

# Newsletter May 2014

# Gresident's Letter

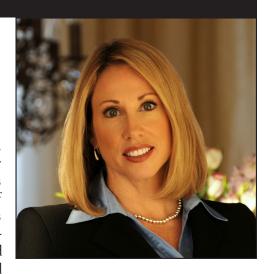
can't believe it is May 2014 already! This also means that the 2014 SPEE Annual Meeting is right around the corner. By the time you read this, it will be less than a month away.

I want to start this newsletter off with an addendum/correction from my previous article to the membership. In my haste and excitement to complete the February 2014 newsletter, I was remiss in not recognizing the services of one of our 2013 outgoing Board of Director Members: Graham Simpson (EU). Graham was the first Director elected to SPEE who represented the EU Chapter of SPEE. He was the Charter Member and the catalyst to the creation of SPEE's European Chapter. Graham is a quiet but impactful leader, who always delivered balanced and thoughtful contributions to SPEE business. During his time on the Board, Graham assured that the SPEE ExCom and Board were challenged to 'think outside the box' of the USA and North America with respect to improvements in the Society for our worldwide memberships. SPEE will be indebted to Graham for his contributions and support in chartering the European Chapter. We will not forget his contributions and the global impact he had on SPEE members and our organization. Thank you, Graham!

The 2014 SPEE Annual Meeting is being hosted at the Stowe Mountain Lodge in Stowe, Vermont. The registration package was mailed out to members or you can download it from www.spee.org. This year, **Gary Gonzenbach**, host of the 2014 Annual Meeting, has arranged a stimulating technical program and two short courses. As a special highlight, Mr. John Hodgin of the Securities and Exchange Commission will address our membership, providing insight into some of the recent SEC Compliance and Disclosure Interpretations. As always, the social experiences will be memorable, with the Monday night Awards dinner and dancing, and opportunities for self-guided tours at local vineyards, zip-lining and water sports. I look forward to seeing you and your guest at the 2014 Annual Meeting.

Each year at the Annual Meeting, the Annual SPEE Evaluation Parameter Survey is distributed to attendees and

the Chairman of the Parameter Survey provides an overview of the results. As an SPEE Member, you should have received



your request to complete the survey. By now, you should have completed the survey so that your perspectives are included in SPEE's important contribution to the industry. If you have any questions, please contact **Dee Patterson**, Chairman of the Evaluation Parameter Survey.

On May 14, the Oklahoma City Chapter will host a Monograph 3 course taught by Russell K. Hall. This one-day course will cover concepts and procedures for performing reserves evaluations of resource play assets as covered in SPEE Monograph 3. Among other topics, participants will be instructed on how to recognize a resource play, define the proved area, classify proved, probable and possible reserves, and avoid common pitfalls and mistakes in evaluating a resource play. A second Monograph 3 Training Course is being planned for later in the year. Check www.spee.org for more information.

Mike White, B.K. Buongiorno and Gary Gonzenbach have been working in conjunction to finalize the 2014 SPEE Directory. They have worked diligently to assure that the records are complete and accurate with respect to membership details and photographs. The Directories should be available for distribution at the Annual Meeting and extra copies will be available for on-site purchase.

In this edition, there is a submission titled: "It's Just My Opinion," authored by our long-time and tireless SPEE Newsletter Chairman, **Richard Miller**. The article focuses on ways in which SPEE can further improve the knowledge and information sharing benefits of SPEE programs and activities to all Members by utilizing various modern forms

## 2014 Officers and Directors

#### **Executive Committee**

President	Samantha Holroyd (Houston)
Vice President	Gary Gonzenbach (Central Texas)
Secretary-Treasurer	Dee Patterson (Dallas)
Past-President	Richard Krenek (Dallas)

#### **Directors**

Jennifer Fitzgerald (Houston) Brent Hale (Dallas) Don Jacks (Oklahoma City) Letha Lencioni (Denver) Simon McDonald (Europe)
Floyd Siegle (Calgary)
Curt Taylor (Houston)
Mike White (Denver)

Rod Sidle (Director-at-Large)(Houston)

#### **Bylaws Committees**

Chair of Past Presidents' Council	.Barry Ashton
Qualifications	Phil Kandel
Committee: Steve Blair, Tim Gilblom, and Richard Rowe	
NominatingRi	ichard Krenek
Grievance	
Committee: Frank Molyneaux and Dan Olds	
Reserves Definitions	.S. Tim Smith
Committee: Russ Long Rod Sidle Stuart Filler, and John Etherington	 

