend the Opening Session and Awards Ceremony.

18th Annual AAPG/SEG Student Expo

Tuesday and Wednesday, Sept. 22–23 • George R. Brown Convention Center

http://studentexpo.info

The AAPG/SEG Student Expo is a unique event that links geosciences students with industry recruiters. Students benefit by networking, sharing their resume, presenting their research, and interviewing with multiple employers while companies enjoy cost-efficient and timely recruiting from a diverse and talented student population. Activities at the two-day Student Expo include open poster sessions on geology and geophysics, multiple field trip and short course options, company-sponsored Icebreaker, and a potentially full day of interviews.

Please note that this event is only for current students and recent graduates of Spring or Summer 2015 in geosciences or related fields. Posters must be related to geophysics, geology, hydrogeology, geochemistry, and earth and environmental science. The last day to register online (www.studentexpo.info) is 10 September 2015. On-site registration will not be accepted.

NOTE: Registration for this event is separate from GCAGS. Please visit www.studentexpo.info for more information.
HOSPITALITY (Sponsored by Auburn Energy and Exama Oil Company)

Welcome to Houston! We hope you'll join us each day for wonderful conversation, information and your Spouse gift. We have some wonderful enrichment programs lined up that everyone is sure to enjoy in the Hospitality Room. Cost is $75 and you will receive a name badge for access to the activities.

You’ll find our Hospitality Suite located in the Hilton, Room 340AB, conveniently on the other end of the skybridge connected to the George R. Brown Convention Center. Wonderful refreshments will be served morning and afternoon, with wine Monday and Tuesday afternoon at 3:00 pm, courtesy of Deborah Sacrey, Auburn Energy. Our hospitality activitiies are also underwritten by a generous donation from Jim Grubb, Exama Oil Company.

On Monday, September 21, we will enjoy two seminars. At 10:00 am, Patricia Neal, Ph.D. will tell us how to improve everything in our lives with Feng Shui. At 1:00 pm, Alice Weiser, an expert on handwriting and body language, will tell us how we can know that someone is lying, including stories of her work in the justice system. On Tuesday, September 22, from 10:00 am to approximately 2:30 pm, we will enjoy a guided walking tour of the Downtown Tunnel System, including a lunch stop on the way. Get some nice exercise, learn about Houston’s Underground, and see some of her most historic buildings.

### Hospitality Suite Hours

<table>
<thead>
<tr>
<th>Day</th>
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<tr>
<td>Monday, Sept. 21</td>
<td>8:00 am–4:00 pm</td>
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<tr>
<td>Tuesday, Sept. 22</td>
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GCAGS HOSPITALITY ENRICHMENT PROGRAMS

**Feng Shui**

Meet Trisha Keel, Ph.D., Teacher, Professional Feng Shui Practitioner and Trainer, Graphic Designer

Monday, Sept. 21 • 10:00 am–11:00 am • Hilton Americas Hotel, Room 340AB • $0 (cost included in guest fee)

Join us Monday, September 21, 2015, at 10:00 am when Dr. Trisha Keel will teach how to balance everything in our lives using Feng Shui. Come and enjoy her special presentation.

**Main Areas:** Teaching, Feng Shui, Theosophy, Metaphysics, and Adventure

**Best Sellers:** Feng Shui and Moon Magic, Adventures in Energy Real-Life Feng Shui Reports, and Living HeartWise

She is celebrated as one of the most gifted feng shui consultants in Texas because of her highly sensitized and intuitive ability to identify environmental energies and their repeating patterns in the lives and businesses of her clients. She is brought in to explain what is happening energetically to the people and businesses in an environment and find concrete reasons why. Her recommendations for energy alignment are both original and creative, always striving for simple solutions.

She has studied, researched and practiced feng shui since 1988. She trained with James and Helen Jay of Feng Shui Designs, receiving Advanced Feng Shui Certification. James Jay was trained by Grandmaster Thomas Lin Yuh, who brought feng shui to the Western World.

**Seven Significant Signs of the Serious Liar?**

Meet Alice Weiser

Monday, Sept. 21 • 1:00 pm–2:00 pm • Hilton Americas Hotel, Room 340AB • $0 (cost included in guest fee)

Want to know the Seven Significant Signs of the Serious Liar? Alice Weiser, handwriting and body language expert, will tell us. Join us for a fun hour of enlightenment on Monday, September 21, 2015, at 1:00 pm.

