The Sixteenth Annual Gulf of Mexico Deepwater Technical Symposium continues to focus on Gulf of Mexico case studies and key technologies in the following sessions:

- Drilling
- Well Completions
- Production Systems
- Reservoir / Economics
- HS&E / Regulatory
- Pipelines / Subsea Infrastructure
- Emerging Technologies
- Geoscience
James Watson, Director of the Bureau of Safety and Environmental Enforcement. He is responsible for promoting safety, protecting the environment and conserving resource through vigorous regulatory oversight and enforcement of operations on the U.S Outer Continental Shelf.

Martin W. Massey
CEO, Marine Well Containment Corporation

David Coatney
CEO, Helix Well Containment Group

Plenary Session
"Permitting A 5D View"
An Industry Expert Panel Discussion

Joe Leimkuhler, Moderator (LLOG)
Vice President - Drilling

Mike Celata (BOEM)
Deputy Regional Director - GOM

Mike Saucier (BSEE)
GOM Regional Field Operations Supervisor

Phillip B. Smith (Shell)
Regulatory Affairs Manager

Rick Fowler (LLOG)
Vice President - DW Projects

Kelly Fortin (EPA)
OCS Air Permits Coordinator

The closing event for this year’s symposium will be a panel discussion among industry leaders and experts, “Permitting A 5D View.” The overall theme is a permitting recap from five perspectives. BOEM, BSEE and the EPA will cover what industry can do to “help us help you” in the Deepwater permitting process. Shell and LLOG will cover the issue from the viewpoint of a Major and an Independent Operator. Don’t miss this final session. It promises to be one of the highlights of the symposium!

SESSION SCHEDULE

Emerging Technology
Angie Gobert (BSEE), Art Johnson (Hydrate Energy)

The technological limits of the oil and gas industry in deepwater Gulf of Mexico are not only being tested by operational challenges of the extreme water depths, but also those from hostile geologic environments, deep wells with extreme pressures, loop currents, and hurricanes. The Emerging Technologies session will feature presenters with knowledge and experience in a variety of areas. Their presentations will explore creative solutions and illustrate new methods to overcome some of the technological hurdles that will help lead the industry to a renewal in our enthusiasm and commitment to our responsibility and research as we continue to establish a safer, smarter, and stronger deepwater Gulf of Mexico for 2012 and beyond.

HSE / Regulatory
Carl Flores (Shell), Joe Ebert (Chevron), Steve St Amand (Century Exploration)

With new regulations for offshore Oil and Gas Exploration and Production in the Gulf of Mexico, operators and contractors must demonstrate compliance through specific standards for Safety and Environmental Management Systems (SEMS). The HSE session includes papers from: 1. Shell on the learnings and challenges associated with demonstrating how their management systems comply with the new mandatory SEMS rules; 2. Chevron will present an overview of the evolution of its oil spill response capabilities in the wake of Macondo; 3. Helmerich and Payne will deliver a presentation based on five case studies to demonstrate the financial impact of injuries and incidents that occur in our business; and 4. Chevron will also present a comprehensive study of upstream and gas worker incidents over a two year period and show that the vast majority of fatal and potentially fatal events occur in specific work activities and involve five primary mechanisms of injury. This presentation will highlight the results of Chevron’s Fatality Prevention Study and explain their work to improve their processes.

Production Systems
Allen Wiley (Multi-Chem), Casey Blake (Shell)

Gulf of Mexico deepwater discoveries bring new challenges in the area of realizing value through producing assets. Continuous improvement in all areas are required as we approach new horizons in the deepwater areas of the Gulf of Mexico. Beginning with the reservoir characterizations, a production system is built around the hydrocarbon resources in place. Deepwater production technologies are providing solutions to unique challenges in areas of environmental compliance, asset integrity, complex operations, and operational excellence. This is done through application of novel design concepts and hardware, materials selection, flow assurance strategy, chemical treatment, and operations philosophy. The purpose of the Production Systems session is to highlight newly developed practices and designs and present applications of technology. Many of the new developments are adopted worldwide following successful implementation in the Gulf of Mexico.
Drilling Technology
Gary Roebke (Chevron),
Sean O'Boyle (Expert E&P),
Rick Farmer (Century Exploration),
Ken Dupal (Shell)

The Drilling Technology Session is focused on technologies to meet the challenges of drilling in the Deepwater GOM. These include: a) managing the integration of People, Processes and Equipment of dual gradient drilling from the perspectives of the drilling contractor, the equipment manufacturer and the operator; b) optimizing hole-opener placement in bottom-hole assemblies to reduce BHA failures and improve drilling performance; c) a new method to compute axial load and torque transfer in BHAs used for extended-reach horizontal wells; d) build-to-suit packages of technologies encompassing directional drilling, formation evaluation and drilling fluids that can deliver optimized solutions in challenging Deepwater operations; and e) TLP top tension drilling and production riser system evolution.