#### **Individual Appointments**

Ethics	Tom Collier
Evaluation Parameters Survey	Dee Patterson
Fair Market Value	D. Russell Long
Internet	Mike White
Membership	Donald C. Jacks
Newsletter Coordinator	
Communications	
Production Tax Summary and University Interface	Marshall Watson
Recommended Evaluation Practices	
Annual Meeting Advance Planning	Barry Ashton
Professional Registration	Marcus Snyder
Monograph 3 - Evaluation of Resource Plays	Russell K. Hall
Monograph 4 - Unconventional Developed Reserves	John P. Seidle
Technical Training	Jennifer Fitzgerald
SPE OGRC Oil and Gas Reserves Committee Observe	r Ron Harrell
JCORET (Joint Committee on Reserves Evaluator Train	ningRod Sidle
COGEH (Canadian Oil and Gas Evaluation Handbook	x) Robin Bertram
UNECE Expert Group on Resource Classification	S. Tim Smith



5535 Memorial Drive, #F654 Houston, Texas 77007 713-651-1639 fax 713-951-9659 www.spee.org

Administrative Secretary B.K. Buongiorno Bkspee@aol.com Financial/Web Administrator Kemper Dotson kemper@spee.org Newsletter Editor
Diane Pollard
dpollard@austin.rr.com

The SPEE Newsletter is a quarterly publication of the Society of Petroleum Evaluation Engineers. News items, correspondence, address changes and advertising inquiries should be directed to SPEE headquarters in Houston, Texas.

## Chapter Officers - 2014

#### Calgary

Chairman – Katherine Crerar Vice Chairman – Doug Wright Secretary – Floyd Williams Treasurer – Gary Metcalfe Membership – Daye Hornung

#### California

Chairman - Brad DeWitt Vice Chairman – Rick Finken Secretary-Treasurer - Barry Evans Membership - John Davis

#### **Central Texas**

Chairman – Jim Bostic Vice Chairman – Secretary - Charles Price Treasurer – Gary Gonzenbach Membership – Paul Clevenger

#### **Dallas**

Chairman - Jack Harper Vice Chairman – Brent Hale Secretary - Joe Young Treasurer - Bill Gross Past Chairman - Jay Thrash, Jr. SPEE Liaison - Paul McDonald

#### Denver

Chairman – Fred LeGrand Vice Chairman - Steve Enger Secretary-Treasurer – Andrew Forcina Membership - John Wright

#### **Europe**

Chairman – Martin Hubbig Vice Chairman – Shane Hattingh Secretary-Treasurer – Paul Taylor Membership – Bob Harrison

#### Houston

Chairman – Anna Hardesty Vice Chairman – Lucy King Secretary-Treasurer – Steve Davis Program Chairman – David Nordt

#### Midland

Chairman – Robert Green Vice Chairman – Secretary-Treasurer – Karl Gulick Membership Chairman – Ru<u>ssell Hall</u>

#### Oklahoma City

Chairman – Don Jacks Vice Chairman - Gary Hunter Secretary-Treasurer - Fletcher Lewis Membership - Bruce Heath

#### Tulsa

Chairman - Marc Schutt Vice Chairman - Laura Stauffer Secretary-Treasurer -Membership Chairman - Phil Schenewerk

Wyoming Chapter Coordinator Scott Stinson

#### Continued from page 1

of technology. The ExCom and Board had an opportunity to discuss this topic at our January meeting and dedicated ample time to the topic for discussion. We identified a number of issues needing further consideration, which is ongoing. Furthermore, the ExCom and BOD remain openminded to identify, consider, and implement opportunities to improve knowledge sharing to SPEE members and industry professionals. One of the recent impactful improvements undertaken by the ExCom and BOD was the creation of the SPEE Training Committee. This committee proactively engages and liaisons with SPEE Chapters to support training sessions related to SPEE publications. Keep those great ideas coming!

In closing, I want to thank you for your continued support as a member of the SPEE. I also extend my open door, email and phone policy to receive your comments or questions about our organization. I look forward to seeing you at the 2014 Annual Meeting in Vermont.

Samantha Holroyd



June 7 - 9, 2014 Stowe, Vermont
Stowe Mountain Lodge
June 5 - 9, 2015 Halifax, Nova Scotia
The Westin Nova Scotian
June 4-7, 2016 Lake Tahoe, Nevada
Ritz Carlton

Contact Barry Ashton to provide suggestions on locations and venues for future meetings.

#### THE ETHICS COLUMN

#### **BEYOND CODES OF CONDUCT**

The SPEE addresses ethical behavior through Article VI of the By-Laws, Code of Ethics of Engineers and Principles of Acceptable Evaluation Engineering Practice. Certainly a member who adheres to these documents would be thought of as an ethical engineer. But is there more?