Alice Weiser is world-renowned as a Graphoanalyst, the science of giving insight into the hidden messages of a person’s handwriting, body language, and voice inflection. Alice has been an expert in this unique field for more than 27 years, and has
provided her talents to prosecutors and defense attorneys in many high profile cases, in the selection of jurors and witnesses. She is also in demand by major corporations in the evaluation and selection of key executives and personnel.

Alice regularly serves major broadcast and cable networks as an expert in the analysis of high profile criminals. She has been featured on MSNBC and CNN as she evaluated such high profile cases as the Unibomber – Ted Kozinsky, The Rail Car Killer, Herb Applewhite, and the Columbine killers. She even appeared on Court TV, and evaluated the infamous ransom note found after the murder of Jon Benet Ramsey, and provided insight to the honesty of John and Patsy Ramsey.

Since the release of her new book, “Judge The Jury,” Alice has become a popular talk show guest and has been heard on hundreds of radio programs. In her book readers quickly discover the powerful advantage to being able to “read” people—their handwriting, their body language, and their facial expressions.

**Houston's Underground**

Tuesday, Sept. 22 • 10:00 am–2:30 pm • $25 (not included in guest fee) • Min. 10–Max. 20

On Tuesday, September 22, 2015, at 10:00 am, become familiar with Houston’s Underground when we take a guided walking tour of the Tunnel System under downtown Houston, make a lunch stop along the way, and learn about some of Houston’s most historical buildings.
HILTON AMERICAS-HOUSTON
1600 Lamar, Houston, TX 77010
RATES: $229 Single or Double

We look forward to welcoming you to the Hilton Americas-Houston hotel. Our AAA Four-diamond hotel is conveniently located in the heart of downtown Houston and connected to the George R. Brown Convention Center via two indoor skywalks. We’re just steps away from Discovery Green Park, Toyota Center, BBVA Compass Stadium, GreenStreet premier dining and entertainment center, and Minute Maid Park.

Work out at the Skyline Spa & Health Club, located on the 23rd floor, and admire stunning city views. Indulge in calming treatments, swim in the 75-ft. Olympic-sized infinity pool, or take a dip in the whirlpool. After a long day, retire to your well-decorated guest room, with 24-hour in-room dining just a phone call away.

Whether traveling for business or romance, Hilton Americas-Houston is a refreshing experience. Enjoy the hotel lobby’s Italian marble, sparkling inlaid tile floor mosaics, Venetian glass chandeliers and an impressive art collection by Texas artists. Relax to the sounds of the cascading water wall before meeting friends or business associates at the Lobby Lounge. Select from an array of refreshing cocktails, beers and an extensive wine list. With 1,200 guest rooms and 91,500 sq. ft. of meeting space (GCAGS’s spouse/guest hospitality suite and many of Saturday’s and Sunday’s short courses will be located on the third level), the Hilton Americas is the ideal choice for corporate meetings and events. Book your next stay at our hotel in Houston and experience true Texas hospitality.

A special group rate of $229 per night for a single or double room has been negotiated for GCAGS. The rate does not include taxes. DEADLINE IS AUGUST 28, 2015. After that date unsold rooms will be released back into general circulation for sale, so book early! Go to the convention’s website at www.gcagshouston.com, click on “REGISTER” then “HOTEL INFORMATION” at the top of the page, and follow the special link (also below) to make your reservation on line. Alternatively, you may call toll free 1-800-Hiltons and refer to the group code 1GS for your discounted rate, or go to https://resweb.passkey.com/go/GCAGS2015.
Pre-Registration Early Discount Deadline: July 31

There are three easy ways to register for the 65th GCAGS Annual Convention:

1. **Register online (credit card is required)**
   
   Go to www.gcagshouston.com and click on “Register Now!” link on the home page.

2. **By mail (check or credit card; IMPORTANT: checks may be drawn on U.S.-based banks only)**
   
   Send your registration form and payment to:
   
   2015 GCAGS Annual Convention
   
   c/o Attendee Interactive
   
   2205 Warwick Way, Ste. 110
   
   Marriottsville, MD 21104
   
   Make checks payable to: GCAGS Convention 2015

3. **By fax (credit card only)**
   
   Fax your registration form, including credit card information, to 1–410–480–1892.