Reservoir Engineering & Economics
Paul Morphy (Shell),
Didier Terroir (ENI)

The 2012 Reservoir Engineering and Economic session includes presentations on: 1) how the low North American gas prices have had a global impact on emerging energy technologies, even though LNG prices in the Far East have had record-high prices; 2) the "Who Dat" field was more attractive commercially by using the OPT-Ex Generic Floating Production System rather than a new design; and 3) the new generation of wireline formation testing tools can be used to quantitatively characterize reservoir fluids in real time, allowing improved decision making for Deepwater developments.

Geoscience
Bob Meltz (Chevron),
Richard Mongan (Chevron),
Matthew Wandstrat (Baker Hughes),
Daisy Pate (Pontchartrain Partners)

The 2012 Geoscience session includes presentations touching on a wide variety of the components of the deepwater value chain. From the exploration side of the business, there will be a presentation on the geology of deepwater offshore Mexico. At the play and prospect level, we include overviews on the ever-expanding Wilcox play, and development plans for Chevron's Bigfoot field in Walker Ridge. As we move to the reservoir level, we will also learn about new ways to exploit 4-D seismic and about various logging technologies to improve interpretations of induction and resistivity data.

Pipelines / Subsea Infrastructure
Angie Gobert (BSEE),
Allen Wiley (Multi-Chem)

As the oil and gas industry in the Gulf of Mexico progresses into extreme water depths, one challenge is how to design and safely operate the pipelines that carry hydrocarbons from subsea wells to processing facilities. To meet the critical and complex issues presented by this challenge, the industry has made significant advances in pushing pipeline technology past previous limits. Much work has been done on researching and designing specialized equipment including steel catenary and hybrid risers, jumpers, PLETs and sles, umbilicals, and other associated pipeline components. The 2012 Pipeline session will feature presenters with extensive knowledge and experience in the design, fabrication, and installation of deepwater pipelines. Their presentations will provide valuable insight into the general aspects of third party design, fabrication, and installation riser verification associated with various floating structures. They will also explore specific creative subsea pipeline infrastructure solutions from the perspectives of both the lease operator/producer and the transporter.

Well Completions & Interventions
William Franke (Hess),
Henrik Larsen (Schlumberger),
Alan Holley (Halliburton)

Deepwater Completion & Intervention work is continuing to evolve and receive greater focus across all phases of deepwater projects. Many deepwater projects are now forecasting the total well costs to be a far greater percentage of total project cost than previously experienced. Well integrity has become a significant concern as the production from every well is often considered critical to project success. New methods are also being developed to obtain additional downhole information via fiber optic and wireless technology. This session will present several solutions to the challenges noted above in the way of new technologies and recently developed operational techniques with a significant focus on improving well integrity.

Student Papers
Emmitt Lockard (ENI Petroleum),
Ashley W. Breaux (Chevron),
Elizabeth Mann (Shell),

The Deepwater Technical Symposium is committed to providing students the opportunities to enhance their university education. The symposium provides an excellent opportunity for students to learn more about the technical solutions that the oil and gas industry applies to problems encountered in the exploration and production of oil and gas in the Deepwater Gulf of Mexico. This session features oral and poster presentations from students, university professors and industry that are focused on topics of interest to students and delegates attending the symposium.

Concluding Plenary Session
Industry Expert Panel Discussion
Joe Leimkuhler (LLOG) - Moderator

The closing event for this year's symposium will be a panel discussion among industry leaders and experts, "Permitting A 5D View." The overall theme is a permitting recap from five perspectives. BOEM, BSEE and the EPA will cover what industry can do to "help us help you" in the Deepwater permitting process. Shell and LLOG will cover the issue from the viewpoint of a Major and an Independent Operator. Don't miss this final session. It promises to be one of the highlights of the symposium.
## 16th Annual Gulf of Mexico Deepwater Technical Symposium