The four graybeards that make up the SPEE Ad Hoc Committee on Ethics under the Chairmanship of Buddy Sipes have suggested in various presentations that there is. Charles Gleeson in a recent article spoke of ethical behavior as a "lifetime journey." Arlen Edgar, who has studied the evolution of professional ethics, says "that an overarching concept of ethical behavior is doing what is simply right because it is the proper thing to do." I have written on the ethical implications of not being truly qualified for a particular assignment, using as examples expert witnessing and the evaluation of unconventional resources.

Unfortunately we live in an imperfect world full of imperfect people where the decisions we often face are not black and white, but gray. Particularly during good times such as the oil boom we are enjoying now there are all kinds of snares and temptations waiting to trip us up. Codified behavior doesn't cover every situation and can often be rationalized to fit the occasion.

I think the key to ethical behavior is to first accept that as a professional you have access to a unique body of knowledge and in exchange for the privilege of practicing, society demands that the public's health, safety and welfare be placed first. Then the lifetime journey begins, consisting of the thousands of decisions we encounter not only in business, but our personal and social lives as well. There will be failure for sure because we are part of this imperfect world where ignorance, self-interest and greed often prevail. We can either use these failures to rationalize and justify our behavior or through objective, often painful self-analysis, learn from it. If we stay the course, then one experience builds upon another until ethical behavior is not something we look up in a document, but a way of life.

Good luck on your journey.

Scott Hickman



#### **Calgary**

At the April meeting we were joined by Darren King, Associate Director of Development, Schulich School of Engineering, University of Calgary and Yitong Yang, who is this year's recipient of the Robert A. Odd Memorial Bursary. The award was presented by David Tutt.

We were also able to present David Elliot with his plaque for Honourary Lifetime Membership. Dave tells us that he is now pulling ahead of his daughter in amassing awards! Congratulations, Dave. See page 12 for photos.

The Calgary Chapter has completed the Bitumen Guidelines and they were distributed to holders of COGEH Volume III in April, 2014.

Draft 15 of The Resources Other Than Reserves (ROTR) Guidelines has been submitted to the COGEH Standing Committee for final review. On behalf of the Calgary Chapter I would like to thank the members of the sub-committee who have committed hours of volunteer time to prepare this document in a very short time. In particular I would like to thank David Elliot and John Chipperfield for spearheading the effort over the past number of years. SPEE (Calgary Chapter) has an agreement with the Alberta Securities Commission (ASC) to publish the ROTR Guidelines on or before June 30, 2014.

In May we will hold our Annual General Meeting (Calgary) and bring in a new executive. The meeting will be held at Sproule's offices on May 20th and will be followed by the business meeting.

Meetings - 3rd Tuesday of each month except June, July and August. Membership - 55

#### **California**

Membership - 22

#### **Central Texas**

No activity in the chapter since the February 2014 newsletter.

Membership – 33

#### **Dallas**

Meetings – Bimonthly from September through May at the Brookhaven College Geotechnology Institute. Membership – 58

#### Denver

On January 8th the Denver Chapter held its first quarterly meeting of 2014 with 40 in attendance, 25 members and 15 guests. Dr. John P. Seidle was the speaker and spoke on the topic Status of SPEE Monograph 4 – Estimating Developed Reserves in Unconventional Reservoirs.

Dr. Seidle is a longstanding member of the Denver chapter currently serving the SPEE at the national level as the Monograph 4 Committee head. Monograph 4 is scheduled for publication in 1st quarter of 2015. Dr. Seidle spoke on a range of topics covering not only reservoir characterization and its relationship with probabilistic reserve estimation techniques but also Decline Curve Analysis focusing on the application of modern methodologies. Several timely examples were provided including application of modern techniques to the Bakken HZ oil play.

John Benton, 2013 Chapter Chair for SPEE Denver, represented the Denver Chapter at the annual AIPG Legislative Reception. John visited with several state representatives while there and also took the opportunity to make attendees aware of the SPEE in Denver. John currently serves as a commissioner on the Colorado Oil and Gas Conservation. John's continuing service to the local community is both recognized and appreciated.

On April 9th the Denver Chapter held its second quarter meeting of 2014 with 47 in attendance, 24 members and 23 guests. The meeting opened with Ms. Debbie Brown, Coloradans for Responsible Energy Development, giving us a brief overview of her organization's efforts on behalf of the energy industry in Colorado. CRED is proactively educating the public, via television ads, an informative website and flyers, concerning the topic of hydraulic fracturing. Multiple ballot initiatives are anticipated in Colorado over the next nine months rendering this effort as both timely and necessary. Mr. Sameer Ganpule was the technical speaker and spoke on the topic *Impact of Well Completion on the Uncertainty in Technically Recoverable Resource Estimation in the Bakken and Three Forks* (SPE 167131).