All registration, social-event, optional-tour, short-course and field-trip fees must be paid IN FULL at the time of the registration. All fax registrations not including credit-card information or mail-in registrations received without credit-card information or a signed check from a U.S. bank will be returned. If completing a hard-copy form, use one form per professional or student registrant. If registering a spouse or guest, be certain to provide the individual’s name for the badge. Professionals may not register as spouses or guests. All speakers and poster presenters must be registered.

**Registration fees are as follow (all prices in USD):**

- GCAGS/GCSSEPM Professional* before July 31: $200.00
- GCAGS/GCSSEPM Professional* after July 31: $300.00
- Student (ID will be required on site)**: $35.00
- Student Volunteer (see p. 32)**: $35.00
- Spouse/Guest***: $75.00
- Exhibit Booth Worker: $95.00
- Icebreaker Only: $60.00

* Professional fee includes the Opening Session, Icebreaker, Exhibition, all technical sessions, all coffee breaks, Presidents’ Reception, ‘Walk & Talk’ lunch, and digital copy of the 2015 Transactions.

** Student fee includes the Opening Session, Icebreaker, Exhibition, special student events (see p. 32), all technical sessions, all coffee breaks, Presidents’ Reception, and digital copy of the 2015 GCAGS Transactions. A $15 box lunch for Tuesday is available for additional purchase.

*** Spouse/Guest fee includes the Opening Session, Icebreaker, Exhibition, all coffee breaks, Presidents’ Reception, ‘Walk & Talk’ lunch in the exhibit hall, and access to the Hospitality Suite Monday, Sept. 21, and Tuesday, Sept. 22.

Pick up your badges and tickets to any optional events in the Exhibit Hall B3, Level 3 of the George R. Brown Convention Center, anytime during the following hours:

- Saturday, Sept. 19: 3:00 pm–6:00 pm
- Sunday, Sept. 20: 7:00 am–8:00 pm
- Monday, Sept. 21: 7:00 am–6:30 pm
- Tuesday, Sept. 22: 7:00 am–12:00 pm
**Registration Form**

65th Annual Convention of the Gulf Coast Association of Geological Societies / Gulf Coast Section of SEPM, September 20–22, 2015

**Discovery, Technology, Leadership & Education**

Online Registration: www.gcagshouston.com

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**Save Time—Register ONLINE!** www.gcagshouston.com

**REGISTER ONLY ONE PROFESSIONAL OR STUDENT PER FORM**

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<th>Fee Per Person</th>
<th>No. of Tickets/Items</th>
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<td>GCAGS/GCSSEPM Professional Early Bird (by July 31)</td>
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<tr>
<td>GCAGS/GCSSEPM Professional (after July 31)</td>
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<td>Exhibit Booth Worker</td>
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<tr>
<td>Icebreaker ONLY, Sun., Sept. 20</td>
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**GCAGS PUBLICATIONS**

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<th>Fee</th>
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<tbody>
<tr>
<td>$65</td>
<td>Hard Copy of 2015 GCAGS Transactions (to be picked up at the GCAGS Bookstore in the Exhibit Hall)</td>
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<tr>
<td>$75</td>
<td>Hard Copy of 2015 GCAGS Transactions (to be shipped from GCAGS)</td>
</tr>
<tr>
<td>$30</td>
<td>Hard Copy of 2015 GCAGS Journal, v. 4 (to be picked up at the GCAGS Bookstore in the Exhibit Hall)</td>
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**SPECIAL EVENTS**