**WEDNESDAY, AUGUST 15**

### 7:00 to 8:00 — Continental Breakfast (Exhibition Hall)

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<tr>
<th>Time</th>
<th>HS&amp;E</th>
<th>PRODUCTION SYSTEMS</th>
<th>EMERGING TECHNOLOGY</th>
<th>STUDENTS</th>
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</thead>
<tbody>
<tr>
<td>9:00</td>
<td>Learnings and Challenges: Demonstrating How Management Systems Comply with SEMS (Shell)</td>
<td>Solve Deepwater Flow-Assurance Problems Through Customized Chemical Applications (Multi-Chem, Halliburton)</td>
<td>Utilizing the Power of Case-Based Reasoning Technology for Enhanced Real-Time Risk Recognition and Hazard Mitigation (Baker Hughes)</td>
<td>Hydraulic Pulsed and Cavitating Jet in Offshore Drilling and Case Study from Bo Sea, China (U of La - Lafayette)</td>
</tr>
<tr>
<td>10:00</td>
<td>The Business Impact of Injuries and Incidents (Helmerich &amp; Payne)</td>
<td>Dynamic Fields Conditions vs Static Operating Philosophies &amp; Resulting Plugged Flowlines (Assured Flow Solutions, LLC)</td>
<td>LWD Sonic Cement Logging: Benefits Applicability, and Novel Issues for Deepwater Well Integrity (Schlumberger)</td>
<td>What Would Happen If Foams Were Injected Without Surfactant Preflush in EOR Processes? (LSU)</td>
</tr>
<tr>
<td>10:30</td>
<td>Fatality Prevention in Chevron Upstream Oil &amp; Gas (Chevron)</td>
<td>Corrosion Offshore — It's A Battle Out There (Charlie Speed, Materials/Corrosion Engineering Consultant)</td>
<td>Sub-Sea Tieback Integrity Management (BP)</td>
<td>Computation of Axial Load and Torque Distribution in Tubulars Used for Extended Reach Horizontal Wells Using a Holistic Design Philosophy (University of Oklahoma)</td>
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### 11:00 - 1:30 Lunch & Keynote Speaker: James A. Watson, Director - Bureau of Safety & Environmental Enforcement - Grand Ballroom

### 1:30 - 2:00 — Drilling – Continental Breakfast (Exhibition Hall)

<table>
<thead>
<tr>
<th>Time</th>
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<th>RESERVOIR ENGINEERING</th>
<th>PIPELINES</th>
<th>STUDENTS</th>
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<tbody>
<tr>
<td>1:30</td>
<td>Dual Gradient Drilling, Integrating People &amp; Equipment on the Pacific Santa Ana DP Drillship (Pacific Drilling)</td>
<td>Applications of In-situ Fluid Property Measurement with Advanced Sensors Technology, Examples from the Gulf of Mexico (Schlumberger)</td>
<td>Installation of Multi Segment Flexible Pipe Risers with an S-Lay Pipe Lay Vessel (LOG Exploration)</td>
<td>Inertial Flow Parameter Calculations of Proppant Packs Under Confining Stress (LSU)</td>
</tr>
<tr>
<td>2:00</td>
<td>Dual Gradient Drilling Integration/Interfaces Challenges of Mud Lift Pumping (GE Oil &amp; Gas)</td>
<td>The Impact of Market Forces on Emerging Technology (HEI, LLC)</td>
<td>Understanding the Requirements and Responsibilities for a Successful Riser CVA Plan and Implementation (Uniflorm Offshore)</td>
<td>Evaluation of the Effectiveness of the Chemical Dispersion of Macondo Blastoff in EOR Processes? (LSU)</td>
</tr>
<tr>
<td>2:30</td>
<td>DGD Concept Definition, Well Construction, Regulatory &amp; Rig Integration from an Operator's Perspective (Chevron)</td>
<td>The &quot;Who Dat&quot; Field Development Overview (LOG)</td>
<td>Export Pipeline Transporter Major Deepwater Pipeline Development System Review (Chevron Offshore)</td>
<td>Experimental Study of the Effect of Drilling Fluid Contamination on the Permeability of Cement-Formation Interface (LSU)</td>
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### 3:00 - 3:15 — Break