Mr. Ganpule is a Senior Reservoir/Stimulation Engineer with Schlumberger in Denver. Mr Ganpule's talk included several examples of production performance under varying completion methodologies and infill patterns/densities for HZ Bakken wells. Case studies included simulation model history matching under completion scenarios that included an unknown contribution from adjacent known productive intervals. The talk made clear the need for planning, design, data gathering and extensive analysis for estimating

recoverable reserves in resource oriented plays.

Finally, the Denver chapter will host a meeting May 15th in which Dr. Dilhan Ilk will speak on Well Performance in Unconventional Reservoirs – State-of-the-Art Analysis/Interpretation. The Denver chapter looks forward to receiving Dr. Ilk's presentation as a complement to this year's education program.

Meetings – 2nd Wednesday of first month of each quarter – Denver Athletic Club – The New Petroleum Club. Membership – 62

#### **Europe**

The Europe Chapter is fast growing and now counts 30 members. So far members are mainly from UK, Germany, Austria, France, The Netherlands and Denmark in Central Europe, but activities are planned to promote the SPEE all over Europe. Four meetings per year are held, three in London and one outside UK. In 2014, a meeting is planned in Vienna, Austria, and previous meetings were held in Copenhagen, Denmark and The Hague, The Netherlands.

Meetings - Four per year. Membership - 28

#### Houston

On Wednesday, January 14th, the Houston chapter hosted our annual joint meeting with SIPES. Phil Martin, CEO, New Century Exploration presented a review of the *Eagle Ford East*. The main theme was that the Woodbine area, a continuation of the prolific Eagle Ford from the west, was slow in development for several years, but enhanced drilling and sweet spot identification techniques perfected in the West are now being used with success. There were 40 members, guests, and visitors in attendance from SPEE for the meeting.

On Wednesday, February 5th, the Houston chapter hosted our monthly luncheon at the Houston Petroleum Club. Dr. John Lee, Professor of Petroleum Engineering, University of Houston, presented a lecture on Are Our Proved Shale Reserves Reasonably Certain? The talk examined some of the key issues evaluation engineers face in shale reserves evaluation and the possible solutions. There were 88 members, guests, and visitors in attendance for the meeting.

On Wednesday, March 5th, the Houston chapter hosted our monthly luncheon at the Houston Petroleum Club. Courtney Stephens, President & CEO, QED Energy Training, presented the topic *Enhanced Recovery - Realizing Undiscovered Value in Your Technicians*. The presentation demonstrated that effective use of technicians adds significant value to the company bottom line by allowing engineers to focus on the more technical aspects of their work, reducing total project time, and producing a better end product. There were 46 members, guests, and visitors in attendance for the meeting.

On Wednesday, April 2nd, the Houston chapter hosted our monthly luncheon at the Houston Petroleum Club. Cheryl Collarini, Chairman, Collarini Energy Staffing, conducted an ethics seminar on *Ethics – Global Perspective*.

The seminar addressed important ethical issues in general business and the energy business from a general and global perspective. There were 61 members, guests, and visitors in attendance for the meeting.

Wednesday, May 7th: Jeff Sieler with Scotia Bank's M&A practice answers a series of questions regarding shale oil development in the United States. The presentation is titled An Economic Perspective of US Shale Developments.

September 3rd, October 1st, November 5th and December 2nd speakers and presentation topics to be announced.

Meetings – 1st Wednesday of each month except June, July and August – Houston Petroleum Club. Membership – 184

#### Midland

The chapter held two meetings and one short course in the first quarter of 2014.

Our January meeting featured Nathan Vrubel from Chevron, U.S.A. who presented *Integrated Petrophysical Evaluation* of *Unconventional Reservoirs in the Delaware Basin*. We thank Chevron for permitting this presentation to the group. The research focused on the reservoirs of the Delaware Mountain Group sands, Bone Spring, and Avalon and Wolfcamp shales. It was well attended with 53 members and guests.

February's two-day short course featured Dr. John Lee teaching *Production Forecasting for Unconventional Resources*. This event was co-hosted and supported by the Midland College, Petroleum Professional Development Center. Thirty-eight students attended our Short Course and it was well received by all. Dr. Lee suggested we should do it again.

March's meeting featured Tim Pope from Schlumberger and presented *Unconventional Reservoir Optimization and Characterization*. Even though our meeting was during the school systems spring break we had 35 members and guests present.