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<tr>
<td>$50</td>
<td>BBQ, Beer, and Bytes—An Evening at St. Arnold’s Brewery, Mon., Sept. 21</td>
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<td>$50</td>
<td>All-Convention Luncheon, Mon., Sept. 21</td>
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<td>$50</td>
<td>DPA Luncheon, Tues., Sept. 22</td>
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<td>$50</td>
<td>GCSSEPM Luncheon, Tues., Sept. 22</td>
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<tr>
<td>$750</td>
<td>FT #1: Upper Cambrian Microbial Carbonate Mounds in Central Texas, Thur.-Sun., Sept. 17–20 (Professional Registration or Student Registration)</td>
</tr>
<tr>
<td>$325</td>
<td>FT #3: Introduction to Regional and Play-Based Exploration, Sat., Sept. 19</td>
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<tr>
<td>$195</td>
<td>SC #4: Core Workshop: Woodbine Sand and Eagle Ford Shale, Sat., Sept. 19</td>
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<tr>
<td>$50</td>
<td>SC #5: AAGP Imperial Barrel Award Competition Training, Sun., Sept. 20 (Student Registration Only)</td>
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<tr>
<td>$150</td>
<td>SC #7: Handheld X-Ray Fluorescence (XRF) Geochemistry: Theory and Application to Mudrock Drill Core and Cuttings, Sun., Sept. 20</td>
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<tr>
<td>$100</td>
<td>SC #8: Introduction to Reservoir Fluid PVT Analysis for Geologists, Sun., Sept. 20</td>
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**FIELD TRIPS**

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<td>FT #3: Geology of Canyon Lake Gorge, Sat., Sept. 19</td>
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<td>$25</td>
<td>FT #4: Spindletop Oil Field—Gladsy’s City Boomtown Museum, Sat., Sept. 19 (Professional Registration or Student Registration)</td>
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<tr>
<td>$100</td>
<td>FT #5: Galveston and the Brazos Delta as Reservoir Analogs, Sat., Sept. 19 (Professional Registration or Student Registration)</td>
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<tr>
<td>$250</td>
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<tr>
<td>$50</td>
<td>FT #7: Field Work on Active Faults in Houston, Sun., Sept. 20 (Professional Registration or Student Registration)</td>
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**SPOUSE & GUEST ACTIVITIES**

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**For Hotel Information, Please Visit Our Website at www.gcagshouston.com/hotel-information.**

*Please make all checks payable to: GCAGS Convention 2015. *Purchase orders will not be accepted. GCAGS does not invoice for the convention. Checks must be drawn from a U.S. bank and in U.S. dollars ONLY. 

*Credit cards are charged in U.S. dollars ONLY.

Please print name as it appears on card

**Signature**

**Authorized Signature (if applicable)**

**ADA or Dietary Special Needs (please specify)**

**Contact Information (name / phone number)**

For Hotel Information, Please Visit Our Website at www.gcagshouston.com/hotel-information.

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**Advance Registration Deadline:** July 31, 2015

**Regular Registration Deadline:** September 20, 2015

For the latest updates, visit www.gcagshouston.com and www.gcags.org.
Convention Team

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We’re Building Sessions in these Themes
- The Gulf of Mexico Systems
- Conventional Carbonates & Clastics
- Tight Gas Plays
- Understanding the Resource Plays
- The Changing Coastal Landscape
- Mexico and Latin America
- Advances in Geophysical Technologies
- Enhanced and Secondary Recovery
- Reservoir Prediction and Quality
- Climate from Multiple Perspectives
- Protecting and Stewarding Water Resources

And We’re Planning Field Trips & Short Courses, Too.
Want to Help? Have Ideas? Need Information? Contact Dawn Bissell, 2016 Convention Chairman, chair@gcags2016.com

Join the 2016 GCAGS Convention with an Oral or Poster presentation!
Please submit a 250-word abstract or summary of your planned paper or poster before December 15, 2015, to our Technical Program Chairs, Bob Critchlow or Rick Paige, at techprogramchair@gcags2016.com. Authors of accepted papers and posters will be notified late January 2016. Final extended abstracts, with or without figures, and full papers for publication in the GCAGS Transactions will be due by March 21, 2016, to the GCAGS Transactions Editor, Jennifer Smith-Engle. Full information, instructions, size limitations, and helpful hints for abstracts, summaries, extended abstracts, and full papers will be posted online at www.gcags2016.com

If you’d like to publish in the GCAGS Journal (the Peer-Reviewed Journal of Gulf Coast Geoscience)
Submit an extended abstract of at least 600 words, including 1–2 representative figures, to the GCAGS Journal Editor, Barry Katz, at barrykatz@chevron.com by December 15, 2015. Once accepted for publication, a full manuscript should be submitted before March 21, 2016. Full instructions for manuscript submissions will be posted online at www.gcags2016.com

Convention presentations of Journal submissions are encouraged, but not required.