### 3:15 - 4:15 — Drilling – Continental Breakfast (Exhibition Hall)

<table>
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<tr>
<td>3:15</td>
<td>Extending Reamer Life and Improving Drilling Performance by Optimizing Neutral Points in Bottomhole Assemblies (Baker Hughes)</td>
<td>Wilcox Play Review (Baker Hughes)</td>
<td>Interfacing Sandface Monitoring with a Subsea Gravel Pack Completion (Schlumberger)</td>
<td>Oil Recovery Enhancement Through Surfactant-Stuff Induced Wettability Alteration (LSU)</td>
</tr>
<tr>
<td>4:15</td>
<td>Built-to-Suit Technologies for Wellbore Construction in Deep and Ultradeep Gulf of Mexico (Baker Hughes)</td>
<td>New Developments in Tri-axial Induction Applications (Schlumberger)</td>
<td>Well Integrity Failure During Production on Llano #3 (Hess)</td>
<td>Update of Stop Work Authority Program Implementation (Nichols State)</td>
</tr>
</tbody>
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### 4:45 - 6:30 — Reception (Exhibition Hall)

7:00 - 10:00
SPE Young Professionals Fundraising Social & Silent Auction
Hilton Riverside New Orleans
## THURSDAY, AUGUST 16

### 7:00 to 8:00 — Continental Breakfast (Exhibition Hall)

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<tr>
<td>Big Foot Geology &amp; Development Plan Overview (Chevron)</td>
<td>Flow Assurance Assumptions and Their Ripple Effect (Assured Flow Solutions, LLC)</td>
<td>Fiber Optic Monitoring - Reconnecting a Two Trip Completion With A Down Hole FO Wet Mate (Baker Hughes)</td>
<td>Vertical Intervention Capabilities In A Subsea Capping Stack: Real Need or Another Myth? (LSU)</td>
</tr>
<tr>
<td>Step Change in Reservoir Modeling (Baker Hughes)</td>
<td>Corrosion Monitoring For Offshore Facilities and Pipelines Deepwater GOM (BP Pipeline Co)</td>
<td>Advances In Integrated Cement Evaluation (Schlumberger)</td>
<td>Fluid Flow and Heat Transfer In the Top Hat Oil Recovery System (LSU)</td>
</tr>
<tr>
<td>Discovering Potentially Unswept Pay: Base 4D Seismic Analysis Using the Stratal Domain (Terra-Spark Geosciences)</td>
<td>Compact Electrostatic Treaters for Deepwater Floaters and Subsea Installations (Cameron)</td>
<td>Advanced Downhole Debris Removal System Saves Time and Reduces Risks (Baker Hughes)</td>
<td>Presentation by Paradigm</td>
</tr>
</tbody>
</table>

### 10:00 - 10:15 — Break

### 10:15 - 1:30 Lunch & Keynote Speakers:

Containment — Overview of Current Industry Capabilities - Grand Ballroom

Martin W. Massey, CEO - Marine Well Containment Corporation

David Coatney, CEO - Helix Well Containment Group

### PLENARY SESSION - GRAND BALLROOM

"Permitting A 5D View" — An Industry Expert Panel Discussion

- **Joe Leimkuhler**, Moderator (LLOG) • **Vice President - Drilling**
- **Mike Celata**, BOEM • **Deputy Regional Director - GOM**
- **Mike Saucier**, BSEE • **GOM Regional Field Operations Supervisor**
- **Phillip B. Smith** (Shell) • **Regulatory Affairs Manager**
- **Rick Fowler**, LLOG • **Vice President - DW Projects**
- **Kelly Fortin**, EPA • **OCS Air Permits Coordinator**

### 3:45 — Closing Remarks: Joe Leimkuhler, Symposium Chair — Grand Ballroom
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• Invitation to Evening Social on August 15
• Entry to exhibit halls

REGISTRATION OPEN
DAY 1: 6:30 am to 6:30 pm
DAY 2: 7:00 am to 1:30 pm

EXHIBITION HALL OPEN
DAY 1: 6:30 am to 6:30 pm
DAY 2: 7:00 am to 1:30 pm

ACCOMMODATIONS
Hilton Riverside Hotel New Orleans
2 Poydras Street
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Why Exhibit in 2012?
As a company interested in the latest challenges in the Gulf of Mexico, you can't afford to miss this event. Exhibiting will provide opportunities to make instrumental connections that hold the key to your success in this growing market.

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New Orleans, LA 70140
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Registration Code: DTS

Onsite Registration FEES
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Non-Members USD $350
Gala Tickets Purchased individually or added to registration. USD $60
STUDENT Registration Must register online. No free onsite student registration. FREE

MasterCard, VISA, and American Express accepted. Attendance at the Deepwater Symposium will be limited. Please register early.
Cancellations: 100% refund granted for requests received before August 3, 2012. No refunds after August 3rd.
For additional information, please contact Symposium Chair, Joe Leimkuhler, 985-801-4398, JML@dlog.com
16th Annual Gulf of Mexico
Deepwater Technical Symposium

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