Meetings – 2nd Wednesday odd months – Midland Petroleum Club. Membership - 26

#### Oklahoma City Chapter

Meetings – Every odd-numbered month. Membership - 24

#### Tulsa

Annual Business meeting was held on January 14, 2014. New officers were elected by email. All business for 2013 was approved as presented.

April Luncheon: On April 9, 32 members and guests of the Tulsa Chapter of SPEE met to hear Joe Stowers with Ryder Scott speak on *Engineering Ethics*, *Why it Matters*. It was an interesting and informative talk tracing the evolution of ethical concepts from the time of Aristotle to today's engineering rules and guidelines.

Meetings will resume in September.

Meetings – Tuesday of each month – Petroleum Club. Membership – 23







# The 51<sup>st</sup> SPEE Annual Conference is just weeks away!

This year promises to top your list of can't miss events for 2014. The folks at Stowe Mountain Lodge in Stowe, Vermont are anxiously awaiting your arrival and have everything perfectly tuned to accommodate you. Come share networking opportunities with your colleagues, superb speakers and short courses, and some quality time to relax with your friends!

#### Don't miss:

- US Securities and Exchange Commission speaker John Hodgin
- Unconventional Reservoirs with Rawdon Seager of Gaffney, Cline & Associates
- Shale Asset Management with Dr. Shahab Mohaghegh of Intelligent Solutions
- Annual SPEE Parameter Survey
- Update on Monograph 4 Estimating Developed Reserves in Unconventional Reservoirs
- Presentations on Resource Play valuations, forecasting, and related topics

- Saturday Golf Tournament
- Short Courses on Sunday and Tuesday
- Technical Presentations Monday and Tuesday
- Ballroom Dancing and Monday Night Banquet
- Sightseeing Activities

#### Thank You!

In addition to the SPEE Group Activities, there are numerous self-guided tours available in the area, like soaring, fishing, shopping in the village, and zip lines. SPEE Group daily room rates of \$209 are valid at the lodge for 3 days prior and 3 days after the conference, subject to availability. (Includes pool, hot tubs, health club, and wireless internet).

Gary J. Gonzenbach, SPEE Meeting Chair

## It is Just My Opinion, Of Course, But...

SPEE needs to give some serious thought to methods of improving Member access to educational programs. One of the stated purposes of SPEE, as noted in Article II of the By-Laws is "to promote the profession of petroleum evaluation engineering, to foster the spirit of scientific research among its Members, and to disseminate facts pertaining to petroleum evaluation engineering among its Members and the public." SPEE has made significant efforts to accomplish this goal through publications, participation with other professional groups, and, most effectively, development of educational programs at the Annual Meeting and the meetings of the various Chapters. It is hoped that efforts will be made to further expand these activities in the future. However, an equal level of effort by national SPEE and the various Chapters to improve access by all Members to these programs and activities is necessary.

Because of the dispersion of the Chapters in the United States and internationally as well as the Members within some Chapters, such as the California Chapter, scheduling of Chapter meetings combined with quality educational programs is difficult at best. While some Chapters such as Houston and Midland can gather large groups of Members to a meeting and attract good speakers and programs to those meetings, often from within the membership or immediate area, other Chapters cannot achieve the same level of information transfer. There are many programs put on in Houston for example, according to the Chapter News in the Newsletter, which would likely be of interest to Members in other Chapters if they had access to the meeting.

Also, the programs put on at the SPEE Annual Meeting (the AM), including the Short Courses, offer a considerable amount of information to those Members who have the opportunity to attend the AM. This includes, of course, the one-hour Ethics session which provides Members with the credit necessary for membership and/or meets the requirements for professional accreditation. Unfortunately, not all Members can afford the time and/or expense of attending the AM in order to take advantage of the program offerings.

The result of these circumstances is that SPEE is not fulfilling the goal of engendering the education of Members to the fullest extent possible. While dissemination of timely information was not always practical in the era of print publications, the advances in communication made possible by the internet and other media offer a range of options for providing educational opportunities to all SPEE Members and the public. SPEE has made use of modern communication through the development of a relatively sophisticated website and the use of the website to benefit SPEE Members.

In order to extend the benefits of SPEE programs and activities to all Members the Board of Directors should consider and put in place one or more systems for media ac-

cess to those programs. Such systems might include:

- Recording of presentations at the Annual Meeting, at short courses and conferences, and at selected
  - Chapter meetings on DVD for distribution to Chapters for viewing at a Chapter meeting or for viewing by individual Members as circumstances dictate.
- Recording of presentations at the Annual Meeting and at selected Chapter meetings in an appropriate medium for posting on the SPEE website. These presentations would then be accessible by Members at any time. An excellent candidate for this type of access would be the Ethics session normally presented at the AM.
- Arrange for visual webcasting of individual presentations or entire programs. A presentation of particular interest at a Chapter meeting could be done as a live or recorded webcast. An extension of this approach would be to webcast an entire session of the AM. This would allow Members who cannot attend the meeting to obtain the benefit of the presentations.
- Arrange for webcasting of the Short Courses presented at the AM. If these courses are considered sufficiently important to organize for the AM, the information would probably also be of use to Members who cannot attend.

The first two methodologies should not be particularly difficult or incur significant expense. Programs can be recorded to DVD by any number of available systems; posting to a website is done every day on Facebook or other social media. This approach could be another function of the AV provider at the AM or Chapter meeting.

Webcasting is more ambitious but many professional organizations routinely offer educational programs through audio and/or visual webcasting. There would be some expense for this approach that could be recovered through a charge for participation by Members. Members would sign up for the event, pay an access fee, and receive an access code. The access fee for an entire session of the AM or for a Short Course could be a couple hundred dollars but assuming a quality presentation it would allow Members to participate without having to incur the time and expense of attending in person. The Board should give serious consideration to implementing this approach to information dissemination.

Just a Thought!

Richard J. Miller Newsletter Publisher

# SPE Hydrocarbon Economics and Evaluation Symposium 19-20 May 2014 | Houston, Texas, USA

# SPEE is a supporting organization of the 2014 SPE Hydrocarbon Economics and Evaluation Symposium

The Hydrocarbon Economics and Evaluation Symposium is taking place in Houston, Texas, on 19-20 May. A link for registration can be found on the **SPEE.org** home page.

Join the symposium to discover the latest technologies, network with peers, and learn from various industry experts. As a supporting organization, SPEE will have a booth. Be sure to stop by. Below are key highlights of the event:

#### Opening Executive Panel

Helge Hove Haldorsen, 2015 SPE President, will launch the event with an address on Monday, 19 May. This will be followed by a panel of industry experts who will provide insights on E&P business development, deal structures, and financing and marketing transactions in a changing global environment.

Keynote Luncheons (included with symposium registration)
Monday, 19 May: "The Changing Business Relationship between NOCs and IOCs" by Daniel Johnson, Petroleum Industry Consultant

Tuesday, 20 May: "Hydrocarbon Investment Challenges in a Global Energy Market" by Greg Guidry, EVP Unconventionals, Shell Upstream Americas

# Training and Young Professionals Workshop (separate registration required)

Wednesday, 21 May 1:00-5:00 pm: <u>HEES Young Professionals Workshop</u> by Nathan Meehan, Senior Executive Advisor at Baker Hughes discussing the importance of hydrocarbon economics and evaluation.

Wednesday, 21 May 9:00 am-5:00 pm: Fiscal System Diversity and Booking Barrels covering basic economic, financial, and accounting aspects of international petroleum fiscal systems, concessions, production sharing contracts, and service agreements particularly with respect to "booking barrels."

Wednesday 21, May – Thursday, 22 May 8:00 am-5:00 pm: Oil and Gas Economics and Uncertainty covering how to identify, evaluate, and quantify risk and uncertainty in everyday oil and gas economic situations.

Editor's Note: At the SPEE 2000 Annual Meeting, the SPEE adopted a pilot program to develop a series of Recommended Evaluation Practices (SPEE REPs). The SPEE REPs were envisioned to be short position papers outlining petroleum evaluation on specific evaluation issues and offering suggestions for handling those issues. To date, SPEE has written, approved, and published ten REPs which are posted on the SPEE website. Since we have many new Members who may not be familiar with the REPs, along with Members who might like a reminder, the REPs will be published in the SPEE Newsletter as space allows. The Recommended Evaluation Practices Committee, chaired by Dan Olds, is active and would entertain suggestions for additional REPs.

#### SPEE Recommended Evaluation Practice #7 – Escalation of Prices and Costs

**Issue:** Reported data at the SPEE Petroleum Economics Software Symposium revealed that current practice is diverse with respect to price and cost escalation. Consistency is important if comparability between software vendors is to be achieved.

**Discussion:** Escalation factors are oftentimes applied to prices and costs used in the calculation of future cash flows. The escalation factors can be applied to the base prices or costs in different ways to yield a variety of outcomes. Consistency in the application of escalation factors can reduce the level of ambiguity currently observed in industry.

Discussions of the treatment of escalations in the cover letter or body of a reserve report often include language along the lines of "Prices and costs were escalated at x%". In many cases, closer examination of the cash flows reveals that the prices and costs were held constant until the end of the first time period (usually a full calendar year for reports with an effective date of January 1; usually for the remainder of the calendar year for reports with an effective date after January 1), then the escalation factor is applied to the second time period so that the second time period is the first price or cost that is actually escalated. Occasionally, reports are observed where the escalation factor(s) are applied immediately rather than after the first time period.

**SPEE Recommended Evaluation Practice:** In keeping with general practice, the application of escalation factors should be assumed to start with the second time period.

The application of escalation factors should be based on the size of the smallest time period being evaluated. The most commonly encountered time period sizes are monthly and annual, although quarterly or semi-annual time periods may be encountered.

#### **Monthly Cash Flows**

If monthly cash flows are used, escalation should take place in a "stair step" fashion on a monthly basis. Thus if prices are assumed to increase at 6% per year, the monthly increase would be based on an effective annual rate of 6% per year with prices increasing every month.

Example: If oil prices are assumed to be constant for the first year at \$17 per barrel, then escalate at 6% per year with prices increasing every month, the monthly oil price would be calculated as follows:

The monthly rate of escalation would be calculated from:

```
(1+i_y) = (1+i_m)12 Where: i_y = \text{the annual rate of escalation} i_m = \text{monthly rate of escalation that results in an effective annual rate of iy.} For i_y = 0.06 and i_m = 0.004868 Months 1-12: $17/bbl Month 13: $17/bbl * (1+0.004868) = $17.08/bbl Month 14: $17/bbl * (1+0.004868)*(1.004868) = $17.17/bbl .... Month 24: $17/bbl * (1.004868)12 = $18.02/bbl
```

#### **Annual Cash Flows**

If annual cash flows are used, escalation should take place in a "stair step" fashion on an annual basis. Thus, if prices are assumed to increase 6% per year, the price is held constant at the escalated rate for the entire year, then increased 6% for the following year.

Example: If the oil price is assumed to be constant for the first year at \$17/bbl, then escalate at 6% per year for each of the following years the annual oil price would be:

```
First year: $17/bbl
Second year: $17/bbl*(1.06) = $18.02/bbl
Third year: $17/bbl*(1.06)*(1.06) = $19.10/bbl
```

Other time period sizes would be treated accordingly. The methodology presented here is consistent with SPEE Recommended Practice #5 – Discounting Cash Flows, which addresses discounting methods for monthly and annual cash flows.

## IN MEMORIUM



We regret to note the passing of:



CARY D. BROCK Houston, Texas March 26, 2014 HERBERT POYNER
Houston, Texas
July 26, 2013

PAUL R. CLEVENGER San Antonio, TX April 25, 2014

With fond farewell we mark t h e passing of Paul R. Clevenger on Friday, April 25, 2014. Born in 1924 and a 1946 graduate of Texas A&M University, he served both in the Army and the Air Force. He joined SPEE



in 1971 and opened Clevenger Engineering in the early '80s. Paul was a founding member of the Petroleum Club of San Antonio. He remained active in SPEE as a Central Texas Chapter officer until his death. He is preceded by his wife, Carol Clevenger. For many years, Paul was a well-known and well-respected petroleum evaluation engineer in the San Antonio, Texas, area. But, perhaps he would best like to be remembered for his many years of volunteer activities with the Roy Maas Youth Alternatives Centers in San Antonio. We will miss you, Paul.

JAMES G. PATTERSON Houston, TX March 6, 2014

It is with deep regret and sadness to inform SPEE members of the passing of a great man, friend, and engineer, Jim Patterson. Jim died on March 6 following a five and a half year battle with cancer. His



friends, associates and family not only grieve at the passing of a tremendous individual but also for the loss his family has suffered. Many of the people Jim came in contact with were inspired by the faith, courage and grace shown by Jim and Rebecca during this long, difficult period. Jim joined SPEE in1988 and was an active member for over 25 years. Jim was elected to the Board of Directors in 2008 and during his three-year term, served as Membership Chairman all three of those years. He and his wife, Rebecca, were very faithful attendees of the SPEE annual meeting.



#### Castilleja, Sylvia H. - Member No. 833

H. J. Gruy and Associates, Inc. Sr. Vice President 333 Clay Street, Suite3850 Houston, TX 77002 713-739-1000 office 713-739-6112 fax scastilleja@hjgruy.com Spouse – Don McIntosh

#### Davis, Jr., James Thomas - Member No. 834

DeGolyer and MacNaughton Vice President/Petroleum Engineer 5001 Spring Valley Rd, Suite 800 East Dallas, TX 75244 214-368-6391 office 214-369-4061 fax jdavis@demac.com Spouse – Lina Davis

#### Monson, Kenneth Nels - Member No. 835

Exxon/Mobil Corporation
Planning Advisor
16676 Northchase Drive
Houston, TX 77060
281-654-3771 office
281-654-3818 fax
kenneth.n.monson@exxonmobil.com
Spouse - Mary Monson

#### Quinn, Patrick - Member No. 832

Senergy GB Ltd Principal Reservoir Engineer Ternan House, North Deeside Road Banchory, AB31 5YR United Kingdom +44 (0) 1330 826663 phone +44 (0) 1330 825206 fax patrick.quinn@synergyworld.com

#### Simmins, Audrey Joan Merivale - Member No. 831

Scotia Bank Managing Director 2000, 700 2nd Street, SW Calgary, Alberta T2P 2W1 Canada (404) 218-6779 phone (403) 221-6767 fax joan.simmins@scotiabank.com Spouse – Geoffrey Simmins

#### Smith, Craig W. - Member No. 836

Triangle Petroleum Corporation Sr. Reservoir Engineer 1200, 17th Street, Suite 2600 Denver, CO 80121 303-260-6033 phone 303-260-5080 fax csmith@trianglepetroleum.com

#### Trimble, Stephen Carl - Member No. 837

Trimble Engineering Associates Ltd. Principal Engineer (Pres. & Owner) 2200, 801 – 6th Avenue SW Calgary, Alberta T2P 3W2 Canada 403-261-4720 phone 403-262-9697 fax steve@trimble-eng.com Spouse – Susan Trimble

#### Walker, Gregory James - Member No. 838

Talisman Energy Senior Reserves Evaluator 2000, 888 3rd Street, SW Calgary, Alberta T2P 5L5 Canada 403-615-0487 phone gxwalker@talisman-energy.com

#### Wilhelm, Jason Kevin - Member No. 839

IHS
Sr. Principal Engineer
2000, 540 – 5th Avenue SW
Calgary, Alberta T2P 0M2
Canada
403-213-4200 phone
403-213-4298 fax
jason.wilhelm@ihs.com

#### Woofter, Michael Bland - Member No. 840

Paramount Resources Ltd.
Manager of Reservoir Engineering
4700 Bankers Hill West
888 3rd Street SW
Calgary, Alberta T2P 5C5
Canada
403-290-6254 phone
403-266-7315 fax
Michael.woofter@paramountres.com
Spouse – Karen Woofter



The following member applicants have been processed by the Qualifications Committee. The by-laws require that names be presented to the membership for at least 30 days as a pre-membership requirement. Any member with an objection should address the objection to the Executive Committee (see by-laws regarding other important details) since the applications have already passed through the Qualifications Committee.

APPLICANT	SPONSOR	APPLICANT	<b>SPONSOR</b>

#### Clemans, Mark A.

John N. Davis President & CEO Tom Fuller Carrier Energy Partners 77 Sugar Creek Center Blvd., Suite 550 John Howie Sugar Land, TX 77478

#### Faz, Jorge Juan

Sr. Reserves Consultant–Geosciences Occidental Petroleum Corporation 5 Greenway Plaza, Suite 110 Houston, TX 77046

#### Harris, Joe Ray

Owner JRH Consulting LLC P. O. Box 27 Cherokee, TX 78832 Jennifer Fitzgerald John Ritter Rawdon Seager

> Dan Olds Guale Ramirez **Danny Wilson**

### Jenkins, Jr., Creties David

Partner Charles Boyer Rose and Associates, LLP John Ritter 4263 Yoakum Blvd., Suite 320 Harold Warner Houston, TX 77006

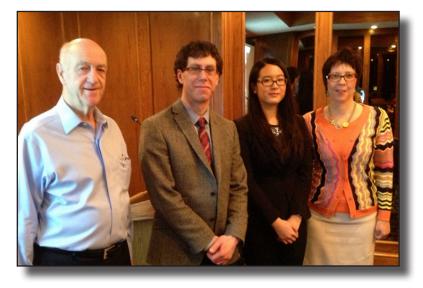
#### Kronkosky, Chad Ewert (Associate)

President **CEK Engineering LLC** 5139 69th Street Lubbock, TX 79424

Gary Gonzenbach Scott Hickman Marshall Watson

The new SPEE Membership Directory is available for purchase and payment on the website - www.spee.org. The cost is \$55.00 plus shipping.

# **Calgary Photos**



Left to right, David Tutt, Darren King, Yitong Yang, Katherine Crerar, Chair Calgary Chapter. Yitong Yang was the recipient of the Robert A. Odd Memorial Bursary.

See article in Chapter News on page 4.



David Elliot receiving Honourary Lifetime Membership plaque from Katherine Crerar.